
TECHNICAL MEMO

Our Ref: 4937_002M_1-0_CW



To: Christopher Brady
Planning Department
London Borough of Hillingdon

From: Chris Wood
Associate Director
E: chris.wood@andersonacoustics.co.uk
T: 020 3176 6933

Date: 3 November 2020

**SUBJECT: STANFORD HOUSE, 9 NESTLES AVENUE, HAYES
51175/APP/2020/2543
AUGUST 2020 NOISE AND VIBRATION ASSESSMENT REVIEW**

1 INTRODUCTION

1.1 Brief

Anderson Acoustics Ltd has undertaken a review of the Noise and Vibration Assessment (NVA) report produced by Mayer Brown Ltd and submitted as part of planning application 51175/APP/2020/2543, to assist London Borough of Hillingdon (LBH) in the determination of the application. The site is known as Stanford House, 9 Nestles Avenue, Hayes. A description of the proposed development is given in section 1.2 below.

This document (ref. 4937_002M_1-0_CW) presents the findings of the review in relation to the potential noise effect(s) of the development on the environment, and the potential noise and vibration effect(s) of the environment on the development, in the context of national and local policy and good practice guidance. Recommendations are made for any further actions considered appropriate.

Anderson Acoustics has not engaged with any other parties in relation to this latest NVA report and review.

1.2 Application Proposal

The application is for:

Demolition of existing buildings and redevelopment to provide a building up to 11 storeys comprising residential accommodation, associated landscaping, access, car parking and cycle parking. Detailed description: To provide 103 residential units (59 x 1-bed, 32 x 2-bed and 12 x 3-bed).

It is notable that the application is in keeping with the surrounding (ongoing and proposed) development, but that there would be a period where the development in question is next to existing commercial/light industrial operations before this is replaced with residential accommodation (subject to planning). These two scenarios are referred to within the application documents as “Day 1” and “Day 2”.

2 DOCUMENTS REVIEWED

2.1 Noise and Vibration Assessment Report

- **Noise and Vibration Assessment** 9 Nestle [sic] Avenue, Hayes London UB3 4SA, by Mayer Brown Ltd (MB) for Healey Development Solutions (Hayes) Ltd (ref. DWNestleAvenue(N)4.9, Version 1.1, dated August 2020). Hereafter referred to as the NVA report.

2.2 Other Documents

The following plan and documents were reviewed for background information:

- Design & Access Statement, TateHindle Ltd (ref. 15406_L11_002_01, 6th August 2020). Hereafter referred to as the DAS.
- Energy & Sustainability Statement, Mecserve Ltd (ref. P20-086, issue no. 02, July 2020).
- Nestles Avenue Day 2 Master Plan, TateHindle Ltd (drawing no. A(03)002B, revision 03, 3rd June 2020).
- Section AA, TateHindle Ltd (drawing no. A - (04) - 200, revision 05, 15th June 2020).
- Section CC, TateHindle Ltd (drawing no. A - (04) - 100, revision 05, 3rd June 2020).

The following were also reviewed:

- Noise Supplementary Planning Document (SPD) - London Borough of Hillingdon, April 2006.
- Local Plan: Part 1 Strategic Policies (Adopted November 2012).
- Local Plan: Part 2 Development Management Policies (Adopted January 2020).

3 REVIEW

3.1 Noise and Vibration Assessment Report

3.1.1 Overview

The NVA report is 134 pages, with 96 pages of main text and 30 pages of appendices. For context, the following are taken from the introductory section:

- 1.3 A previous planning application (LPA case reference 51175/APP/2018/4260) for a mixed-use development at 9 Nestles Avenue was appealed for non-determination on 7 June 2019 and subsequently refused by Members of the LBH's Major Application Planning Committee on 19 June 2019, citing eleven reasons for refusal.

- 1.4 The fifth reason for refusal related to perceived noise impact of the scheme and stated that:

"The development provides a high proportion of single aspect dwellings and dwellings with their sole aspect facing towards Strategic Industrial Land. The development fails to provide sufficient separation from the western boundary of the site to mitigate against a potential noise generating use on the neighbouring site and as such, the proposal fails to take responsibility for mitigating impacts from existing noise-generating activities or uses on the proposed new noise-sensitive residential development and thereby fails to provide a suitably high quality of residential amenity for future occupiers contrary to Policy BE1 of the Local Plan: Part One (November 2012); Policy OE1 of the Local Plan: Part Two (November 2012) and Policy 7.15 of the London Plan (2016) and Paragraph 182 of the NPPF (2019)."

- 1.5 Following the submission of additional evidence in response to LBH's Statement of Case and detailed technical discussions with an external acoustic consultant (Anderson Acoustics) commissioned by LBH to represent them at the appeal, noise was not pursued as a reason for refusal.

1.6 Notwithstanding the above, the appeal was dismissed following a Public Inquiry held between 18th and 21st February 2020. This report accompanies a revised application which seeks to address the reasons for the dismissal of the Appeal. Changes implemented in the revised proposals include:

- A reduction in the ground floor footprint of the building (by around 35%);
- The removal of ground floor commercial accommodation;
- The introduction of new duplex flats at ground and first floor level to the eastern and southern boundaries;
- The introduction of some car parking at ground floor level (for disabled occupants and the larger three bed units);
- The incorporation of a part basement to accommodate plant; and
- A marginal increase in height (less than an additional full storey of accommodation).

1.7 This revised Noise and Vibration Assessment therefore seeks to amplify on those matters addressed in the aforementioned rebuttal reports, within the context of the revised development proposals.

As we would expect, the report references national, region and local planning policy and the most relevant guidance (including ProPG¹ and AVO Guide²), and presents assessments of the sound/noise (and vibration) from existing sources upon the proposed development and of sources associated with the development's operation on existing receptors. Some consideration is also given to noise and vibration associated with the construction phase, which is helpful, but not necessary a default requirement at this stage.

Despite referencing the Local Plan, there is no reference to Policies OE1 or BE1, which are referenced in the June 2019 refusal notice. There is also no reference to the Council's 2006 Noise SPD. Given the other references, however, including the use of best practice guidance, this is not considered to be significant, whilst any further requirement to consider the Noise SPD can be conditioned (as per Section 4 below).

The suitability of the proposals is considered to rest on whether the noise environment outside the development's western elevation is genuinely "mixed", as MB believes, and not, therefore, dominated by noise of a commercial/industrial nature. Whilst we would argue that the data could be interpreted either way – and there's no denying the proximity of potentially key sources of noise – it is not proposed to debate this further (especially since the premises in question are subject to compatible redevelopment in any case). Instead, it is recommended this is checked upon completion (secured by condition).

The NVA report is discussed in further detail below, with our recommendations presented in Section 4.

3.1.2 The potential noise effect(s) of the development on the environment

As a purely residential development, the risk of significant noise effects on the environment is likely to be low. However, the scheme does include for a number of heat pumps (15 assumed) at roof level, which have helpfully been given detailed consideration within the NVA. We are content with the assessment at this stage, which identifies both existing and future noise-sensitive receptors, and we recommend a condition is imposed for the assessment to be finalised once the final plant selections have been made.

In addition to which, the development's vehicle movements are also identified as a potential source of noise, but discounted out on account of the low numbers. We would agree with the conclusion in this regard; however, LBH should be mindful of the cumulative effect of the wider development on the flows on Nestle Avenue and the resultant change in sound levels at existing dwellings.

¹ ProPG: Planning & Noise (Professional Practice Guidance on Planning & Noise, May 2017).

² Acoustics Ventilation and Overheating Residential Design Guide (January 2020).

Some consideration is also given to noise and vibration during the construction of the proposed development, with generic mitigation measures and assessment criteria proposed. This is helpful, but does not change anything in terms of the requirement for a condition or conditions in this regard.

See Section 4 'Recommendations' below.

3.1.3 The potential effect(s) of the environment on the development

For context, Figure 2.2 from the NVA report is presented below.



Figure 2.2. Site Location

The site is shaded pink, and which can be seen to fall within a wider development area (comprising Sites A, B and C) allocated for residential-led, mixed-use development. Site A is the site of the former Nestlé factory, which has already been demolished, and with construction of the development already underway.

In terms of existing noise sources, it can be seen that the site is fronting Nestles Avenue, which is primarily residential in nature, and somewhat removed from the railway lines to the north. We would not expect significant noise from these two sources, therefore – with the development proposals presenting a blank façade towards the railway in any case on account of adjoining (proposed) development. Indeed, the NVA report identifies that the site is “low” risk in accordance with the ProPG Stage 1 Initial Site Risk Assessment. We would also not expect significant vibration or groundborne noise from the operation of the railway, which is confirmed within the NVA report.

Of more potential significance is considered to be the site’s proximity to Squirrels Trading Estate (to the north) and 7 Nestles Avenue (to the west). This is better shown in the aerial photograph overleaf.



Source: Imagery ©2020 Google, Map data ©2020 (as annotated by Anderson Acoustics).

Note: The former Nestlé factory has since been demolished and construction started on the residential-led development.

The general argument is made in the NVA report that noise from the Estate is not dominant and thus the environment is treated as “mixed”, whereby the same assessment methodology and criteria for transportation sources apply. The majority of the assessment is presented on this basis, therefore; however, separate consideration is given to noise from the Estate and 7 Nestles Avenue nonetheless, which is discussed below.

Notwithstanding the low (noise) risk, the NVA report also presents a ProPG Stage 2 Full Assessment, with the aim of demonstrating “good acoustics design”. This is a helpful and robust approach, and should ensure national policy compliance. No reference is made to LBH’s Noise SPD; however, consideration of ProPG is considered sufficient in this regard.

In the event, a number of measures are listed as part of the design. These include the northern elevation being a blank façade (but which is perhaps more about enabling adjoining development than providing acoustic screening), the use of MVHR units (as a result of the SAP calculations), the use of solid balustrades to balconies on the western elevation and acoustically absorptive soffits to minimise potential noise reflections from the underside of projecting balconies. The proposed block is also set further back from 7 Nestles Avenue than the previous scheme design, and with standard thermal double-glazing being more than sufficient acoustically.

Assuming the commercial/light industrial sources are not dominant, therefore, the measures and design are considered sufficient acoustically (i.e. in terms of environmental noise egress) and that the relevant national, regional and local policies would be met in this regard.

As to whether the commercial/light industrial sources are dominant, it is considered that the presented data could be interpreted either way. Certainly, however, MB has visited site on numerous occasions and undertaken a number of measurements, and is clearly convinced that: the environment is mixed; there would be no significant adverse noise effect on the proposed development; and “the proposed development does not create any intrinsic conflict with the existing employment uses of the adjoining Squirrel’s Trading Estate...” (which is assumed to include 7 Nestles Avenue, also).

Accordingly, it is not proposed to debate the data further – especially since the premises in question are subject to compatible redevelopment in any case – but rather we would recommend a suitably worded condition for this to be checked upon completion.

It should be noted that, understandably, the assessments make use of previously measured sound levels, at currently accessible locations. It's questionable, however, how these will relate to the "Day 1" scenario, once the eastern elevation of 7 Nestles Avenue has been revealed and the proposed block constructed, with the western elevation perhaps better screened from the surrounding ambient and background sources than the relevant measurement location(s).

It should also be noted that there is no mention of acoustic screening along either the western boundary with 7 Nestles Avenue or at the exposed section of the northern boundary with the Estate. This is the case for both the NVA report and the DAS. The later does mention and show tree planting in front of 7 Nestles Avenue, but this is not for acoustic purposes, and, indeed, may not be required in this regard, but where, therefore, there is potential for such screening should this be required and worthwhile. In terms of the northern boundary, a double-door/gate arrangement is indicated in plan form in the DAS, as if access is required to/from the Estate, but there's no mention of their construction. Given the height of the proposed development, the coverage of any such acoustic screening in this location will be limited; however, given the potential proximity of activities within the Estate, worthwhile attenuation could be achieved for ground floor locations, and so this is a measure that could also be explored if required.

4 RECOMMENDATIONS

If LBH is minded to grant planning permission, then the following actions are recommended:

1. Condition the adoption of the proposed noise mitigation measures.
2. Condition the requirement for a Noise SPD/BS 4142 assessment of the final plant selection and agreement of any required mitigation.
3. Condition the requirement for assessment of the noise within the units associated with the ductwork and operation of the MVHR systems.
4. Condition the requirement for measurement and assessment of any noticeable commercial/industrial noise from existing sources in accordance with the Noise SPD/BS 4142 (and BS 8233, where applicable) once at least the lower three floors of the development have been construction and before the development is occupied.

If point 4. is not considered reasonable, then we would recommend that, either via condition or as an addendum to the NVA report, the assessment is updated to reflect both the requirements of the Noise SPD (i.e. a rating level at least 5 dB below the relevant L_{A90}) and the "screened" conditions of the development's western elevation (whereby alternative background sound level(s) may apply).

DOCUMENT END