



your energy assessor

Fenton Energy Ltd.

Ground Floor
Parker Court
Knapp Lane
Cheltenham
GL50 3QJ

01242 506150

info@fentonenergy.co.uk

www.fentonenergy.co.uk



PROJECT NAME

37 Sandholme Road

DATE

10/4/2024

ASSESSOR

Lee Humphries

SUSTAINABILITY STATEMENT



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Contents

| | |
|---|----|
| Executive Summary..... | 2 |
| Climate Change and Sustainable Energy..... | 3 |
| Energy Efficiency | 3 |
| Decentralized, Renewable and Low-carbon Energy Supply Systems | 3 |
| Site Layout and Design - Resilience to Climate Change | 3 |
| Encouraging Greener Transport Use..... | 4 |
| Sustainable Design and Construction | 5 |
| Green Infrastructure and Biodiversity Enhancement..... | 5 |
| Avoiding Responses to Climate Impacts that Lead to Increases in Energy Use and CO ₂ Emissions... | 5 |
| Waste and Recycling - During Construction..... | 5 |
| Waste and Recycling - In Operation..... | 6 |
| Building Materials - Type, Life Cycle and Source | 6 |
| Site Layout and Design - Flexibility and Adaptability | 6 |
| High Speed Internet Connectivity | 7 |
| Flood Risk and Water Management | 8 |
| Water Conservation Measures | 8 |
| Table 1 - Water Consumption..... | 8 |
| Minimising Flood Risk | 9 |
| Summary | 10 |
| References | 10 |



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Executive Summary

This Sustainability Statement has been compiled to demonstrate compliance with the following Bristol City Council Policies from the Development Framework Core Strategy:

- BCS13 – Climate Change
- BCS14 – Sustainable Energy
- BCS15 – Sustainable Design and Construction
- BCS16 – Flood Risk and Water Management

The proposal is for the conversion of 37 Sandholme Road, Bristol, BS4 3RP from a single dwelling to 1 ground floor flat and 1 first floor maisonette.



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Climate Change and Sustainable Energy

Energy Efficiency

The thermal elements and fenestration have been designed to meet and exceed the standards set out in Approved Document L1. Well specified thermal elements with low U-values help to reduce energy demand and improve comfort levels within the property, while new, highly efficient systems will be installed to provide heating, hot water and ventilation to the building.

For more information, including details on the specification of the thermal elements and services, please refer to the Energy Strategy.

Decentralized, Renewable and Low-carbon Energy Supply Systems

Air source heat pumps whether individual or communal are the best option for this development. The performance of the units have been selected to be conservative whilst being reflective of products available on the market. Additionally, the heat pumps will also provide hot water heating via cylinders fed from the heat pumps. This will allow space and hot water heating to the apartments to be provided year-round without requiring an additional 'top up' heating system. The use of air source heat pumps will need to be confirmed by survey before installation.

For more information, please refer to the Energy Strategy.

Site Layout and Design - Resilience to Climate Change

The building has been designed such that cross ventilation is possible from the South East-side to the North West-side through openable windows. This will help to reduce the need for mechanical ventilation now and in the case of a potentially warmer future climate.

Furthermore, overheating can be avoided by using appropriate internal shading such as blinds and curtains and external shading.

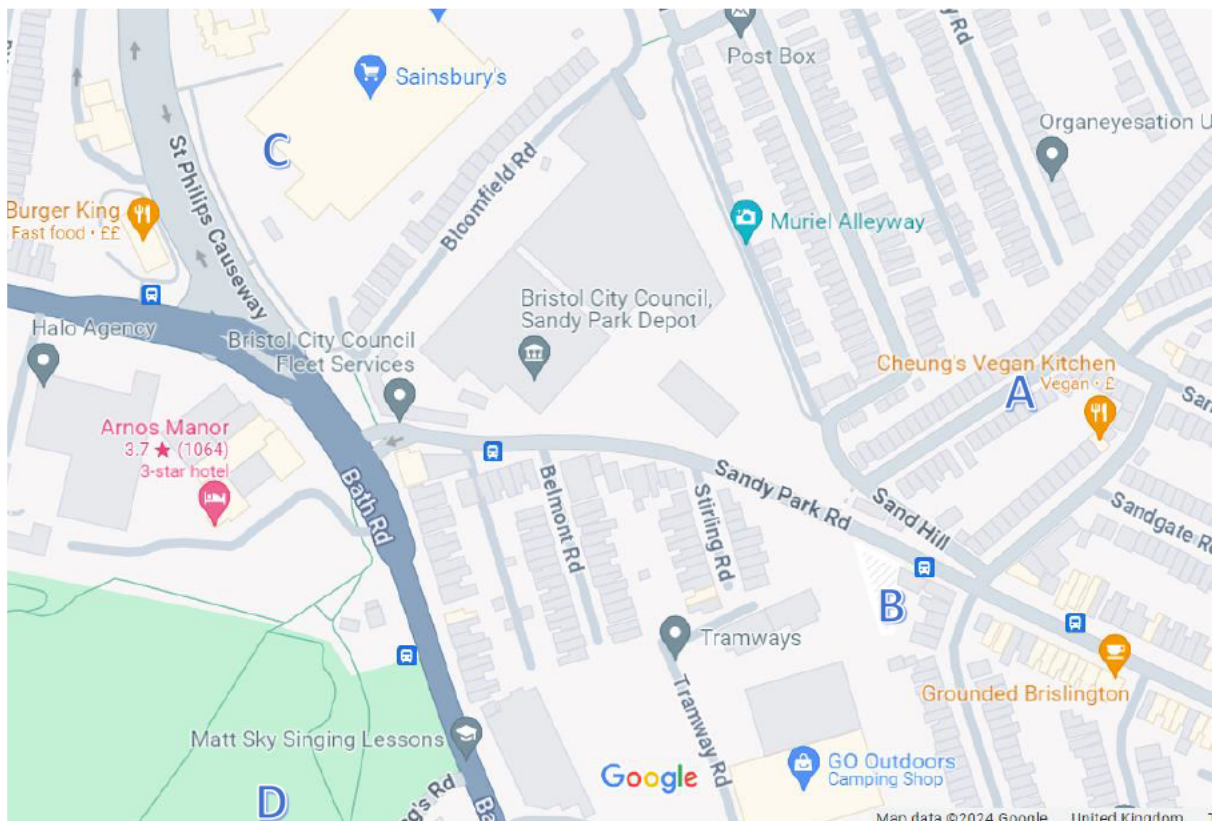
Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Encouraging Greener Transport Use

37 Sandholme Rd, Brislington, Bristol BS4 3RP ('A' on the map below) is situated an approximate 3-minute walk away from the nearest bus stops on Repton Road (B). These stops are well served with buses travelling towards Bristol City Centre, Temple Meads train station (which serves national travel) and going on to Cribbs Causeway.

As shown on the plans, secure cycle storage is proposed for each dwelling. This storage will allow bicycles to be accessed and taken directly to the nearest highway without the need to carry the bikes through the dwellings. There is a Sainsbury's supermarket (C) is approximately 1 mile away. In this vicinity there is also a public house called The Castle which serves food. There is also a public park (D) all within a 10-minute walk.



The proximity of these amenities and the proposed facilities should discourage car journeys for potential future residents. This should help to reduce emissions and congestion associated with motorised transport.



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Sustainable Design and Construction

Green Infrastructure and Biodiversity Enhancement

This development is a conversion of a single dwelling to a flat and a maisonette so the concern of contributing to heating the urban environment is not significant.

There is little scope to enhance biodiversity on this project, however, there will be no loss in biodiversity on the site as the footprint of the building will be unchanged.

Avoiding Responses to Climate Impacts that Lead to Increases in Energy Use and CO₂ Emissions

There are no proposals to include artificial cooling as part of these works. Cross ventilation and appropriate internal shading such as blinds and curtains will be used to mitigate against the effects of overheating from the sun.

Although well specified, the thermal envelope is not designed so as to require mechanical ventilation and cooling.

Waste and Recycling - During Construction

A Site Waste Management Plan (SWMP) will be developed for this project. Waste groups to be monitored will be identified and targets set in order to identify how waste will be reduced, diverted from landfill, reused or recycled wherever possible. If waste is unavoidable, it will be disposed of responsibly.



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Waste and Recycling - In Operation

Adequate waste and recycling storage will be developed from the existing provision to cater for this change in use for the building.

Both the internal and external provision will comply with the Bristol City Council recycling and waste collection requirements, ensuring that recyclables and waste can be separated before collection.

Building Materials - Type, Life Cycle and Source

All materials specified for the new construction will be at least 'B' rated or higher under the BRE's Green Guide to Specification, in-line with guidance in the Climate Change and Sustainability Practice Note. This will ensure that construction is more sustainable and environmentally friendly.

Where feasible, the most local suppliers of materials will be selected to minimise the environmental impact of transportation. Only suppliers with a certified chain of custody showing responsible sourcing will be used to source materials, including ensuring that 100% of timber is legally sourced.

Site Layout and Design - Flexibility and Adaptability

37 Sandholme Rd, Brislington, Bristol BS4 3RP is currently a single dwelling. The proposal is for it to be converted into a flat and a maisonette. Depending on the future needs of the local area, there is scope for the building to be adapted again as desired. For example, it could be returned to a single dwelling that, due to the attic conversion, would now be a larger property. Furthermore, the ground floor flat could be reconfigured to accommodate accessible living requirements.

Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

High Speed Internet Connectivity

High speed Broadband internet will be provided to each property, as extended from the existing provision to the surrounding area. This will have to be confirmed by a survey prior to installation but the broadband checker from Ofcom indicates the following:

BS43RP [Change Location](#)

37, SANDHOLME ROAD

The speeds indicated on the checker are the fastest estimated speeds predicted by the network operator(s) providing services in this area. Actual service availability at a property or speeds received may be different. [More information](#).

The table shows the predicted broadband services in your area.

| Broadband type | Highest available download speed | Highest available upload speed | Availability |
|----------------|----------------------------------|--------------------------------|--------------|
| Standard | 15 Mbps | 1 Mbps | |
| Superfast | 80 Mbps | 20 Mbps | |
| Ultrafast | 1000 Mbps | 220 Mbps | |

Networks in your area - [Virgin Media](#), [Openreach](#)

Click on a network's name to be directed to a website where you can find out about service availability and how to request a service from them or one of their partners.

You may be able to obtain broadband service from these Fixed Wireless Access providers covering your area.

EE



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Flood Risk and Water Management

Water Conservation Measures

Internal potable water will be conserved by installing flow restrictors to taps and showers, installing dual flush toilets and a low-capacity bath.

The following schedule provides a suggested specification which has been proven to exceed building regulations requirements for water conservation (Regulation 36 Compliance).

Table 1 - Water Consumption

| Internal Potable Water Fixing | Flow Rate / Capacity |
|-------------------------------|-----------------------------------|
| Toilet | Dual Flush 6 and 4 litres |
| Basin Taps | 6 litres / minute |
| Bath | 180 litres (capacity to overflow) |
| Shower | 10 litres / minute |
| Kitchen Taps | 8 litres / minute |

Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Minimising Flood Risk

The site lies within Flood Zone 1, according to the government's Flood Map for Planning, as shown below (Flood Zones 2 and 3 would be marked in blue).



As the works will build on existing structures and hardstanding, there is unlikely to be any impact on the flood risk of this site. There will be no increase in hardstanding as a result of these works.



Sustainability Statement

Project: 5452JH - 2024.04 SS (37 Sandholme Road - Tony McGreene)

Summary

This proposed development has been well designed to cope with and mitigate against the effects of climate change. The energy strategy proposes the installation of air source heat pumps to help reduce the carbon dioxide emissions associated with the building, whilst the proximity of local amenities and public transport links should help to reduce car journeys associated with the development. Additionally, as the works are wholly contained in the existing building structure, flood risk at the site will not be affected.

The likely impact on the local environment as a result of this proposed conversion works will be minimal.

References

[Approved Document L2B](#)

[Bristol City Strategic Flood Risk Assessment](#)

[SWMP – WRAP](#)

[Green Guide to Specification](#)

[Climate Change and Sustainability Practice Note](#)

[Bristol City Council Recycling and Waste Collection Requirements](#)