No: 6/91 **Ref: EW/G91/03/13** **Category: 1c**

Aircraft Type and Registration:	Denny Kitfox, G-BRDA	
No & Type of Engines:	1 Rotax 532 piston engine	
Year of Manufacture:	1989	
Date & Time (UTC):	22 March 1991 at 1700 hrs	
Location:	Cleobury Mortimer (Milson) Airstrip, Shropshire	
Type of Flight:	Private	
Persons on Board:	Crew - 1	Passengers - 1
Injuries:	Crew - None	Passengers - None
Nature of Damage:	Severe damage to wings, fuselage and landing gear	
Commander's Licence:	Private Pilot's Licence	
Commander's Age:	52 years	
Commander's Flying Experience:	124 hours (of which 51 were on type)	
Information Source:	Aircraft Accident Report Form submitted by the pilot and telephone enquiries to the pilot and aircraft manufacturer.	

Milson has a single grass strip aligned 18/36 of 450 metres by 30 metres. The strip elevation is 500 ft amsl and the mean surface slope is 1.5° up on runway 36. The slope increases markedly towards the northern end of runway 36. The pilot reports that the surface was smooth and the grass short but wet. The weather at the time of the accident was scattered cloud at 3000 ft, good visibility, temperature 13°C and the wind 360° at 5 kt gusting to 10 kt.

The pilot/co-owner and his passenger made two attempts to take-off on runway 36 at near maximum weight. On each of these attempts the aircraft failed to attain the take-off speed of 40 mph by the half-way point and the take-off was abandoned. The third attempt to take-off was made on runway 18 which was down-slope and downwind, although at the time the pilot observed that the windsock was almost vertical. The take-off roll was commenced from the top of the north end of the strip but although the aircraft's tail rose almost immediately at the start of the run, the aircraft failed to accelerate above 30 mph. The take-off was abandoned slightly beyond the halfway point and the wheelbrakes were applied. The wheels, which were fitted with wide smooth tread tyres, locked and the aircraft skidded on the wet grass. It over ran the south end of the strip where the down-slope became much steeper and entered a tree-lined ditch at an estimated speed of 17 mph. Most of the impact was

absorbed when the wings struck the trees and the occupants, who were wearing full harnesses, were unhurt and able to leave the aircraft via the normal access doors.

The aircraft was fitted with a variable pitch propeller which enabled the pitch of individual blades to be adjusted on the ground only. The blades had been set to give 6000 rpm at full throttle on take-off. The pilot has since attributed the accident to the engine which achieved only 5000 rpm at full throttle. According to a graph supplied by the manufacturer, 5000 rpm equates to 67% power. The pilot stated that he did not notice the abnormally low rpm during his first two attempts to take-off and that he believes the loss of rpm was probably due to throttle cable stretch.