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Aviation Safety Investigation Report 198801401

Piper PA25-235/A1

27 October 1988

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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.

Occurrence Number: 198801401 Occurrence Type: Accident

Location: 7 km W of Inverleigh VIC

Date: 27 October 1988 **Time:** 915

Highest Injury Level: Serious

Injuries:

	Fatal	Serious	Minor	None
Crew	0	1	0	0
Ground	0	0	0	-
Passenger	0	0	0	0
Total	0	1	0	0

Aircraft Details: Piper PA25-235/A1

Registration: VH-FAW
Serial Number: 25-3148
Operation Type: Aerial Work
Damage Level: Substantial

Departure Point: 14 km W of Inverleigh VIC

Departure Time: 0905

Destination: 14 km W of Inverleigh VIC

Approved for Release: March 7th 1989

Circumstances:

The company chief pilot, who holds an Agricultural 1 Rating, accompanied the pilot on the ferry flight. They surveyed the paddocks to be sprayed from the air before landing at a nearby agricultural strip where they discussed the order of work with the farmer and studied a local map. The pilot prepared a diagram of the paddocks and plotted wires and obstacles. The aircraft was then loaded with liquid chemicals and the pilot sprayed the first paddock while the chief pilot remained at the airstrip. Weather conditions were a light south westerly wind, with excellent visibility. After spraying the first paddock, the aircraft was reloaded. The pilot circled the second paddock before flying a spray run in a southerly direction between a highway and a railway line. During the run the pilot glanced at the boom pressure gauge and adjusted the setting. As he approached the railway line he commenced a pull-up during which the undercarriage struck a railways communications wire. The wire was about 4 metres above the ground and ran parallel to and just north of the railway line. Realizing that the aircraft had caught a wire, the pilot commenced a gentle, left turn starting at about 50 feet above the ground with the intention of landing as soon as possible in a safe area. During the turn, because of the drag of the wire, the aircraft vibrated and lost airspeed, despite the application of full power. After the turn the aircraft stalled from about 20 feet with wings level. The aircraft struck the ground in a slightly nose-low attitude and slid for 42 metres before coming to rest south of the railway line. Approximately 140 metres of wire was found trailing from part of the spray boom which had detached from the left wing and was located 5 metres behind the aircraft. The communication wires about 10 metres north of the railway tracks were the only significant obstruction near the crop. The steel poles supporting the wires were spaced reasonably close but the spray run was midspan such that the poles did not assist depth perception. The pilot could see the wires ahead at the end of the run. The wires were too low for the aircraft to fly beneath. It was the pilot's intention to fly over the wires. The pull-up was late and too shallow. The pilot had been given 17 hours flight

training under close supervision by his employer immediately before commencing operational flying. At the time of the accident he was flying in a suitable area for an Agricultural 2 rated pilot with low experience.

Significant Factors:

The following factors were considered relevant to the development of the accident

- 1. The pilot may have distracted himself by trying to adjust boom pressure during the spray run.
- 2. The pilot misjudged the distance from the wires for the pull-up.
- 3. The pull-up was too shallow.