

SUSTAINABILITY STATEMENT

Proposed remodelling of the properties No.13 and No.15 Bonny Street to provide x2 No. dwellings.



1. Energy

The approach to achieving the planning policy energy objectives has been to consider strategies and technologies to achieve a low energy and carbon footprint for the scheme.

The development has undergone preliminary RDSAP assessments and through the following specified building fabric strategy and services has achieved an potential EPC B rating.

2. Building Fabric Efficiency

To improve the passive design of the development, the thermal fabric has been specified to meet or exceed current Building Regulation targets.

Proposed U Values of No.13 and No.15 Bonny Street:

Measure	Element	Residential
U Values	External Walls	0.30 W/m ² K
	Roof	0.16 W/m ² K
	Floor	0.17 W/m ² K
	Windows	1.4 W/m ² K
	External Doors	1.4 W/m ² K*

*It is proposed to overhaul the existing front doors (3.3 W/m²K) to both properties, and to specify for a u-value of 1.4 W/m²K where an external door is to be provided to the courtyard of No.13.

3. Energy Efficiency

In order to minimise the heating of rooms whilst they are unoccupied and not in use, the heating system will be zoned to control at least the daytime living areas and bedrooms separately.

All white goods provided to the property will be specified to be efficient with an A rating or better in order to reduce electrical loads and water consumption.

Energy efficient equipment has been proposed where possible to support the services strategy. *This includes:*

- Space Heating - Gas Combi Boiler 89% efficient
- Heating Controls - Time and Temperature control
- Hot Water Heating - Gas Combi Boiler 89% efficient
- Hot Water Storage - None
- Ventilation - Mechanical Extracts
- Comfort Cooling - None

Assessment of suitable renewable energy contributions:

- Solar Collectors – No private space suitable for positioning of PV's.
- Air Source Heat Pump – No private space suitable for positioning of plant.

4. Water Management

Water use will be reduced to a maximum of 105l/person/day through the use of low flow equipment such as smaller baths, dual flush WCs and low flow taps and showers. Water fittings will be specified with the following flow rates to meet the target water consumption:

- WC – 4/2.6 litres dual flush
- Shower – 8 l/min
- Bath – 170 litres
- Basin taps - 5 l/min
- Sink taps - 6 l/min
- Dishwasher – 1.25 l/place setting
- Washing machine – 8.17 l/kilogram

Water meters are to be installed in each unit to encourage residents to limit their consumption.

5. Materials

All the new building elements will achieve the highest feasible rating on the BRE Green Guide to Specification. Materials will be specified to have low embodied energy, taking into account whole life cycle analysis. All materials will be sourced from manufacturers who employ environmental management systems such as ISO 14001 or BES 6001. All timber used in construction will be FSC or PEFC certified.

Where elements are retained, these shall meet as a minimum of Part L1 for upgrading retained elements. The retention and refurbishment of the existing thermal elements means that the material performance is high in comparison to new build elements. As good quality materials are reused in situ, this shall significantly reduce the energy used for the manufacturing and transport of materials.

Due to the heritage value of the existing windows, it is proposed that these are to be overhauled, and secondary glazing is to be provided.

Insulating materials will be specified to maximise thermal performance whilst still paying attention to the environmental impact of the materials used. The use of recycled products will be pursued wherever feasible and the use of other low embodied energy products will be further investigated.

Responsible sourcing will also be pursued. All timber used on site during the construction phase and within the building will be from FSC sources or equivalent. Other materials, including insulation, will be sourced from manufacturers who employ environment management systems such as ISO 14001 or BES 6001. Where possible, materials will be sourced locally.

Non-toxic materials will be used wherever possible, including the specification of products with low VOC content in line with European testing standards.

6. Surface Water and Flood Risk Management

The Environment Agency flood map shows that the development site is located within Flood Zone 1 with a low probability of flooding.

The site is fully occupied by an existing building and 100% hardstanding with no areas which would allow for improvement to help with water run-off.

7. Air Pollution

Construction site impacts

The construction site will be managed in such a way that the environmental impact is minimised. This includes following best practice policies for dust pollution by using dust sheets, covering skips and damping down where appropriate.

Plant and machinery

All plant and equipment installed will be appropriately sized and selected for efficiency in order to reduce greenhouse gas emissions.

Insulating materials and heating systems will be specified to keep pollutants to a minimum. All insulation will have a low Global Warming Potential (GWP) and zero Ozone Depletion Potential (ODP).

All equipment will be frequently maintained to ensure it continues to run efficiently and cleanly. Insulating materials and heating systems will be specified to keep pollutants to a minimum. Boilers will have low NO_x (Nitrous Oxides) emissions and insulation will have a low Global Warming Potential (GWP).

8. Noise Pollution

Construction Site Impacts

The construction site will be managed in such a way that the environmental impact is minimised. This includes following best practice policies to minimise noise pollution, including the use of quieter machinery where possible. Site working hours will be managed to mitigate the possibility that they will cause a nuisance to the surrounding properties.

Noise impact of the development

The development will comply with Building Regulations Part E, providing a good level of sound insulation between the development and the surrounding buildings. All external windows will be provided with secondary glazing to minimise the transmission of noise between the property and surrounding area.

9. Waste

The homes will be designed to encourage recycling through the provision of containers in kitchens. Construction site waste will be monitored through a Site Waste Management Plan. There will be procedures and commitments to minimise waste generated on site and to sort, reuse and recycle construction waste.

The contractor will target to divert at least 85% of construction waste from landfill. Waste will either be segregated on site into at least 5 different streams for recycling or collected, sorted and recycled by an external recycling contractor. Re-use of construction waste will also be encouraged. Given that the existing building structure shall be retained, this shall minimise site waste produced during the construction period.

10. Contaminated Land

The site is currently not thought to be contaminated. The proposed use will not involve the storage, processing or transfer of hazardous substances.

11. Health & Wellbeing

The revised internal remodelling will ensure a high-quality environment by maximising daylight and sunlight levels. The development will improve on the minimum standards set out in the Building Regulation Part E where possible, providing a good level of sound insulation between dwellings.

12. Management

During construction the site will be managed in such a way that the environmental impact is minimised. The occupiers of the completed residential units will be provided with information to allow them to use the environmental features of their homes to maximum potential.

13. Ecology

The site does not have any external space, and limited roof space in the form of a flat roof in between the properties No.13 and No.11 Bonny Street. This flat roof is not suitable for provision of a green roof as there is limited day light.

Due to the lack of external space, it is highly unlikely that any protected species would be affected by development proposals.

14. Sustainable Travel

The site is in close proximity to Camden Road overground station and to cycle hire stations. There are no external provisions for cycle storage as the site does not have access to external space other than for maintenance.

15. Other

Home use guide provision to the residents to provide guidance and instructions in regard to maintenance of the properties.

16. Conclusion

The proposed residential development at Nos. 13 and 15 Bonny Street employ sustainable design and construction measures through various stages of the project in line with the London Plan and Camden Local Plan.

The design team have made all reasonable endeavours to achieve the minimum requirements of the London Borough of Camden. The energy hierarchy has been followed, fabric improvements have been made to improve the windows and a high efficiency heating system has been specified.

By incorporating all of these measures, the environmental impact and energy use associated with the project will be considerably lower than for a project that is built to standard Building Regulations compliance.