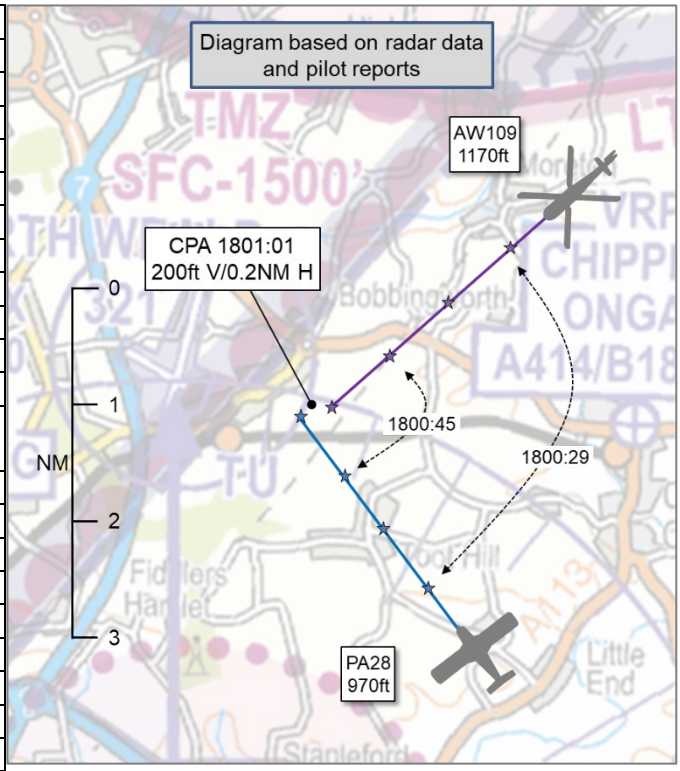
AIRPROX REPORT No 2025026

Date: 07 Mar 2025 Time: 1801Z Position: 5143N 00011E Location: 1.3NM east of North Weald

PART A: SUMMARY OF INFORMATION REPORTED TO UKAB

Recorded	Aircraft 1	Aircraft 2
Aircraft	PA28	AW109
Operator	Civ FW	Civ Comm
Airspace	London FIR	London FIR
Class	G	G
Rules	VFR	VFR
Service	AGCS	Listening Out
Provider	North Weald Radio	Stansted
Altitude/FL	970ft	1170ft
Transponder	A, C, S	A, C, S+
Reported		
Colours	White	Grey
Lighting	Strobes, nav, beacon, landing	Navigation, anti-coll
Conditions	VMC	VMC
Visibility	>10km	>10km
Altitude/FL	1200ft	1300ft
Altimeter	QNH (1011hPa)	NK
Heading	310°	NK
Speed	120kt	150kt
ACAS/TAS	SkyEcho	TAS
Alert	None	None
Separation at CPA		
Reported	100ft V/0.4NM H	Not seen
Recorded	200ft V/0.2NM H	



THE PA28 PILOT reports that they had been returning from [departure airfield] with another group member (PPL holder) in the right seat. The aircraft is based at [destination airfield] and they are both very familiar with the airspace. Their landing light, wing tip strobes, nav lights and rotating beacons were on and operational. They were also using [EC equipment] with ADSB-out enabled. With a strong tailwind, they had made contact with North Weald relatively early (7min to run) to understand circuit traffic etc. There was no other traffic on radio, and they positioned to join crosswind for RW20 at circuit height (1200ft) and around 115kt IAS. With 1.5NM to the overhead, the pilot passenger reported traffic to the right side. As they had been joining the circuit and about to lower their landing gear, the PA28 pilot asked the non FP to monitor, and when they said 'they should have seen them by now' the PA28 pilot then looked too. The helicopter was slightly higher than they were, landing light on, on a constant bearing. Its pilot then saw the PA28, and did an abrupt bank left and climb to avoid them [they believe]. The PA28 pilot landed without incident. Upon landing, the pilot asked North Weald Radio if they had any helicopter traffic on frequency and informed them of what happened; they said there were none, but that two helicopters had just passed through not on radio. The PA28 pilot reviewed the flight on ADS-B exchange after the flight and decided to submit a report.

The pilot assessed the risk of collision as 'Medium'.

THE AW109 PILOT reports that they had received an email informing them that an Airprox had been filed involving the AW109 that they had been flying. At the stated time, and in that general location, the AW109 pilot was not aware of another aircraft in their vicinity. They report that they are afraid that they cannot provide any comment on the event as the email informing them of it was the first they had been aware of it. The AW109 pilot reports that, normally, they request a zone transit from Stansted ATC but [Stansted] had been busy which is why [on this occasion] they had elected for a listening watch and a path clear of controlled airspace.

THE NORTH WEALD AIR/GROUND OPERATOR reports that they had been downstairs manning the gate when tower called them to hand down the radio to the office and was informed that the PA28 pilot had been running behind with their flight plan and would be arriving just after sunset, but not after +30min, when the airfield closes. The PA28 pilot called inbound, and all had been normal from their initial call. Shortly after that initial call was completed, the AGO noticed a helicopter had transited east-to-west into the TMZ and the pilot hadn't called for transit so assumed they might be with Stansted during the transit. The PA28 pilot's next call [from their accounts] was crosswind and from memory all was normal but the AGO did notice after the PA28 had joined crosswind there had been another helicopter which was heading in a south-westerly direction, but again noticed this after the PA28 had joined crosswind for RW20RH. Again there was no communication between [the AGO] and the helicopter in question but at some point the PA28 pilot had asked if [North Weald] was communicating with the helicopter and from memory the AGO had said something along the lines of "*we've had two helicopters transiting and neither were speaking to* [North Weald]" and the PA28 pilot mentioned that avoiding action had to be taken.

Factual Background

The weather at Stansted was recorded as follows:

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METAR EGSS 071750Z AUTO 15007KT 9999 NCD 13/07 Q1012=
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Analysis and Investigation

UKAB Secretariat

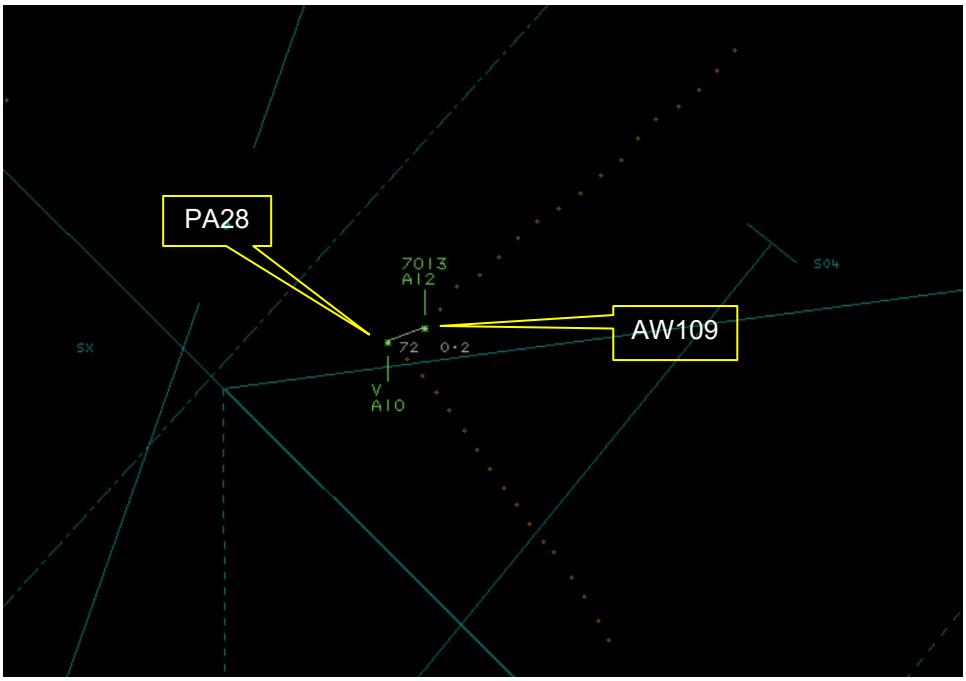


Figure 1: At CPA 1801:01

Both aircraft were tracked via radar and identified through Mode S data. Although the AW109 pilot has no recollection of encountering other traffic in this area at this time, the aircraft can be seen (Figure 2) to have made a turn to the left before passing behind the PA28 and then continuing on their original path.

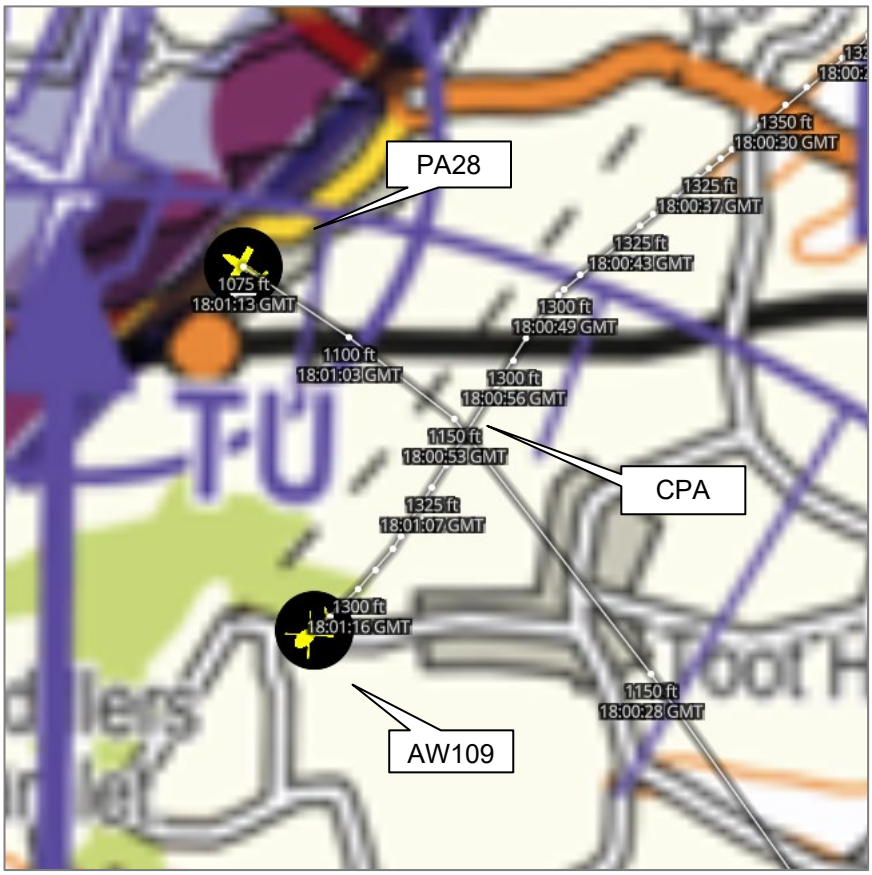


Figure 2: AW109 showed as having manoeuvred behind the crossing PA28

The PA28 and AW109 pilots shared an equal responsibility for collision avoidance and not to operate in such proximity to other aircraft as to create a collision hazard.[1] If the incident geometry is considered as converging then the PA28 pilot was required to give way to the AW109.[2] An aircraft operated on or in the vicinity of an aerodrome shall conform with or avoid the pattern of traffic formed by other aircraft in operation.[3]

Summary

An Airprox was reported when a PA28 and an AW109 flew into proximity 1.3NM east-southeast of North Weald airfield at 1801Z on Friday 7th March 2025. The PA28 pilot was operating under VFR in VMC in receipt of an Air Ground Communications Service from North Weald, and the AW109 pilot was operating under VFR in VMC and had been Listening Out on the Stansted Radar frequency.

PART B: SUMMARY OF THE BOARD'S DISCUSSIONS

Information available consisted of reports from both pilots, radar photographs/video recordings, ADS-B-derived track data and a report from the AGO involved. Relevant contributory factors mentioned during the Board's discussions are highlighted within the text in bold, with the numbers referring to the Contributory Factors table displayed in Part C.

The Board firstly discussed the actions of the PA28 pilot, noting that they had been positioning for a crosswind join to RW20 at North Weald. Members noted positively that the aircraft had been operating with a comprehensive lighting suite, an electronic conspicuity unit and had made early radio contact with the North Weald AGO to enable their arrival. Members noted that the pilot reports having visually acquired the AW109 and had maintained their approach until the AW109 pilot appeared to have made an avoidance turn. The Board was keen to remind all that when two aircraft are converging, the aircraft

[1] (UK) SERA.3205 Proximity.
[2] (UK) SERA.3210 Right-of-way (c)(2) Converging.
[3] (UK) SERA.3225 Operation on and in the Vicinity of an Aerodrome.

to the right has right of way and that, in this case, the PA28 pilot had not yielded (**CF2**) and had flown close enough to cause the AW109 pilot concern (**CF6**).

Members secondly considered the actions of the AW109 pilot, noting that they had equipped with a TAS unit which had been mutually compatible with that carried by the PA28 and felt it unfortunate that neither unit had alerted the respective pilots to the presence of the other (**CF4**). The Board recognised the nature of the flight the AW109 pilot had been undertaking and considered the pilot's report with reference to their preference for an active service from Stansted and the logic applied to subsequently settling on a listening watch, which comes with an appropriate squawk. Members opined that, as the area in which this event occurred is an increasingly well-known hotspot, in this situation where a zone transit was unlikely, an alternative option might have been to contact North Weald and alert them to their transit towards their southeastern side (**CF1**). As both aircraft had been operating on different radio frequencies and neither had registered EC alerts, despite the fact that the equipment carried had been compatible, neither pilot had gained any situational awareness of the presence of the other aircraft (**CF3**). The Board felt that it had been fortunate that the AW109 pilot had achieved a late sighting of the PA28 (**CF5**) and had taken late avoidance action, adding that, when operating in such circumstances, it is advisable to avoid a transit at normal circuit heights where possible.

The Board then reviewed the actions of the North Weald AGO, accepting that they had exchanged calls with the PA28 pilot but had not recalled any interaction with the AW109. The Board felt that the AGO could not have done more in this case.

Concluding their discussion, members noted that neither pilot had gained situational awareness of the presence of the other aircraft but that the PA28 pilot had visually acquired the AW109 and members agreed that, although safety had been degraded, there had been no risk of collision. Risk Category C.

PART C: ASSESSMENT OF CONTRIBUTORY FACTORS AND RISK

Contributory Factors:

	2025026			
CF	**Factor**	**Description**	**ECCAIRS Amplification**	**UKAB Amplification**
	Flight Elements			
	• Tactical Planning and Execution			
1	Human Factors	• Accuracy of Communication	Events involving flight crew using inaccurate communication - wrong or incomplete information provided	Ineffective communication of intentions
2	Human Factors	• Insufficient Decision/Plan	Events involving flight crew not making a sufficiently detailed decision or plan to meet the needs of the situation	Inadequate plan adaption
	• Situational Awareness of the Conflicting Aircraft and Action			
3	Contextual	• Situational Awareness and Sensory Events	Events involving a flight crew's awareness and perception of situations	Pilot had no, late, inaccurate or only generic, Situational Awareness
	• Electronic Warning System Operation and Compliance			
4	Human Factors	• Response to Warning System	An event involving the incorrect response of flight crew following the operation of an aircraft warning system	CWS misinterpreted, not optimally actioned or CWS alert expected but none reported
	• See and Avoid			
5	Human Factors	• Identification/ Recognition	Events involving flight crew not fully identifying or recognising the reality of a situation	Late sighting by one or both pilots
6	Human Factors	• Incorrect Action Selection	Events involving flight crew performing or choosing the wrong course of action	Pilot flew close enough to cause concern

Degree of Risk: C.

Safety Barrier Assessment[4]

In assessing the effectiveness of the safety barriers associated with this incident, the Board concluded that the key factors had been that:

Ground Elements:

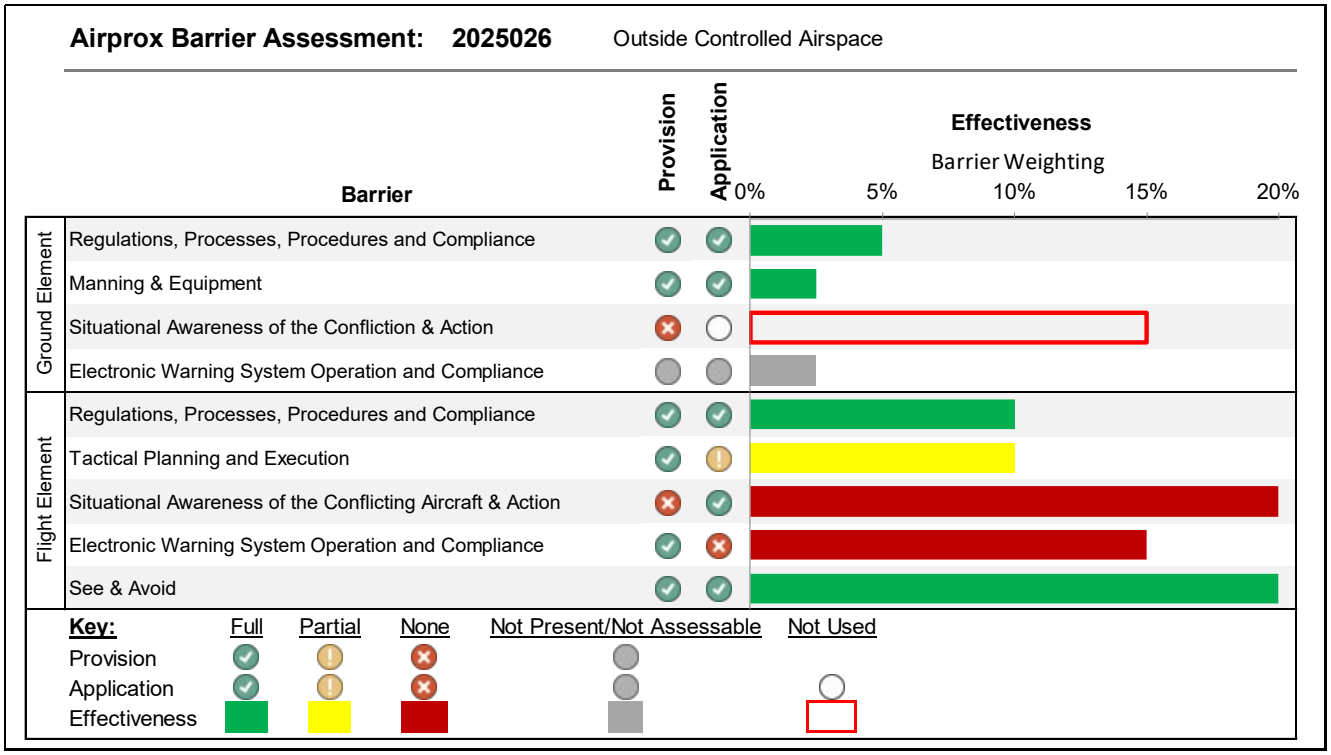
Situational Awareness of the Confliction and Action were assessed as **not used** because the North Weald Air/Ground Operator is not required to sequence traffic.

Flight Elements:

Tactical Planning and Execution was assessed as **partially effective** because the AW109 pilot could have called North Weald as they had transited the area and the PA28 pilot should have given way to the AW109.

Situational Awareness of the Conflicting Aircraft and Action were assessed as **ineffective** because neither pilot had any situational awareness of the presence of the other aircraft.

Electronic Warning System Operation and Compliance were assessed as **ineffective** because although the AW109 and the PA28 carried compatible electronic conspicuity equipment, neither pilot reported having received an alert.



[4] The UK Airprox Board scheme for assessing the Availability, Functionality and Effectiveness of safety barriers can be found on the UKAB Website.