



ZIYUE WANG
ACE465_URBAN PROTOTYPE
Zone A

ANIMAL BOX is not only a transformation of the backyard of Blue Star Animal Hospital, it is also a stray animal shelter that can attract stray animals in the surrounding area and increase ecological diversity. It is also a public space where people in the southern part of the city can gather.

ANIMALS BOX

MORE THAN A BOX

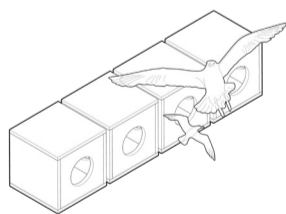
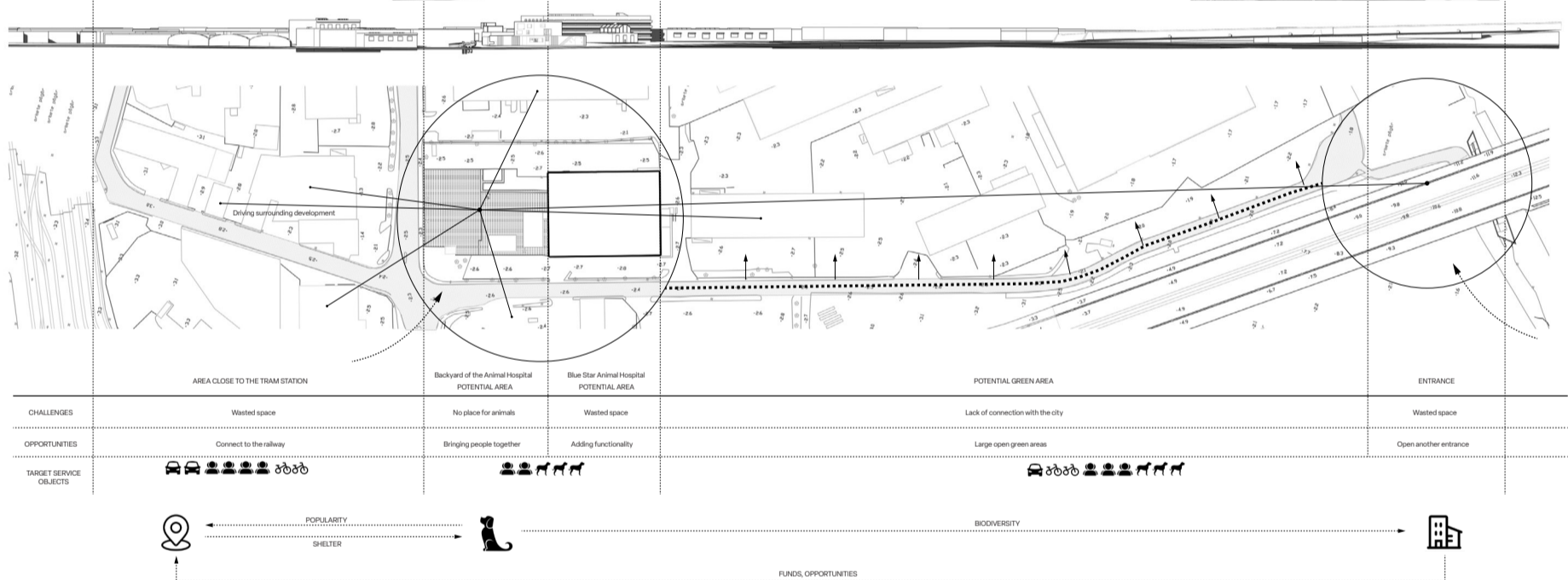
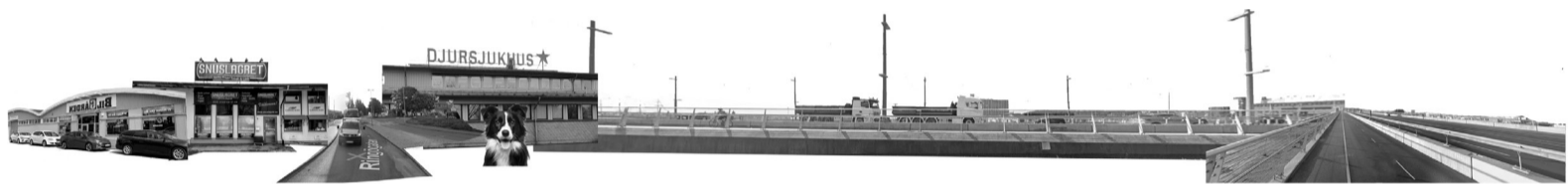
ANIMALS BOX

More than just a box

The design site is located at the entrance of RINGON. Due to the verticality of the surrounding commercial areas and the inconvenient transportation, the entrance cannot function properly. The design aims to make full use of existing resources without destroying the original facilities and revitalize the entrance. ANIMAL BOX is not only a transformation of the backyard of Blue Star Animal Hospital it is also a stray animal shelter that can attract stray animals in the surrounding area and increase ecological diversity it is also a public space where people in the southern part of the city can gather. The design adopts a modular design and can be implemented in any corner of the city, achieving economic, ecological and social sustainability.



DESIGN SITE



BIRDS

Nesting

Flying

Gathering



Outdoor Space



CATS

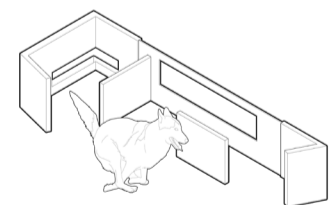
Resting

Hiding

Observing



Indoor Space



DOGS

Running

Playing

Climbing



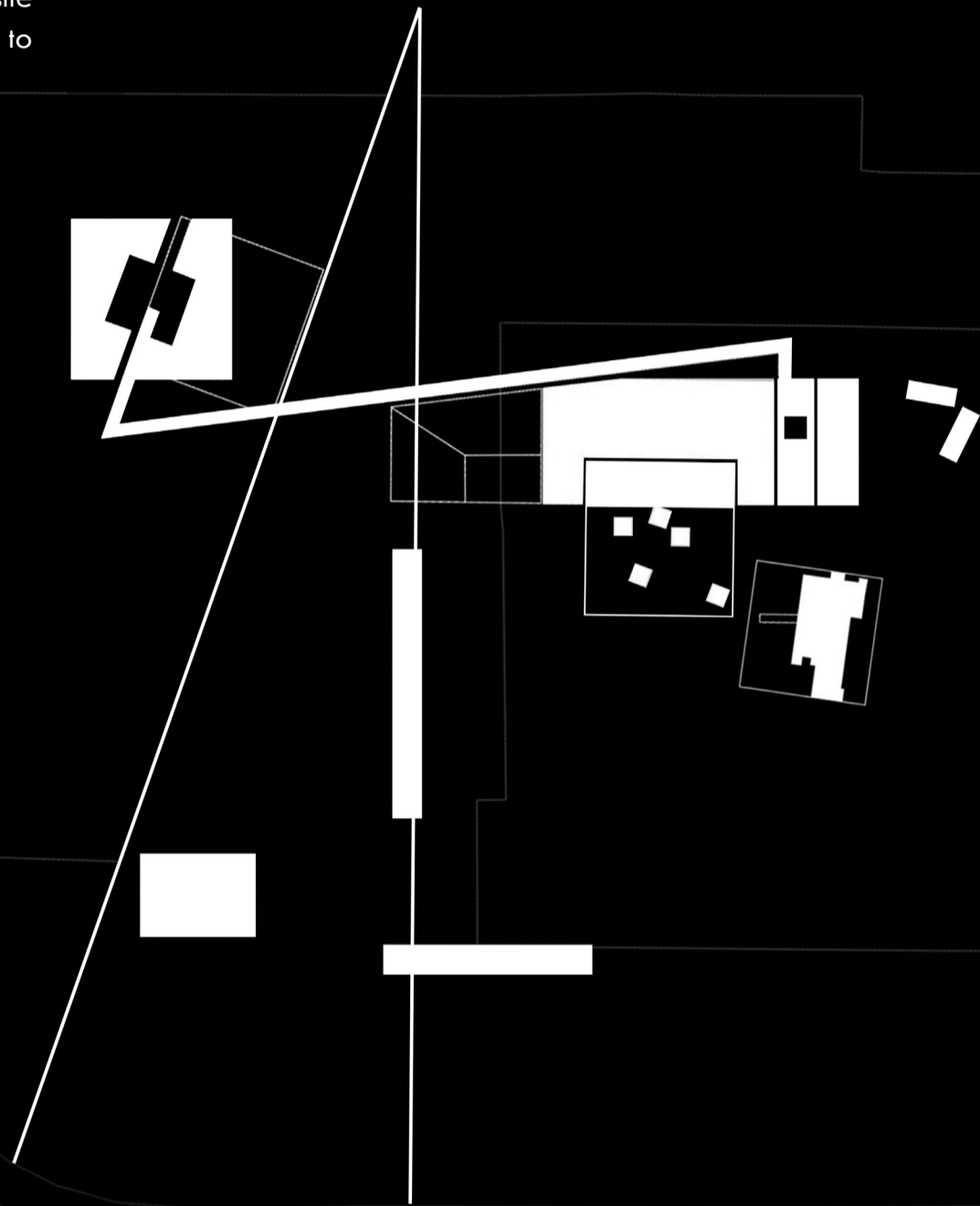
Semi - Outdoor Space

ANIMALS BOX

More than just a box

A06

According to the preliminary investigation, the design site was determined to be located in the backyard of the Blue Star Animal Hospital. The site is currently in a state of abandonment and has many green resources that can be used. The trees on the north side of the site are densely populated, while the south side is relatively open and connected to the main building of the hospital. The design replanned the site and formed an entrance square in a V shape, showing the intention of inviting people to enter. The north side of the site is designed as a relatively closed space to increase the tree coverage rate.



ANIMALS BOX

More than just a box

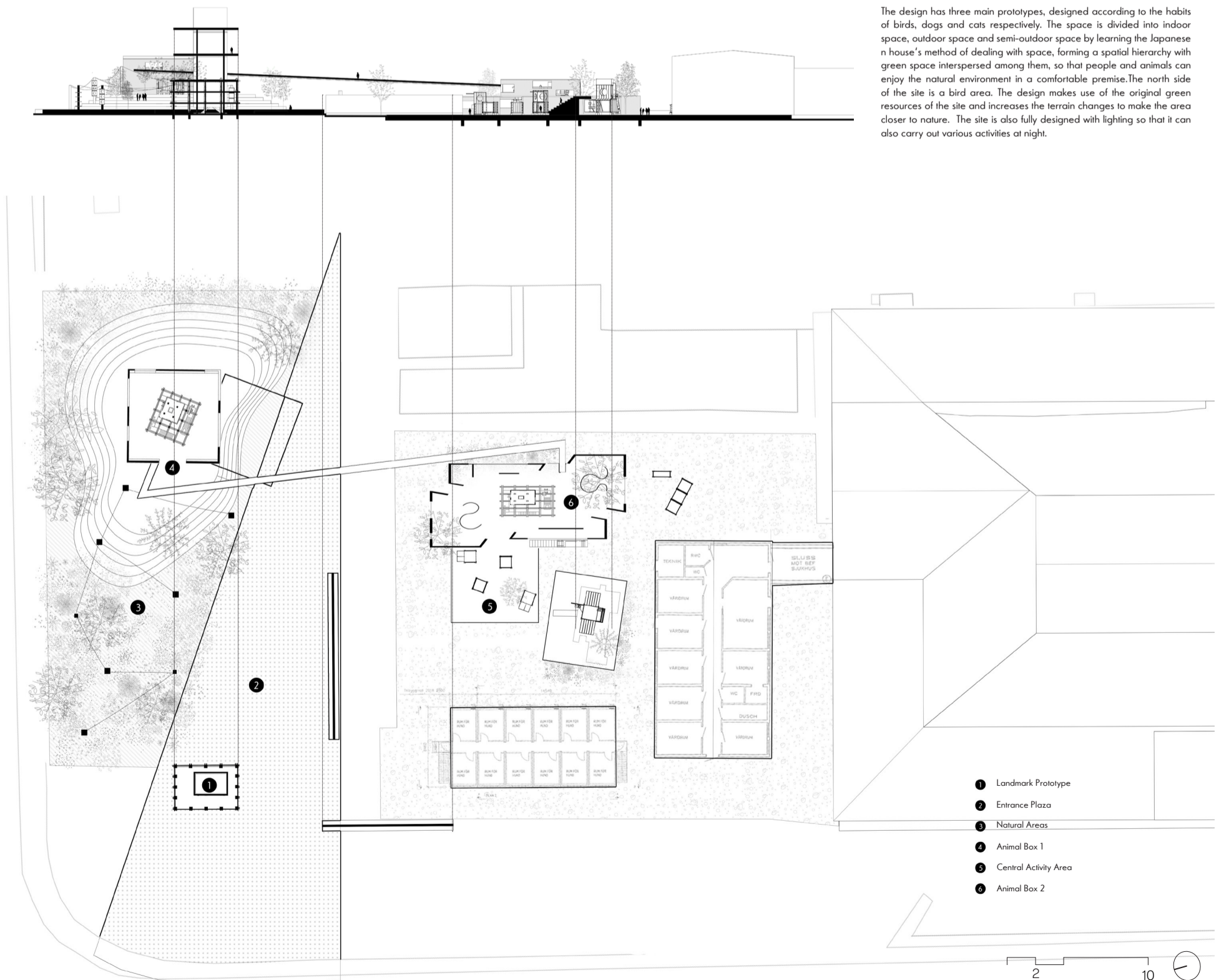
A06

Achieving ecological sustainability is one of the main goals of the design. Based on grasshopper's analysis of solar direction and wind direction, the prototype adopts an environmentally friendly design that integrates animal space with human space and adds rainwater collection and purification functions, so that it can serve as a system to promote ecological diversity in the RINGON area.

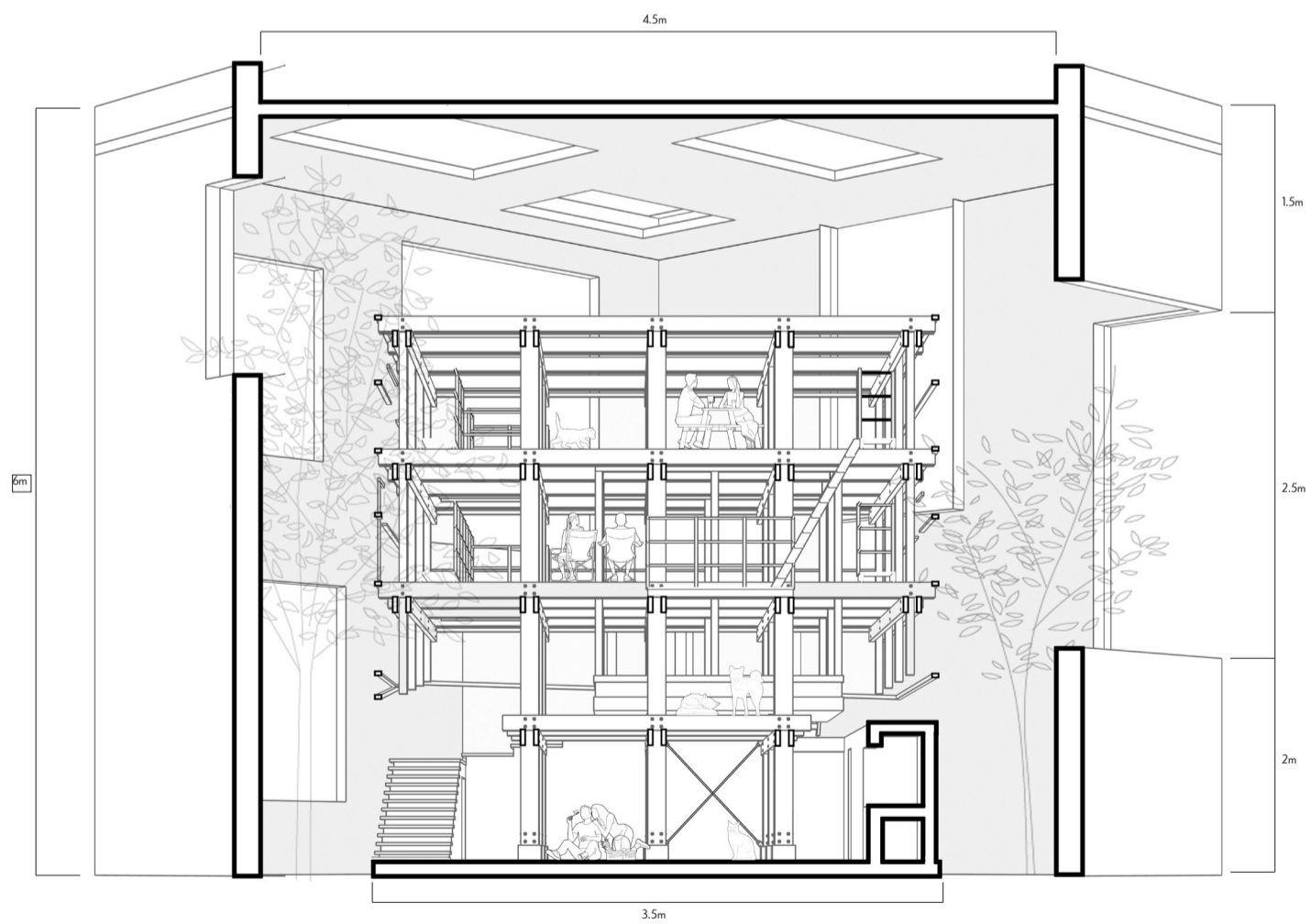


Various Boxes

The design has three main prototypes, designed according to the habits of birds, dogs and cats respectively. The space is divided into indoor space, outdoor space and semi-outdoor space by learning the Japanese house's method of dealing with space, forming a spatial hierarchy with green space interspersed among them, so that people and animals can enjoy the natural environment in a comfortable premise. The north side of the site is a bird area. The design makes use of the original green resources of the site and increases the terrain changes to make the area closer to nature. The site is also fully designed with lighting so that it can also carry out various activities at night.

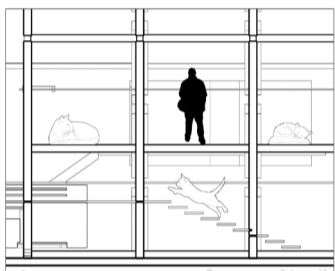
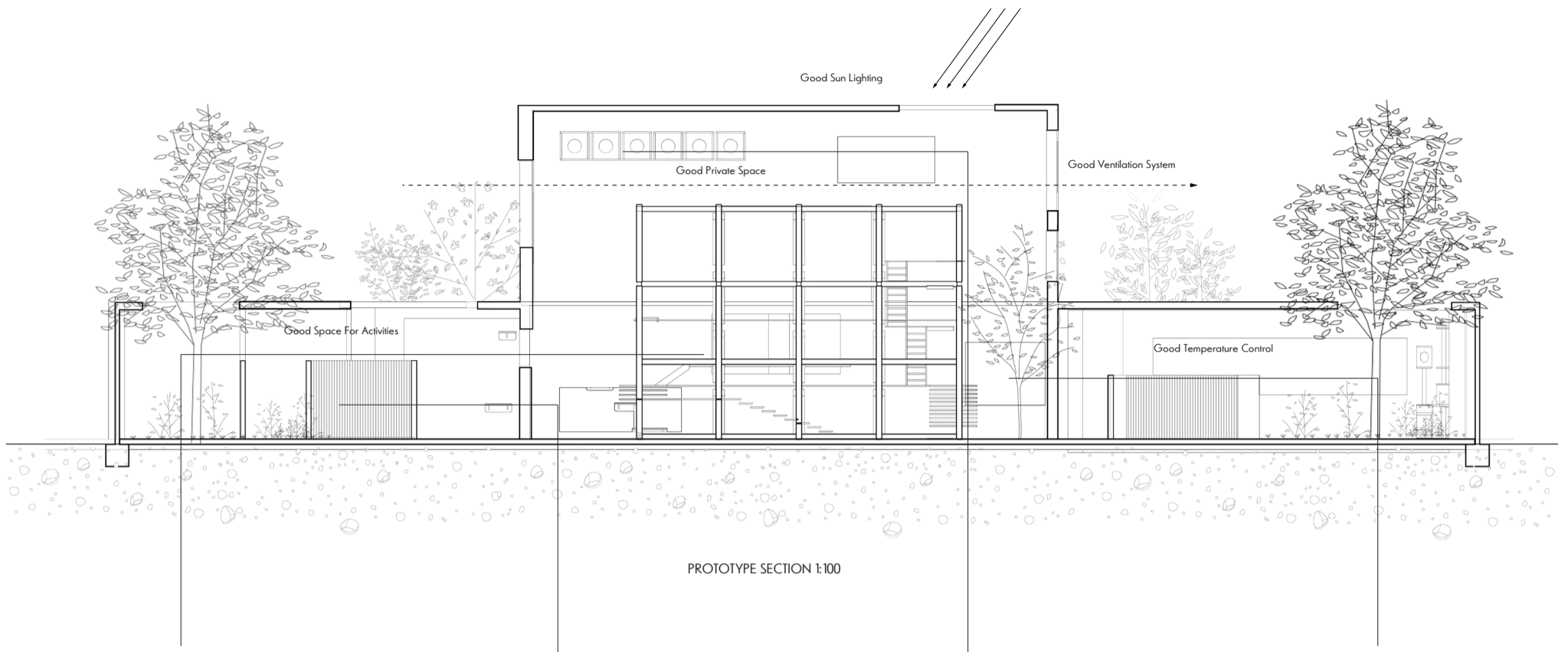


ANIMALS BOX IN RINGON

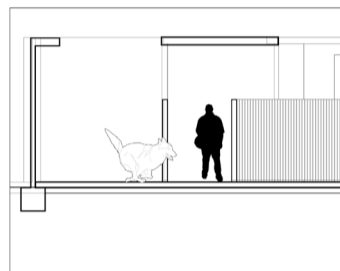


Detailed Technical Perspective

The north side of the site is a bird area. The design makes use of the original green resources of the site and increases the terrain changes to make the area closer to nature. The prototype adopts a nested structure of concrete boxes and wooden frame structures, which allows bird activities to be viewed without destroying the bird habitat. The hole structure on the outer structure has multiple functions. It can not only increase sunlight exposure and enhance the ventilation capacity of the box, but also allow birds to come and go more freely, which can attract more birds, such as birds on the river bank to live here, and can also attract more tourists, forming a virtuous circle.



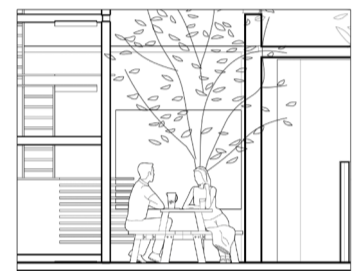
CATS



DOGS



BIRDS



HUMANS



Wooden Frame



Animal-Friendly Design



Blending with Nature

In the middle of the box is an open public structure designed to bring people and animals together to play and interact. Its wooden frame structure mimics the vertical spatial experience of the woods, with bird nests hung above as soft partitions. The small box in the middle of the structure creates a gathering space where people can visually and physically surround the sunken type to enjoy interaction with the animals. Many spaces of different scales are interspersed in the box to accommodate various behaviors of different species.

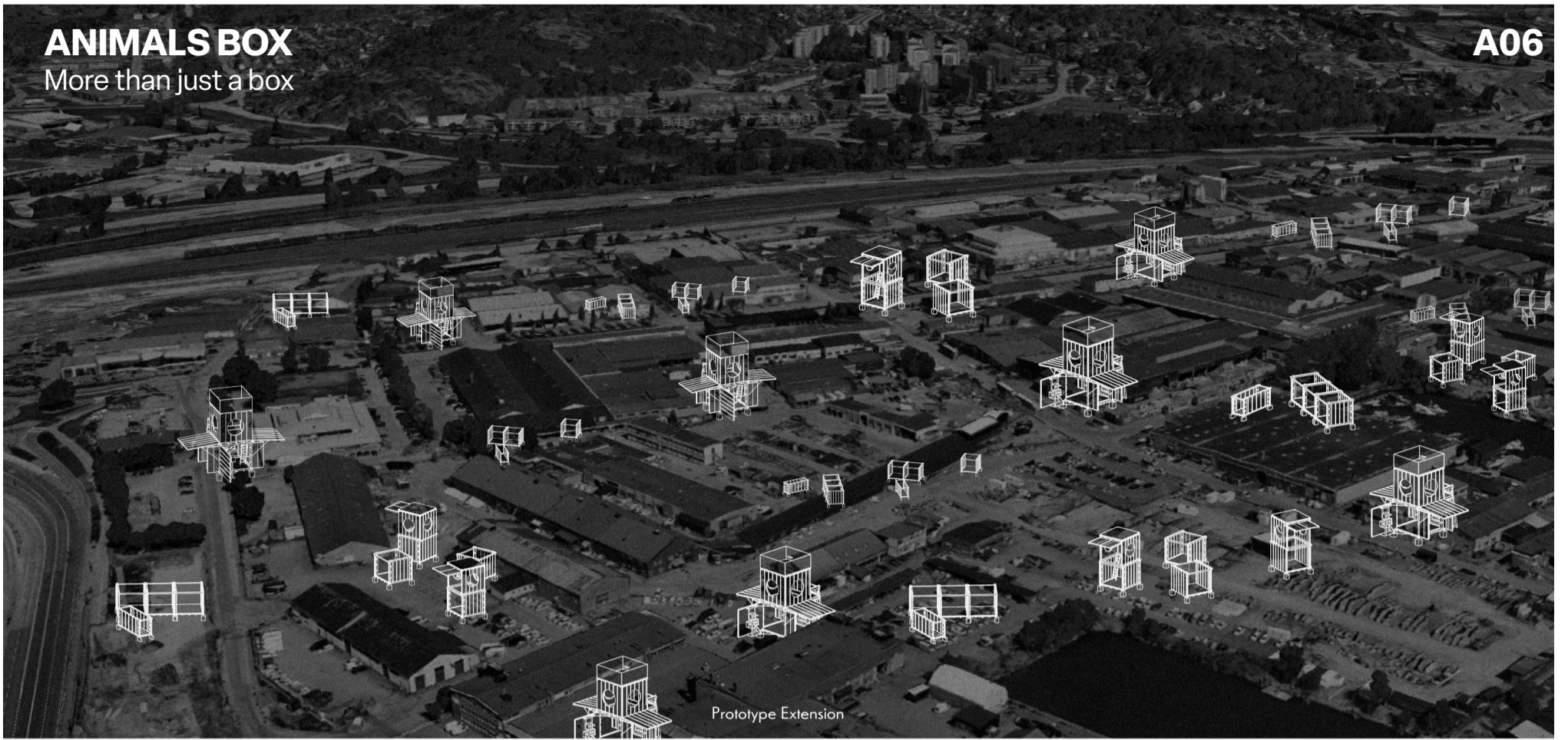
The non-human is at the heart of the design. Floors are typically designed for people and their shoes, but are adapted to the pads and joints of canine paws: the semi-outdoor space leaves plenty of room for dogs to vent to the outside, and rainwater from the roof is collected in large troughs for dogs and birds. The exterior wall materials minimize echo, noise and reverberation. The building is lifted off the site so that the entire activity area is connected to the center of the site and into the animal hospital. The entrance uses the sightline design method of Chinese gardens, which prevents people from directly seeing the entire site, thus attracting visitors to enter.

The openness of the facade allows the prototype to incorporate the surrounding nature into the interior climate, but it is also closed to create a buffer zone between the two. The rooftop device collects rainwater and snowmelt, which is then transported to a tank and then used to irrigate the concrete walls and plants in the box. The shape symbolizes the ability to bring nature into the box in the form of air, water and light.

ANIMALS BOX

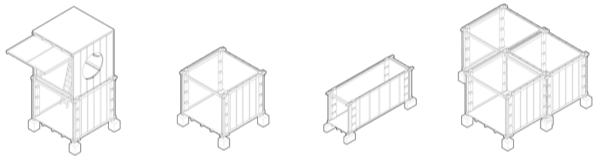
More than just a box

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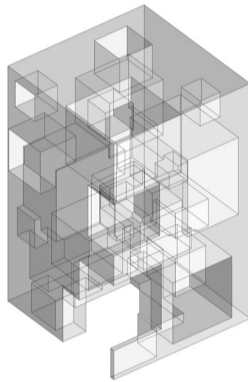


Random Space and Expansion

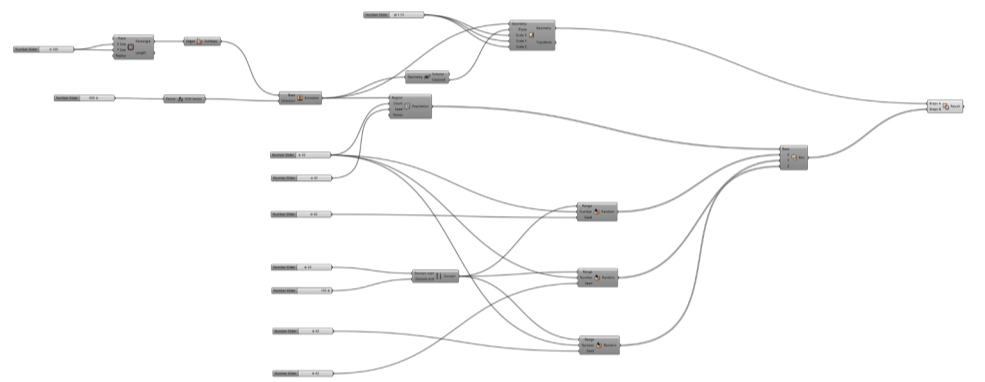
The design adopts a sample design and can be implemented in any corner of the city. The design uses grasshopper for space simulation, simulating several dot matrices in a cube, and expanding it into several cubes as the center, thus forming a variety of random spaces in the box, which conforms to the behavioral scale of various organisms. These boxes are divided into different sizes and can be assembled arbitrarily according to the site. This saves transportation costs, achieves economic and ecological sustainability, and can serve as the development direction of future cities.



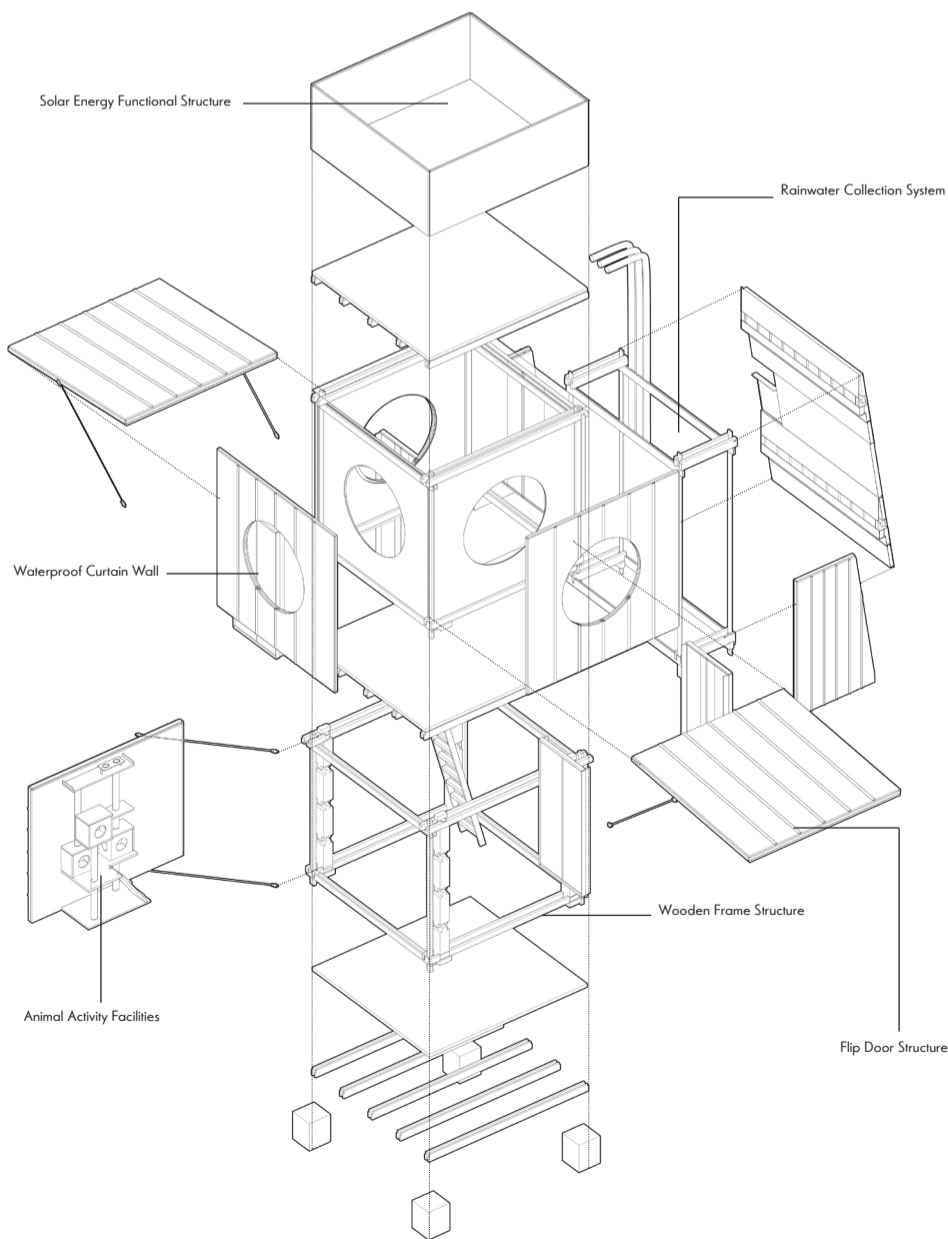
Various Boxes



Random Space



Random Box Generation Process



Explosion Analysis



Open Source Urbanism

The core idea of open source urbanism is to promote democratization and inclusiveness of urban governance through open technology and community-driven infrastructure. It draws on the concepts of the open source movement and emphasizes the decentralization and community participation of infrastructure design and management. This model challenges the traditional centralized, expert-led urban governance model and advocates promoting urban innovation and development through open source platforms and collaborative development. I hope that this design can be a vision of this idea and provide a direction for thinking about future cities.