





(1) Unless otherwise stated, all times given in this report are in local time.

Accident to the JODEL D18 registered 89WP

on 25 August 2019

at La Selle-en-Hermoy microlight strip (Loiret)

Time	Approximately 15:30 ⁽¹⁾
Operator	Private
Type of flight	Cross-country
Persons on board	Pilot
Consequences and damage	Pilot fatally injured, aircraft destroyed

This is a courtesy translation by the BEA of the Final Report on the Safety Investigation published in March 2020. As accurate as the translation may be, the original text in French is the work of reference.

Loss of control on final, collision with the ground

1 - HISTORY OF THE FLIGHT

Note: The following information is mainly based on the statement made by the microlight strip manager.

The pilot took off from Pont-sur-Yonne aerodrome (Yonne) for the private microlight strip at La Selle-en-Hermoy, about 22 NM away. Upon arrival at his destination, the pilot flew over the runway to check out the strip and then proceeded directly to the final approach for runway 22. The strip manager, who was at that point close to threshold 22, indicated that the microlight was aligned on final with the runway. The microlight flew over the power lines about 400 m from the threshold. Then the witness saw the microlight, with a steep nose-up attitude, turn left perpendicular to the final, swing about its roll axis, and then stall with respect to its left wing.

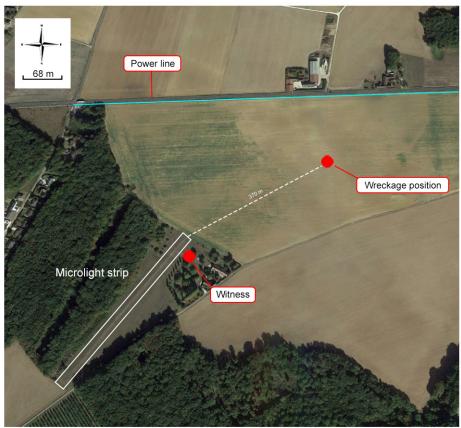
2 - ADDITIONAL INFORMATION

2.1 Accident site and wreckage information

The microlight was lying approximately 370 m upstream from the threshold of runway 22 in a harvested field.







Basemap source: Google Earth

BEA

Accident site

Examination of the site and the wreckage showed that the microlight struck the ground in a left-bank, nose-down attitude with a flight path heading of approximately 115°. No technical faults were found that could have contributed to the loss of control.

The propulsion system did not show any obvious evidence of engine torque transmission to the propeller when it hit the ground. This lack of obvious torque transmission can be explained by the fact that low power is required on final. Fuel was found throughout the fuel system and in the fuel tank. The carburettor examination did not reveal anything in particular. The battery was functional, as was the magneto, which was tested on a test bench.

2.2 Aircraft information

The D18 involved in the accident was equipped with an 80-hp Limbach L2000EO engine and a twin blade, fixed-pitch, wooden propeller. It was not equipped with wing flaps or a stall warning system.

This amateur-built aircraft was originally registered and operated as an aeroplane. Its manufacturer had declared a stall speed of 80 km/h at the maximum weight of 490 kg, a take-off distance of 400 m and a landing distance of 370 m. After purchasing this aircraft, the pilot involved in the accident registered it as a microlight with the administrative authorities. As indicated on the 89WP identification card, the pilot involved in the accident reported a stall speed of 65 km/h⁽²⁾ to the authorities and a maximum take-off weight of 450 kg.

(2) The regulations in force at the time of the accident required fixed wing microlights to have a stall speed of 65 km/h or less.



(3) The D185 and the D18V are not equipped with the same flaps. There are versions of the D18 that are fitted with flaps, known as the D185 (microlight) or D18V (aircraft)⁽³⁾. For these aircraft models, the declared landing distance is around 300-350 m. The stall speed of the D185s is about 60 km/h and that of the D18Vs is about 70 km/h.

2.3 Information about the microlight strip at La Selle-en-Hermoy

The private strip at La Selle-en-Hermoy (LF4525) has an unpaved runway 04-22, which is 350 m long and 20 m wide. Preference is to be given to runway 22 for landing due to obstacles near the 04 threshold. A windsock is present near the runway.

The strip manager indicated that he had been notified by the pilot of his arrival. He added that the pilot had flown to the strip before, once with the 89WP and twice with another Jodel D18.

2.4 Pilot Information

2.4.1 Aviation Experience

The pilot, who was 72 years old, held a microlight pilot licence issued in 1996 with a fixed wing microlight rating. He had never held an aircraft pilot licence.

It was not possible to establish precisely his experience. Nevertheless, according to the statements made, the pilot flew an FK9 regularly until he had an accident in 2006. After being seriously injured in that accident, he did not fly for a lengthy period.

In 2012, the pilot purchased a Jodel D18, which was fitted with wing flaps. The investigation was unable to determine whether the aircraft was a D185 or a D18V. In 2013 or 2014, following an engine failure on take-off, the pilot was involved in an accident. The aircraft was not returned to an airworthy condition subsequent to this.

In 2017, the pilot purchased the 89WP, which he seldom flew. When he did, it was, mainly to perform local flights to monitor the aircraft after technical maintenance or short cross-country flights.

2.4.2 Medical and pathological information

The various statements taken down during the investigation indicate that the pilot was suffering from impaired mobility as a result of his accident in 2006. He was also suffering from a chronic bronchopulmonary disease, which the autopsy results revealed was at a very advanced stage. He required oxygen on a daily basis and had recently been admitted to hospital several times.

It is likely that the pilot's medical condition was incompatible with obtaining a Class-2 medical certificate and that his driving licence was subject to review by the driving licence medical board⁽⁴⁾.

2.5 Meteorological Information

On the day of the occurrence, the situation was anticyclonic. The visibility and cloud conditions were CAVOK. At the time of the accident, the wind was 4 to 6 kt from the north and the temperature was 33°C.

The strip manager indicated that, at the time of the accident, the wind was light with a tailwind component for runway 22.

(4) Order of 21 December 2005 laying down the list of medical conditions that are incompatible with obtaining or retaining a driving licence or which may give rise to the issuance of driving licences with limited validity.



3 - CONCLUSIONS

The conclusions are established solely on the basis of the information that came to the knowledge of the BEA during the investigation. They are in no way intended to apportion blame or liability.

Scenario

The pilot undertook a flight to a strip that he had used once before with this aircraft. However, given the length of the runway and the wind and temperature conditions, the performance of the 89WP made landing difficult, even impossible. On final, the pilot lost control of his aircraft.

Contributing factors

The following factors may have contributed to the loss of control:

- ☐ The pilot's decision to take advantage of the flexibility of microlight regulations to continue flying despite serious chronic pathologies that may have affected his performance, particularly due to the significant heat.
- ☐ The choice of an airspeed on final that was close to the stall speed in order to shorten the landing distance as much as possible.
- ☐ Insufficient awareness on the part of the pilot, who held a microlight pilot licence only, of the consequences of operating an aircraft with a stall speed greater than that required to qualify as a microlight.