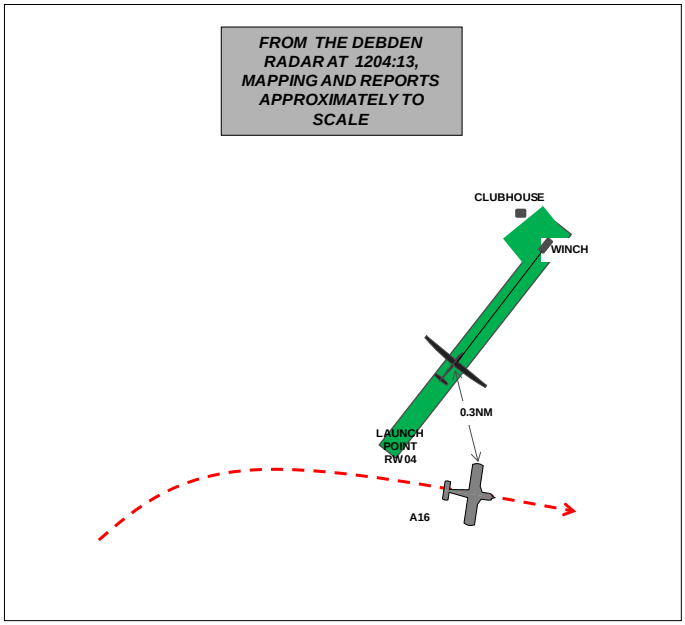
AIRPROX REPORT No 2011008

Date/Time: 29 Jan 2011 1204Z (Saturday)

Position: 5211N 00007W (Gransden Lodge - elev 254ft)

Airspace:	Lon FIR	(*Class: G*)
	Reporting Ac	*Reported Ac*
Type:	ASK21 Glider	PA28RT
Operator:	Civ Trg	Civ Pte
Alt/FL:	800ft (QFE)	1600ft (QNH)
Weather:	VMC CLBC	VMC CLBC
Visibility:	>15km	>7km
Reported Separation:	0ft V/250m H	500ft V/500m H
Recorded Separation:	Est 550ft V/0.3nm H	



PART A: SUMMARY OF INFORMATION REPORTED TO UKAB

THE SCHLEICHER ASK21 PILOT (K21) (the Deputy CFI) reports flying as HP on a training flight heading 040° at 70kt on a winch launch and in communication with Gransden Lodge Radio; FLARM was fitted and serviceable. He was informed after the flight by the Duty Instructor that he had been involved in Airprox but he did not see the other ac as it passed behind his glider; the other ac's engine was not heard due to increased noise during the winch launch. Although he did not see the ac, from other information he assessed the risk as being Medium.

THE WINCH DRIVER reported that he was conducting a winch-launch of a K21 glider on RW04 at Gransden Lodge. While the glider was in the main part of the climb passing about 800ft, he caught sight of a single-engine 'T' tail light ac crossing the RW in a SE'ly direction. From his line of view the ac appeared to be relatively close to the height of the glider, but it had passed over the glider before he had an opportunity to discontinue the launch. He continued with the launch but was sufficiently concerned to raise the issue with the launch marshal and discuss the incident; the launch marshal confirmed that he had also seen the light ac but thought that that its flightpath was taking it behind the launching glider.

THE ONCOMING DUTY INSTRUCTOR reported that he was about to start duty and at 1204 was watching a winch launch in progress on RW04, when a light single-engined ac overflew the RW, passing behind the launching glider from his point of view. It was below cloudbase, which he estimated to be about 1500ft, and was on SE'ly track. He called the winch driver and launch marshal on the ground radio and all agreed that the separation had been uncomfortably close. He guessed that the ac might have been talking to Cambridge TWR so he telephoned them within 15min, but they could not help identify it.

THE PA28T PILOT reports flying a white ac with a multi-coloured stripe on a VFR private flight, with a passenger, inbound to Cambridge. He was heading 095° at 130kt and 1600ft (QNH) in receipt of a BS from Cambridge APP, squawking with Modes C and S (elementary) but TCAS was not fitted.

The incident occurred on a cruise leg from DTY to a point SW of Cambridge where he had planned to pass to the S of Gransden. The conditions were generally overcast at about 1800ft with the reported visibility being 7000m and sub-zero temperatures and they were flying below the cloudbase. In a few local areas along that leg, the lower cloudbase forced them to descend briefly to about 1400ft in places; although he had an IMC rating he did not climb through the cloud due to the risk of icing.

He was aware of the gliding sites in the vicinity and was concentrating on lookout but in spite of this, the first sighting of the reporting (low-wing) white glider was in 10 o'clock position at about 500m range but below their level. The glider was in sight for about 5sec before passing out of sight below their port wing and it appeared to be flying straight and level after it was sighted.

He assessed that the glider would pass below and behind them and, since there was no further or developing risk, he assessed the risk of collision as being low.

ATSI reports that the Airprox occurred at 1204:06, in Class G airspace in the close vicinity of Gransden Lodge Gliding Site, situated 10nm SW of Cambridge Airport.

The PA28, was operating on a VFR flight from Bristol to Cambridge Airport and was in receipt of a BS from Cambridge APR. The glider was being winch launched from RW04 at Gransden Lodge Gliding site.

Cambridge APP was providing an Approach Procedural Control Service, without the aid of surveillance radar.

Gransden Lodge is shown on the Aeronautical Information Charts and is notified in the UK AIP as a Glider Launching Site, active from sunrise to sunset, with a vertical limit of 3000ft agl (altitude 3250ft). Cambridge MATS Part 2, Section 1, Page 29, paragraph 10.4 Gliding sites, states:

> 'Gliding takes place at Gransden Lodge 10nm SW of Cambridge. Gransden shall be considered always active although details are usually faxed to ATC when gliding events are scheduled.'

The ATSU indicated that Gransden Lodge normally notify Cambridge regarding any unusual activity or event. No additional gliding activity information was promulgated by AIS NOTAM.

The Cambridge METAR was:

> EGSC 291150Z 02007KT 7000 OVC016 01/M03 Q1023=

At 1201:00, the PA28 called Cambridge APP reporting inbound from Bristol VFR, estimating at 1209, requesting joining instructions and information about parachuting in the area. APP advised the PA28, that the only known parachuting was at Chatteris, N of Cambridge, asked the pilot to report at a range of 5nm from Cambridge, and passed the QNH of 1023 and the RW as 05; this was acknowledged correctly. No information was passed regarding possible gliding activity at Gransden Lodge.

At 1201:00, the radar recording showed the PA28, 6.2nm to the SW of Gransden Lodge, squawking 7000, with Mode C showing an alt of 1700ft. Also shown was a possible glider contact, manoeuvring in the PA28's half past ten position at a range of 1.7nm.

At 1202:05, APP asked the PA28 pilot to confirm that a BS was required, together with a request for the aircraft alt; the pilot requested a TS and reported at an alt of 1600ft. APP agreed to provide either a BS or PS because the radar was not available so a BS was agreed at 1202:20. (It was noted that the UK AIP page AD-2EGSC-1-5 (16 Dec 10) promulgates the Radar hours of operation

as (winter) 0900 – 1800 and then by arrangement). The ATSU has indicated that radar services are provided to planned traffic on a tactical basis within the promulgated hours.

At 1204:02, the radar recording showed the PA28 tracking E, close to the S boundary of Gransden Lodge airfield. At 1204:13, the recording showed a primary contact appear 0.1nm NE of Gransden Lodge, consistent with a departure from RW04; at that point the PA28 was 0.4nm to the SE of Gransden Lodge with the 2 ac 0.3nm apart and diverging.

At 1207:00, the PA28 pilot reported 5nm from Cambridge airport and requested a straight in approach for RW05, which was approved and the ac was transferred to TWR.

The PA28 was in receipt of a BS from Cambridge APP; the Manual of Air Traffic Services, Part 1, Section 1, Chapter 11, Page 4, paragraph 3.1.1, states:

> 'A Basic Service is an ATS provided for the purpose of giving advice and information useful for the safe and efficient conduct of flights. This may include weather information, changes of serviceability of facilities, conditions at aerodromes, general airspace activity information, and any other information likely to affect safety. The avoidance of other traffic is solely the pilot's responsibility.'

CAA ATSI recommends that Cambridge ATSU review the Cambridge UK AIP entry, regarding the promulgated arrangements for the provision of radar services.

UKAB Note (1): The London QNH (and Cambridge) was 1023mb and the PA28 was indicating level at A016 at the CPA; that being the case it was at about 1350ft agl. If the glider was at 800ft, as reported, the vertical separation would have been 550ft. From the viewpoints of both the winch driver and the Duty Instructor (both about 1nm to the N of the PA28) this would have appeared substantially less.

PART B: SUMMARY OF THE BOARD'S DISCUSSIONS

Information available included reports from the pilots of both ac, radar recordings, reports from the winch driver and the Duty Instructor.

It was explained that, although this incident was not strictly in accordance with normal reporting procedures in that the glider pilot did not witness it, since there was sufficient other reliable information, somewhat unusually including a good radar recording, and apparently lessons to be identified, it was decided to allow the incident to be investigated as an Airprox. In these circumstances it was reiterated that the key is 'sufficient reliable information' and gliding clubs should submit as much as possible allowing the UKAB Secretariat to view it and select the most relevant for consideration by the Board.

The Board was informed that Gransden Lodge is a busy glider site in a congested area and, being predominantly grass, is difficult to acquire visually; further it is very close to Little Gransden, Bourne and numerous other light ac strips, further restricting routeing options.

It was also pointed out that gliding supervisory staff have restricted options and little time to react when spotting an unknown ac approaching their site at a relatively low height and while in the initial stages of a winch launch sequence; further, just after getting airborne gliders climb very quickly and, as evident in this incident, their pilots have a restricted field of view allowing them to react only to ac ahead of them and above the nose. Winch drivers too have a restricted field of view (albeit in the opposite direction) but have to concentrate largely on the launching glider to achieve a safe launch and maintain speed control.

Based mainly on the radar recording, it seemed to Members that the PA28 pilot, although reportedly aware of local airfields, attempted unwisely to 'thread the needle' between Little Gransden and

Gransden Lodge, bringing him into close proximity to both. In this case, the lowered cloudbase had restricted both the maximum glider launch height and, due to potential icing, the height that the PA28 could fly, resulting in the latter being at about the maximum winch launch height as he passed very close to the Southern boundary of the airfield; that, Members agreed unanimously, was too close for comfort. Although the precise geometry of the incident differed when viewed from different points and regrettably there was no report from the Launch Marshal who was by a significant margin closest to the PA28's track, it was accepted by Members that the PA28 had tracked along, or just outside, the airfield boundary at about 1600ft amsl as the glider was at about 800ft agl (1050ft amsl) resulting in about 550ft vertical and 0.3nm (500m) horizontal separation (as reported by the PA28 pilot and confirmed by the radar recording). Although Members agreed that the track selected by the PA28 pilot had been unwise, it was unanimously accepted that there had been no risk of collision as the PA28 pilot had seen the glider throughout.

The Board noted the ATSI comment regarding the provision of radar services by Cambridge, but did not consider it to have played a significant part in the incident.

PART C: ASSESSMENT OF CAUSE AND RISK

Cause: The PA28 flew close enough to a notified and active Glider Launch Site to cause concern.

Degree of Risk: C.