BOX FOR LIFE

A Future Living Project

Climate Emergency and Sustainability

BOX FOR LIFE:

The “Box For Life” project is a **national tiny home intentional community network** designed to bring the tiny home movement to urban cities.

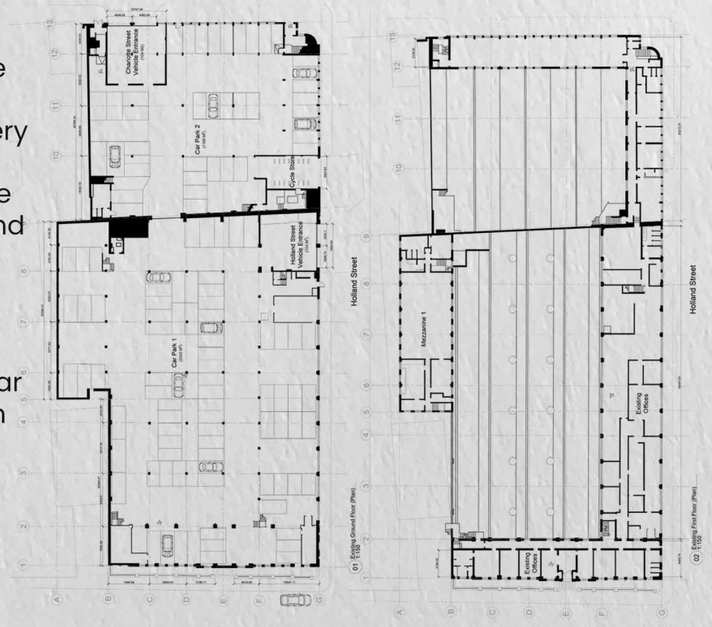
This project will develop both the **ultimate tiny home,** that can be purchased at an affordable price **and an exemplar community site** on George Street in Birmingham’s Jewellery Quarter. It will combat the growing economical issue that sees **struggling young people attempt to juggle work and social lives whilst reaching for the property ladder.**

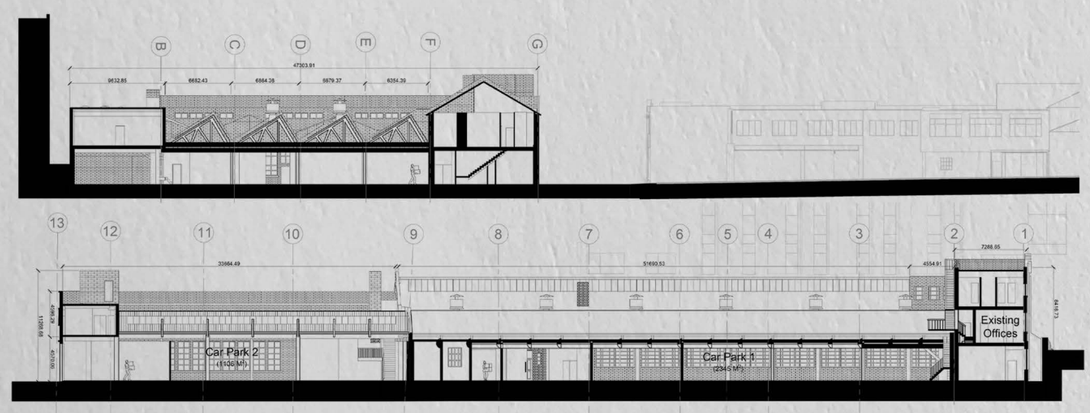
The project aims to increase **“Urban Opportunity” for people in tiny home and sustainable living communities and attract a new generation of tiny dwellers.**

– Luke Reynolds

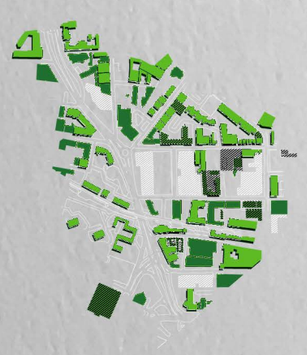
Site Selection:
The building selected was the old print factory on charlotte street in birminghams jewellery quarter. The James Cond Building. Selected for its prime location, access to the city and speedy wifi signals it was the perfect place to design a residential space.

Currently used as a private car park the building is open plan with masses of unnessasary structural elements. The Box For Life project sees the buildings unique charm retained and all damage repaired.





Whilst the building is a 3 story building, in comparison to its surroundings it is a nice low rise building. The idea of a low rise residential space alignes itself to the ideas explored surrounding mental health and susatinability in m critical study that suggests th lower to the ground you are the more connected you feel to nature and people.

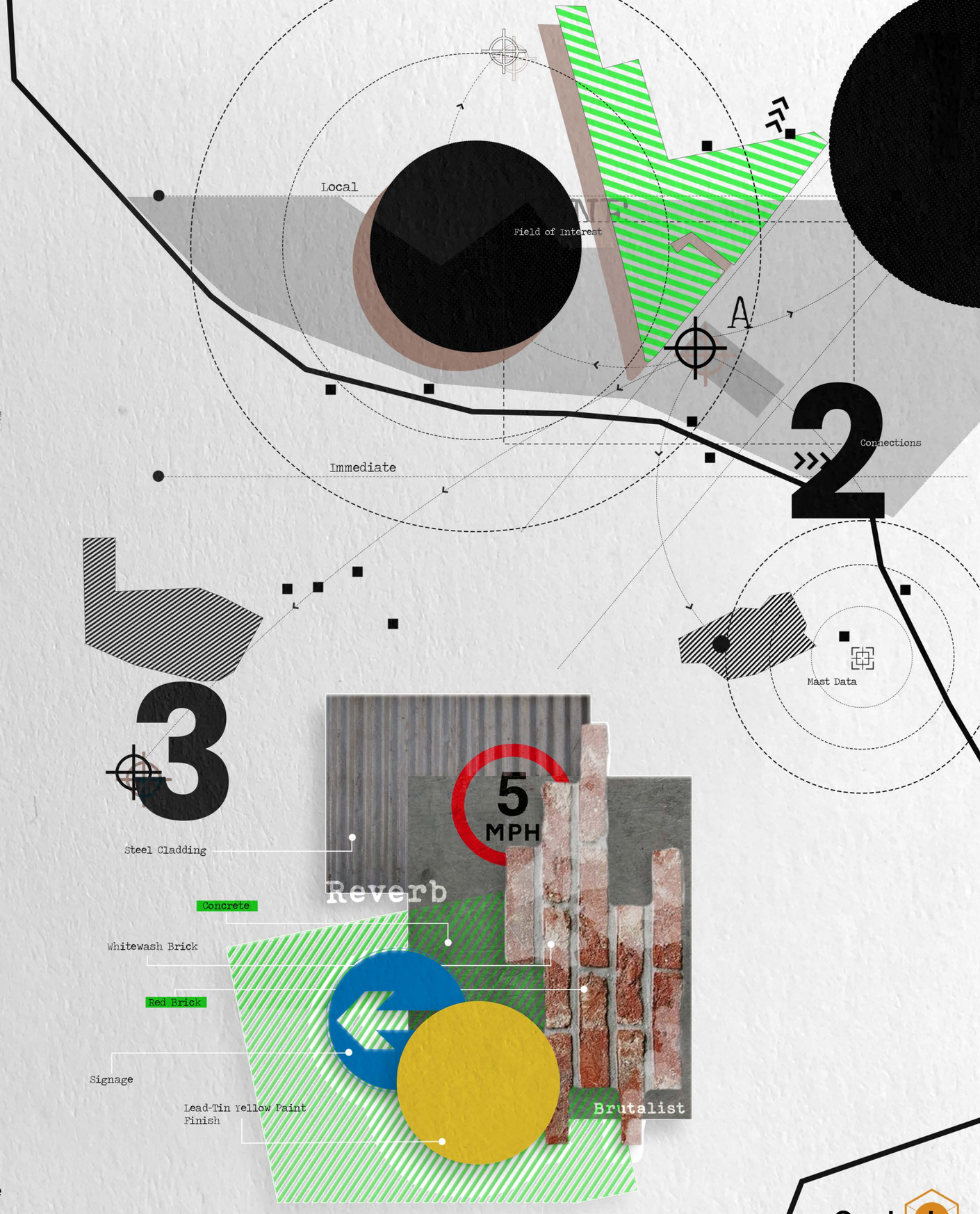


Local Uses

Traffic

Vegitation

Conservation Zone



Context

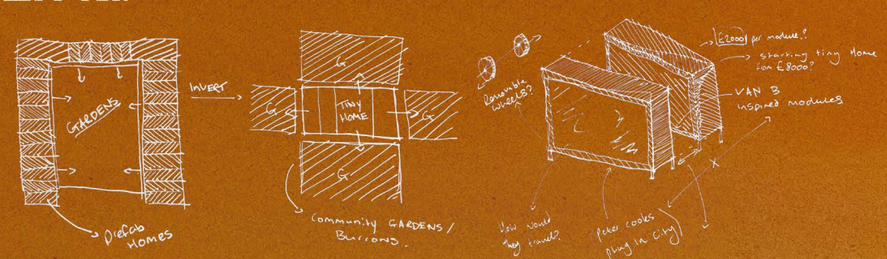
SPATIAL SUSTAINABILITY:

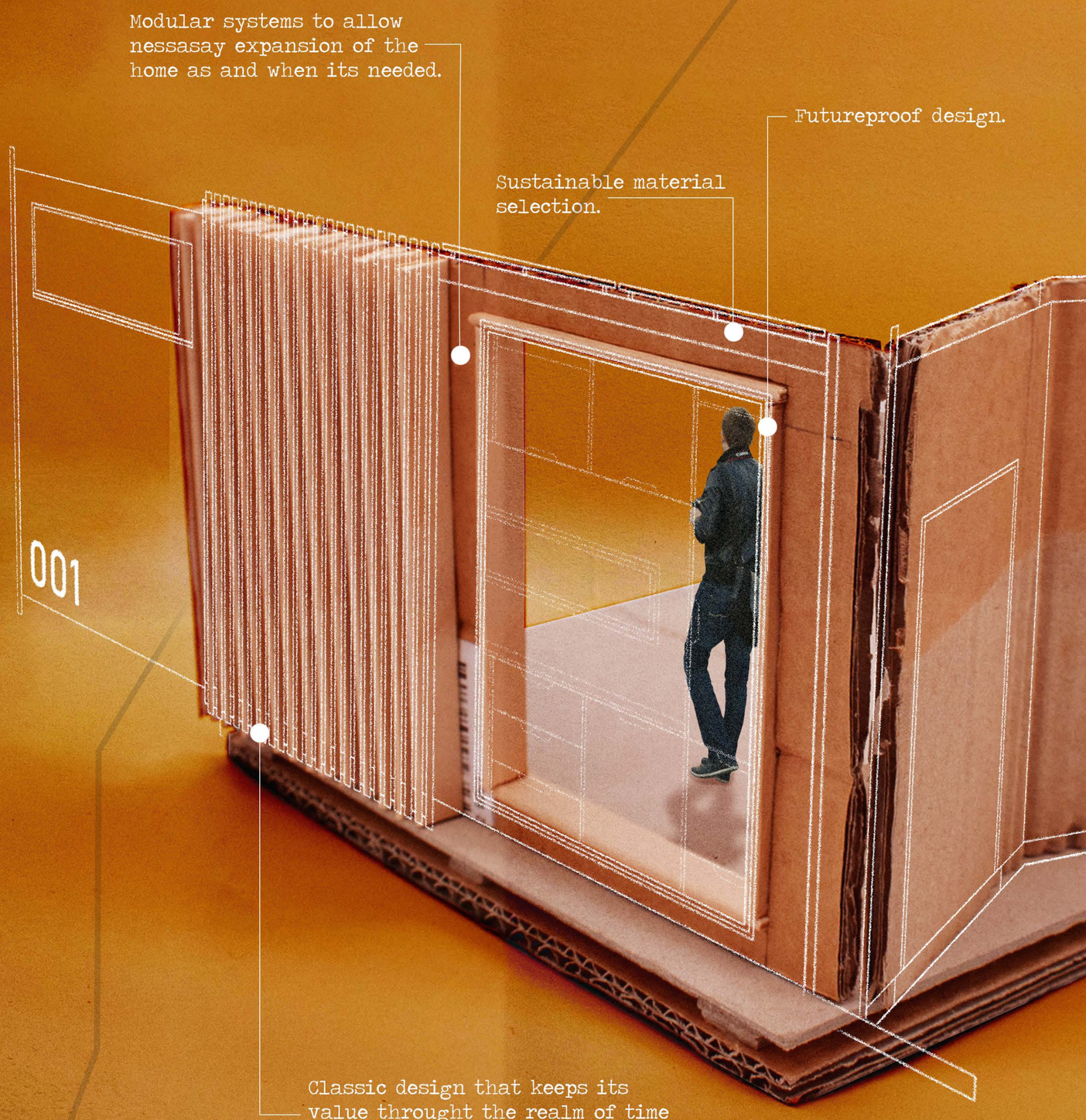
Definition: *Spatial Sustainability is the conscious recognition that we are running out of global territory and take action to help reduce unnecessary urban sprawl.*

The projects foundation was built on the question: **How can spatially sustainable design benifit the collective mental health of generation Z in cities?**

After the critical exploration of spatial sustainability which concluded that **we as a new generation are in a position to make radical change to our spatical habits** and that "Doers and Dreamers" of Gen Z are concerned with environmental change and finance and **are more likely to transition into smaller spaces to preserve resources on both a macro and micro scale**, I decided to design the BFL Network to enhance the community for the Doers and Dreamers of Generation Z and other generations that want to take tiny living to the city and create that niche idea trhat cities lack.

To read the full critical study scan the QR code or visit:
https://www.boxforlifenetwork.co.uk/our-story
and scroll down the **"A Critical Foundation"**





Concept

BOX FOR LIFE CYCLE:

How is the Box For Life Network encouraging sustainable habits?

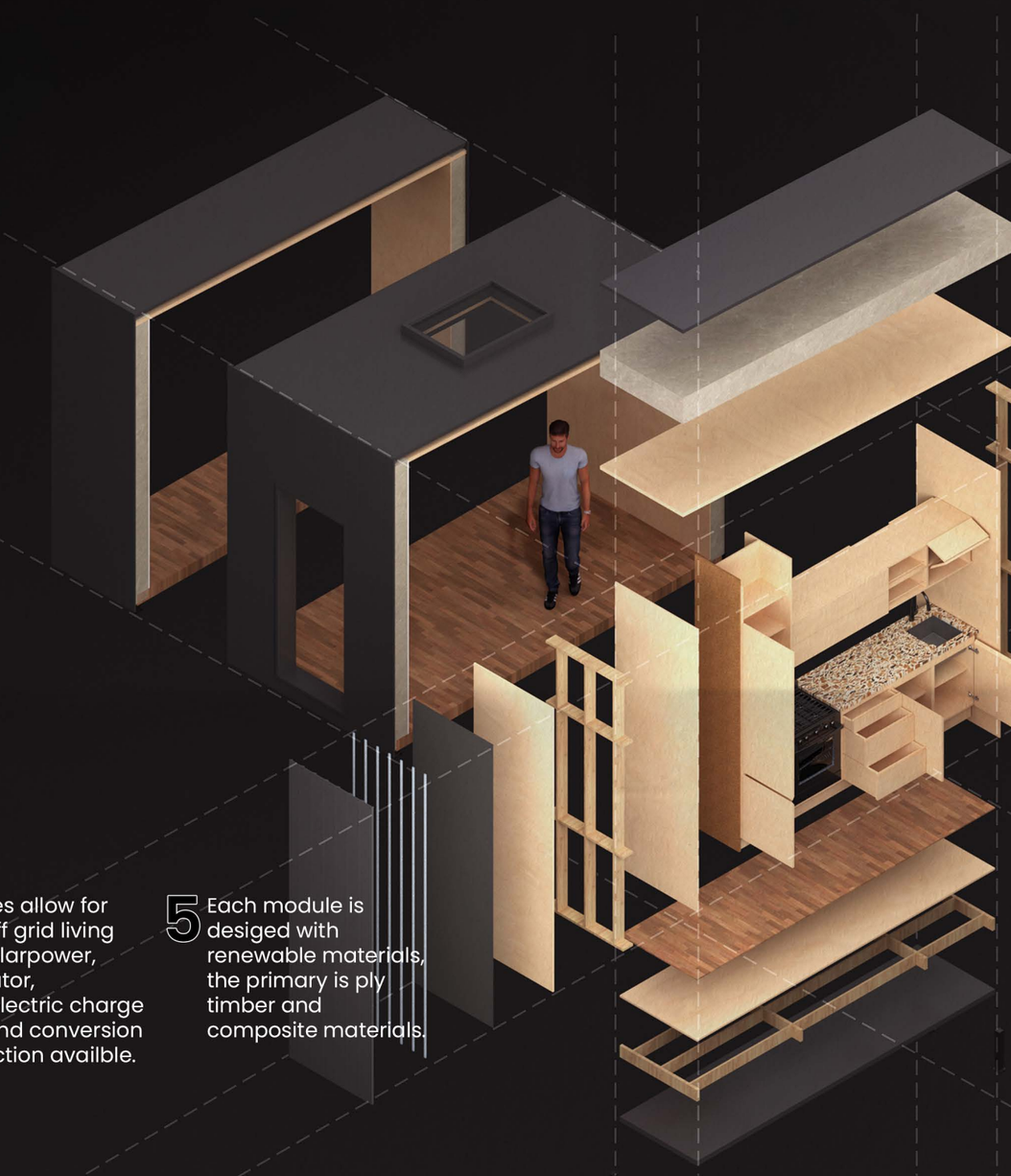
1 The site and tiny homes are conditioning new generations to live small and be happy / prepare us for an inevitable change in environment in the future of our planet.

2 The site has been designed to encourage smarter habits. Recycling, less water usage and minimal use of shore power.

3 Modules are easy to relocate for changes in circumstances such as a new job in a new city or expansion of family.

4 Modules allow for 100% off grid living with solarpower, generator, hydroelectric charge and wind conversion connection availble.

5 Each module is desiged with renewable materials, the primary is ply timber and composite materials.



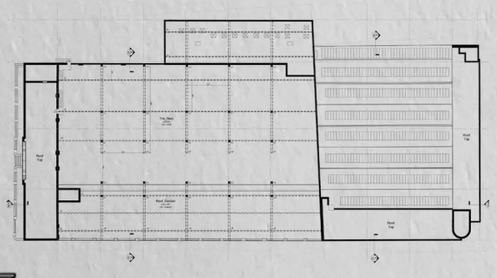
Sustainability

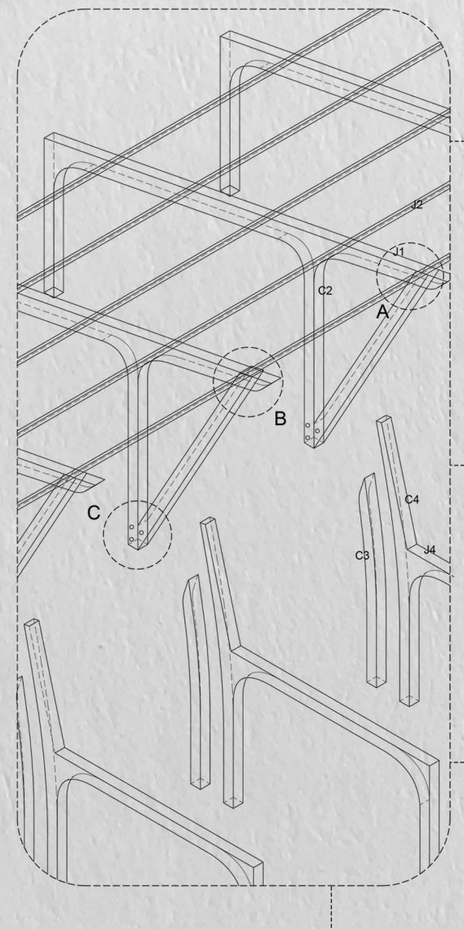
DFD Details:

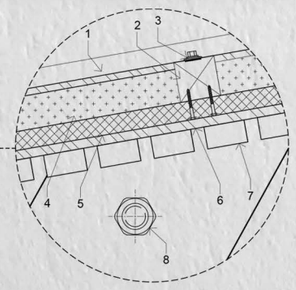
During the design process and technical consideration phase it was important to ensure that the project had a long lifespan and that even when elements needed replacing or the project becomes obsolete due to a nation wide change to the space crisis, that the building and modules can be easily disassembled. This meant that timber joinery used traditional joining techniques that needes very little additional security such as bolts and that screws instead of nails were used to ensure easy removal of finishes.

The details seen here are from the adaptation of the buildings orginal asbestos roof.

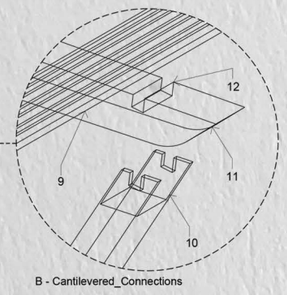
However there are elements such as steel work that needed to be sealed.



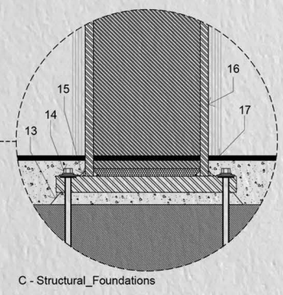




A - Natural_Joinery_Detailing



B - Cantilevered_Connections

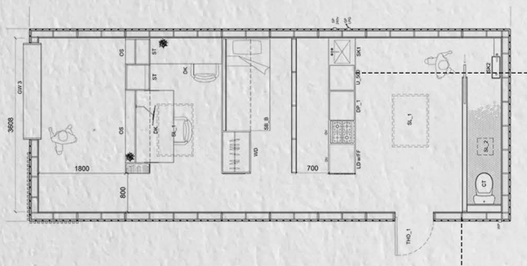


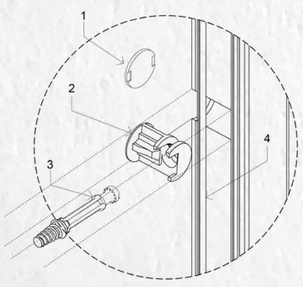
C - Structural_Foundations

Sustainable Modular Design:

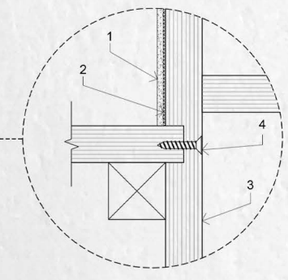
The modules have been designed and constructed to have low embodied energy values as well as a passive carbon footprint. Larger Modules use solar panels to produce power for the rest of the homeand small modules have connections to off gird power such as diesel generators and all kitchen moduels are powered by gas to reserve the need for high shore power. The Box For Life Homes come with a composting toilet that uses no water and instead a sustainable dried coconut fibre alternative from natures head. The bathroom showers are also low water useage showheads.

On network sites the homes can be fully plumbed in to there pitches that use a combination of recycled rainwater from a roof collection system and main supply reservoir water.

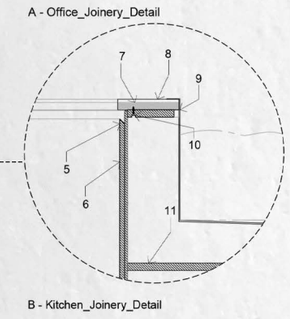




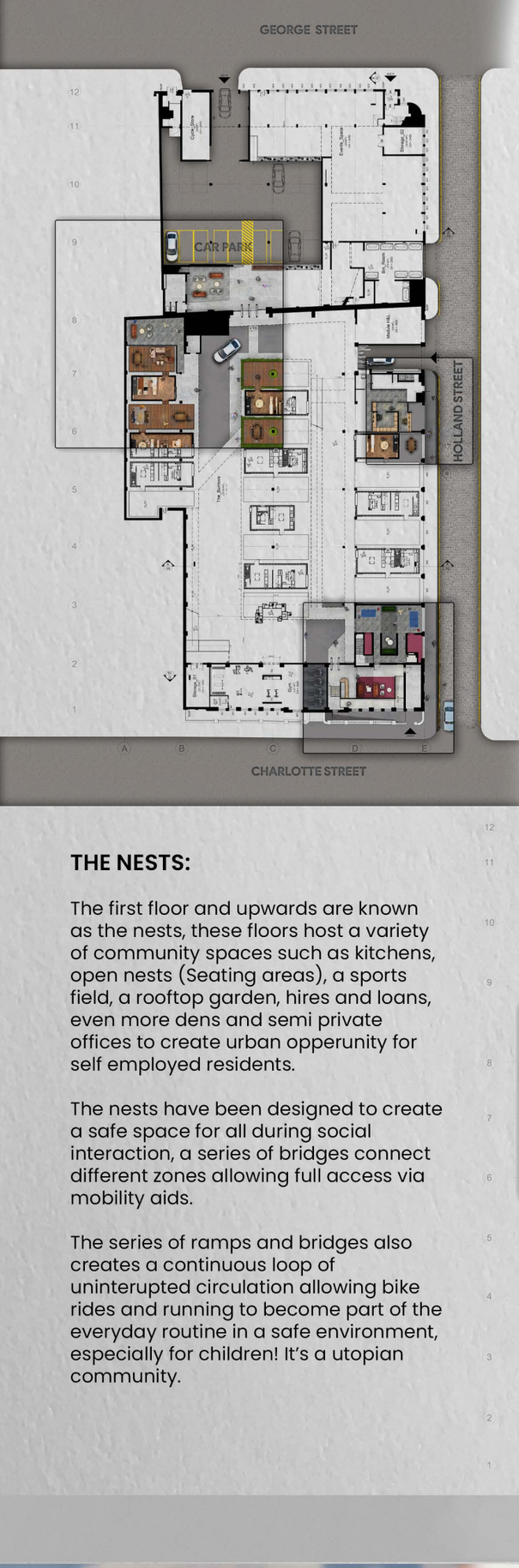
A - Module Connection Detail



A - Office_Joinery_Detail



B - Kitchen_Joinery_Detail



THE BURROWS:

The ground floor is your dedicated residential area! The burrows are host to all residential homes as well as indoor gardens, a gym, residents car park and semi private events spaces for community events through the year.

Throughout the space there are a series of dens that allow for the concept of fertile laziness and engrourage personal growth.

Each tiny home plot has a maximum capacity of 9.5m in length and 4m in width and has access to its own decked garden space that can be private or shared.

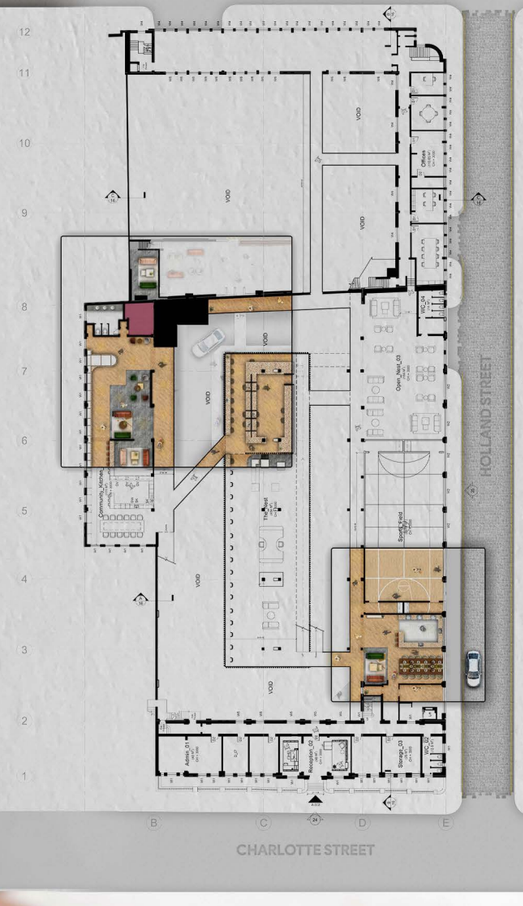

Tiny Home Example Configuration


Tiny Home Example Interior

Residential Reception


Tiny Home Access View


Central Nest



THE NESTS:

The first floor and upwards are known as the nests, these floors host a variety of community spaces such as kitchens, open nests (Seating areas), a sports field, a rooftop garden, hires and loans, even more dens and semi private offices to create urban opperunity for self employed residents.

The nests have been designed to create a safe space for all during social interaction, a series of bridges connect different zones allowing full access via mobility aids.

The series of ramps and bridges also creates a continuous loop of uninterupted circulation allowing bike rides and running to become part of the everyday routine in a safe environment, especially for children! It's a utopian community.

Concrete
Red Brick
Corrugated Steel
Glazing

Cork
Siberian Larch
Plywood
Velvet
Composite Clading
Foresso

Proposal

HEALTHY URBAN LIFE:

The building has been designed with a minimalist material pallet that compliments the bold presence of our Box For Life modular tiny homes. The building itself **works hard to reduce sounds, smells and pollution that enter the site from the urban landscape** of Birmingham and aims to replicate the modern rural conversion aesthetic that so many barn conversions strive for.

The interior selection of materials are **all low VOC materials and many are locally sourced and ethical materials** from birmingham that work hard to benifit our environment.

Whilst the building offers basic services such as a post office, a gym and office spaces the building **encourages internal residents to explore the local area** and helps the Box For Life network strengthen its connection to the local area.

To view the full project visit:
www.boxforlifenetwork.co.uk
or scan the QR code for the mobile lite version.

Materials