



Accident to the SCHLEICHER ASK21
registered **F-CHMF**
on Thursday 18 July 2024
at Orléans - Saint-Denis-de-l'Hôtel

Time	Around 13:10 ¹
Operator	Les Planeurs d'Orléans
Type of flight	Instruction
Persons on board	Instructor and student pilot
Consequences and damage	Instructor seriously injured, student pilot injured, glider slightly damaged
This is a courtesy translation by the BEA of the Final Report on the Safety Investigation. As accurate as the translation may be, the original text in French is the work of reference.	

Untimely separation of cable during winch take-off, hard landing, in instruction

1 HISTORY OF THE FLIGHT

Note: the following information is principally based on statements and a video from a security camera installed on the aerodrome.

The student pilot, accompanied by an instructor, carried out a winch take-off from grass runway 05² for his first flight of the year. During the rotation, when the glider was at a height of a few metres, the cable separated from the aircraft.

The instructor decided to wait a “pedagogical second” before taking the controls if required. The student pilot’s reflex action was to extend the airbrakes with a view to landing before pushing on the stick to correct the pitch attitude.

The instructor then immediately took the controls, and retracted the airbrakes while pitching down to gain speed.

The glider collided hard with the ground, with its wings level, ten seconds after the glider had been set in motion.

¹ Except where otherwise indicated, the times in this report are in local time.

² Dimensions 1,250 m x 70.

2 ADDITIONAL INFORMATION

2.1 Instructor experience and statements

The 49-year-old instructor held a sailplane pilot licence (SPL) along with an instructor rating. He had logged more than 700 flight hours including more than 300 hours on type. He had carried out around 12 flight hours on type in the month prior to the accident.

He indicated that it was the first flight of the season for the student pilot and that the purpose of the flight was to allow him to perform solo flights again. He had already been allowed to perform solo flights the previous year.

The walk-around inspection had been carried out without detecting any particularity and the cable hook and shear had been checked. After the accident, the hook and cable were found intact and the winch operator did not report any technical problem during the winch launch.

The instructor believed that he left too much time for the student to react given the very low height as the flight path could still have been managed when the cable separated from the glider. He had not anticipated the student pilot potentially extending the airbrakes. He took the controls but was unable to prevent the hard landing.

He also indicated that in hindsight, the content of the safety briefing concerning a cable break at low height “pitch attitude, airbrakes, land ahead” used by the student pilot before taking off was not the most appropriate. He considered that the pilot should first push the stick forward to correct the pitch attitude and speed and then see what needed to be done, in particular not necessarily extending the airbrakes or in any case, not doing it too quickly.

2.2 Student pilot’s experience and statement

The 16-year-old student pilot was in training to obtain an SPL. He had logged approximately 20 flight hours. The accident flight was a refresher flight for this season.

The student pilot indicated that all of the flight preparation and the beginning of the take-off had proceeded normally. Shortly after the start of the rotation, he heard a “click” and the instructor announce that the cable had broken. The student pilot thought he took too long to react because it was his first flight of the season. He unlocked the airbrakes before correcting the pitch attitude. The instructor then took the controls and carried out the landing.

2.3 Meteorological information

The instructor indicated that the weather conditions were clement and favourable for the flight. There was a light crosswind at the time of the take-off.

The 11:00 UTC aerodrome METAR indicated wind from 130° at 6 kt, varying between 080° and 160°, CAVOK, a temperature of 29°C, a dew point of 13°C and a QNH of 1019 hPa.

2.4 Untimely separation of cable during winch launch

The French glider federation, the FFVP, stated that there were no statistics for this type of incident.

A number of reports relating to the untimely separation of the winch cable were identified, with potential explanations for this. In some cases, pilots (particularly student pilots in instruction) unintentionally released the winch cable, as they hold the release control in their hand throughout the winch launch. The automatic release may also be activated following slackening of the cable. Finally, the cable may be incorrectly attached, or the winch system may malfunction.

3 CONCLUSIONS

The conclusions are solely based on the information which came to the knowledge of the BEA during the investigation.

Scenario

During the winch take-off, the cable separated from the glider at a low height for an undetermined reason. The instructor and the student pilot were slow to react and push the stick forward. Furthermore, the student pilot extended the airbrakes although the speed and pitch attitude for landing had not been acquired. The instructor, who took the controls late, was unable to manage the glider's flight path. The glider touched down hard on the ground.

Contributing factors

The following factors may have contributed to a hard landing after the separation of the winch cable at low height:

- No immediate pitching down to obtain the optimum approach speed. This can be explained by:
 - the instructor's decision to leave a "pedagogical second" to the student pilot for him to react to a "cable break" rather than directly taking the controls in this dynamic flight phase at a very low height,
 - the small total and recent experience of the student pilot who was carrying out his first flight of the season;
- the extension of the airbrakes by the student pilot which degraded lift and increased drag.

Safety lessons

Before take-off safety briefing

The French glider federation, the FFVP, proposes several before-flight briefings in the video series "[Briefings avant vol](#)" on its website. In video 28/46 about preparing for a winch launch, "[Préparation au vol treuil](#)", an example of a briefing in the event of a cable break at low height is proposed (view from 14 min 50 s onwards). The video, "[Le treuil - procédures normales](#)" covers normal winch procedures.

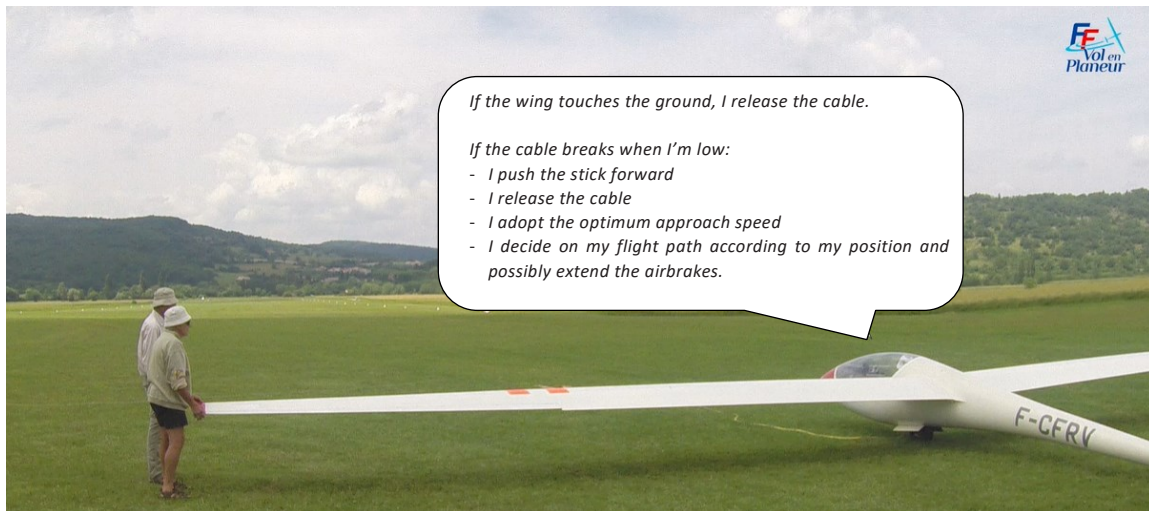


Figure 1: excerpt from preparation for winch launch briefing (Source: FFVP, translation BEA)

4 SAFETY MEASURES TAKEN BY OPERATOR

A safety bulletin has been issued in the *Les Planeurs d'Orléans* association setting out the following points:

- in instruction, in the event of a cable break at low height, the instructor immediately takes the controls;
- during the before take-off safety briefing, the pilot performs the actions on the stick while reciting the briefing, the aim being to ensure that the actions become reflex actions.

The BEA investigations are conducted with the sole objective of improving aviation safety and are not intended to apportion blame or liabilities.