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London Luton Airport Expansion

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**8.186 Applicant's Response to Examining Authority's Rule
17 Request Dated 25 January 2024**

Infrastructure Planning (Examination Procedure) Rules 2010

Application Document Ref: TR020001/APP/8.186



The Planning Act 2008

The Infrastructure Planning (Examination Procedure) Rules 2010

**London Luton Airport Expansion Development Consent
Order 202x**

**8.186 Applicant's Response to Examining Authority's Rule 17
Request Dated 25 January 2024**

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Author:	Luton Rising

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1 INTRODUCTION

1.1 Purpose of this document

- 1.1.1 This document has been prepared by Luton Rising (a trading name of London Luton Airport Limited) ('the Applicant') for submission to the Examining Authority ('ExA'). It provides the Applicant's response to the Rule 17 request issued by the ExA on 25 January 2024 **[PD-021]** and provides the information requested from the Applicant for Deadline 9.

2 APPLICANT'S RESPONSE TO THE EXA'S RULE 17 REQUEST FOR DEADLINE 9

Table 2.1: Applicant's response to the ExA's Rule 17 Request dated 25 January 2024

Ref	Information Requested by the ExA	ExA's Deadline	Applicant's Response
Chilterns Area of Outstanding Natural Beauty Special Qualities Assessment (SQA) [REP7-046]			
1	<p>Paragraph 5.3.4 of the SQA states that "It is beyond the scope of this assessment to describe and evaluate in detail where contributors to and detractors from relative tranquillity are present or absent within the Study Area. It is evident however that relative tranquillity within the Study Area varies." To provide understanding of the existing baseline condition of relative tranquillity and the information in Figures 6.7 to 6.10 (tranquillity mapping) and Figures 6.11 to 6.14 (dark skies), submit further written information of the areas and/ or receptors that most experience tranquillity and areas of darkness. If this cannot be provided, explain why.</p>	9	<p>Figures 6.7 to 6.10 of the Special Qualities Assessment [REP7-046] show the broad distribution of tranquillity within the Study Area. The areas that most experience tranquillity within the study area are shaded green and include: the central and northern part of the Area of Outstanding Natural Beauty (AONB) to the north of Luton; the area to the north east of Tring and to the north of Berkhamstead; the area to the east of Wendover; and the area between Wendover and Princes Risborough.</p> <p>Figures 6.11 to 6.14 of the Special Qualities Assessment show the broad distribution of dark skies within the Study Area. The areas that most experience dark skies are broadly similar to areas that most experience tranquillity.</p> <p>Key receptors within these areas include residents of isolated dwellings and farmsteads, residents within villages and visitors to the AONB.</p>
2	<p>Aside from physical impact, confirm whether the experience of people enjoying the Special Qualities of the dramatic chalk escarpment; over 2000ha of common land and 3700ha of open access land; distinctive buildings and attractive places to live and archaeological landscape could be affected by the increase in overflights from the</p>	9	<p>The Applicant considers that the experience of people enjoying these Special Qualities would not be materially affected by the increase in overflights from the Proposed Development.</p> <p>The increase in overflights over most of the Chalk Escarpment (which is located towards the northern</p>

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	<p>Proposed Development and, if they would be, why these were scoped out of the SQA?</p>		<p>periphery of the AONB as shown in Figure 5.2 of the Special Qualities Assessment [REP7-046]) is relatively low as evidenced by the increase in overflights at: Ivinghoe Beacon (an increase of six overflights per day as a result of the Proposed Development); Pulpit Hill (an increase of five overflights per day as a result of the Proposed Development); and Telegraph Hill (an increase of three overflights per day as a result of the Proposed Development).</p> <p>The increase in overflights per day over some areas of common land, open access land, distinctive buildings, attractive places to live and archaeological landscape where the increase in overflights is greatest (for example to the north of Hemel Hempstead) would occur where the baseline overflights are relatively high. There will be a small increase in overflights per day in areas of the Study Area where the number of baseline overflights are relatively low as evidenced by the overflight data in Table 6.1 of the Special Qualities Assessment. The magnitude of effect on these Special Qualities is likely to be very low and therefore no significant effects would arise. Elsewhere as a result of the increase in overflights over these Special Qualities outside the Study Area the magnitude of impact would be very low or no change, which results in insignificant effects.</p> <p>The Special Qualities referred to by the ExA were therefore scoped out of the Special Qualities Assessment as likely significant effects on these Special Qualities were not</p>

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			identified, as is common and accepted good practice in scoping assessments.
3	<p>Explain:</p> <p>a. whether the increase in 50 overflights per day over areas such as Dagnall and Ivinghoe Beacon and 100-200 overflights over areas such as Gaddesden Row and Jockey End, as shown on Figures 6.5 and 6.6, has been factored into the assessment of 'very low adverse' magnitude of impact and if so, reasons for concluding that the increase in overflights would be small against the existing baseline;</p>	9	<p>The increase in overflights per day over the areas referred to by the ExA are noted by the Applicant. The increase in overflights in these areas will occur where the baseline number of overflights is relatively high. The geographical extent of the areas affected is also relatively small and so the magnitude of effect of increase in overflights on the AONB is assessed to be very low adverse.</p>
	<p>b. what consideration has been given to the proportion of increase in overflights in areas where it is stated that relative tranquillity is already impacted due to the current level of overflights;</p>		<p>The Applicant has considered the proportion of increase in overflights in areas within the AONB where relative tranquillity is already impacted. Altering flightpaths to avoid these areas and/or the AONB would require aircraft to make a tighter turn off the end of the runway and head either north or south to converge to the required track.</p> <p>This would result in aircraft overflying the more densely populated areas to the western edge of Luton and Dunstable, and Harpenden, whereas the current tracks have been identified having regard to minimising the number of people affected by aircraft noise.</p>
	<p>c. which receptors would experience fleeting views of aircraft landing lights and whether the impact on increase in overflights on panoramic viewpoints for relatively dark skies has been assessed. If not, why not?</p>		<p>Fleeting views of aircraft landing lights would be experienced by residents and people outdoors (for example walking, engaging in recreation etc) throughout the Study Area. The impact on increase in overflights on panoramic viewpoints for relatively dark skies has not explicitly been considered within the Panoramic Viewpoints</p>

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			<p>section of the Special Qualities Assessment [REP7-046], as this section considers the effects on “<i>panoramic views from and across the escarpment interwoven with intimate dipslope valleys and rolling fields...</i>” as set out in the Chilterns AONB Management Plan (Ref 1), rather than dark skies.</p>
4	<p>Paragraph 6.3.24 of the SQA appears to provide an assessment of effects for Phase 2b compared to Phase 2a rather than against the baseline. Provide an assessment of effects for Phase 2b against the baseline or explain why this is not required.</p>	9	<p>Assessing the effects for Phase 2b against the baseline would result in a similar conclusion to that for Phase 2a.</p> <p>The overflight data in Table 6.1 of the Special Qualities Assessment [REP7-046] demonstrates that for Phase 2b there would be an increase of one aircraft movement per day at Environmental Statement Assessment Viewpoint 1 (Warden Hill) and Viewpoint A (Dunstable Downs) compared to the baseline; three additional overflights per day at Viewpoint C (Telegraph Hill) compared to the baseline; and six additional overflights per day at Environmental Statement Assessment Viewpoint 45 (Ivinghoe Beacon) compared to the baseline.</p> <p>There would be an increase of 24 overflights per day for Phase 2b compared to the baseline at the Crown and Sceptre public house . However, as noted above the existing baseline for this receptor is relatively high (42 overflights per day) and the geographical extent of the areas affected where baseline overflights are relatively high within the study area is small and so the magnitude of impact on this Special Quality is judged to remain very low adverse.</p>

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5	The overflight information provided in Table 6.1 and Figures 6.3 to 6.6 is for the period 07:00-23:00. Noting that an increase in the number of flights is proposed during the shoulder period (06:00-07:00 and 23:00-23:30), explain why the overflight figures during this period have not been included in the SQA. If the shoulder period was included, explain whether this would result in any change to the assessment findings.	9	The inclusion of the overflight figures for the shoulder period would not affect the assessment findings. The number of overflights over the AONB during these periods is very low. The number of overflights would increase by less than one within most areas within the Study Area.
6	Section 7 of the SQA seeks to explain the difference in findings between the effects on 'AONB Special Qualities' and 'Effects on AONB'. Clearly explain the difference between the two assessments and the different conclusions reached. Provide a more detailed description of the factors that make up the 'aesthetic and perceptual qualities of the AONB', expanding on the information presented in section 7.1 of the SQA and paragraphs 14.7.42 to 14.7.46 of ES Chapter 14 [AS-079].	9	<p>The Special Qualities Assessment [REP7-046] considers the effects of the Proposed Development on the Chilterns AONB. It demonstrates that most of the Special Qualities are not affected by the Proposed Development (and have been 'scoped out' of the Assessment).</p> <p>Of the 'scoped in' Special Qualities, the Assessment concludes that the Proposed Development would not have significant effects on the Special Qualities of Panoramic Views, Relative Tranquillity or Ancient Routeways.</p> <p>Factors that make up the 'aesthetic and perceptual qualities of the AONB' include scenic value, which comprises the overall visual quality of the landscape; recreation value, which is people enjoying the AONB; and tranquillity which is a state of calm and quietude associated with peace.</p>
7	n/a – request not directed to the Applicant	n/a	n/a
8	The ExA requests comments at D10 regarding the compliance of the Proposed Development	10	The Applicant notes this request and will respond at Deadline 10.

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	with both national and development plan AONB policies and any comments on the legislative provisions in Section 85 of the Countryside and Rights of Way Act 2000.		
Fire Training Ground (FTG) (Work No.2d)			
9	Page 47 of your D8 response to D7 submissions states that the reasons for locating the FTG in the proposed location are set out in [REP6-066]. Only a limited commentary of the alternative locations considered is provided. Please provide further written details on this matter.	9	<p>Options for the locations of the relocated FTG were considered from Sift 2 onwards as described in the Design and Access Statement (DAS) Vol I Section 4 [AS-049] and Chapter 3 of the Environmental Statement (ES) [AS-026].</p> <p>Factors which informed the potential siting of the FTG included consideration that it must be in an airside location with direct access to the airfield to allow the Airports Rescue and Fire Fighting Service (RFFS) to remain airside whilst training so that they can still respond to an actual aircraft incident within the response times stipulated in CAA publication (Ref 2).</p> <p>The FTG must also be sufficiently far from the operating taxiways and runway that the FTG facilities do not present a hazard to aircraft operations. The height of the FTG facilities provided a constraint as each option needs to comply to the obstacle limitation surfaces as described in ICAO Annex 14 (Ref 3) and/or UK equivalent which limit the height of developments to safeguard aviation safety (as described in DAS Volume 2 [AS-124] paragraph 5.23.7) and shown on General Arrangement Drawing [AS-018].</p>

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			<p>Sift 2 had four scheme layout options. Options 1a, 1b and 1c (with the new terminal to the north of the runway) resulted in no viable locations to site the FTG on the north side of the runway as all the available space was required to construct the proposed apron, taxiways and associated facilities for the Proposed Development without encroaching on the Green Belt and meeting the criteria as set out above. There were two feasible locations to relocate the FTG to the south of the runway.</p> <p>Sift 2, Scheme layout Option 2 (a new terminal to the south of the runway) meant the FTG could remain in its current location. Option 2 was discontinued at the end of Sift 2 when the decision not to locate the new terminal to the south of the runway was taken.</p> <p>Following Sift 2, Option 1a became the emerging preferred scheme layout option (new terminal and apron north of the runway). Two FTG locations south of the runway were reviewed to establish which location best met the strategic objectives of the development. These locations included the proposed location (West option) and a location further to the east (where the proposed Surface Movement Radar (Work No. 2a (02)) is located (East option)). The East option was not selected as although the land is under the Applicant's ownership it is within the Green Belt, closer to an existing domestic property and further away from the existing fire station.</p>
10	Provide comments as to whether the 'minor adverse effect' identified in paragraphs 10.9.66	9	The landscape surrounding the scheduled monument of Someries Castle has been assessed within Chapter 10 of

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	<p>and 10.9.67 of ES Chapter 10 [AS-077] and the 'less than substantial harm' identified in the Cultural Heritage Gazette [REP4-017] would preserve the setting of the Schedule Monument.</p>		<p>the ES [AS-077] using guidance produced by Historic England (Ref 4). It has been concluded that it no longer contains components that are contemporary with the castle, and therefore does not contribute significantly to its heritage value; it does provide a sympathetic and positive setting which does not detract from the ability to appreciate the asset.</p> <p>Chapter 10 of the ES [AS-077] has identified the potential for changes to the existing view of the functioning airport. However, this will not erode the setting of the Scheduled Monument as a result.</p> <p>The current heritage setting of the Scheduled Monument of Someries Castle would, therefore, be preserved.</p>
11	<p>The ExA also requests further details on the lighting associated with the FTG. The Applicant is requested to confirm:</p> <p>a. the maximum height of the 'high mast lighting' in Work No. 2d(c);</p> <p>b. the approximate number of lights required;</p> <p>c. the duration lighting would be needed to be in operation; and</p>	9	<p>The maximum height of the high mast lighting in this location must be below the Obstacle Limitation Surface (as described in DAS Volume 2 [AS-124] para 5.23.7) specifically the transitional surface, which in this area ranges from 4.4m to 14.2m as shown on General Arrangement Drawing [AS-018].</p> <p>Therefore, the maximum height of the high mast lighting is 14.2m.</p> <p>The initial lighting design undertaken identifies six masts to provide sufficient lighting.</p> <p>The FTG would only require lighting when training is required and will be switched off otherwise. The FTG is currently used around 12 times a month and is utilised for</p>

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	<p>d. more detail on the visual effects of lighting from the FTG, particularly, but not limited to, Luton Hoo Registered Park and Garden, noting the findings in section 8 of the Light Obtrusion Assessment [APP-052 and APP-053] which reports exceedances in respect of lighting from the FTG.</p>		<p>both day and night-time operations. Typically, deployments on the FTG will last for no more than 2 hours, with 80% complete in less than 1 hour. Lighting would only be used during the debrief and tidy up element, making up approximately 30 minutes of that time.</p> <p>The vast majority of training exercises are completed during the day, however in winter months some lighting may be required.</p> <p>As a result, the likely lighting usage is 6 hrs per month in the winter season and no more than 2 hrs per month in other seasons.</p> <p>The detailed design of the lighting will be in accordance with the Design Principles [REP8-022], principle BIODV.04 which considers the lighting design on biodiversity, landscape and historic character of the area.</p> <p>The Light Obtrusion Assessment [APP-052 and APP-053] used the standard floodlights with upward light cowls. Application of the BIODV.04 principle during the detailed design phase will, if necessary, consider additional light cowls to avoid a direct view of the FTG floodlight light source from Luton Hoo.</p> <p>The FTG floodlights are generally aimed towards the runway and not towards Luton Hoo, therefore the peak intensity of the FTG light sources is not visible in the direction of Luton Hoo. However, by contrast the existing South Apron floodlighting uses taller masts and includes</p>

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			<p>numerous floodlights aimed towards the south-east, including Luton Hoo. Therefore, by comparison the proposed FTG lighting is expected to have significantly lower intensity visible from Luton Hoo, even without mitigation.</p> <p>It is also noted that the Light Obtrusion Assessment [APP-052 and APP-053] excludes any vegetation to present a worst-case scenario, however it is noted that there is significant mature tree planting alongside the River Lea and in Georges Wood and Bush Pasture which will offer further mitigation towards Luton Hoo.</p>
Multi-storey car park P1 (Work No. 4g)			
12	<p>Given the concerns raised by CBC on the visual impact of the car park and request for its removal in the PADSS at D8, the Applicant is requested to provide comments on this request, further details of the visual impact on Luton Hoo Registered Park and Garden beyond those in [REP7-067] and [REP6-066] and explain what mitigation could be proposed to reduce any impacts.</p>	9	<p>Car Park P1 (Work No. 4g) is required to accommodate a proportion of airport-related staff parking from Assessment Phase 2a onwards. The car park has been sited to enable usage of the Luton DART for those staff members travelling between the existing and proposed airport terminals, and its removal would result in a shortfall of necessary staff parking provision.</p> <p>The Applicant understands the concerns raised by Central Bedfordshire Council (CBC) and to address these concerns the Applicant has added two additional Design Principles ASF.24 and ASF.25 to the Design Principles (issued at Deadline 9) [TR020001/APP/7.09] which consider the design of the facade and solar panels of Multi-Story Carpark (MSCP) P1 to have regard for the setting of Luton Hoo Registered Park and Garden (RPG).</p>

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			<p>Furthermore, Design Principle ASF.23 has been written to refer to additional design mitigation measures for consideration during the detailed design stage to avoid a direct view of the light sources connected to the car park from beyond the site boundary.</p> <p>It is noted that there is significant mature tree planting alongside the River Lea and in Georges Wood and Bush Pasture which will offer further mitigation of lighting effects from the car park towards Luton Hoo.</p> <p>As such, Chapter 10 of the ES [AS-077] concludes that the presence of the car park would introduce new components into the visual setting of the RPG, but that it would not be prominent in views from it. On this basis it is not considered that further mitigation would reduce impacts.</p>
Shoulder period Air Traffic Movement (ATM) cap			
13	Provide comment on the proposed shoulder period caps set out at D8 including those by the host local authorities, LADACAN and St Albans Aircraft Noise Defence (Stand). Signpost to the flight and noise data assessed in the Environmental Statement (ES) to demonstrate how the 13,000 ATM shoulder cap has been derived from the ES worst case assessment.	9	The Applicant has addressed the topic of shoulder period movement limits and has responded to the alternative limits put forwards by the Host Authorities, LADACAN and STAND in the Applicant's Position on Noise Contour and Movement Limits [TR020001/APP/8.184] , submitted at Deadline 9.
Core growth limits			
14	Provide a detailed explanation of how the core growth and faster growth limits set out in	9	Please refer to Appendix A of this document for a full response to this request.

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	<p>Applicant's Response to Written Questions – Green Controlled Growth (GCG) [REP7-054] relate to the assessment tables provided in ES Appendix 16.1: Tables 7.40, 7.43, 7.46, 7.49, 7.52 and 7.55 [REP7-013] that set out the Applicant's assessed likely and worst case(s). In responding explain why interpolation would mean that values were set higher than an individual peak year.</p>		
Environmental Scrutiny Group (ESG) as a limited company			
15	<p>Provide the reasons for making ESG a limited company and explain what the implications would be for the GCG framework [REP7-020] and the membership of ESG</p>	9	<p>The Applicant's strong view is that the ESG should, as is currently proposed and anticipated, be established as a not-for-profit company limited by guarantee. One of the very important drivers in the Applicant's approach has been to ensure that the ESG is independent and is also <u>seen</u> to be truly independent.</p> <p>The Applicant wants to ensure that the ESG is effectively arm's length from the airport operator and owner so that its decisions / appointments / contracts for technical support are not contingent on, or otherwise seen as comprised by, the airport operator.</p> <p>GCG is intended to be a clear and explicit communication to the local communities and surrounding host authorities that the structures in place are at arm's length from the operator, the owner and, indeed, in order to address a perceived conflict, with LBC itself. It is on that basis that the Applicant considers the corporate entity approach</p>

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			<p>provides the appropriate degree of independence of the ESG to oversee the GCG Framework.</p> <p>The ESG will be carrying out statutory functions when approving Level 2 / Mitigation Plans / amendments to documents such as the Monitoring Plans. It is the Applicant's view this heightens the risk that 'decisions' of local authority representatives may themselves be amenable to judicial review. By creating a separate legal entity which is distinctly the decision-maker, it will reduce the risk to those authorities and their respective representatives.</p> <p>The risk here is, for example, a decision to refuse (or approve) being amenable to judicial review, and local authorities being liable. The Applicant considers it undesirable for an aggrieved third party to be capable of taking legal action against local authorities just because they have refused a plan with the consequent effect that the airport's capacity cannot grow. By having a body with distinct legal personality taking these decisions, this reduces the potential for that scenario.</p> <p>This approach allows for the usual powers of companies (e.g., entering into contracts) to be adopted. The risk in using the DCO alone is that various powers, controls on liability, and more bureaucratic and formal matters such as executing documents are inadvertently not provided for.</p>

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			<p>The implications for local authorities are therefore that the corporate entity (a company limited by guarantee) will secure independence, minimise their potential legal liability enabling the ESG to undertake their functions, and also ensure that the legal powers open to companies are given to the ESG (e.g., in terms of appointments and entering into contracts).</p> <p>It would be anticipated that “members” of the ESG under the DCO would be directors of the proposed company. There are also implications in terms of “director duties” under the Companies Act 2006 but the Applicant does not consider the director duties to be burdensome in this context, and they merely regulate conflicts and ensuring the director acts in the best interests of the company (which, in this context, would fundamentally be ensuring GCG works and operates as intended). The Applicant stresses that the administrative costs associated with GCG do not fall on the local authorities, but the Applicant/operator (as per the Terms of Reference) and this principle would extend to the new corporate entity.</p> <p>The Applicant notes that other routes do not provide for the enhanced transparency, efficiency and independence (nor provide for a minimisation of potential legal liability for the local authorities) of the corporate entity route. The Host Authorities have previously suggested that practical considerations (such as appointments or contracting for services) could be addressed by one local authority taking the lead, acknowledging that the operator/Applicant should be arm's length from such a process. However, a “lead”</p>

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			<p>local authority is, in the Applicant's view, at risk of heightened politicisation, a potential risk to independence and the "equity of arms" approach which the corporate entity approach provides. Under the Applicant's proposed approach, the entity would be a distinct legal person, and the relevant authorities would have equal status providing transparency to all parties.</p>
Noise insulation scheme			
16	<p>Michael Reddington's D8 submission 'comments on any further information/ submissions received by Deadline 7' notes that "The current Scheme has an Air Noise as well as a Ground Noise contour, and also a limit of 90dB SEL at least once per night". Explain why this criterion has not been included within the noise insulation policy and, where relevant, update the policy to include this criterion.</p>	9	<p>The 90dB SEL does not relate to the methodology for identifying adverse likely significant effects or significant effects on health and quality of life as set out in Chapter 16 of the ES [TR020001/APP/5.01]. The scheme is therefore not relied upon for the noise assessment or noise policy compliance.</p> <p>The Applicant believes that the noise insulation schemes in the DCO are an improvement over the existing scheme, including its inclusion of a 90dB SEL eligibility criteria.</p> <p>The 90dB SEL footprints for the loudest aircraft that are forecast to operate during the night in 2027 are similar in size and shape to the 55dB_{L_{Aeq,8h}} night-time contour and 57dB_{L_{Aeq,16h}} contours that determines eligibility for schemes 3 and 4, and generally is entirely within the 54dB_{L_{Aeq,16h}} contour that determines eligibility for scheme 5.</p> <p>Where the contour shapes differ, it is outside of areas of population. As current generation aircraft are forecast to be phased out of the fleet over time, the 90dB SEL contours</p>

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			<p>will continue to reduce in size by comparison to the L_{Aeq} contours.</p> <p>In other words, including the 90dB SEL eligibility criteria would provide limited benefit to communities, as it would not introduce any new community areas to the scheme and would add a sixth scheme that overlaps with the proposed schemes, further duplicating and complicating the situation.</p> <p>All residential properties that are currently eligible for the current 90dB SEL scheme are forecast to be eligible for schemes 3, 4 or 5 under the DCO noise insulation scheme and would therefore be eligible for £4,000, £6,000 or the full cost of insulation for bedrooms, which represents a substantial improvement to the current scheme offer.</p>
Requirement 19 – Exceedance of air quality Level 2 Threshold or Limit			
17	<p>Provide a worked example to demonstrate how the 5% criteria would apply to an exceedance of a limit. The ExA currently understands that in applying 5% to the criteria in Table 4.2 of the GCG Framework [REP7-020] it would be possible to make between 6-18% contribution to an air quality effect before triggering the need for action under the requirements of the framework, even in the event of an exceedance of a limit. For example, at Dane Street: 13% airport contribution + 5 percentage points = 18%. Also explain why this specific control needs to be a Requirement rather than part of the process set out in the framework and why the scaled criteria in Table</p>	9	<p>Please refer to Appendix B of this document for a response to this request.</p>

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	6.3 of the EPUK and Institute of Air Quality Management (IAQM) guidance 'Planning for Air Quality' 2017 would not apply.		
Effects on European Sites			
18	n/a – request not directed to the Applicant	n/a	n/a
Agricultural land and holdings [Chapter 6, APP-033]			
19	Sections 6.9.42 and 6.9.50 conclude that the loss of Best and Most Versatile land would result in a significant major adverse effect. Please confirm that omission of this from the assessment summary is a typographical error.	9	The Applicant confirms that the assessment in section 6.9 of Chapter 6 of the ES [APP-033] is correct and the omission of the significant effect identified from the summary table is an error. This does not alter the overall conclusions of the assessment, and a corrected version of Chapter 6 has been submitted at Deadline 9.
20	In addition, the ExA notes that no significant effects on agricultural holdings are anticipated. Given the eventual loss of a large area of land at the Winch Hill holding, explain how this conclusion has been reached with reference to Table 6.9 where loss of more than 20% of land farmed is a 'high' impact.	9	<p>As identified through ongoing engagement reported in Table 6.6, and paragraphs 6.7.24 and 6.6.25 of Chapter 6 [APP-033] describing the baseline, the agricultural land that was farmed under tenancy at Winch Hill within the Main Application Site is owned by the Applicant.</p> <p>The agricultural tenancy was terminated in 2020, it was therefore determined in the assessment that there would be no agricultural holdings affected by the Proposed Development (i.e. 0%). The only other agricultural holding directly adversely affected by the Proposed Development is the L&G owned land to the west of Junction 10 of the M1 and immediately to the north of Half Moon Lane, as assessed and reported in section 6.9 on agricultural holdings.</p>
Statements of Common Ground (SoCG)			

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21	The ExA note that the SoCGs submitted with Historic England [REP6-013] and Bedfordshire Fire and Rescue [REP6-041] have only been signed by the Interested Party. For completeness can the Applicant please sign these documents.	9	The Applicant confirms that signed versions of both SoCGs have been submitted at Deadline 9.
22	The ExA notes the comments made in the Applicant's D8 submission regarding the potential late submission of SoCGs. The ExA will be responding separately on this matter in conjunction with the Applicant's subsequent request regarding the late submission of a number of other documents.	n/a	Noted.
Response to further written question BCG.2.4 [REP7-087]			
23	Provide comment on the implications of the developments identified by the relevant planning authorities for the conclusions of the ES Chapter 21 In-combination and cumulative effects assessment [AS-032], if any.	9	<p>The only other developments of note raised by the Host Authorities, not already raised and responded to during the Examination, was the request for the following developments to be fully taken into account in the EIA:</p> <ol style="list-style-type: none"> 1. Wandon End Solar Farm – (Ref 22/03231/FP) 2. East of Luton Planning Application by Bloor Homes (Ref: 17/00830/1; 22/02905/FP; 22/02904/FP) <p>Development No.2 was taken fully into account in the cumulative assessment as evidenced by its inclusion on the Short List of developments to be considered [APP-141]. The Wandon End Solar Farm development was acknowledged in the ES (paragraph 21.3.10 of [AS-032]) but was not made available in time for it to be considered in full in the ES.</p>

Ref	Information Requested by the ExA	ExA's Deadline	Applicant's Response
			<p>An initial review of the cumulative assessment and the potential implications of including the Wandon End Solar Farm development has shown that the conclusions would not change for the majority of environmental aspects and matters reported in the ES. Where potential changes may be seen, such as landscape and visual, heritage or agriculture, the cumulative assessment will be updated and submitted at Deadline 10.</p>
<p>Rule 17 Applicant - Response to ISH9 Action Point 37</p>			
<p>24</p>	<p>The Applicant's D8 response to ISH9 Action Point 37 explains that "The mitigation being offered under the new Noise Insulation Scheme includes for properties inside the 54dBLAeq,16h and therefore includes more properties than are within Category Three". Paragraph 7.1.2 of the Statement of Reasons [AS-071] states that "Category 3 includes parties who the Applicant thinks would or might, if the DCO were made and implemented, be entitled to make a relevant claim for compensation under section 10 of the Compulsory Purchase Act 1965 (Ref 7.1) and/or Part 1 of the Land Compensation Act 1973 (Ref 7.2) and/or section 152(3) of the Act." If additional parties within the 54dB LAeq16hour contour are eligible to make a claim, explain why they do not qualify as Category 3 interests.</p>	<p>9</p>	<p>The Applicant can clarify that the eligibility for its noise insulation scheme, which is discretionary, is not the same as eligibility to make a relevant claim under section 10 of the Compulsory Purchase Act 1965 and/or Part 1 of the Land Compensation Act 1973 and/or section 152(3) of the Planning Act 2008. The contours for its discretionary noise insulation scheme purposefully go wider thereby demonstrating the generosity of the scheme on offer.</p> <p>Further, the Applicant can confirm that it does not consider that because there is an offer of noise insulation under the Compensation Policies, Measures and Community First [TR020001/APP/7.10] policy it does not mean that the Applicant considers those homeowners would have or would otherwise be eligible to make a relevant statutory claim. Noise contours do not determine entitlement or otherwise to compensation.</p> <p>The assessment of compensation is based on proven diminution in market value of the property, which is often influenced by factors other than noise, particularly when</p>

Ref	Information Requested by the ExA	ExA's Deadline	Applicant's Response
			<p>the property is located in an area close to an existing airport.</p> <p>There is a weight of precedent for assessment of compensation from the Upper Tribunal emphasised most recently in a case at London Southend Airport.¹ The case focused on the effects on property values due to changes in the number and types of commercial aircraft using the airport. In particular, the Tribunal found that any change of less than 3dB would be minimal and so no compensation was due.</p> <p>This provides support for the Applicant's approach to the Category 3 boundary definition for the application for development consent.</p>

¹ LCA/65-255/2019.

GLOSSARY AND ABBREVIATIONS

Term	Definition
AONB	Area of Outstanding Natural Beauty
DAS	Design and Access Statement
DCO	Development Consent Order
FTG	Fire Training Ground
GCG	Green Controlled Growth
LBC	Luton Borough Council
ES	Environmental Statement
ESG	Environmental Scrutiny Group
ExA	Examining Authority
LBC	Luton Borough Council
RFFS	Rescue and Fire Fighting Service
RPG	Registered Park and Garden
SoCG	Statement of Common Ground

APPENDIX A – DERIVATION OF NOISE ENVELOPE LIMITS

A.1.1.1 This Appendix provides a response to item 14 of the ExA's Rule 17 request as follows:

“Provide a detailed explanation of how the core growth and faster growth limits set out in Applicant's Response to Written Questions – Green Controlled Growth (GCG) [REP7-054] relate to the assessment tables provided in ES Appendix 16.1: Tables 7.40, 7.43, 7.46, 7.49, 7.52 and 7.55 [REP7-013] that set out the Applicant's assessed likely and worst case(s). In responding explain why interpolation would mean that values were set higher than an individual peak year.”

A.1.1.2 The Noise Envelope Limits are based on an interpolated forecast between assessment years. The interpolation results in Limit values being different to those in the individual assessment years as the assessment phases do not align (in number or duration) with the five-yearly noise limit phases.

A.1.1.3 **Table A.1.1** shows the interpolated forecast for the Core case, using the assessment year contour area values from Tables 7.40, 7.43, 7.46, 7.49, 7.52 and 7.55 of **Appendix 16.1 of the ES [TR020001/APP/5.02]**. Next to these are the derived noise Limits (as presented in response to Written Question GCG.2.4 [REP7-054]), which are calculated based on the highest contour area within each five-year period. This is also illustrated graphically in **Figure A.1.1** and **Figure A.1.2** which show that if any of the Limits were decreased, the forecast would result in breaches of noise Limits between assessment years.

A.1.1.4 **Table A.1.2** shows the equivalent data for the Updated Faster Growth forecast introduced in the **Applicant's Position on Noise Contour and Movement Limits [TR020001/APP/8.184]**, using the assessment year contour values from Tables 6.1 and 6.2 of the **Applicant's Position on Noise Contour and Movement Limits [TR020001/APP/8.184]** (for 2027) and Tables 12.12 and 12.13 of **Appendix 16.1 of the ES [TR020001/APP/5.02]** (for 2038 and 2042). The data is also shown graphically in **Figure A.1.1** and **Figure A.1.2**.

A.1.1.5 In deriving Limit values, the largest contour value in each five-year period is rounded up to the nearest 0.1 km². The approach of rounding upwards is considered appropriate when setting limits/caps. The approach also avoids the situation in which a potential breach of a Limit could be unreasonably exaggerated due to rounding. For example, the 'up to 2028' Limit of 33.00 km² is based on a calculated contour area of 32.94 km² in 2026 (see **Table A.1.2**). Using traditional rounding would result in a Limit of 32.90 km², which could then result in a breach if the actual contour area was 32.95 km², despite an increase in contour area against the value used to set the Limit of only 0.01 km² (0.03%). Contour areas are shown in **Table A.1.1** and **Table A.1.2** to two decimal places to illustrate the implications of rounding.

Table A.1.1: Derivation of indicative Core case Limits as provided in response to Written Question GCG.2.4 [REP7-054]. Assessment years in bold.

Noise Limit period	Year	54dB _{L_{Aeq,16h}} contour area (km ²)		48dB _{L_{Aeq,8h}} contour area (km ²)	
		Daytime forecast	Daytime Limit	Night-time forecast	Night-time Limit
	2019	35.35	-	45.27	-
	2020	34.76	-	44.88	-
	2021	34.17	-	44.50	-
	2022	33.58	-	44.12	-
	2023	32.99	-	43.73	-
	2024	32.40	-	43.35	-
	2025	31.81	-	42.97	-
Up to 2028	2026	31.22	31.30	42.58	42.60
	2027	30.63	31.30	42.20	42.60
	2028	30.47	31.30	41.84	42.60
2029 - 2033	2029	30.31	30.40	41.47	41.50
	2030	30.16	30.40	41.11	41.50
	2031	30.00	30.40	40.75	41.50
	2032	29.84	30.40	40.38	41.50
	2033	29.69	30.40	40.02	41.50
2034 - 2038	2034	29.53	29.60	39.66	39.70
	2035	29.38	29.60	39.29	39.70
	2036	29.22	29.60	38.93	39.70
	2037	29.06	29.60	38.57	39.70
	2038	28.91	29.60	38.20	39.70
2039 - 2043	2039	28.75	32.60	37.84	43.20
	2040	29.70	32.60	39.17	43.20
	2041	30.65	32.60	40.51	43.20
	2042	31.60	32.60	41.84	43.20
	2043	32.55	32.60	43.17	43.20

Table A.1.2: Derivation of Updated Faster Growth forecast Limits as applied in the **Green Controlled Growth Framework** at Deadline 9 [TR020001/APP/7.08]. Assessment years in bold.

Noise Limit period	Year	54dB _{L_{Aeq,16h}} contour area (km ²)		48dB _{L_{Aeq,8h}} contour area (km ²)	
		Daytime forecast	Daytime Limit	Night-time forecast	Night-time Limit
	2019	35.35	-	45.27	-
	2020	35.01	-	44.98	-
	2021	34.66	-	44.70	-
	2022	34.32	-	44.42	-
	2023	33.98	-	44.13	-
	2024	33.63	-	43.85	-
	2025	33.29	-	43.57	-
Up to 2028	2026	32.94	33.00	43.28	43.30
	2027	32.60	33.00	43.00	43.30
	2028	32.27	33.00	42.53	43.30
2029 - 2033	2029	31.94	32.00	42.06	42.10
	2030	31.62	32.00	41.59	42.10
	2031	31.29	32.00	41.12	42.10
	2032	30.96	32.00	40.65	42.10
	2033	30.63	32.00	40.19	42.10
2034 - 2038	2034	30.30	30.40	39.72	39.80
	2035	29.98	30.40	39.25	39.80
	2036	29.65	30.40	38.78	39.80
	2037	29.32	30.40	38.31	39.80
	2038	28.99	30.40	37.84	39.80
2039 - 2043	2039	29.88	32.60	39.17	43.20
	2040	30.77	32.60	40.51	43.20
	2041	31.66	32.60	41.84	43.20
	2042	32.55	32.60	43.17	43.20
	2043	32.55	32.60	43.17	43.20

Figure A.1.1: Daytime Updated Faster Growth (UFG) and indicative Core case Limits and forecasts

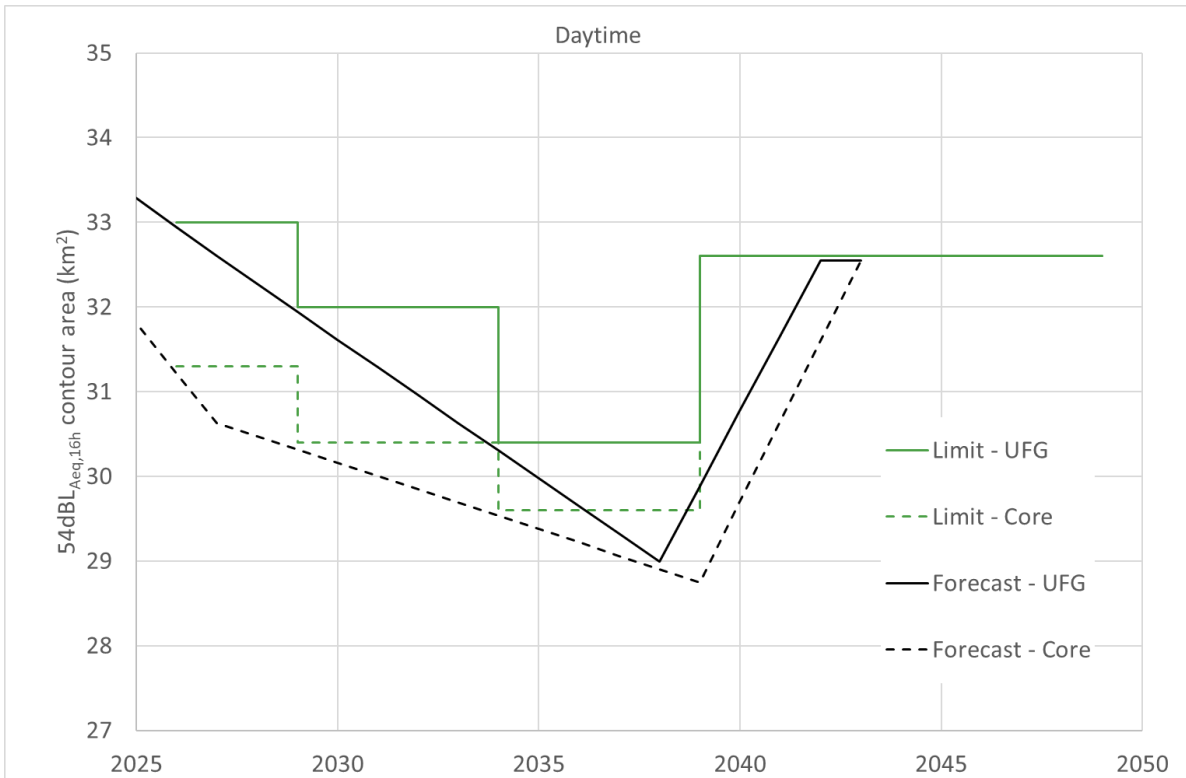
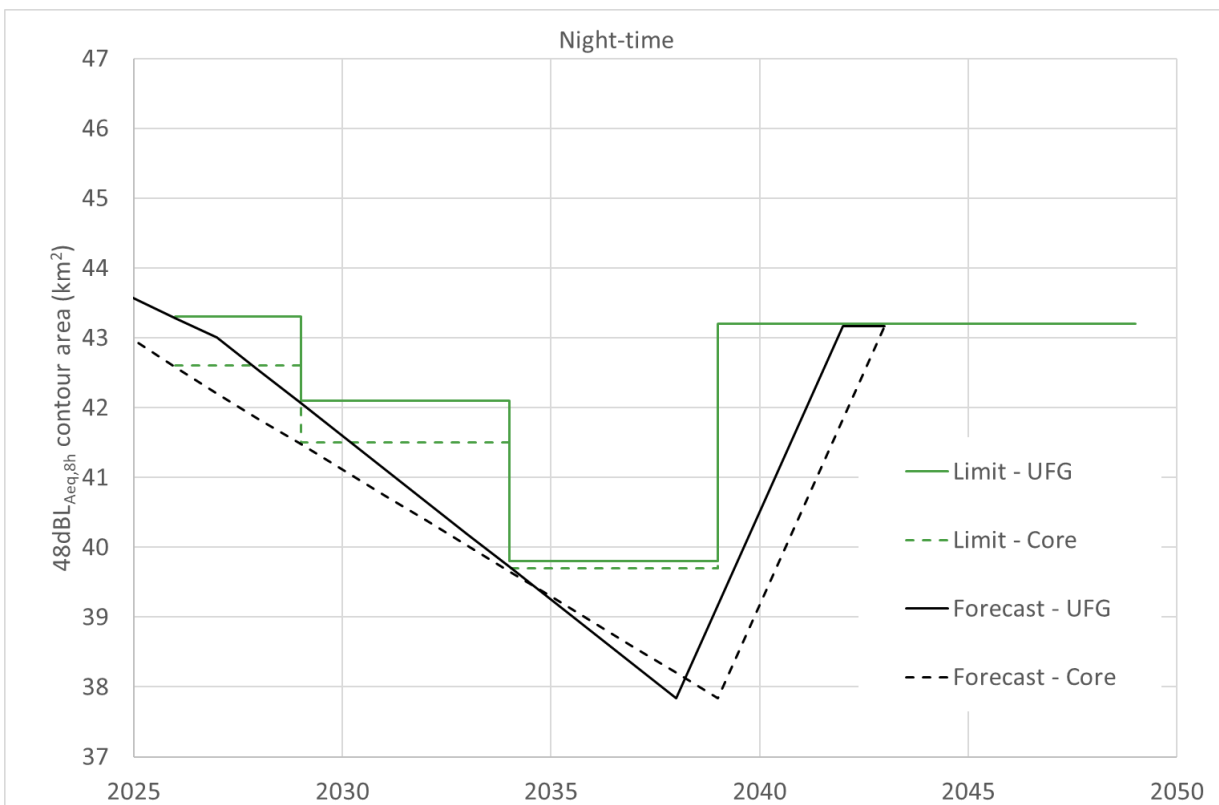


Figure A.1.2: Night-time UFG and indicative Core case Limits and forecasts



APPENDIX B – AIR QUALITY WORKED EXAMPLE

B1 Introduction

B.2.1.1 This Appendix provides a response to item 17 of the ExA's Rule 17 request as follows:

“Provide a worked example to demonstrate how the 5% criteria would apply to an exceedance of a limit. The ExA currently understands that in applying 5% to the criteria in Table 4.2 of the GCG Framework [REP7-020] it would be possible to make between 6-18% contribution to an air quality effect before triggering the need for action under the requirements of the framework, even in the event of an exceedance of a limit. For example, at Dane Street: 13% airport contribution + 5 percentage points = 18%. Also explain why this specific control needs to be a Requirement rather than part of the process set out in the framework and why the scaled criteria in Table 6.3 of the EPUK and Institute of Air Quality Management (IAQM) guidance ‘Planning for Air Quality’ 2017 would not apply.”

B2 Rationale for the proposed approach to air quality within GCG

- B.2.1.2 The GCG Framework is an explicit commitment to link environmental performance to the future growth of the airport. In this context, ‘environmental performance’ relates to the environmental impacts identified and assessed as part of the application for the development consent. The commitment therefore ensures that the identified environmental effects, which for the application to be granted, must have been determined to be acceptable in the overall planning balance, will not be exceeded.
- B.2.1.3 The proposed approach for air quality within GCG needs to reflect the specific challenge for air quality (unlike the other three environmental topics in GCG) that monitoring cannot directly identify either the total impact of the airport, or the additional impacts (beyond the currently consented baseline) associated with Proposed Development. The central question that the GCG approach therefore seeks to answer is whether the airport is having more of an impact on air quality than formed the basis of it getting consent.
- B.2.1.4 This reflects the fact that pollutant emissions from non-airport sources can, and are likely to, change over time, leading to changes in monitored concentrations, but those changes are completely outside of the control or influence of the airport and the airport operator. It can only be reasonable and appropriate therefore to link GCG, and the corresponding controls on growth, with the actual contributions directly related to the operation of the airport itself, and whether those are greater or lesser than those forecast in the Environmental Statement.

B3 Why a 5% buffer is needed

- B.2.1.5 A 5% buffer has been proposed for the following reasons:
- a. Uncertainty in modelling and monitoring

Like any form of modelling, the assumptions used and limitations of the modelling process introduce a degree of uncertainty to the modelled results. Whilst the air quality modelling has been undertaken in accordance with all relevant LAQM guidance, and adheres to the necessary criteria and requirements, as set out in **Appendix 7.1: Air Quality Methodology** of the **ES [AS-028]**, there will always be some degree of variation between the modelled results and future monitoring data. For example, the air quality modelling was informed by 'perfect knowledge' using traffic modelling data that forecasts the number of vehicles on the roads of interest at all times of day. However, those traffic forecasts in and of themselves will also have a degree of variation between forecast and actual flows in future, and the same level of knowledge or information will not be readily available to inform the calculation of future air quality changes. The 5% buffer therefore allows for a reasonable and expected level of variation between monitored and modelled pollutant concentrations in future.

b. Proportionality of any increase

The second reason is that the buffer does provide a link with the criteria in Table 6.3 of the EPUK and Institute of Air Quality Management (IAQM) guidance 'Planning for Air Quality' 2017 and the proportionality of any increase. Without a buffer, a change of only $0.01 \mu\text{g}/\text{m}^3$ would be sufficient to trigger GCG, which would plainly be a negligible change in impact and with reference to the point above, could not even be measured with sufficient certainty to that degree of accuracy.

A 5% increase in the airport-related concentration relative to Air Quality Assessment Level (AQAL) (which the Limits are aligned with) would represent a change in significance of the air quality impact (i.e. moving from left to right across a row in Table 6.3 of the EPUK/IAQM, assuming the total concentration had not also changed band). Therefore, the 5% 'buffer' ensures that the GCG processes would apply where there had been a change in environmental effects directly as a result of the airport.

- B.2.1.6 It is not considered reasonable to consider changes in the banding for total concentrations (i.e. any movements vertically in Table 6.3 of the EPUK/IAQM guidance), because the majority of emissions are not related to the airport and cannot be controlled or influenced. Instead, the only criteria that should be used to assess a breach of the GCG Limit is one that the airport operator can control or influence.

B4 Worked Example for Application of 5% Criteria

- B.2.1.7 **Table B.1.1** sets out the specific percentages and concentrations to inform the worked example requested for the location at Dane Street identified by the ExA. The key sources of this information are as follows:

- a. The Limit and Thresholds from Table 4.3 of the **GCG Framework [TR020001/APP/7.08]**;
- b. The % contributions of airport-related emissions from Table 4.2 of the **GCG Framework [TR020001/APP/7.08]**, and the % of total concentrations (from

all sources, including non-airport related) relative to the Limit from Table A.1 of the **GCG Explanatory Note [TR020001/APP/7.07]**. These percentages have also been provided as absolute concentrations to aid clarity.

- c. The 5% 'buffer' referenced in requirement 19 of Schedule 2 of the **Draft DCO [TR020001/APP/2.01]**, which has been converted to a concentration to aid clarity.

Table B.1.1: Information for air quality worked example

Information	Value	Source	Calculation Ref.
Location	Dane Street		
Pollutant	NO ₂		
Phase	1		
Limit	40µg/m ³	Table 4.3 of the GCG Framework [TR020001/APP/7.08]	(a)
Level 2 Threshold	38µg/m ³		(b)
Level 1 Threshold	30µg/m ³		(c)
Total modelled concentration	15.1µg/m ³	ID H299 in Table 4.1 of ES Appendix 7.4 Air Quality Sensitivity Tests [REP4-015]	(d)
Of which airport-related	5.1µg/m ³	Additional analysis of modelling results reported in [REP4-015]	(e)
Of which non-airport related	10.1µg/m ³		(f)
Total modelled concentration as % of Limit	38%	Table A.1 of the GCG Explanatory Note [TR020001/APP/7.07]	(g) = (d/a)
Airport-related contribution as % of Limit	13%		(h) = (e/a)
Non-airport-related contribution as % of Limit	25%	Calculated	(i) = (f/a)
Additional airport-related contribution required for exceedance of air quality Level 2 Threshold or Limit	5%	Requirement 19 of Draft DCO [TR020001/APP/2.01]	(j)
Equivalent concentration of NO ₂	2µg/m ³	Calculated	(k) = (j*a)
Total airport-related contribution as % of the Limit required for exceedance of air quality Level 2 Threshold or Limit	18%	Calculated	(l) = (h+j)
Equivalent airport contribution as a concentration of NO ₂	7.1µg/m ³	Calculated	(m) = (e+k)
Percentages are rounded to zero decimal places. Pollutant concentrations are rounded to one decimal place. Values may not sum due to rounding.			

- B.2.1.8 The process for applying the 5% 'buffer' would be based on the following steps:
- B.2.1.9 Annual monitoring of the NO₂ takes place and is reported in the annual Monitoring Report.
- If the Level 1 Threshold is not exceeded (i.e. <math><30\mu\text{g}/\text{m}^3</math>), the results are reported and no further action needs to be taken.
 - If the Level 1 Threshold is exceeded but not the Level 2 Threshold (i.e. $\geq 30\mu\text{g}/\text{m}^3$ but <math><38\mu\text{g}/\text{m}^3</math>), the results are reported and the Monitoring Report must include commentary on the avoidance of an exceedance of Limit, as per requirement 22.
 - If the Level 2 Threshold is exceeded (i.e. $\geq 38\mu\text{g}/\text{m}^3$), the results are reported and the airport operator must determine the extent of its contribution to determine if a Level 2 Threshold or Limit has been exceeded, as per requirement 23. This is the scenario considered in this worked example.
- B.2.1.10 Where a Level 2 Threshold or Limit is exceeded, the airport operator would be required to determine its contribution to the observed concentration (from the monitoring). As set out in response to Written Question GCG.1.10 in **[REP 5-090]**, the Applicant has not sought to be overly specific as to how this is achieved, and the introduction of an "unless otherwise agreed" provision to requirement 18 at Deadline 7 (now requirement 19 in the Deadline 9 version of the Draft DCO) was done to provide flexibility that would avoid the need for the calculation of absolute concentrations of pollutants, should the airport operator and ESG agree that a breach has occurred.
- B.2.1.11 However, should it be determined that the calculation of absolute concentrations is required, as the initial analysis undertaken has been inconclusive as to the source of an increase, then the 5% 'buffer' would apply.
- B.2.1.12 As shown in **Table B.1.1**, the 5% 'buffer' is relative to the Limit, which equates to an additional $2\mu\text{g}/\text{m}^3$ of NO₂. Therefore, a breach of the Level 2 Threshold or Limit would only be deemed to have occurred (and the corresponding requirements to produce a Level 2 Plan or Mitigation Plan apply) if the airport-related contribution had increased from $5.1\mu\text{g}/\text{m}^3$ (as determined by the modelling for the ES) to $>7.1\mu\text{g}/\text{m}^3$.
- B.2.1.13 This additional step has been introduced in recognition of the fact that there are multiple contributing sources to pollutant concentrations, and in most locations, those directly attributable to the airport are negligible. It would therefore not be proportionate or reasonable for the GCG Limits and Thresholds to prevent further growth where the impacts of the Proposed Development are no greater than that forecast in the ES, and a breach of the Limits has been proven to be attributable to non-airport related sources.

B5 Scenarios to illustrate the need for the 5% buffer

- B.2.1.14 Two specific examples to illustrate the need for the 5% buffer, with reference to the information set out in **Table B.1.1**, are as follows.

- a. Scenario 1: Monitoring results show an exceedance of a Limit, with an observed concentration of $41\mu\text{g}/\text{m}^3$. The airport-related contribution has been shown to increase from $5.1\mu\text{g}/\text{m}^3$ to $6.1\mu\text{g}/\text{m}^3$ (an increase from 13% to 15%). The non-airport related contribution however had therefore increased significantly from $10.1\mu\text{g}/\text{m}^3$ to $34.9\mu\text{g}/\text{m}^3$ (an increase from 25% to 87%). Plainly, the overwhelming cause of the exceedance in this scenario is unrelated to the airport, and it would be wholly disproportionate for there to be controls on growth at the airport. In this scenario, the ESG would therefore certify that no breach of the Limit had occurred, and no Mitigation Plan would be required. The air quality issues would need to be addressed by the relevant local authority in line with their statutory duties.
- b. Scenario 2: Monitoring results again show an exceedance of a Limit, with an observed concentration of $41\mu\text{g}/\text{m}^3$. The airport-related contribution has been shown to increase further from $5.1\mu\text{g}/\text{m}^3$ to $9.1\mu\text{g}/\text{m}^3$ (an increase from 13% to 25%). The non-airport related contribution however has therefore also increased significantly from $10.1\mu\text{g}/\text{m}^3$ to $31.9\mu\text{g}/\text{m}^3$ (an increase from 25% to 80%). Whilst the cause of the breach in this scenario is still largely caused by non-airport related factors, the airport-related contribution is still such that a breach could have been avoided if impacts were the same as those forecast in the ES. In this scenario, the 5% buffer has been shown to have been exceeded, and the ESG would certify that a breach of the Limit had occurred, and a Mitigation Plan would be required. However, in recognition of the proportionality of the airport's contribution to the breach, such a Mitigation Plan could include, for example, a financial contribution to measures being delivered by a local authority. This approach is set out in paragraph 3.3.26 of the **GCG Explanatory Note [TR020001/APP/7.07]**.

- B.2.1.15 The examples provided have used annual mean NO_2 results which are useful as it provides a good example to work with, however the 5% buffer is also very important for $\text{PM}_{2.5}$ where the total concentration is already closer to the standard and the method for monitoring and modelling are not accurate to within such low margins. For $\text{PM}_{2.5}$, 5% of the standard in 2040 is just $0.5\mu\text{g}/\text{m}^3$ and with most of the changes as a result of the project being $<0.1\mu\text{g}/\text{m}^3$ it would not be reasonable to apply the GCG process to a monitored or modelled change which is well below the level of accuracy in each process.
- B.2.1.16 The response set out above has demonstrated why retaining the 5% change is proportionate to the risk from airport contributions and provides a reasonable method for avoiding a disproportionate review process based on the level of accuracy of modelling and monitoring equipment.

B6 Why specific control needs to be a requirement

- B.2.1.17 The Applicant considers it appropriate to be secured by way of requirement, rather than in the Framework, because it makes clear how an "exceedance" is to be interpreted in the provisions which follow. The Applicant does not consider that the principle enshrined in the requirement is contested, nor that it is capable of review in the way that other elements of GCG which are secured by

the Framework are likely to be (e.g. the Limits in response to the specified changing of circumstances).

REFERENCES

- Ref 1 Chilterns AONB Management Plan 2019-2024. Chilterns Conservation Board
Ref 2 CAP 168: Licensing of Aerodromes. Civil Aviation Authority, Twelfth edition, January 2022
Ref 3 UK Certification Specification & Guidance Material for Aerodrome Design CS-ADR-DSN For Regulation (EU) No. 139/2014 as retained (and amended in UK domestic law) under the European Union(Withdrawal) Act 2018
Ref 4 Historic Environment Good Practice Advice in Planning: 3 The Setting of Heritage Assets 2017, Historic England