

Note

| Title | ES Noise Clarifications | | |
|-----------|-------------------------|-----------|----|
| Project | Luton Airport 19mppa ES | | |
| Reference | 271E.NT2.0 | Author(s) | VC |
| Date | 2 September 2021 | Reviewer | ВН |

1.0 Introduction

- 1.1 In Memo VC 20-05/M1-0 dated 21 February 2021, I reviewed Noise Chapter 8 of the ES. It accompanied the LLAOL application to vary existing Conditions 8 and 10, required to increase the permitted number of passengers by 1mppa to a maximum 19mppa. I noted there were several matters requiring further information and/or careful consideration in determining whether noise is a reason for refusing the application.
- 1.2 In Memo VC 20-05/M2-0 dated 16 July 2021, I commented on the updated Volume 2 of the ES, including revisions to Chapter 8 dated May 2021. Further to that, I have reviewed the Wood letter dated 25 August 2021, plus attached Noise Clarifications document and table of responses to specific queries (Section 4 dealing with noise). I respond to the latest information using the headings in the Noise Clarifications document.

2.0 Forecasting

- The summer period operating figures set out in Table 3.3 of the ES dated January 2021 are justified because they were considered accurate at the time of submission. It seems that in January 2021, no recognition was made of the significant decrease in operating numbers in 2020 due to Covid 19. I would have expected these to be clearly signposted in the interim operating reports, even if final figures were not available for the full year.
- 2.2 I accept that the noise case rests on the expected effects arising in future years for which operating numbers are forecast. Wood explain the basis on which fleet replacement assumptions have been made and I do not take issue with it. So far as the total operating numbers are concerned, in the absence of contrary advice from an aircraft forecasting expert I have no basis for disputing the figures. I would note, however, that the retention of a clearly infeasible number for 2020 does not enhance the credibility of the numbers forecast.

3.0 Validation of aircraft

- I previously noted that the revised ES noise chapter would benefit from including the measured data used to justify the modelled noise levels for the A321neo. Comments made by others (David Gurtler for LBC and Andrew Lambourne for LADACAN) were also querying the basis on which the A321neo noise levels had been established. Wood clarify that that the relevant noise data are justified by measurements carried out in 2019 and 2020, the results of which are summarised in Tables 1 and 2.
- 3.2 The data in the tables indicate that there is virtually no difference in noise levels between the A321neo and A321ceo on arrival based on measurements at NMT1, while on departure the difference ranges from -1.3 to -2.1dB across the three monitoring points, NMT1-3. Based on these results, the corrections made in the ES appear to me to be reasonable.



- 3.3 The point is made that noise levels from operations of the A321neo in the future may be lower on account of:
 - future mixes including a greater percentage of short haul movements which involve lower operating weights and consequently lower thrust and noise levels on departure.
 - future models benefitting from noise reduction measures implemented by Airbus
- 3.4 Given the limited benefits associated with the first and the uncertainty associated with the second of these points, I agree that these should not be factored into the current assessment.

4.0 Scenario years

- Wood indicate that it is not necessary to provide numbers of people significantly affected by noise, and therefore eligible for sound insulation treatment under the terms of the SIGS in years 2025 to 2027, as they would have anyway fallen eligible during the preceding worst-case year of 2022. I accept this point subject to SIGS being provided in advance of the significant adverse effects occurring. This is unlikely to happen in practice.
- 4.2 I believe this point needs to be addressed if the S.106 Agreement by ensuring it is appropriately worded. The roll out of SIGS needs to be undertaken in a manner that prioritises treatment to those most significantly affected and ensures that all qualifying properties are offered sound insulation as soon as it is known that the qualifying threshold will be exceeded. The agreement should cover matters of community engagement, timing and funding of works, together prioritisation to ensure that no property that qualifies for, and applies for, enhanced sound insulation is treated in time to mitigate the forecast significant noise effect.
- 4.3 Since the airport is committing to delivery of a sound insulation grant scheme that delivers the required mitigation, no eligible property should be left untreated for any longer than the minimum practicable time necessary to provide the enhanced insulation if the offer is accepted.
- 4.4 I previously noted that since it is established that the LT noise contours limits will be achieved three years after 2028, further details including the number of dwellings within the respective SOAEL contours should be provided for the year 2031. These figures are provided in Table 4.1.

5.0 Assessment

5.1 No comment.

6.0 Responses

6.1 No comment.

7.0 Other matters

7.1 Responses made by wood to comments from NHDC and LADACAN need to be seen and, if necessary, commented on by those parties.

Issues and response table

Section 4 of the Issues and Response table (number not given on document) deals with noise.



I do not recognise most of the issues raised, meaning I have not seen them before. It is important, therefore, that the document is made available for review by those parties who did raise the issue to determine whether the response is deemed adequate.

I have no comments on the responses to the issue pertaining to tables 8.10 to 8.21, which I recognise as having been raised by me.

