

Why is NATS OpenAir needed if autonomous access to airspace requires drones to have detect-and-avoid capabilities that are not yet technically feasible or assured?

The debate about how it is achieved is likely to push us to co-operative electronic environments in the short term, with only larger, more complex drones having access to independent non-cooperative solutions. This may remain true for a significant period of time. OpenAir would provide assured information and a trusted exchange between operator, UTMSP and ANSP to support their roles in accessing airspace.

Is the OpenAir Traffic Information Service intended for situational awareness or collision avoidance?

OpenAir would provide information for situational awareness and for UTMSPs, drone operators and ANSPs to make decisions. We support the need for a cooperative surveillance system appropriate to users for airspace in which it is needed, but it would remain up to the change agent, UTMSP, drone operator or ANSP to apply for and justify the need for electronic conspicuity (EC) and its technology in a given block of airspace.

Will OpenAir encroach into Class G airspace and restrict GA operations?

OpenAir would not change access to Class G airspace; OpenAir is neither requesting nor operating any airspace.

For Class G airspace, the OpenAir assumption is that crewed aviation will continue to move freely, with pilots potentially availing themselves of additional services if they choose, and providing EC only for those areas where it is required, such as Transponder Mandatory Zones.

Many GA users do not have radios and transponders or the electrical power to run this type of equipment so, by centralising traffic management and data-sharing services, will OpenAir simply limit less-equipped operators, instead of providing benefit to well-equipped GA aircraft?

The CAA Airspace Modernisation Strategy lays out a vision for a future lower airspace that integrates both existing crewed aircraft and new airspace users that requires enhanced surveillance. NERL assumes that whilst many aircraft will be able to comply with any requirement for radios and transponders, there will be provision made for those airspace users that are not able to equip to plan their access to such airspace. The intention is for OpenAir to become a trusted entity for the exchange of information between different airspace users and airspace managers and that OpenAir services can be used (such as airspace authorisation) so that such access can be arranged.

Is OpenAir just a way for NATS to increase revenues?

Our intention is for OpenAir services to be economically regulated by the CAA and independent of any downstream commercial interests.

Why are you using a user-pays approach when access to airspace cannot be charged for?

The intention is for OpenAir to charge service providers for the use of its data exchange services. It will not charge end-users for access to airspace. The user-pays principle is based on users paying for the services they require, not for airspace access, similar to the way in which NERL charges commercial airlines for air traffic control services rather than for access to the airspace itself.

In developing the OpenAir concept have you considered the increased complexity and risk to existing airspace users from dynamically switching on and off access to designated airspace regions?

The OpenAir Geo-Awareness service is about supplying aeronautical information and other information sources that are available today, via a new automated and digitised data exchange. The underlying data will be the same as it is today, so any changes in airspace access should be no more dynamic than experienced today. Further feedback on this point from respondents would be appreciated.

Have you considered the potential for airspace to become a patchwork quilt of Transponder Mandatory Zones and the implications this would have for existing users?

The establishment of Transponder Mandatory Zones would not be a result of implementing OpenAir. By collating data from airspace users and removing data silos, OpenAir is designed to support a variety of market structures and airspace constructs depending on the requirements of modernised future airspace as defined by the CAA.

Will detect and avoid systems for drones be operated by technology or by humans?

CAA CAP1861A and CAP722 are two CAA publications that relate to Detect and Avoid (DAA) capabilities for Unmanned Aircraft Systems (UAS). This will give clarity to how DAA can be anticipated to operate in the UK. NATS OpenAir aims to provide a Traffic Information Service to support ground-based DAA systems in their 'Detect' function. We are planning trials during 2025 to further inform this service and validate our design.

It seems OpenAir is being developed ahead of market demand and does not appear to be imminently needed. Is that correct?

OpenAir is being developed in anticipation of future demand and regulatory approval. NERL acknowledges the challenges and uncertainties in achieving integrated airspace but we need to be prepared for future requirements and these services will take some years to develop – hence the need to start now. OpenAir would enable the gathering of evidence to support drone operators' safety cases, allowing improved assessment of safety risks and the creation of best-practice guidelines.

Is the Traffic Information Service a data repository or does it cover Communications Navigation and Surveillance (CNS) infrastructure collecting data?

The service focuses on functioning as a data repository. Establishing a CNS infrastructure for data collection is the responsibility of industry.