

ACCIDENT

Aircraft Type and Registration:	P&M Aviation Quik GT450, G-CEZX	
No & Type of Engines:	1 Rotax 912 ULS piston engine	
Year of Manufacture:	2008 (Serial no: 8360)	
Date & Time (UTC):	2 June 2018 at 1330 hrs	
Location:	Abergavenny Airfield, Monmouthshire	
Type of Flight:	Private	
Persons on Board:	Crew - 1	Passengers - 1
Injuries:	Crew - None	Passengers - None
Nature of Damage:	Extensive damage to the wing, landing gear fairings and propeller	
Commander's Licence:	National Private Pilot's Licence	
Commander's Age:	59 years	
Commander's Flying Experience:	278 hours (of which 80 were on type) Last 90 days - 8 hours Last 28 days - 4 hours	
Information Source:	Aircraft Accident Report Form submitted by the pilot	

Synopsis

The aircraft was taking off from Abergavenny and had climbed to approximately 40 to 50 ft agl when it encountered significant turbulence. This caused the aircraft to weathercock, roll to the right and descend, all of which the pilot was unable to counteract. The aircraft landed heavily and as the mainwheels contacted the ground, the right wing tip struck some shrubs near the side of the runway and spun the aircraft through 180°. Although the aircraft remained upright, and there were no injuries to the pilot or passenger, substantial damage was caused to the wing, propeller, landing gear and fairings. The pilot considered the cause was likely to have been a low-speed wing stall, compounded by the variability of the wind and the effect of the tree line alongside the runway.

History of the flight

The pilot had flown his aircraft from Redlands with a passenger earlier in the day and observed that the wind and level of turbulence had increased as he crossed the River Severn into Wales. During his approach to Abergavenny, he also observed the wind sock was indicating the wind straight down Runway 15 and appeared to be at least 12 to 15 kt. The pilot was unhappy with his final approach, considered it to be unstable and decided to go around. His second attempt was uneventful and he landed. After a short stop the pilot and his passenger prepared for departure to fly to Kemble. During the preparations they held a discussion regarding the effects of the slight upslope of the

runway, the variable wind conditions and the parallel tree line separating the airfield from the A40 (dual carriageway).

The pilot lined up the aircraft on Runway 15 and applied full power and held the control bar back to allow the aircraft to build up speed on the upslope. Rotation appeared normal but as the aircraft achieved 40 to 50 ft agl it encountered significant turbulence, causing it to weathercock, roll to the right and descend. The pilot was unable to counteract this and, mindful of the proximity of the road on the right, tried to steer to the left but found he had limited control authority. The aircraft continued to descend and was now about 10 to 15 m from the right edge of the runway, so the pilot reduced the power and landed heavily. On landing, the right wing tip contacted shrubs at about the same time the mainwheels touched the ground and the aircraft immediately spun around through 180° but remained upright. The ground impact caused damage to the wing and airframe structure, propeller, mainwheel and cockpit fibreglass fairings. The pilot and passenger were uninjured.

Discussion

In the pilot's own analysis of the event, he considers that several factors conspired to cause the accident. He believes that the wing stalled, resulting in the loss of control authority, compounded by the turbulence created by the wind striking the trees. He considers that the stall was due to the slightly low airspeed on takeoff, because of the upslope of the runway.