

Appendix

D Daylight, Sunlight, Energy and Sustainability

The development incorporates sustainable design and construction measures to reduce energy demand, mitigate climate change, and improve occupant wellbeing. Key Measures Include:

Daylighting & Ventilation

The layout is designed to maximise natural light, minimise overheating, and reduce reliance on artificial lighting. Openable windows provide natural ventilation, eliminating the need for mechanical cooling.

A formal Daylight and Sunlight Assessment has not been undertaken, it is noted that the single-storey scale, modest height, and siting of the proposed dwelling ensure that there will be no material loss of daylight or sunlight to neighbouring properties. Consequently, the development will not adversely affect the amenity of surrounding occupiers.

Energy Efficiency

Optimised insulation, improved window U-values, higher air tightness, and reduced thermal bridging.

Water Efficiency

Low-flow fixtures to reduce water demand.

Lighting

All internal lighting will be low-energy; no external lighting is proposed to prevent light pollution.

Air Quality & Noise

Use of eco-friendly materials, natural ventilation, and low-emission appliances to reduce pollution.

Construction Practices

Contractors will follow the Considerate Constructors Scheme and a site-specific Code of Construction Practice. Waste will be segregated, reused, or diverted from landfill (minimum 80% for construction waste, 90% for demolition). Pre-fabrication of elements and reusable packaging will be considered.

Materials

Responsibly sourced timber (FSC), high recycled content steel, concrete with 50% GGBS, at least 20% recycled content in materials overall, and preference for A/B rated BRE Green Guide materials.

Part L Compliance

The design exceeds Part L Building Regulations, reducing regulated CO₂ emissions.