6A and 6B Nutley Terrace

Details of the Proposed External Lighting from a Bat Conservation Perspective

By: Sian Baxter of Sian Baxter Lighting Design Ltd

Version 1b August 2018

This document details how the proposed external lighting schemes for 6A and 6B Nutley Terrace by Sian Baxter Lighting Design have been designed to ensure that, as far as possible, they meet the guidelines laid out by the Bat Conservation Trust in their report entitled 'Bats and Lighting Report in the UK' (May 2009).

Background - Bat Survey Findings

Two bat surveys were carried out in 2015 by Middlemarch Environmental Ltd. No bat roosts were found.

The January 2015 report concluded that it is unlikely that bats would utilise the site regularly, but may still utilise it infrequently as a commuting route to foraging sites. Due to the number of features found during the daytime bat survey and considering the surrounding habitat, the site is considered to have potential for roosting bats.

The July 2015 concluded, amongst other things, that the development is likely to provide a minor decrease in bat foraging habitat in the longterm. However, the foraging habitat onsite is minor in comparison to the remaining suitable habitat within the wider area. It is considered the site is not of significant importance to any local bat population as it is used by small numbers of common species only.

Details of the Proposed Lighting Schemes

The external lighting scheme has been designed to provide security and comfort to the future occupiers of No 6A and 6B Nutley Terrace.

The external lighting scheme specifically avoids the use of coloured lighting.

All the proposed external light sources are LEDs (light emitting diodes). LEDs emit very little, if any, ultra violet (UV) light. The Bat Conservation Trust favours lights that emit low levels of UV light as insects are particularly attracted to UV light.

The level of light has been kept as low as possible to reduce the impact on wildlife. This has been achieved in two ways. Firstly, lights have been chosen that have a relatively low light output. (A lumen breakdown per light as been provided in Appendix A for 6A and Appendix B for 6B. The total number of lumens for each property is also provided). Secondly, lights have generally been positioned only where they are necessary/for a specific reason, for example, to light a dining table, a kitchen/bbq area, a passageway or a piece of art.

Light spill has been kept to a minimum by setting lights close to objects and by using relatively narrow beam angles. Wherever it is possible to add hoods, cowls, louvers and shields to the lights this has been done. The details of this have been provided in Appendix A for 6A and Appendix B for 6B. Apart from the front boundary walls the lights spill onto neighbouring properties is expected to be nominal.

The lights have not been put onto one circuit but instead a number of circuits have been proposed each of which can be controlled individually. This ensures that only the lights that are needed at any one time are turned on.

Lights along the flank wall are controlled by carefully placed motion sensors (that will ensure the lights are only triggered when someone is walking along the passageway) and they will remain on for the shortest possible time. All the remaining lights will be turned off automatically at pre set times every night. This will ensure that lights aren't left on by mistake. Details of how each type of light is controlled is detailed in Appendix A for 6A and Appendix B for 6B.

The vast majority of the lights chosen focus the light downwards. The lights on the steps and paving stones to the rear spread the light horizontally across the steps and paving stones. Uplights are also used sparingly to light certain objects where downlighting is not appropriate. All of the uplights are low glare, on dimmable circuits and the Lux levels at 3m are relatively low. Appendix C shows the cone diagrams for all the proposed uplights.

In addition to the general exterior lighting described above and designed by Sian Baxter Lighting Design, there is also separate security lighting. This has been proposed by Robert Taussig and the details have been included in Appendix D.