SNCAN Nord 1101 Noralpha, G-BSMD

AAIB Bulletin No: 10/2004	Ref: EW/G2004/07/16	Category: 1.3
Aircraft Type and Registration:	SNCAN Nord 1101 Noralpha, G-BSMD	
No & Type of Engines:	1 Renault 6Q10A piston engine	
Year of Manufacture:	1947	
Date & Time (UTC):	20 July 2004 at 0953 hrs	
Location:	North Weald, Essex	
Type of Flight:	Private	
Persons on Board:	Crew - 1	Passengers - None
Injuries:	Crew - None	Passengers - N/A
Nature of Damage:	Left landing gear collapsed	
Commander's Licence:	Private Pilot's Licence	
Commander's Age:	66 years	
Commander's Flying Experience:	501 hours (of which 1 was on type)	
	Last 90 days - 0 hours	
	Last 28 days - 0 hours	
Information Source:	Aircraft Accident Report Form submitted by the pilot	

The aircraft had been issued with a 'permit to fly' to enable the pilot / owner to ferry it from North Weald to Prestwick following maintenance to return it to a flying condition after several years in storage. Before departing en-route the pilot, who only had one hour experience on type, decided to carry out a series of touch and go circuits on Runway 02 at North Weald in order to familiarise himself with the aircraft.

On the first approach, the flare did not arrest the rate of descent as expected and the touchdown coincided with a prominent hump in the runway, resulting in a hard landing. On the second approach the aircraft was subject to a gusting crosswind of approximately 7 kt from the west, causing it to weathercock. In response the pilot applied into-wind aileron. This produced an unexpectedly strong sideslip to the left and the aircraft touched down heavily while still moving sideways across the runway. The aircraft however, continued into another circuit, during which ATC suggested that a landing further along the runway would avoid the hump. The third landing was gentler but during the rollout the left main landing gear collapsed, the aircraft veered to the left and came to rest on grass at the western edge of the runway. The pilot was able to exit the cockpit without injury.

The Nord 1101 Noralpha, built in France during the late 1940s but developed from a pre-war Messerschmitt design, is a low wing monoplane with a retractable tricycle undercarriage. Other operators of the type have commented that, although the aircraft has mainly benign handling characteristics, it is liable to descend quite rapidly if power is reduced prematurely on landing and the elevator has insufficient authority to produce an adequate flare in these circumstances. The ailerons, however, are sufficiently effective to produce a fast roll rate even at low airspeed. The pilot, whose recent experience was on a simple single engine type of more recent design, had made a considerable effort to learn about the Noralpha before the flight. Nevertheless, he considered that his lack of relevant experience might have caused his handling of the aircraft to be inappropriate in the prevailing conditions.

Flying historic or unusual aircraft can be an unexpected challenge. Operators of such aircraft are encouraged to seek advice from reputable sources with relevant experience and to familiarise themselves with any published material applicable to the type before getting airborne. General handling exercises carried out at a safe height are valuable in gaining an appreciation of the characteristics of a particular aircraft but, if possible, it is desirable during initial practice flights to be accompanied by a pilot who is already familiar with the type. Although a permit to fly usually restricts the maximum number of occupants to the minimum number necessary for safe operation, the CAA has stated that it will look favourably on an application for an additional pilot of suitable experience to be carried.