AIRPROX REPORT No 2010105



PART A: SUMMARY OF INFORMATION REPORTED TO UKAB

THE BAe HARRIER GR9 PILOT reports he was on the final leg of a low-level training flight from Wittering. He was not in receipt of an ATS; a squawk of A7001 was selected with Mode C. Neither TCAS nor Mode S is fitted.

In the vicinity of Daventry at 340ft agl, flying a NE'ly course at 420kt a small high wing Cessna-type white coloured light ac (LA) was spotted in his 12o'clock about $\frac{1}{2}$ nm away crossing from L – R, slightly low, flying straight and level. To avoid the LA, he pulled 5G and climbed to the L as the LA passed about $\frac{1}{4}$ nm away to starboard with a 'high' Risk of collision. He opined that his Harrier would have collided with the LA 2-3sec later if he had not taken avoiding action, adding that with the Sun behind him coupled with a low workload he had the best chance of spotting the LA, but 'it was still a late spot'.

LATCC (Mil) RADAR ANALYSIS CELL reports that the absence of radar data on the reported LA has inhibited tracing action. Despite checking the movements logs of numerous aviation facilities in the vicinity of the Airprox location and following several leads, all enquiries proved fruitless. Consequently, the identity of the reported white high-wing monoplane remains unknown.

UKAB Note (1): The LATCC (Mil) Radar recording shows the Harrier approaching the reported Airprox location at the time given, but no other radar contacts are evident in the vicinity. Just after 1031:14, when the Harrier indicated an altitude of 800ft unverified Mode C (1016mb), a climb to 900ft ALT and L turn are evident. As the Harrier passes abeam DAVENTRY VOR at 1031:43, a single solitary primary contact is shown directly astern of the Harrier, which might be the reported LA. Thereafter on the next return the Harrier displays 1200ft ALT Mode C, indicative of an avoiding action climb. No further radar returns are evident in the vicinity that might be associated with the reported LA.

HQ AIR (OPS) comments that this was a timely visual pick up by the Harrier pilot who took effective avoiding action. The use of a CWS may have reduced the risk by increasing the situational awareness of both pilots. Sadly the Harrier is not equipped and the LA was not squawking.

PART B: SUMMARY OF THE BOARD'S DISCUSSIONS

Information available included a report from the Harrier pilot, radar video recordings and comment from the appropriate operating authority.

It was unusual to encounter a civilian powered ac in this height range – below 500ft and therefore potentially operating contrary to the Rules of the Air, a GA Member pointed-out - unless it was landing or taking-off, but no other ac had been identified in this locality during the search for the reported ac. Members understood that the paucity of radar data on the reported LA had not helped here and there were no further clues to its identity. Without the LA pilot's report, the Board could only assess this Airprox on the basis of the Harrier pilot's account coupled with the radar data on his ac. Therefore, it was most unfortunate that the reported pilot's perspective on this encounter in Class G airspace was not available.

Sighting the LA at a range of ½nm crossing ahead, the Harrier pilot suggested frankly that he had seen it at a late stage. The Board accepted that a white LA with a small frontal cross-sectional area is difficult to spot at the same height, but without knowledge of the actual size or type of the reported ac pilot Members recognised that the Harrier pilot might well have seen it as soon as was practically feasible, which argued somewhat against a late sighting on his part. It was suggested that the Harrier pilot's robust 5G avoiding action climb, coupled with the L turn, enabled him to avoid the LA as best he could and was effective in preserving horizontal separation of about ¼nm clear astern. With these few facts, the Board could only conclude that this Airprox had been the result of a conflict in Class G airspace resolved by the Harrier pilot. Furthermore, with sufficient time to engineer vertical and horizontal separation, Members agreed unanimously that, on the evidence available, there was no actual Risk of a collision.

PART C: ASSESSMENT OF CAUSE AND RISK

Cause:

Conflict in Class G airspace resolved by the Harrier pilot.

Degree of Risk:

C.