

29 June 2021

Energy Assessments / Planning & Assessments Department of Planning, Industry and Environment 4 Parramatta Square, 12 Darcy Street PARAMATTA NSW 2150

Attention: Nicole Brewer

Dear Ms Brewer

## State Significant Development (SSD 8392) Modification 1 – RFI 22899008 (RFI)

I refer to your letter dated 22 June 2021 requesting further information on project details, relating to the assumptions and methodologies followed in calculating the operational noise levels presented in the project's Modification Report - Appendix A Noise Assessment Report prepared by Spectrum Acoustics. The matters raised in the Department's information request are addressed in this letter.

## 1. Confirmation of assumptions used for operational noise sources

- 1.1. It can be confirmed that Edify Energy provided Spectrum Acoustics with comprehensive sound power level data from two leading battery energy storage system providers. To ensure a conservative and technology agnostic approach was assessed, Spectrum Acoustics selected the battery system that produced the higher sound power level during the noise emission calculations.
- 1.2. A total of 170 battery enclosures was modelled, achieving a storage capacity of 400 MWh.
- 1.3. The battery system enclosures (noise sources) were modelled by calculating a peak noise power level of 84 dB(A).
- 1.4. It is noted that the receivers of interest are located to the west of the proposed battery energy storage system and therefore it is assumed that the noise levels attenuate for each eastern row of battery enclosures. For example, the next row (east of the first, western row) was modelled at 74 dB(A). The next row considered 64 dB(A) and the remaining rows were modelled at 60 dB(A), as 24 dB is the practical limit for barrier insertion loss.
- 1.5. Noise emission calculations were performed using the Environmental Noise Model (ENM, v3.06), which included the cumulative noise sources detailed above.

Please let me know if you have any queries.

Yours faithfully

Claire Driessen



Senior Development Manager Edify Energy Pty Ltd

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