

Landing on an Occupied Runway

Aircraft	Dyn'Aéro "MCR Sportster" registered HB-YKH
Date and time	30 December 2012 at 15 h 10 ⁽¹⁾
Operator	Private
Place	Carcassonne Salvaza Aerodrome (11)
Type of flight	General aviation
Persons on board	Captain
Consequences and damage	None

⁽¹⁾All times in this report are local.

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

1 - HISTORY OF FLIGHT

The pilot, owner of the MCR, was undertaking a flight between Saragossa (Spain) and Carcassonne (France).

At 14 h 58 min 06⁽²⁾, he told the controller that he was south of the aerodrome area. The controller asked him to call back when on the left-hand downwind leg for runway 28.

At 15 h 00 min 45, the pilot of a twin-jet public transport aeroplane announced that he was set for a landing on runway 28 with a circuit to the north.

At 15 h 01 min 53, the controller told the pilot of the MCR that he should expect to be number 2 behind the public transport aeroplane. The pilot read back the information given.

At 15 h 05 min 00, the pilot of the MCR announced that he was making a holding circuit to the south of the aerodrome.

At 15 h 07 min 04, the pilot of the public transport aeroplane was cleared to land on runway 28.

At 15 h 08 min 22, the controller told the pilot of the MCR that he could reach the final in second position behind the public transport aeroplane. He warned him about the wake turbulence generated by the public transport aeroplane. He also told him that the latter was going to taxi back up the runway after its landing.

At 15 h 09 min 54, the pilot of the MCR announced that he was established on final for runway 28. The controller asked him to call back on short final because the public transport aeroplane was taxiing back up the runway.

At 15 h 10 min 22, the pilot of the MCR announced that he was on short final. The controller asked him to go around and to call back when he was established on the downwind leg.

At 15 h 10 min 39, the controller repeated his request for a go-around. The pilot read back "Go-around H-KH" then continued the landing on runway 28.

⁽²⁾Communications between the controller and the pilots of the two aeroplanes were in English at all times.

2 - ADDITIONAL INFORMATION

The wind was from 300 at 13 kt.

The pilot of the MCR had been flying this aeroplane since 2002. He totalled 660 flying hours of which 534 on type. In the previous three months he had flown 19 hours of which 17 on type.

He stated that the controller asked him to go around late, when he was about 30 m from the runway threshold, at a height of 5 to 10 m, with a speed of 65 kt and the flaps extended to three quarters of their travel.

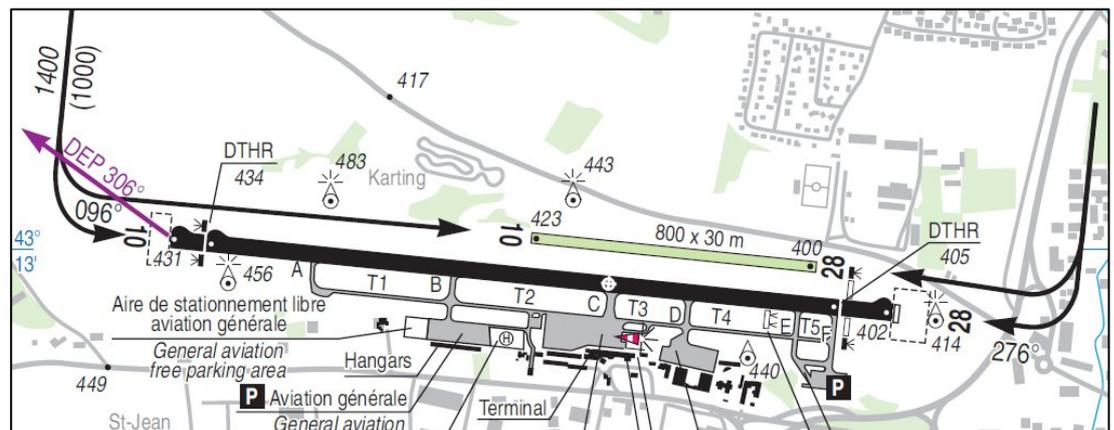
He explained that he would have needed a speed of 75 to 80 kt to be able to retract the flaps to 10° and start to gain height. At the same time, he saw the public transport aeroplane facing him at a height that he estimated to be over 10 m more than his due to the runway slope.

He stated that he then thought of:

- Either a go-around on the runway extended centreline, above the public transport aeroplane;
- Or a go-around with a right turn, above the grass runway;
- Or a landing facing the other aeroplane.

He mentioned that the wind was turbulent and he thus reckoned it to be risky to go around, not knowing whether he would be able to climb enough facing the other aeroplane. He reckoned it was safer to continue the landing.

He added that his aeroplane's landing distance at the maximum weight was 210 m. He reckoned that there were about 700 m between him and the public transport aeroplane.



Extract from the Carcassonne Salvaza aerodrome VAC chart

The threshold of runway 28 is at an altitude of 402 ft; the runway then slopes up to about 425 ft in the middle, then to 431 ft at the end. The public transport aeroplane was between taxiways B and C when the MCR landed, that's to say about 7 m above the threshold of runway 28.

The Dyn'Aéro company, designer of the aeroplane, stated that during go-around under the conditions reported by the pilot, a power-up would have made it possible for the aeroplane to climb even if the flaps were still completely extended. The electrical command to fully retract the flaps from the « fully extended » configuration to the clean configuration takes twelve seconds, during which the aeroplane would have had time to accelerate to its climb speed.

⁽³⁾The takeoff and passing 15 m distances relate to an MCR-01 equipped with a fixed-pitch propeller. HB-YKH is equipped with a high-performance variable-pitch propeller.

The MCR Sportster flight manual gives the following characteristics:

- Recommended approach speed: 130 km/h (70 kt);
- Go-around: speed of 130 km/h (70 kt), flaps retracted, then climb at 165 km/h (89 kt);
- Flat stall speed in clean configuration: 118 km/h (64 kt);
- Flat stall speed in configuration with the flaps fully extended (25°): 91 km/h (49 kt);
- Takeoff distance⁽³⁾: 155 m;
- Passing through 15 m distance: 230 m;
- Landing distance on paved runway under standard conditions: 270 m.

3 - CONCLUSION AND LESSONS LEARNED

At each stage of his aerodrome circuit, the pilot of the MCR was informed by the controller of the presence of the public transport aeroplane. On final, the MCR pilot saw that the runway was still occupied by the public transport aeroplane. He did not, however, anticipate that he was probably going to have to make a missed approach and did not prepare himself for this eventuality.

When he announced that he was on short final, the controller asked him to go around. At that moment, the absence of any anticipation and his lack of knowledge of his aeroplane's performance led him to believe that he did not have any choice and had to continue his landing despite the controller's request.

In contact with a controller, the pilot probably thought that he did not have freedom of action and let himself be led into a situation that he no longer controlled due to his worries about his aeroplane's ability to be able to go around on short final facing an obstacle.

The serious incident was due to the pilot's decision to continue his approach and to land on a runway that was occupied, despite the controller's request to perform a go-around. The pilot's failure to anticipate and his not knowing the performances of his aeroplane contributed to the serious incident.

Even when in contact with a controller, a captain must ensure his safety and can initiate a go-around.