AIRPROX REPORT No 2010113

Date/Time: 17 Aug 2010 1225Z

Position: 5403N 00115W

(Linton-on-Ouse - elev

53ft)

Airspace: Linton ATZ (Class: G)

Reporting Ac Reported Ac

Type: Tucano GA-8

Operator: HQ AIR (Trg) Civ Club

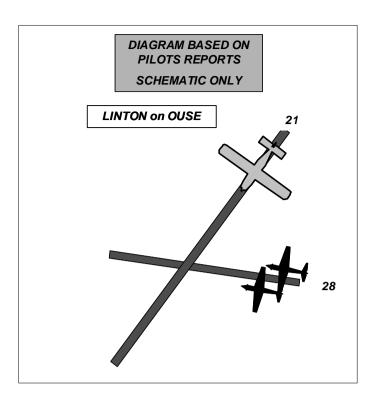
Alt/FL:OftOftWeather:VMCVMCVisibility:NK15km

Reported Separation:

NR 50ft V/100m H

Recorded Separation:

NR



PART A: SUMMARY OF INFORMATION REPORTED TO UKAB

THE TUCANO PILOT reports that he was leading a pair of Tucanos on [a pairs] take-off from RW28 at Linton on Ouse, in receipt of an aerodrome control service from them. During the take off roll at about 20kt, a civilian registered GA-8 ac landed on RW21, the intersecting RW. He assessed the risk as being low. The incident was subject to a Unit Inquiry (UI) and a video from a hand-held camera was provided.

THE GA-8 PILOT reports that several weeks before the incident a military Parachute Display Team, with whom they had worked previously, contacted his operator to determine the availability of an ac for a show at Whitby. The Team requested a pick-up at RAF Linton-on-Ouse and sent full details of the task.

On the morning of the flight the pilot called Linton Ops to confirm his details, determine the airfield details and RW in use and was given a PPR number.

He departed Peterlee airfield at 1200 and flew a direct track towards Linton during which he was cleared through the Teesside CTR, they handed him to RAF Leeming Radar who directed him through the Topcliffe overhead and en-route he passed them his Linton PPR number. At a range of about 5nm he could see ac manoeuvring close to Linton-on-Ouse and, as he had not yet been handed over to Linton APP, he prompted Leeming Radar for a handover. At the time his alt was 2500ft on the Barnsley RPS and he was becoming concerned about his proximity to the airfield, which he knew to be busy. Following a change of squawk and on handover to Linton APP he requested an immediate descent as he had about 4nm to run to the airfield.

He was instructed to call TWR on 129.350; he called 2 or 3 times but got no response so he returned to Linton APP, informed them he could not contact TWR and asked APP to confirm the frequency. They confirmed that he was using the correct frequency and was told to try again, which he did, again with no response. By that time he was at cct alt and again he switched back to APP, stating that he could not raise TWR and asking if they wanted him to stay on their frequency, but they replied 'Wait'. At that time he was on very short finals to a clear runway, which he believed to be the duty RW, (but with hindsight knows to be RW21) and made a safe landing.

Although he was aware that there was a problem, there had been no communication whatsoever from TWR and, in addition, Linton APP did not provided any information other than an instruction to wait

As he was braking through 20kt to taxi speed, he saw 2 Tucano ac passing from left to right at about 50ft after take off so he stopped his ac immediately about 100m short of the RW intersection. From that position he called TWR and requested taxi instructions but their response was, 'You have landed on the wrong runway', which he considered to be stating the obvious and not at all helpful. He then asked for taxi and parking details twice but again received no answer so he checked the RW to his left and right proceeded to taxi towards a marshaller in the dispersal.

The pilot secured the ac and went to Operations and was taken to SATCO's office and interviewed with another officer present. He was asked why he landed on the wrong RW; he responded by saying that he landed on a safe RW and asked why TWR did not respond to any of his calls, but he did not receive a suitable reply. He also stated that in his opinion, the chain of events had been as a result of a late handover from Leeming.

Prior to departing Linton airfield the pilot asked Operations to confirm if he needed to call TWR for start-up but he was told to call on GND and was given 129.350 as the frequency. He was aware that this is the TWR frequency and observed that if it is also used as a GND frequency he would expect that there should be 2 different controllers listening out but again he had to request start-up 3 times from getting a response form GND. In his opinion the VHF frequencies was not being monitored adequately.

On landing back at base he checked his radios and found them fully serviceable and also that he had called on the published frequency.

With hindsight, he thought that the VHF frequency at Linton TWR is not routinely monitored as they work primarily on UHF; he considered this inappropriate particularly since he gave over two weeks notice of the exact time of his arrival. Furthermore, Leeming had apparently not alerted Linton that he was inbound. Again with hindsight, he considers that the action he took, although non standard, was the safest course given the circumstances at the time, most of which were totally outside of his control. It was not possible to talk to Linton TWR or other ac and consequently he had no SA and thought that, had he attempted to join the circuit for RW28 without communication with TWR, this would have exacerbated the situation. He was under a high workload at the time and considered it important to get the ac on the ground quickly and clear of other traffic that was probably unaware of his presence. He was fully aware that he must stop before the RW intersection but could not understand why ATC cleared a pair of ac to depart knowing he was landing on another RW.

Finally he wished to inform the Airprox Board that this is the first time he has been involved in such a situation and hopes it will be his last, as it was, and continues to be, a very stressful experience. He has been involved in parachuting for over 30 years in the military, including the last 10 as a pilot and has always been fully committed to Flight Safety; he was recently commended for his actions during a RW incursion [by another ac] at Durham Tees Valley.

HQ AIR BM SM reports that the pilot of the GA-8 received the airfield details from Linton Ops during his planning procedure. The Linton Sup logbook recorded the RW in use at the start of the day as being RW21RH and it changed to RW28RH at 1200Z. The RW change was recorded in the Stn Ops logbook at 1207Z and in the ATC Switchboard logbook at 1158Z. It appears therefore, that although the RW change took place after the GA-8 was airborne, he was aware of it since while speaking to Linton App he gave a correct readback of RW28RH a number of times.

As the GA-8 required a MATZ crossing of RAF Topcliffe, the handover from RAF Leeming Zone was initiated when it was clear of the RAF Topcliffe visual cct, as is standard practice. [The radar recording shows the GA-8 was transiting at 2500ft]. The handover between RAF Leeming Zone and

Linton APP was standard but the pilot, being perhaps unfamiliar with local airspace, had expected an earlier handover.

The Linton APP call to Linton GND did not include a range or ETA for the GA-8. It is not standard practice to pass a range on visual recoveries but in this particular case the lack of information regarding the range or ETA hindered the ADC's planning. Further Linton APP did not communicate that the ac was switching to TWR imminently.

The Linton ADC acknowledged the pre-note of the GA-8 passed by GND but the ac was closer to Linton than he anticipated. This delayed the ADC's decision to select VHF 129.350. Pre-note details are passed face to face between GND and the ADC as they are seated next to one another. The [new] Linton Tower has no 'Live-mike' facility in the VCR, therefore the conversation regarding the pre-note between GND and the ADC was not recorded.

When the GA-8 pilot called on VHF, his transmission was heard by GND who assumed that the ADC, having acknowledged the pre-note, had selected VHF 129.350 and was listening in. After the first few sec of the GA-8's transmission GND deselected the VHF 129.350 and continued talking to other traffic on UHF. As a result he was not listening out for a response from the ADC to the GA-8's call. Further there was no positive handover of VHF 129.350 between Linton GND and ADC.

After the GA-8 pilot had tried to establish 2-way comms with TWR three times on VHF 129.350, he reverted back to APP on 123.3 informing them that there was no reply. Linton APP instructed the pilot to 'Standby' and via landline asked GND to confirm that the Linton ADC was listening in; GND replied 'To what' and APP replied 'C/S'. Linton GND then informed APP the ADC had spoken to the GA-8 when in fact he had not.

Overhearing Linton APP's conversation, the Sup instructed APP to try frequency VHF 122.1, as he assumed that there had been a technical fault with VHF 129.350. However the ATC Engineering watch-log, recorded that there were no frequency unserviceabilities outstanding or reported.

The process of switching frequency from VHF 129.350 to VHF 122.1 meant manually dialling a new frequency into the standby box located in the VCR. This process added further delay in establishing 2-way comms between the GA-8 and the ADC. It also meant both controllers in the VCR were temporarily heads down focused on adjusting the standby radios and this could have affected the lookout for both controllers.

The ac details were not on the Linton Flt Log but had been annotated on the ATC Electronic Tote. The lack of an airborne time and ETA at Linton could have hindered planning processes for the Controlling staff.

The Linton Runway Controller does not routinely use the Station Visitors Programme as a guide to daily movements. Additionally, and though technically able to, the Runway Controller does not select a VHF frequency at any time, listening only to the Linton Tower UHF frequency.

The UI was not able to determine if the GA-8 had been visible on Hi-Brite radar during the final stage of its approach. Linton APP could have identified it to the ADC on the Hi-Brite as the GA-8 had been given a Linton squawk and this would have helped the ADC pinpoint the ac's position visually.

The Inquiry also noted that when RW28RH is in use the threshold of RW21 is behind and to the right to where the Linton ADC is seated and is therefore out of his peripheral vision. Further to that there is a stanchion obstructing a portion of the Linton ADCs view of the approach lane to RW21.

HQ AIR (Trg) comments that the GA-8 pilot appears to have allowed himself to proceed with a preplanned course of action without altering his plan in light of external situational indicators, leading to a dangerous outcome. It is not clear exactly what contributed to the 'high workload' that the pilot describes, on what appears to be a straightforward transit flight. This incident would have been

identical had the lack of comms with the Linton ADC been the result of a RT failure, which the Supervisor suspected had happened at the time. The UI acknowledges issues with the operation of the VHF frequencies at Linton and appropriate changes will be mandated once the UI is released. However, while the outcome *may* have been different had the GA-8 pilot received an immediate reply to his first radio call to Linton ADC, his actions suggest that this is by no means certain. Furthermore, it is not reasonable for Linton ATC to have predicted the outcome of the failure to establish 2-way comms in this instance, as all the indicators were that the GA-8 pilot understood the RW in use and could therefore have been expected to integrate safely with the extant traffic pattern. It is also unreasonable to expect them to have held the formation taking off, as they would have expected an ac that could not talk to tower would join the visual circuit, or the overhead at the very least, and not proceed to land, deliberately as he implied, on the non-duty RW.

PART B: SUMMARY OF THE BOARD'S DISCUSSIONS

Information available included reports from the pilots of both ac, transcripts of the relevant RT frequencies, radar photographs/video recordings, reports from the air traffic controllers involved and reports from the appropriate ATC and operating authorities.

The GA Member reminded pilots of 'Safety Sense Leaflet 26 - Visiting Military Aerodromes', which provides a useful guide to procedures used at military airfields for pilots not familiar with them.

Although accepting that this was clearly a very serious incident, many Members, both Controllers and pilots considered that the incident did not meet the normal criteria for an Airprox since the GA-8 was stationary (or almost stationary) on the ground, about 100m short of the intersection, when the Tucanos crossed ahead at about 50ft agl.

It was also pointed out by a Military Controller Member that the Tucanos would have been given take-off clearance before the GA-8 landed and the ADC was not aware of the presence of the GA-8, so he would not have been in a position to cancel that clearance.

Members discussed whether the GA-8 had entered the Linton ATZ without permission but agreed that, although no specific approval was given by Linton APP, the pilot had been in communication with them when he entered the ATZ and, in Members' view, that had constituted tacit approval.

Although there were significant mitigating factors for the GA-8 pilot and shortcomings by Linton ATC. Members agreed unanimously that he should not have landed without permission from ATC; they found it difficult, however, to agree a suitable course of action that the GA-8 pilot should have followed when faced with a total lack of communications with TWR. Returning to the previous and workable frequency and perhaps requesting that TWR come up on that frequency was considered to be a sensible first step, but when also faced with a lack of any assistance from APP, Members agreed that the GA-8 should have climbed immediately to above cct height and departed the ATZ/MATZ, while continuing to attempt to establish communication and position his ac at a safe distance (and/or height) from the airfield/cct. Should that also fail (as it might have done in this case since the ADC was not listening on VHF) he should have returned to his base or, if he had insufficient fuel, initiated a diversion. Members agreed, however, that although the pilot had been placed in an unenviable situation by ATC, he should not have landed at a busy airfield without permission. When considering why the GA-8 pilot had landed on RW21 rather than RW28, one Member suggested that, despite reading back (on more than one occasion) that RW28 was the RW in use, the GA-8 pilot might not have registered the change from RW21 to RW28 that was made after he planned the flight, had formed a mental picture of the profile and also after he had taken off. On being transferred from Leeming to Linton (in his opinion) late and being very rushed and confused when he did not get the expected responses to his transmissions, he had become anxious and his normal routine and checks had been disrupted.

Since the GA-8 was aware of the Tucanos crossing ahead and stopped his ac before the RW intersection, Members agreed that there had been no risk of collision.

PART C: ASSESSMENT OF CAUSE AND RISK

The GA-8 pilot landed on the out of use RW, without clearance, into conflict with the Tucano pair taking off on the duty RW. Cause:

Degree of Risk: C.