CAA Operational Assessment

Title of airspace change proposal	Future Combat Airspace for Military Collective Training
Change sponsor	MOD
Project reference	ACP-2020-026
Account Manager	[redacted]
Case study commencement date	1 Aug 23
Case study report as at	30 Oct 23

Instructions

In providing a response for each question, please ensure that the 'status' column is completed using the following options:

- YES
- NO
- PARTIALLY
- N/A

To aid the SARG Lead it may be useful that each question is also highlighted accordingly to illustrate what is:

resolved YES not resolved PARTIALLY not compliant ....NO....

Executive Summary

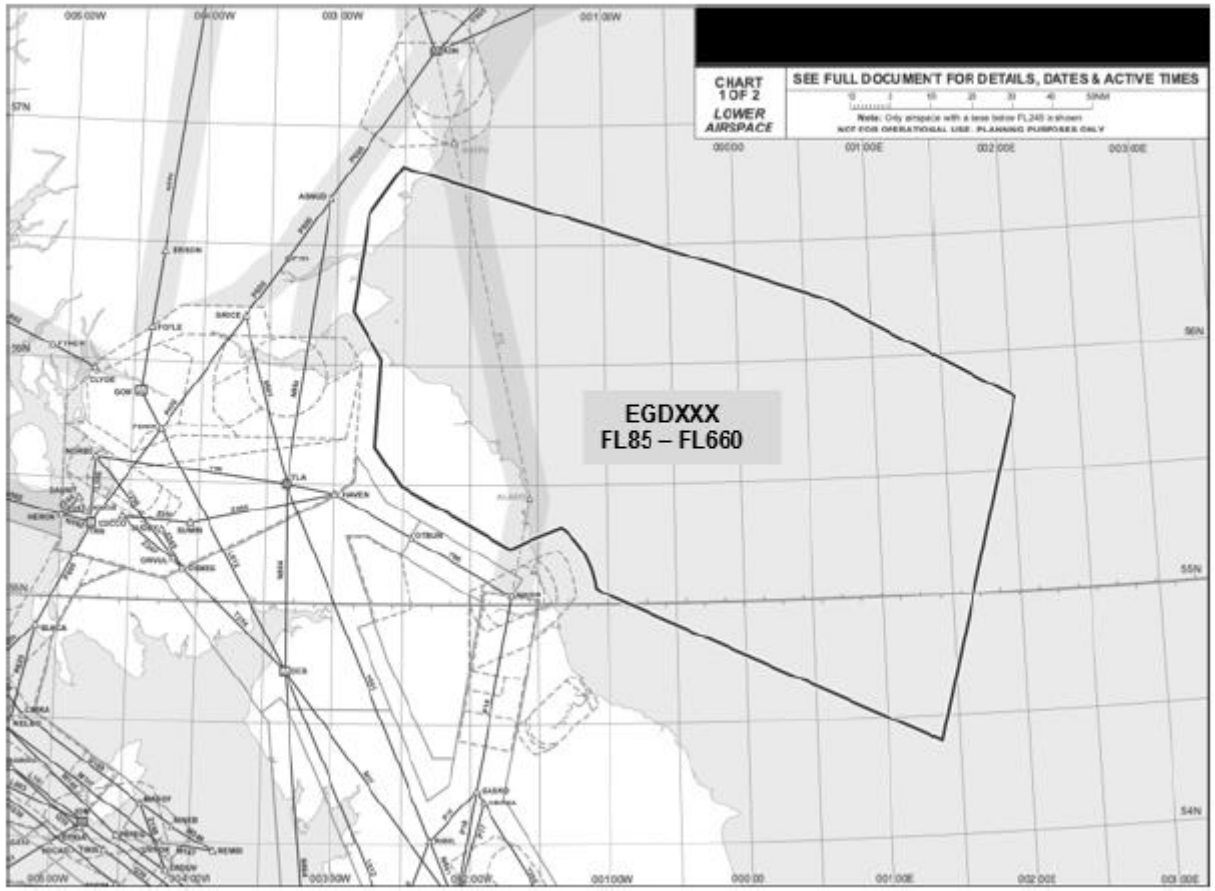
The Ministry of Defence (MOD) is seeking to secure segregated airspace in the form of a new Danger Area for use by the UK and coalition partners during large scale, highly complex training exercises that are used to prepare aircrews for operational service. The MOD considers that existing Danger Areas are suitable for routine flying training but are of insufficient volume for the execution of large force exercises utilising new aircraft types and modern weapons and tactics. Due to the high energy manoeuvring of aircraft and a need to support a large and diverse collection of aircraft, the airspace in which training is conducted needs to be notified to, and segregated from, other airspace users.

This is an Airspace Change Proposal for the development of a permanent airspace solution to support MOD exercises. It was initially assessed as a Level M1 change, which was confirmed at the Stage 2 Gateway, due to the potential for civil flights to be impacted below 7000ft; however, the Sponsor adopted a proportionate approach to assessing impacts below 7000ft, which was accepted by the CAA at Stage 3 given that subsequent analysis indicated very minor impacts at the lower altitudes.

Previously, ACP-2020-42 was conducted for the running of a trial over 2 phases; firstly in Oct/Nov 20 utilising the Cobra Air Combat Airspace (a NATS and MOD agreement for airspace sharing), but with improved notification and Airspace Management (ASM) arrangements achieved through the publication of the agreement area as a Temporary Danger Area (TDA). The second phase of the trial in Mar 21 utilised a new TDA design (designated EGD597), a Flight Plan Buffer Zone (FBZ) and additional Waypoints for managing en-route traffic flows. Publication, notification and Airspace Management were in line with International (ICAO and Eurocontrol) and UK procedures to ensure appropriate flight planning behaviours for en-route traffic.

A temporary Airspace Change Proposal under ACP-2021-007 then followed, which established further use of EG D597 for exercises in Sep 21 and Mar 22 (although the Mar 22 exercise was subsequently cancelled by the MOD). Due to delays in progressing the permanent solution, an additional temporary Airspace Change Proposal (ACP-2021-048) was submitted by the MOD and approved by the CAA to support exercises in 2022 and 2023; this again utilised EGD597 and the other airspace structures/arrangements previously established, but also included conditional approval to extend the use of the TDA beyond the normal UK 90-day limitation.

This Proposal consists of the introduction of a large Danger Area (approx. 90nm x 160nm, FL85-FL660) mostly over the High Seas, with an associated FBZ providing a flight planning buffer of 5nm external to the Danger Area. Additional Waypoints would be utilised to assist with flight planning of en-route traffic around the area and some existing Air Traffic Services (ATS) Routes would become Conditional Routes (CDRs) such that they can be switched on and off as required. This is supported by operating protocols agreed between MOD, NATS, Newcastle International Airport, and Tessside International Airport that have been refined through the previous TDA activations. The airspace would be activated by NOTAM only when required and would be managed by the UK Airspace Management Cell.



The Proposal offers no changes to the airspace structures or arrangements developed under ACP-2021-007 and ACP-2021-048 (Danger Area, Flight Plan Buffer Zone, supporting Waypoints and operating procedures) other than converting some ATS Routes to CDRs. Whilst not able to be exact about the number or timings of activations required, the MOD has described an intent to increase the number of associated exercise serials from previous years due to changing Defence requirements in response to real-world events. This has lead to an increase in expected activations of the proposed new Danger Area compared to historical data and the numbers used in the analytical assessment – this information was provided to stakeholders within the Stage 3 Consultation and subsequent formal submission.

The initial analysis undertaken of the impacts on General Air Traffic was based on 38 activations of the Danger Area for 4 hours each over a one year period. The indicative use as described in the Stage 3 Consultation was for 55 activations as below:

- Exercise A: spring/summer, 25 activations of 4 hours duration each.
- Exercise B: spring/summer, 12 activations of 4 hours duration each.
- Exercise C: throughout the year, 18 activations of 4 hours duration each.

The Sponsor has concluded that a small number of flights to/from Newcastle International Airport and Teesside Airport may be directly affected by Danger Area activations. Newcastle flights routing to/from Scandanavia (possibly up to 5 per activation) may be required to fly longer routes and would have difficulty in connecting to the European Air Traffic Services Network; the MOD has agreed to facilitate connectivity for these flights by providing Air Traffic Services through Class G airspace for those directly affected by activation of the Danger Area. Additionally flights routing to/from Aberdeen may sometimes require a longer routing due to needing to utilise alternative ATS Routes; it should be noted that this is already a common daily behaviour as ATS Route P18 is normally only available in the quieter hours such as overnight, weekends and early morning. Anticipated use of the proposed new Danger Area is likely to be mostly when P18 is already unavailable. In all cases aircraft are expected to fly existing SIDs and STARs or follow existing routine procedures for tactical routing.

It should be noted that other Newcastle/Tessside flights might be impacted where the MOD are unable to provide Air Traffic Services in Class G airspace as part of the derogated services agreement between the MOD and NATS. However, this is not as a direct result of this Proposal and alternative arrangements already exist under such circumstances to ensure connectivity to the ATS Network for these flights.

Dundee Airport, a non-radar Air traffic Control unit situated entirely within Class G airspace adjacent to RAF Leuchars, stated in their consultation response that there may be an impact to some of their flights, where climb or descent profiles might have to be amended, and that there may be an increase in alerts from aircraft Traffic Alert and Collision Avoidance Systems. Dundee requested an agreement from the MOD for the provison of a Lower Airspace Radar Service from RAF Leuchars when the Danger Area is activated, and proposed a reduction in the overland portion of the Danger Area; the Sponsor has not agreed to this due to the airspace design having been determined as the minimum required to achieve the operational requirements. The MOD analysis of Dundee traffic during activations of EGD597 in 2022 shows that there were approximately 2-3 movements per activation period, with no reported safety concerns or issues with the profiles of these flights. The Sponsor has noted in their submission that Dundee will usually transfer departing aircraft to other ATC units with a surveillance capability once the aircraft has passed 3000ft, such as Scottish Control or Leuchars ATC, with it being likely that the majority of the activations of the proposed Danger Area would occur during the normal operating hours of the Leuchars Lower Airspace Radar Service. The Sponsor has subsequently stated that there are no further discussions underway regarding changes to the provision of the Leuchars Lower Airspace Radar Service.

The MOD has assessed that there would be a likely overall **net benefit** when considering all GAT flights affected by the Danger Area when compared with routine activations of extant Danger Areas. This is due to the airspace having been designed to facilitate efficient routing of en-route traffic as much as possible with an agreement from the MOD to not activate adjacent danger areas simultaeneously. The Sponsor's analysis concluded that there would be an estimated **fuel saving** of 346 tonnes in 2024, rising to 395 tonnes in 2033 (based on 55 activations per annum of 4 hours duration each). This would result in an estimated **reduction in CO2e impact** of 1745 tonnes in 2024, rising to 1901 tonnes in 2033.

1.	Justification for change and options analysis (operational/technical)	Status
1.1	Is the explanation of the proposed change clear and understood?	YES
	Introduction of a new Danger Area off the north east coast of the UK, including an overland element, with an associated FBZ, 5 additional Waypoints, and conversion of some ATS Route segments to CDRs to aid in rerouting GAT.	
1.2	Are the reasons for the change stated and acceptable?	YES
	To enable highly complex large force exercises for UK MOD and coalition partners to prepare aircrews for operational service.	
1.3	Have all appropriate alternative options been considered, including the 'do nothing' option?	YES
	Doing nothing is not a viable option to meet UK Defence requirements. Existing volumes of Special Use Airspace (eg Danger Areas and Military Training Areas) are not suitable. Appropriate segregation from other airspace users is required; operating in Class G and Class C airspace without a volume of Special Use Airpsace has been deemed unsafe by the Sponsor. The majority of the evolution and testing of the design of airspace objects and operational procedures has taken place within the previous ACPs for a temporary solution.	
1.4	Is the justification for the selection of the proposed option sound and acceptable?	YES
	In accordance with Flexible Use of Airspace principles: • No larger than is required (lateral and vertical). • Activated only when required. • Level 2 Airspace Management conducted by the UK Airspace Management Cell. • Level 3 Airspace Management conducted by the MOD in accordance with existing procedures. Managed by the HQ AIR Danger Area Authority.	

	Mostly over the High Seas. Standard methodology for notification of activity for visibility in the European ATS Network, with alternative predictable routing achievable for GAT. No simultaneous activation of adjacent/overlapping volumes of Special Use Airspace, providing an overall net benefit to GAT flights when compared to the more routine weekday use of SUA for MOD activity.

2.	Airspace description and operational arrangements	Status
2.1	Is the type of proposed airspace design clearly stated and understood?	YES
	New Danger Area, with an associated FBZ, x5 new Waypoints (5LNCs), some ATS Route segments converted to CDRs.	
2.2	Are the hours of operation of the airspace and any seasonal variations stated and acceptable?	YES
	Only activated when needed (managed by the UK Airspace Management Cell), deactivated as soon as practicable if planned activity is cancelled. An indication of seasonal activation has been provided, along with an aspirational number and duration of activations: • Exercise A: spring/summer, 25 activations of 4 hours duration each. • Exercise B: spring/summer, 12 activations of 4 hours duration each. • Exercise C: throughout the year, 18 activations of 4 hours duration each. Whilst not able to determine precise activation dates and times, the Sponsor has committed to conducting early engagement with stakeholders on anticipated use (6 months notice where possible), with dates and times being refined as planning matures. This also provides opportunities for stakeholders to discuss any challenges that the activations may introduce, including an agreement from the MOD to consider impacts for affected airports when determining activation periods.	
2.3	Is any interaction with adjacent domestic and international airspace structures stated and acceptable including an explanation of how connectivity is to be achieved? Has the agreement of adjacent States been secured in respect of High Seas airspace changes?	YES
	All airspace objects would be established within the Scottish FIR/UIR and London FIR/UIR. Most of the Special Use Airspace would be established over the High Seas so the proposal for a danger area is in accordance with ICAO and Eurocontrol requirements. Modelling of the impact of the airspace design by MOD/NATS has included analysis of the flow of traffic to/from the North Atlantic and to/from continental Europe. This was conducted using assessment tools/data provided via Eurocontrol. The CAA has raised awareness of the project with all ECAC States via the Route Network Development Sub-Group catalogue of airspace projects (ERNIP Part 2). The CAA will issue a High Seas notification letter to ICAO should the Proposal be approved.	

	The Danger Area, FBZ, 5LNC Waypoints and CDRs are proposed to be published in accordance with UK and Eurocontrol requirements, providing visibility in the European ATS Network and predictable flight planning outcomes for General Air Traffic flights. UK airports potentially impacted by this Proposal are Dundee Airport, Newcastle International Airport and Teesside International Airport. Patterns of flights below 7000ft utilising the extant ATS Network inside Controlled Airspace, including airport Standard Instrument Departure and Standard Instrument Arrival procedures, would be largely unaffected although some flights may be required to adopt longer routes. It should be noted that the ability for flights to utilise P18 for more direct routing is routinely only achievable during the quieter hours; therefore, it is not unusual for these flights to adopt the longer route based on current arrangements. The indicative activation times of the proposed new Danger Area as used to assess the impacts described in the ACP submission (ie 0900-1300 UTC) fall within the period where the P18 direct route is unavailable. A small number of flights to/from Newcastle International Airport and Teesside Airport may be directly affected by Danger Area activations. Flights routing to/from Scandanavia (possibly up to 5 per activation) may be required to fly longer routes and would have difficulty in connecting to the European Air Traffic Services Network; the MOD has agreed to facilitate connectivity for these flights by providing Air Traffic Services through Class G airspace for those directly affected by activation of the Danger Area; this is likely to be provided by 78 Sqn (the military Air Traffic Service unit at Swanwick).	
2.4	Is the supporting statistical evidence relevant and acceptable?	YES
	Supplementary information was requested from the Sponsor to better understand how the statistical analysis was undertaken.	
2.5	Is the analysis of the impact of the traffic mix on complexity and workload of operations complete and satisfactory?	YES
	The complexity of the civil operation is addressed by establishing the Danger Area, FBZ, Waypoints and associated CDRs in accordance with existing Eurocontrol and UK protocols, including publication and notification. All hazardous military activity is contained within the SUA; the need for ingress and egress procedures is contained within the Letter of Agreement. Procedures have been tested through previous exercises utilising EGD597. Whilst not directy related to this ACP, it is worthy of mention that other exercise traffic (fixed wing and helicopters) may also be operating inside and outside Controlled Airspace at various levels over land and sea across a broad region. These will operate in accordance with extant procedures and arrangements – Newcastle International Airport raised a concern during enagagement for this ACP (and the associated temporary changes), where they considered a potential increased demand on the provision of ATS. The MOD agreed to brief	

	exercise particpants to routinely avoid the Newcastle Controlled Airspace; specific requirements for exercise traffic to access Newcastle Controlled Airspace would need to be discussed in advance to mitigate any risk of controller overload.	
2.6	Are any draft Letters of Agreement and/or Memoranda of Understanding included and, if so, do they contain the commitments to resolve ATS procedures (ATSD) and airspace management requirements?	YES
	There is a draft LOA between NATS En Route, MOD, Newcastle International Airport and Teesside International Airport, providing confirmation of the need for robust briefing for exercise participants, committing to the need for ingress/egress procedures, and providing details about MOD mitigation for the impacts (supressing adjacents danger areas and the provision of military ATS to some flights to assist with connectivity with the ATS Network). This LOA has evolved from the operational procedures used for previous exercises.	
2.7	Should there be any other aviation activity (low flying, gliding, parachuting, microlight site etc) in the vicinity of the new airspace structure and no suitable operating agreements or ATC Procedures can be devised, what action has the change sponsor carried out to resolve any conflicting interests?	
	Operating hours are determined to be the minimum acceptable to meet MOD requirements. The Danger Area has been designed to minimise the impact on GAT and other airspace users. The Sponsor has committed to continuing engagement with stakeholders (notably Newcastle International Airport, Teesside International Airport, Dundee Airport and the Borders Gliding Club) when planning exercises.	
2.8	Is the evidence that the airspace design is compliant with ICAO SARPs, airspace design & FUA regulations, and Eurocontrol guidance satisfactory?	YES
	The aim throughout all iterations of the development of this airspace has been to provide a design using recognised structures and procedures, that is compliant with all relevant aspects of Flexible Use of Airspace (FUA), Airspace Management, and integration with the ATS Network. This work has required engagement with NATS, the Eurocontrol Network Manager and the UK Airspace Management Cell.	
2.9	Is the proposed airspace classification stated and justification for that classification acceptable?	YES
	No change in airspace classifications.	

2.10	Within the constraints of safety and efficiency, does the airspace classification permit access to as many classes of user as practicable?	YES
	By nature of the exercises and the need to maintain safety for non-participants, the Danger Area will not normally be accessible to other airspace users; however, the Danger Area has been designed to minimise the impact on GAT and other airspace users, and the Sponsor has committed to continue engagement with stakeholders when planning exercises.	
2.11	Is there assurance, as far as practicable, against unauthorised incursions? (This is usually done through the classification and promulgation.)	YES
	A standard airspace structure promulgated via the AIP and NM systems, activated via the UK Airspace Mangement Cell. Most of the Danger Area is over the High Seas, with a base-level of Flight Level (FL)85. A 5nm FBZ is proposed to manage GAT flight plans around the area, with additional 5LNC Waypoints utilised to establish alternative flight-planable routes.	
2.12	Is there a commitment to allow access to all airspace users seeking a transit through controlled airspace as per the classification, or in the event of such a request being denied, a service around the affected area?	YES
	See 2.7, 2.8, 2.10 and 2.11.	
2.13	Are appropriate arrangements for transiting aircraft in place in accordance with stated commitments?	YES
	See 2.7, 2.8, 2.10 and 2.11.	
2.14	Are any airspace user group's requirements not met?	No
	Newcastle International Airport, Teesside International Airport, Dundee Airport and the Borders Gliding Club were key stakeholders where dialogue has taken place regarding airspace users' requirements. Whilst there may be some impacts, these have been mitigated as much as practicable. - Airspace base level as high as practicable. - Airspace activated only when required. - A committement from the MOD to maintain dialogue and discuss exercise planning as early as practicable (ideally 6 months prior).	

	- A Letter of Agreement that establishes: o suppression of adjacent Danger Areas. o Danger Area ingree/egress plan for exercise participants. o briefing and mapping requirements for exercise participants. o avoidance of Newcastle CTR/CTA by exercise participants. o provision of military ATS for some GAT flights. o Access to the Danger Area by GAT flights in emergency. The Letter of Agreement was developed from the operational procedures established to support the use of EGD597.	
2.15	Is any delegation of ATS justified and acceptable? (If yes, refer to Delegated ATS Procedure).	YES
	No change, although 78 Sqn have agreed to provide appropriate ATS to some affected aircraft operating to/from Newcastle International Airport and Teesside International Airport (see Executive Summary and 2.3).	
2.16	Is the airspace design of sufficient dimensions with regard to expected aircraft navigation performance and manoeuvrability to contain horizontal and vertical flight activity (including holding patterns) and associated protected areas in both radar and non-radar environments?	YES
	The Danger Area has been designed as the minimum size required to contain hazardous activity, with ingress and egress procedures established for each exercise serial. Exercise traffic operating outside the Danger Area will do so under existing routine arrangements. Flight plans for GAT are addressed by the use of a 5nm FBZ outside the proposed Danger Area, with flight-planable alternatives utilising x5 new 5LNC Waypoints and CDRs to ensure a safe and suitable flow of traffic outside the Danger Area.	
2.17	Have all safety buffer requirements (or mitigation of these) been identified and described satisfactorily (to be in accordance with the agreed parameters or show acceptable mitigation)? (Refer to buffer policy letter.)	YES
	The CAA Special Use Airspace Safety Buffer Policy for Airspace Design Purposes was updated in July 2023; however, this was an editorial update with no fundamental changes to the requirements. The Sponsor has proposed a reduced lateral buffer of 5nm around the Danger Area, established by an FBZ to manage flight plans for GAT flights routing through the area. Mitigation for a reduced buffer has been proposed based on safety analysis and actual aircraft performance conducted throughout the evolution of this airspace design in the previous associated ACPs, as well as considering mitigation developed for SUA buffers introduced as part of other major airspace changes.	

	A dispensation from the current policy for a reduced lateral buffer would also be appropriate in this airspace change given the safety mitigations considered, other examples of similar scenarios (such as the 5nm FBZs already in place for adjacent/overlapping EGD323 Danger Area complex), and current thinking on the use of FBZs.	
2.18	Do ATC procedures ensure the maintenance of prescribed separation between traffic inside a new airspace structure and traffic within existing adjacent or other new airspace structures?	YES
	The proposed Danger Area and associated FBZ do not necessitate any changes to existing mechanisms for ensuring that prescribed separation is maintained. Flight planning mechanisms will enable en-route GAT to plan safe transits around the proposed new Danger Area when active; tactical obligations/actions by ATCOs are unchanged. Some ATS Routes will become CDRs to appropriately manage GAT flights.	
2.19	Is the airspace structure designed to ensure that adequate and appropriate terrain clearance can be readily applied within and adjacent to the proposed airspace?	YES
	The proposed Danger Area has a base level of FL85 and is mostly over the High Seas, no changes to published airport departure/arrival procedures.	
2.20	If the new structure lies close to another airspace structure or overlaps an associated airspace structure, have appropriate operating arrangements been agreed?	YES
	Overlapping/adjacent Danger Areas (operated by the MOD) will be suppressed for the duration of the activation of the proposed new Danger Area, with Airspace Management protocols determining temporal buffers. ATS Route P18 and associated CTAs are normally only available at quieter times – the activation of the proposed new Danger Area may introduce additional short periods where this routing is unavailable.	
2.21	Where terminal and en-route structures adjoin, is the effective integration of departure and arrival routes achieved?	N/A

3.	Supporting resources and communications, navigation and surveillance(CNS) infrastructure	Status
3.1	Is the evidence of supporting CNS infrastructure together with availability and contingency procedures complete and acceptable? The following are to be satisfied:	
	• **Communication:** Is the evidence of communications infrastructure including RT coverage together with availability and contingency procedures complete and acceptable? Has this frequency been agreed with AAA Infrastructure?	N/A
	No change.	
	• **Navigation:** Is there sufficient accurate navigational guidance based on in-line VOR or NDB or by approved RNAV-derived sources, to contain the aircraft within the route to the published RNP value in accordance with ICAO/ Eurocontrol standards? For example, for navaids, has coverage assessment been made, such as a DEMETER report, and if so, is it satisfactory?	N/A
	No change.	
	• **Surveillance:** Radar provision – have radar diagrams been provided, and do they show that the ATS route/airspace structure can be supported?	N/A
	No change.	
3.2	Where appropriate, are there any indications of the resources to be applied, or a commitment to provide them, in line with current forecast traffic growth acceptable?	YES
	The Sponsor has committed to ensuring that services are provided to flights directly affected by the activation of the proposed Danger Area where suitable alternative arrangements for connectivity with the ATS Network are problematic eg Newcastle flights routing to/from the Copenhagen FIR.	

4.	Maps/charts/diagrams	Status
4.1	Is a diagram of the proposed airspace included in the proposal, clearly showing the dimensions and WGS84 co-ordinates? (We would expect sponsors to include clear maps and diagrams of the proposed airspace structure(s) – they do not have to accord with aeronautical cartographical standards (see airspace change guidance), rather they should be clear and unambiguous and reflect precisely the narrative descriptions of the proposals.)	YES
	Coordinates provided in the Aerodata spreadsheet.	
4.2	Do the charts clearly indicate the proposed airspace change?	YES
4.3	Has the change sponsor identified AIP pages affected by the change proposal and provided a draft amendment?	YES
4.4	Has the change sponsor completed the WGS84 spreadsheet and submitted to the CAA for approval?	YES

5.	Operational impact	Status
5.1	Is the change sponsor's analysis of the impact of the change on all airspace users, airfields and traffic levels, and evidence of mitigation of the effects of the change on any of these, complete and satisfactory? Consideration should be given to:	YES
	a) Impact on IFR General Aviation traffic, on Operational air traffic or on VFR General Aviation traffic flow in or through the area.	YES
	GAT - All associated airspace objects will be visible in applicable European ATS Network systems, with flight plans handled in accordance with standard protocols when Special Use Airspace is activated. A small number of GAT flights at lower altitudes may be required to flight plan alternative SIDs/STARs/ATS Routes. OAT – no impact. VFR GA – see detail on Borders Gliding Club in 5.1d (below).	
	b) Impact on VFR Routes.	N/A
	c) Consequential effects on procedures and capacity, i.e. on SIDs, STARs, holds. Details of existing or planned routes and holds.	YES
	All associated airspace objects will be visible in applicable European ATS Network systems, with flight plans handled in accordance with standard protocols when Special Use Airspace is activated. A small number of GAT flights at lower altitudes may be required to flight plan alternative SIDs/STARs/ATS Routes.	
	d) Impact on airfields and other specific activities within or adjacent to the proposed airspace.	YES
	Potential impacts on Dundee Airport, Newcastle International Airport and Teesside International Airport are described above. There may be occasional impact on gliding activities from the Borders Gliding Club, especially when they have major events; the Sponsor has committed to maintaining open dialogue with the gliding club, providing early engagement when planning exercise dates, with the intention of deconflicting activities where practicable.	

	ATS Route P18 and associated CTAs are normally only available at quieter times – the activation of the proposed new Danger Area may introduce additional short periods where this routing is unavailable.	
	e) Any flight planning restrictions and/ or route requirements.	YES
	All associated airspace objects will be visible in applicable European ATS Network systems, with flight plans handled in accordance with standard protocols when SUA is activated. A small number of GAT flights at lower altitudes may be required to flight plan alternative SIDs/STARs. ATS Route P18 and associated CTAs are normally only available at quieter times – the activation of the proposed new Danger Area may introduce additional short periods where this routing is unavailable.	
5.2	Does the change sponsor consultation material reflect the likely operational impact of the change?	YES

Case study conclusions – to be completed by Airspace Regulator (Technical)	Yes/No
Has the change sponsor met the SARG airspace change proposal requirements and airspace regulatory requirements above?	YES

The Sponsor has been clear on the Defence requirements for a new volume of segregated airspace. The evolution of the final airspace design has taken place through 4 Airspace Change Proposals over a 3½ year period. Throughout this period the Sponsor has established and maintained dialogue with relevant stakeholders to understand and mitigate the impacts on other airspace users as much as is practicable, including through the commitment to maintain open dialogue when planning use of the proposed new Danger Area.

The Sponsor has developed an airspace design and associated procedures that consider the requirements of other airspace users and that have been tested in a live environment. The design and procedures have been assessed as likely to provide a net benefit to the ATS Network in terms of fuel burn and CO2e emissions. The Final Submission acknowledges that there is a likely impact to a small number of GAT flights, where in part the MOD has agreed to provide services through Class G airspace to facilitate connection to the ATS Network.

The airspace design is in accordance with national and international requirements. This includes the design and publication of the Danger Area, associated changes to the ATS Network to facilitate GAT flight planning, Airspace Management, and Flexible Use of Airspace.

RECOMMENDATIONS/CONDITIONS/PIR DATA REQUIREMENTS	Yes/No
Are there any Recommendations which the change sponsor **should try** to address either before or after implementation (if approved)? If yes, please list them below.	YES

GUIDANCE NOTE: *Recommendations are something that the change sponsor **should try** to address either before or after implementation, if indeed the airspace change proposal is approved. They may relate to an area in which the change sponsor is reliant upon a third party to actually come to an agreement and consequently they do not carry the same 'weight' as a Condition.*

RECOMMENDATIONS

It is recommended that:

1. References to Fast Jet Areas in the Letter of Agreement should be updated to include the new identifications that define them as Danger Areas (ie EGD713 and EGD901).
2. The terminology in the Letter Of Agreement should be amended to remove reference to Managed Danger Areas (MDAs) as this term is no longer in use.
3. The Letter of Agreement glossary reference to 'USAFE' should be amended to the correct meaning of 'United States Air Forces in Europe'.

Are there any Condition(s) which the change sponsor **must fulfil** either before or after implementation (if approved)? If yes, please list them below.	YES

GUIDANCE NOTE: *Conditions are something that the change sponsor **must fulfil** either before or after implementation, if indeed the airspace change proposal is approved. If their proposal is approved, change sponsors **must observe** any condition(s) contained within the regulatory decision; failure to do so **will usually** result in the approval being revoked. Conditions should specify the consequence of failing to meet that condition, whether that be revoking the ACP or some alternative.*

CONDITIONS

The following condition must be met prior to the first activation of the Danger Area:

1. Finalise the Letter of Agreement. A copy of the final version must be provided to the CAA along with evidence of the agreement of all parties (either through signatures on the document or alternative information that confirms acceptance by all parties).

The following condition must be observed by the Change Sponsor, otherwise the CAA may be required to revoke approval to use the Danger Area until potential impacts can be assessed:

2. Amendments to the airspace management and operational procedures in the Letter of Agreement may alter the impacts of the airspace design; these must therefore be discussed with the CAA in advance of any proposed modifications to assess if an airspace change may be required.

Are there any specific requirements in terms of the data to be collected by the change sponsor for the Post Implementation Review (if approved)? If yes, please list them below.	YES

GUIDANCE NOTE: *PIR data requirements concerns any specific data which the change sponsor* ***must*** *collate post-implementation, if indeed the airspace change proposal is approved. Please use this section to list any such requirements so that they can be captured in the regulatory decision accordingly.*

See PIR data Request Form.

General summary

The Sponsor proposes the introduction of a large danger area along with other associated airspace objects that are consistent with UK and International requirements, and managed in accordance with CAP 740 (UK Airspace Management Policy). Whilst there will be some impacts to a small number of GAT flights, the broader perspective shows a net benefit to the ATS Network due to the design and management protocols established for the airspace. In consideration of the Airspace Modernisation Strategy, this proposal retains a high level of safety, provides proportionate segregation with airspace managed flexibly, establishes a simple and predictable airspace scenario that facilitates standard flight planning behaviours for GAT, and enables an improvement to the environmental impacts when compared to the more routine weekday use of SUA for MOD activities.

Comments and observations

Operational assessment sign-off	Name	Signature	Date
Operational assessment completed by Airspace Regulator (Technical)	[redacted]	[redacted]	30 Oct 23
Operational assessment approved by Manager Airspace Regulation	[redacted]		23 Nov 23
Manager Airspace Regulation Comments: Comments are contained in the Decision Log			

Head AAA	Name	Signature	Date
Operational assessment conclusions approved by Head AAA	[redacted]	[redacted]	27 Nov 23
Head AAA Comments: Comments are contained in the Decision Log			