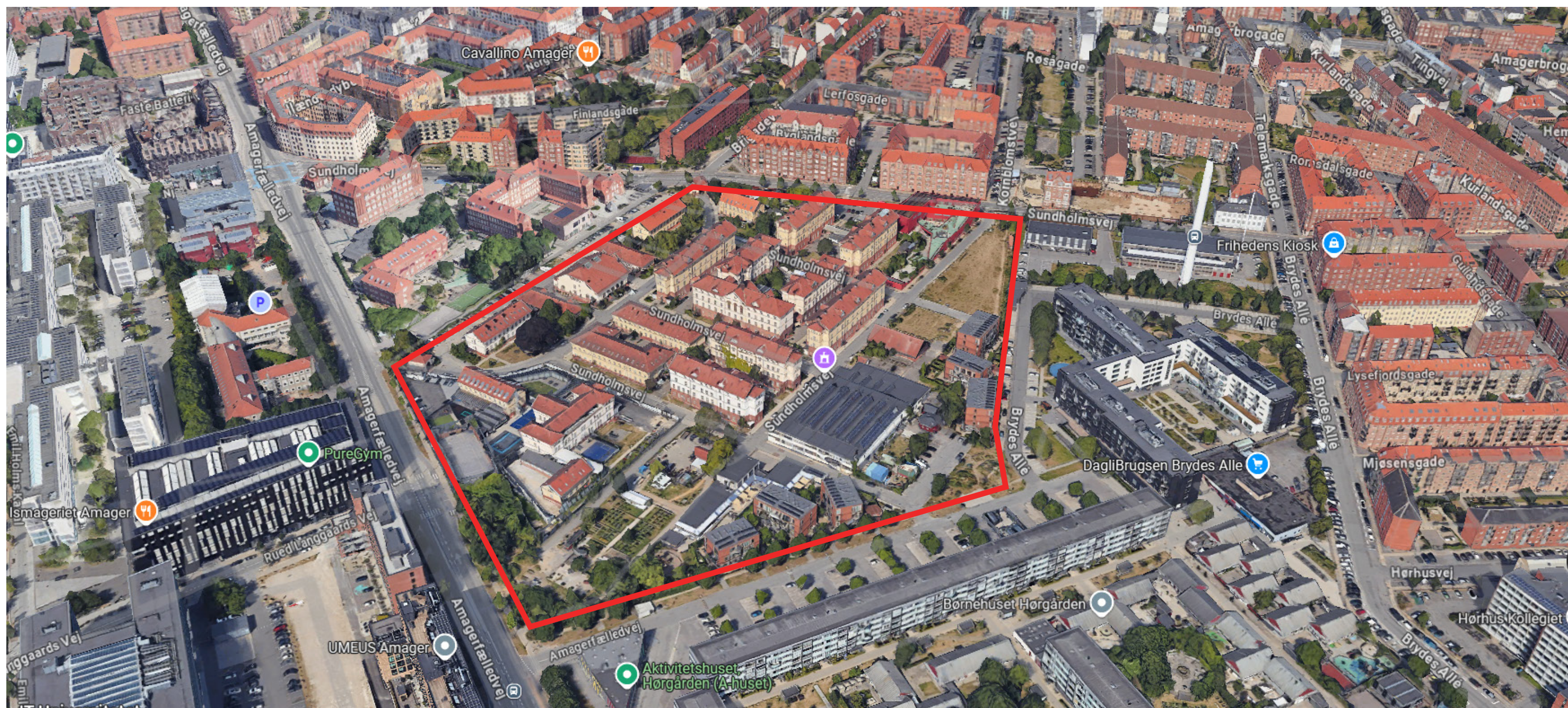


Reshaping Boundaries

Public Building - Public Condenser 2024-2025

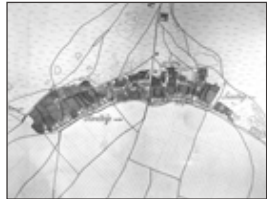
Tutors: Henk Bultstra
Florian Eckardt
Sien van Dam

Student: Jing Ge
Student number: 6037275

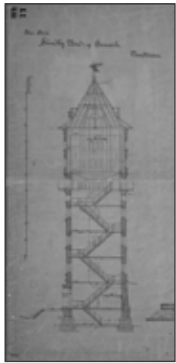


Timeline

1750



Sundby
A village outside Copenhagen
The Sundby area on Amager has its historical origins back in the 11th century. The Sundholmsvej kvarteret, as it is called today, originally went by the name Sundbyvester and, together with Sundbyøster, formed the Sundby area.



The beginning of industrialization
In 1841, Ludvig Zinn built an asphalt factory, later converted into the Godthaab match factory in 1855, employing 180 people, many of them women.



1840

By 1840, Sundbyvester had 1,133 residents and several industries, including mills, an oil factory, and a paper factory.

Sundby Municipality, on the outskirts of Copenhagen with immigration, factories and great hopes for the future.

1901



The infrastructure here is becoming more and more complete, and many health and military institutions have been established here.



1905

1908



Establishment of Sundholm
It originally comprised 22 buildings, including service buildings and workshops. Two types of people lived at Sundholm at that time: people who were able to work but without the financial means to look after themselves and convicted felons who had been sentenced to labor.



Sundholm was a self-sufficient institution and around the buildings a three-metre deep moat and fence was established so that the institution's users could not escape.

1930



Housing

The Industrial Revolution made cities more and more crowded, and companies bought nearby land and began to build low-cost housing.



During this period, the area was full of residences, factories and social institutions.

1969



1970-80

Sundholm had shifted from its origins as a workhouse to becoming part of a more holistic social welfare framework, reflecting the progressive social policies of Denmark during that era.



Shift in Social Welfare

By the 1970s, Denmark's approach to social welfare began emphasizing rehabilitation and reintegration rather than punishment.

1999



Sundholm closes as a unified institution and now houses various institutions and workshops



Area Lifting

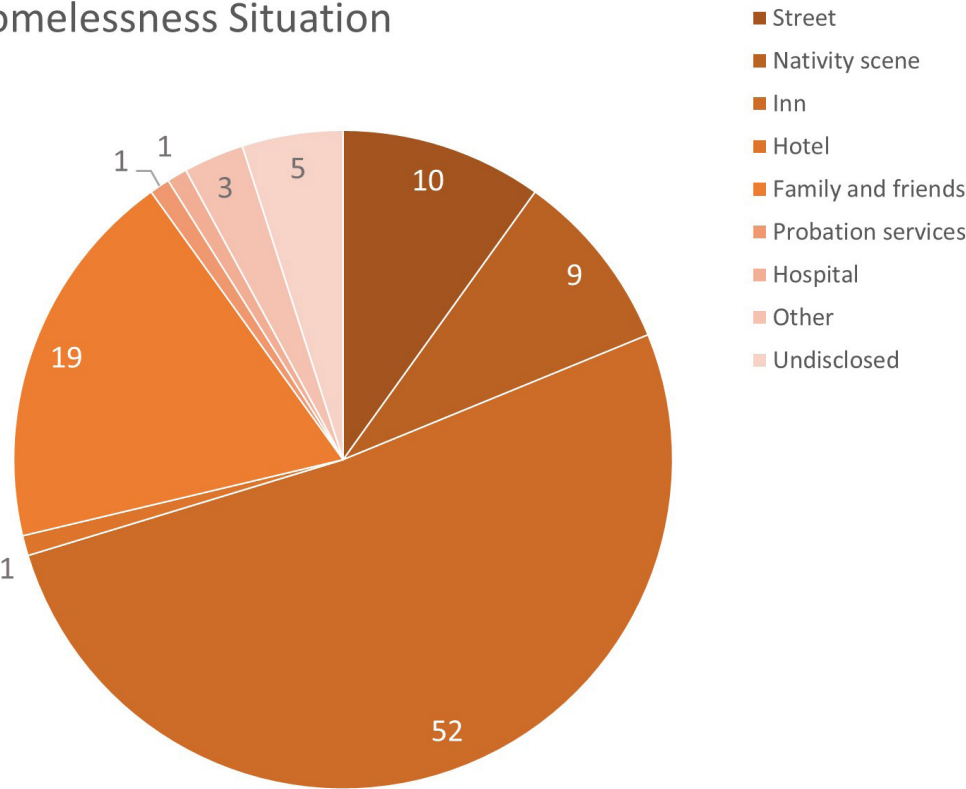
Due to the area's bad reputation and poor urban space ecology, the government decided to carry out urban transformation here in 2008.

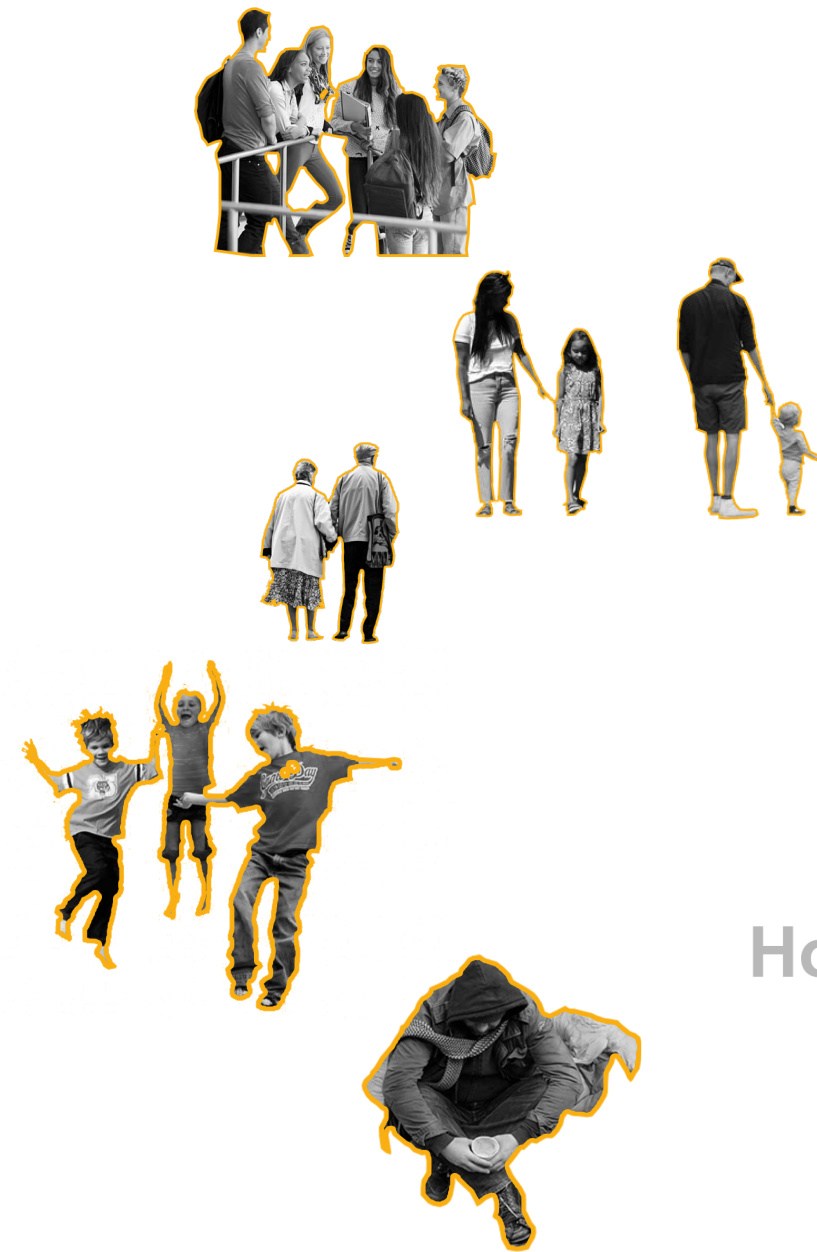
2008

Social background



Homelessness Situation





Harsh environment
with vulnerable

“Gangs”

Lost space

Darkness

Lack of meeting place

Arts

Holes in the road

Garbage

Shit

Insecurity

Greenery

Playground

Cars take up too
much space

Poor connection

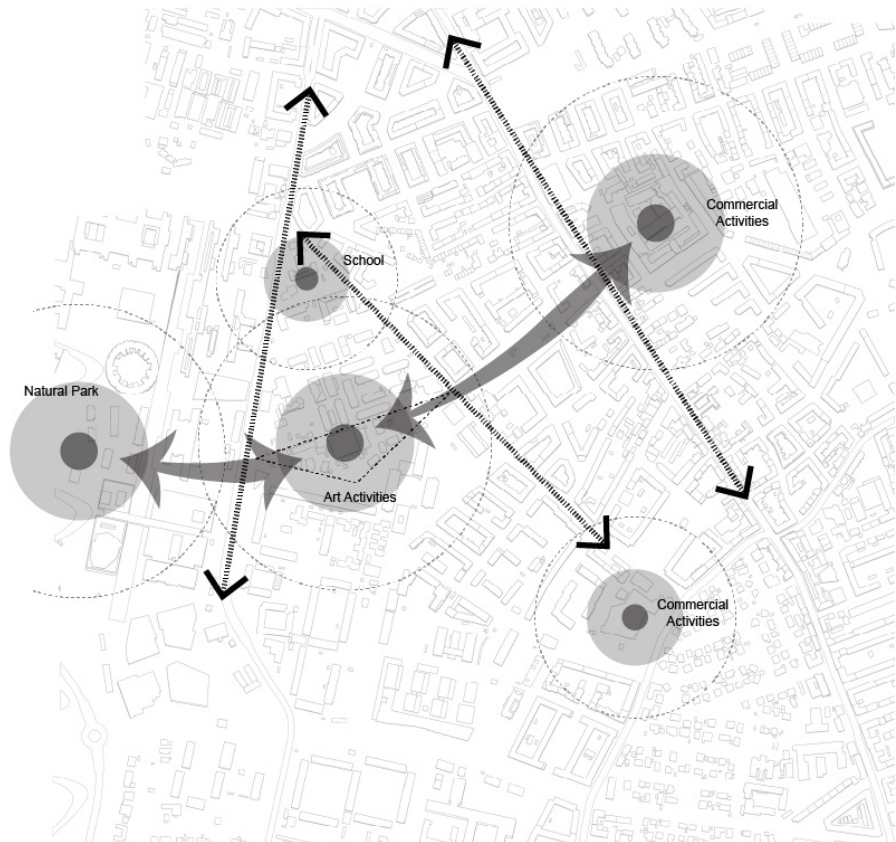
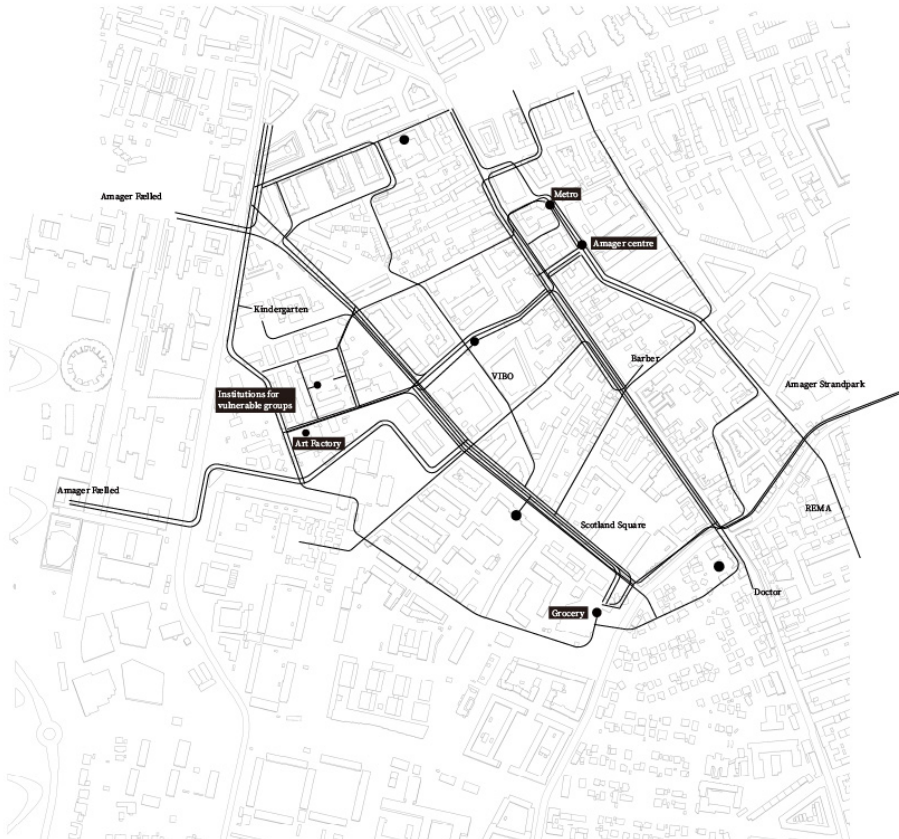
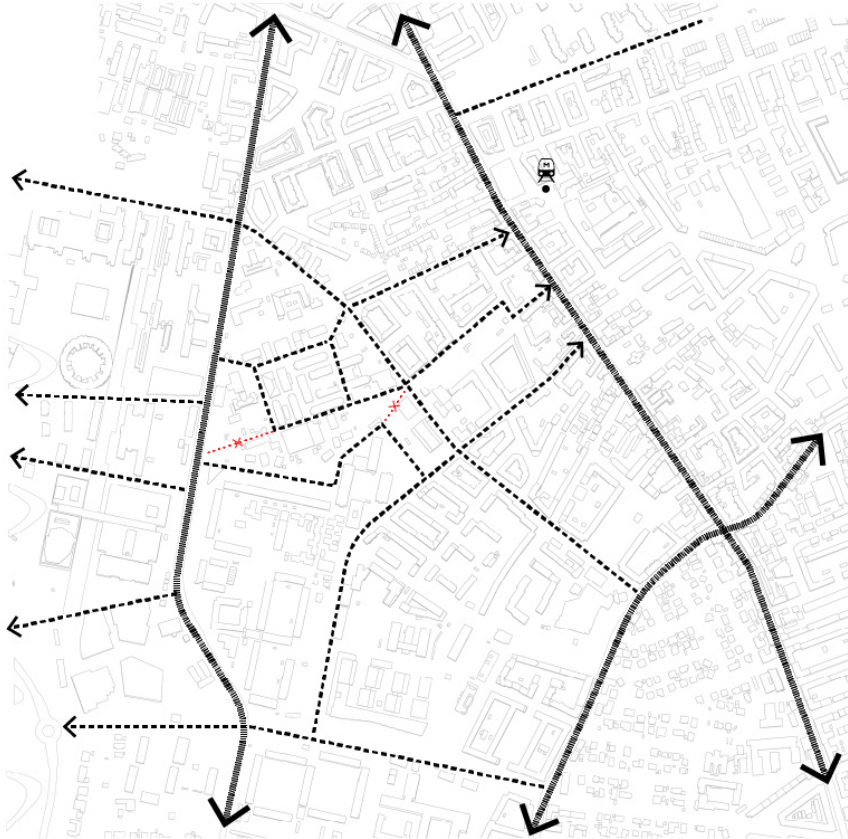
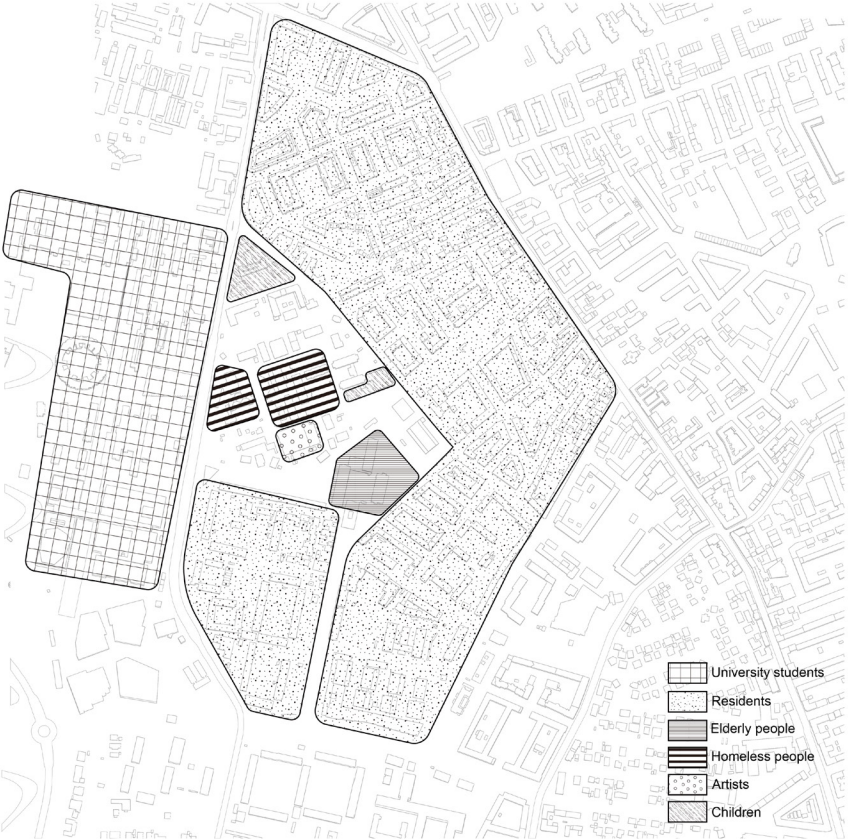
Missing more
commen events

Barriers

NO “Hygge”

Hørgården's reputation

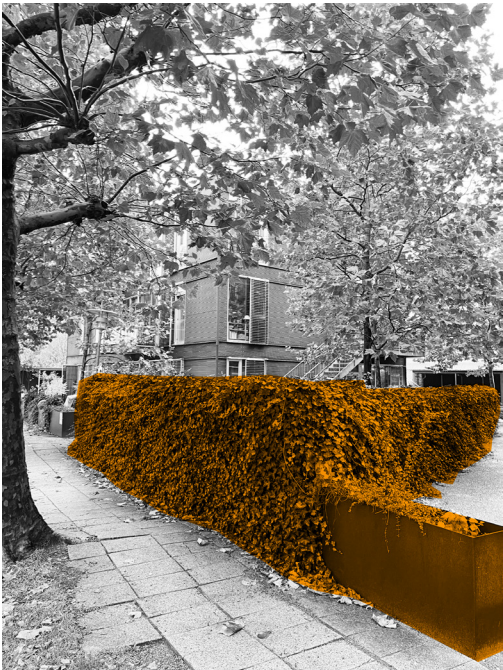
Urban Analysis



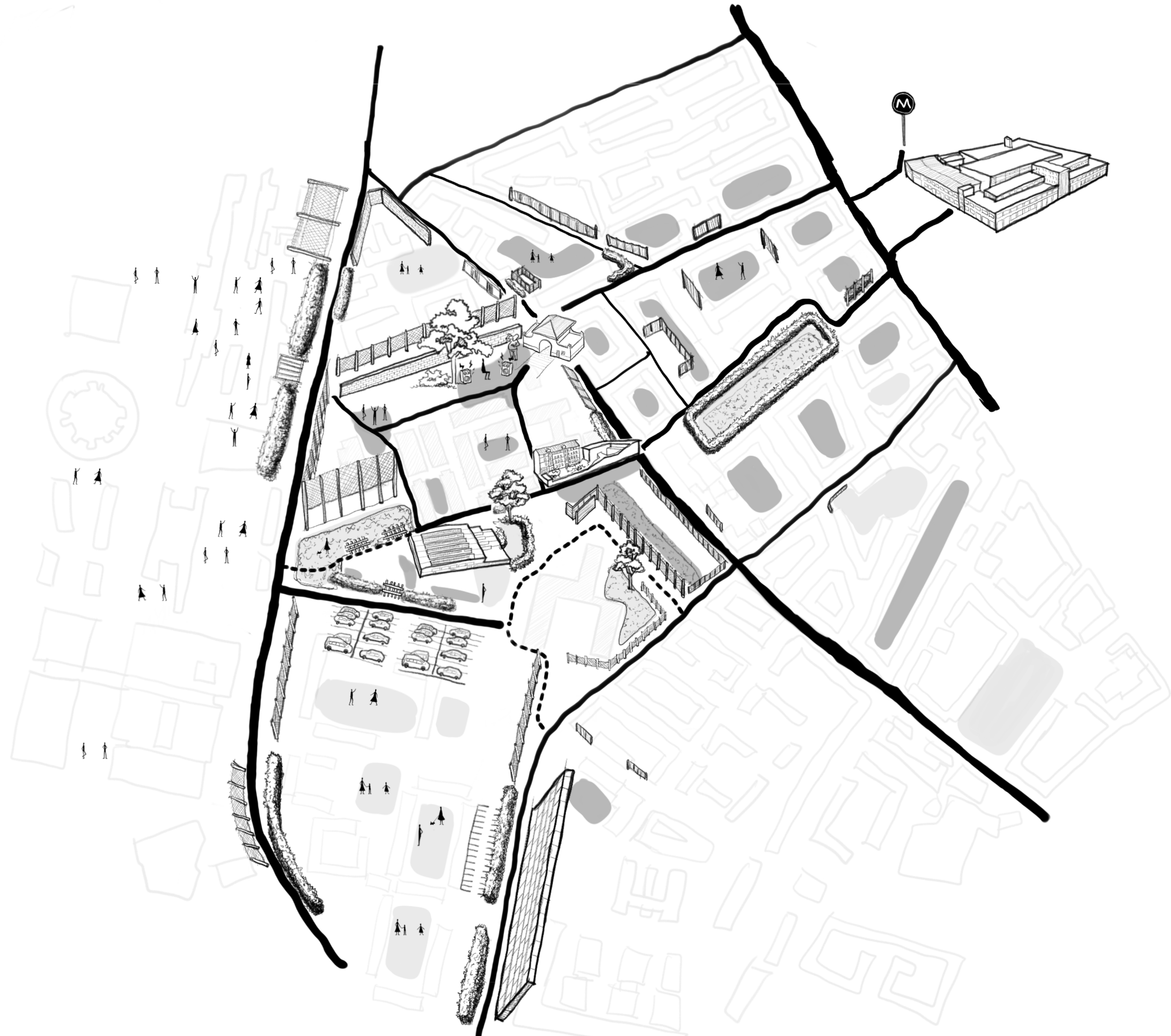
Moat and Fences

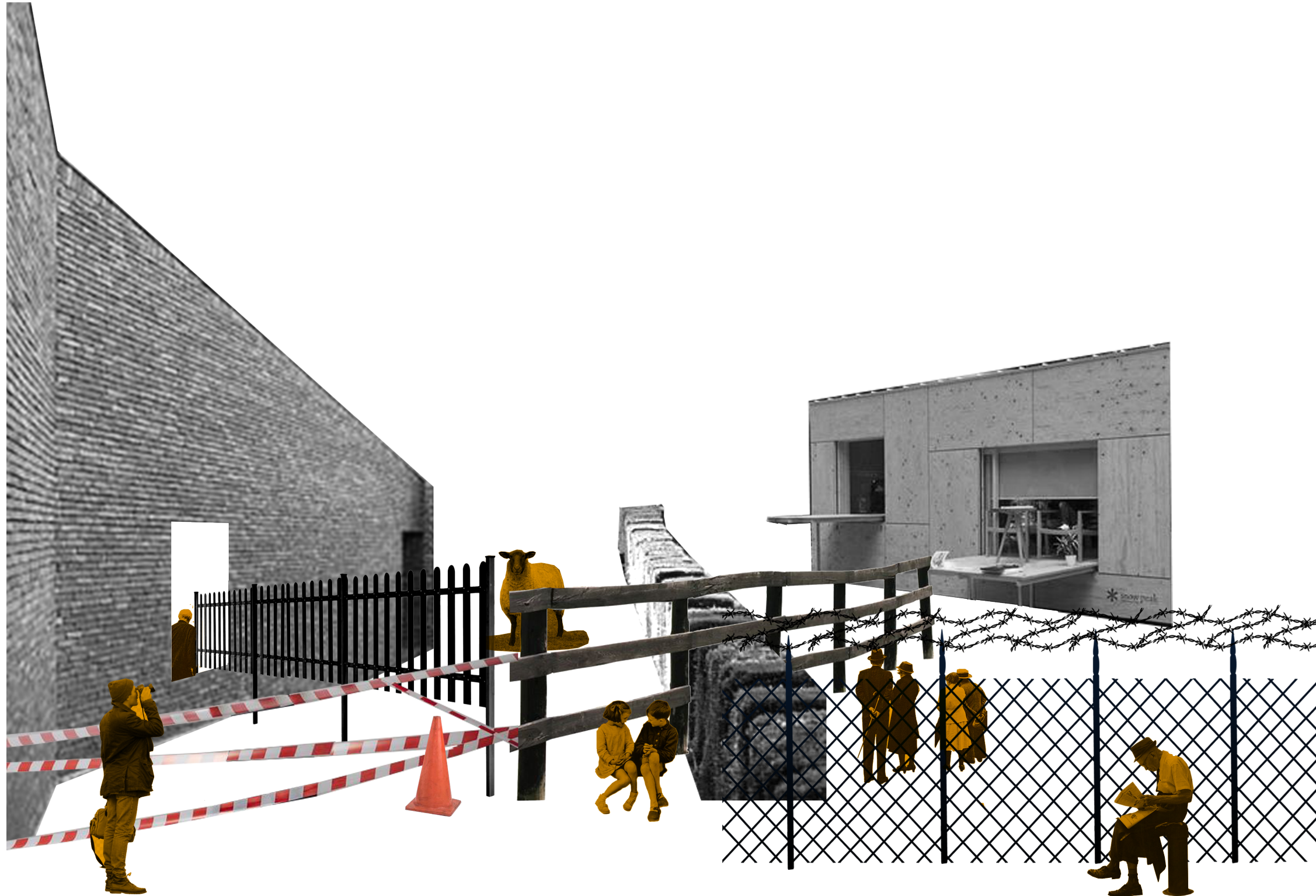


Boundaries in Sundholm



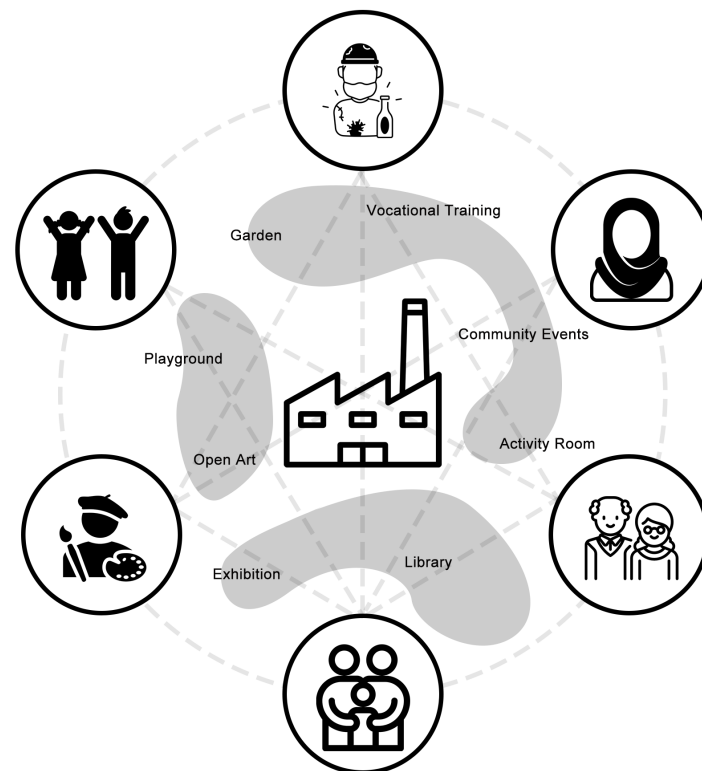
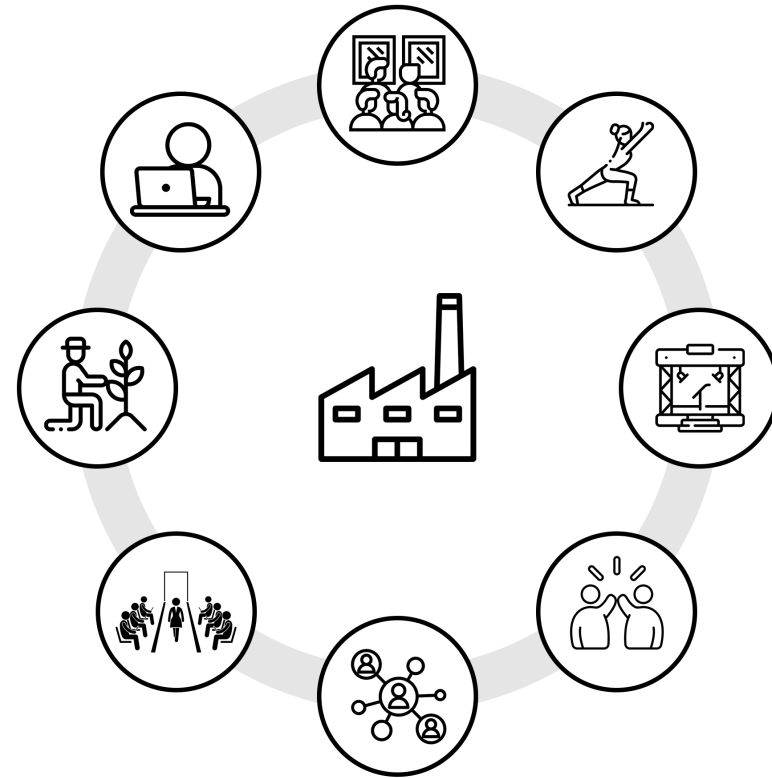
Mapping of the Boundaries







Design Goals



Design Brief

Entry 200-300 m²

- entrance
- information
- toilet
- café

Art Studios 600 m²

Community Centre 600 m²

Library 400 m²

Gym 200 m²

Workshop 400 m²

Vocational Training 400 m²

Shared Kitchen 150 m²

Canteen 200 m²

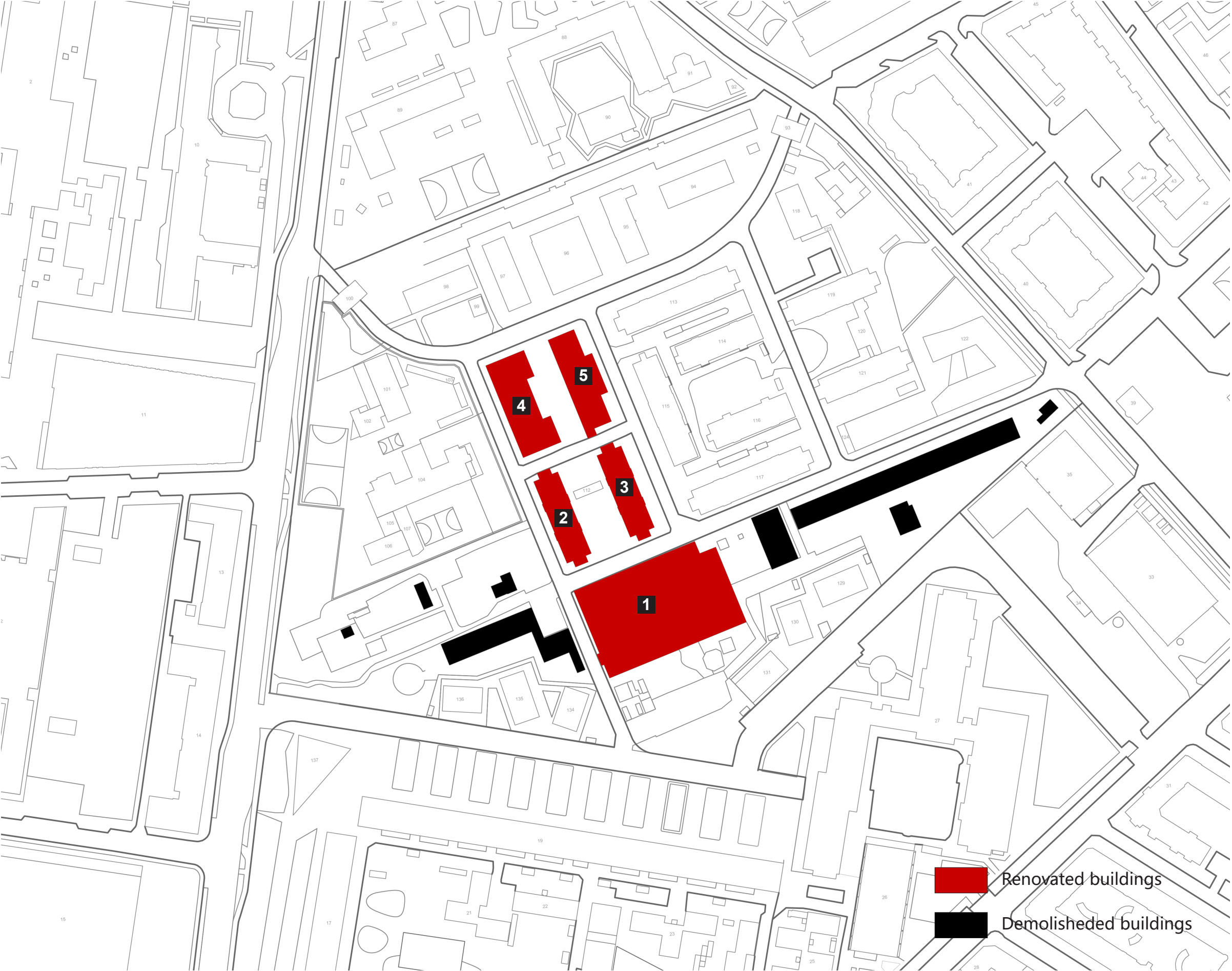
Toilets 150 m²

Circulation 700 m²

In total 4500 m²

1:1000

Current Circumstance



Current Circumstance



The Art factory
originally a laundry, is now a large art studio community hosting 60+ artists with 50 workshops and a 1,000 m² hall.

1



Sundbyhus
is a residential facility for 27 individuals with mental health and substance use challenges. Built in 1907, it offers private rooms or apartments, shared spaces, and 24/7 staff support. Residents receive personalized care, harm reduction assistance, and access to activities for social and personal growth.

2



Aktivitetscenter Sundholm
is a public institution in Copenhagen offering work opportunities under flexible conditions. Participants can join one of four workshops: gardening, woodworking, crafts, or bike repair. The center provides a supportive environment where individuals can work individually or in teams, earn a stipend, and contribute to various tasks like maintaining green spaces, crafting, and repairing bikes.

3



Væksthuset
is a social economic enterprise and a business foundation. Our profits are used, among other things, for social projects and for research and development into employment efforts for disadvantaged unemployed people in Denmark.

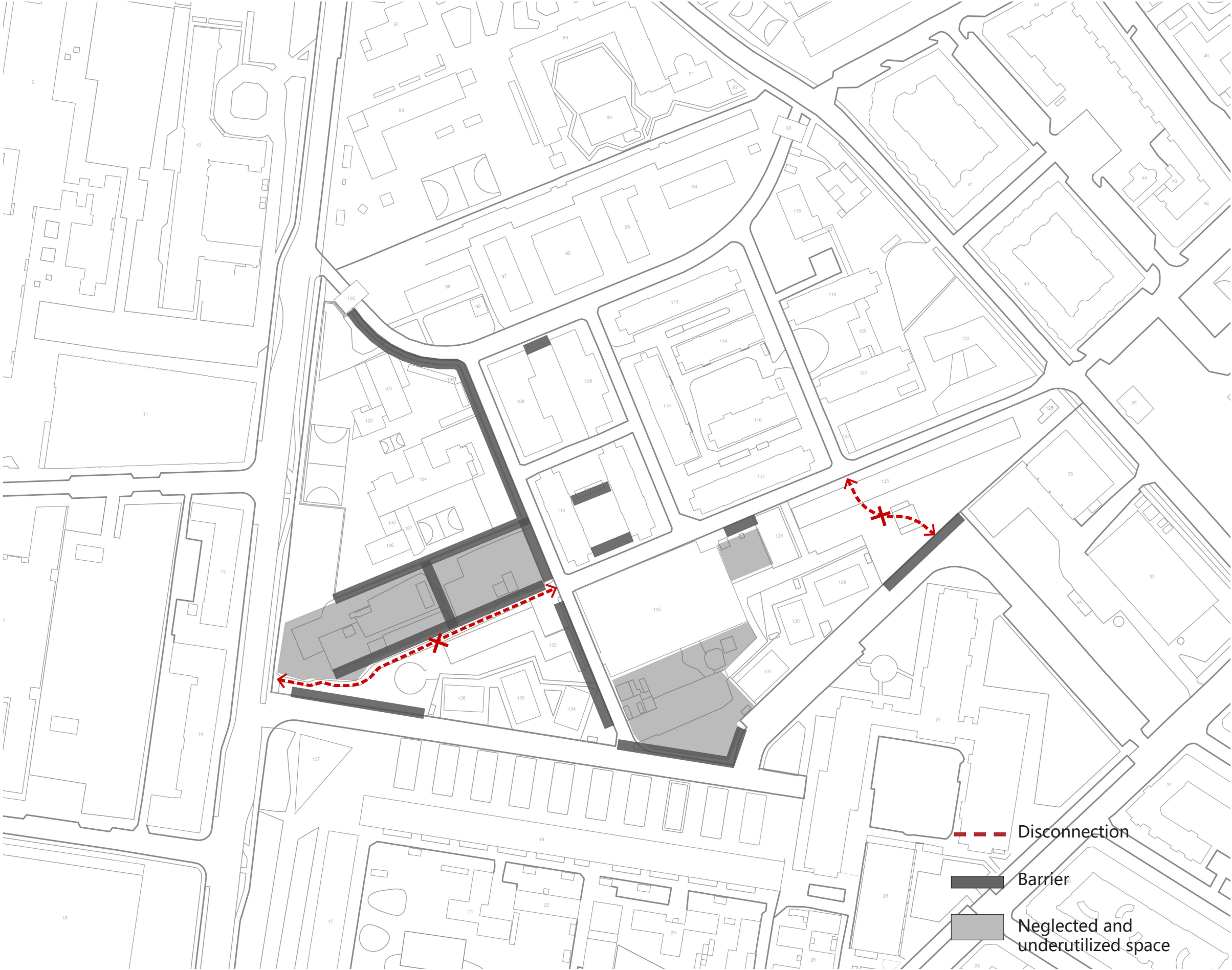
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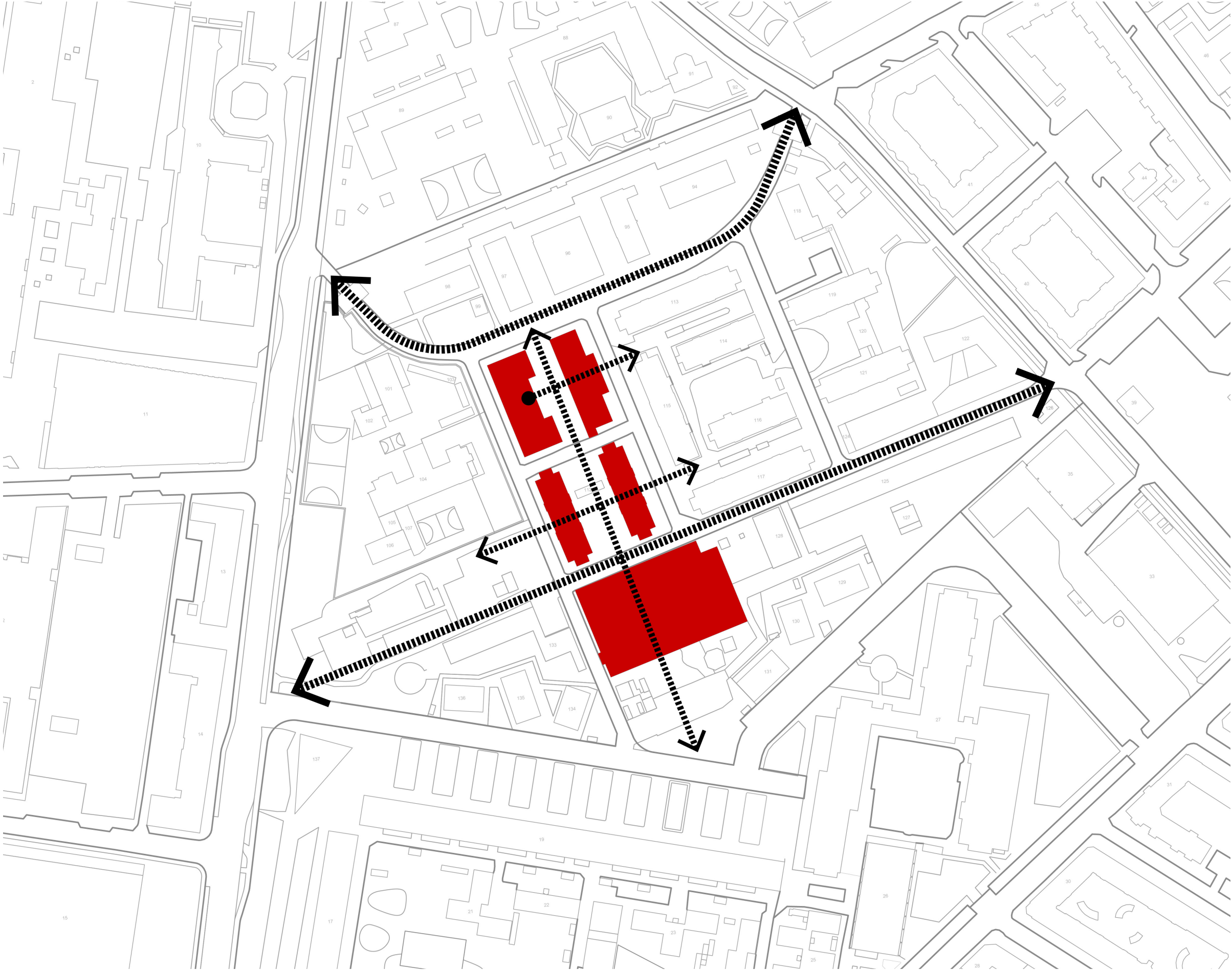


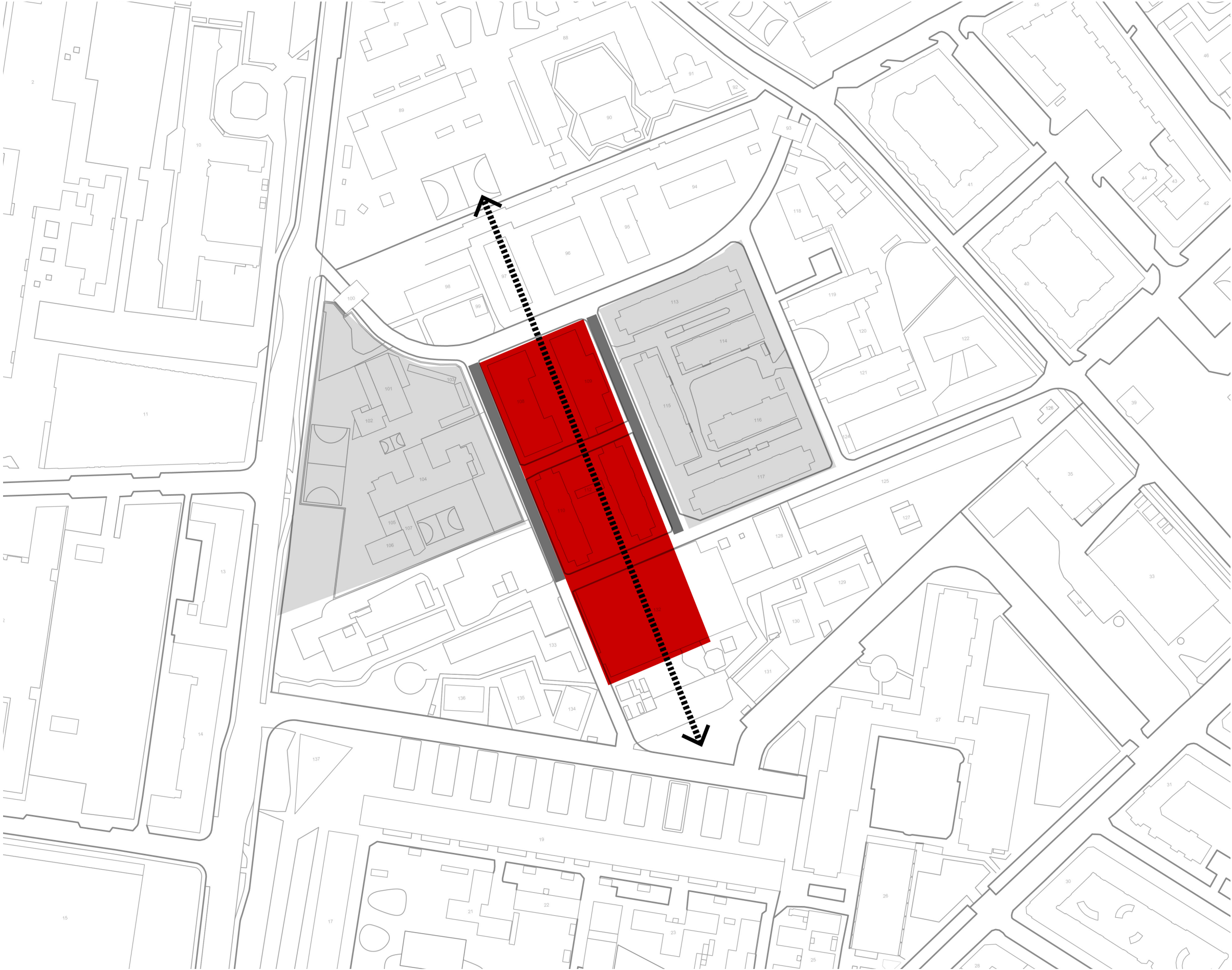
The night café
offers overnight accommodation and support for homeless adults. Guests can work with staff to set personal goals, create a plan for their stay, and connect with external services.

5

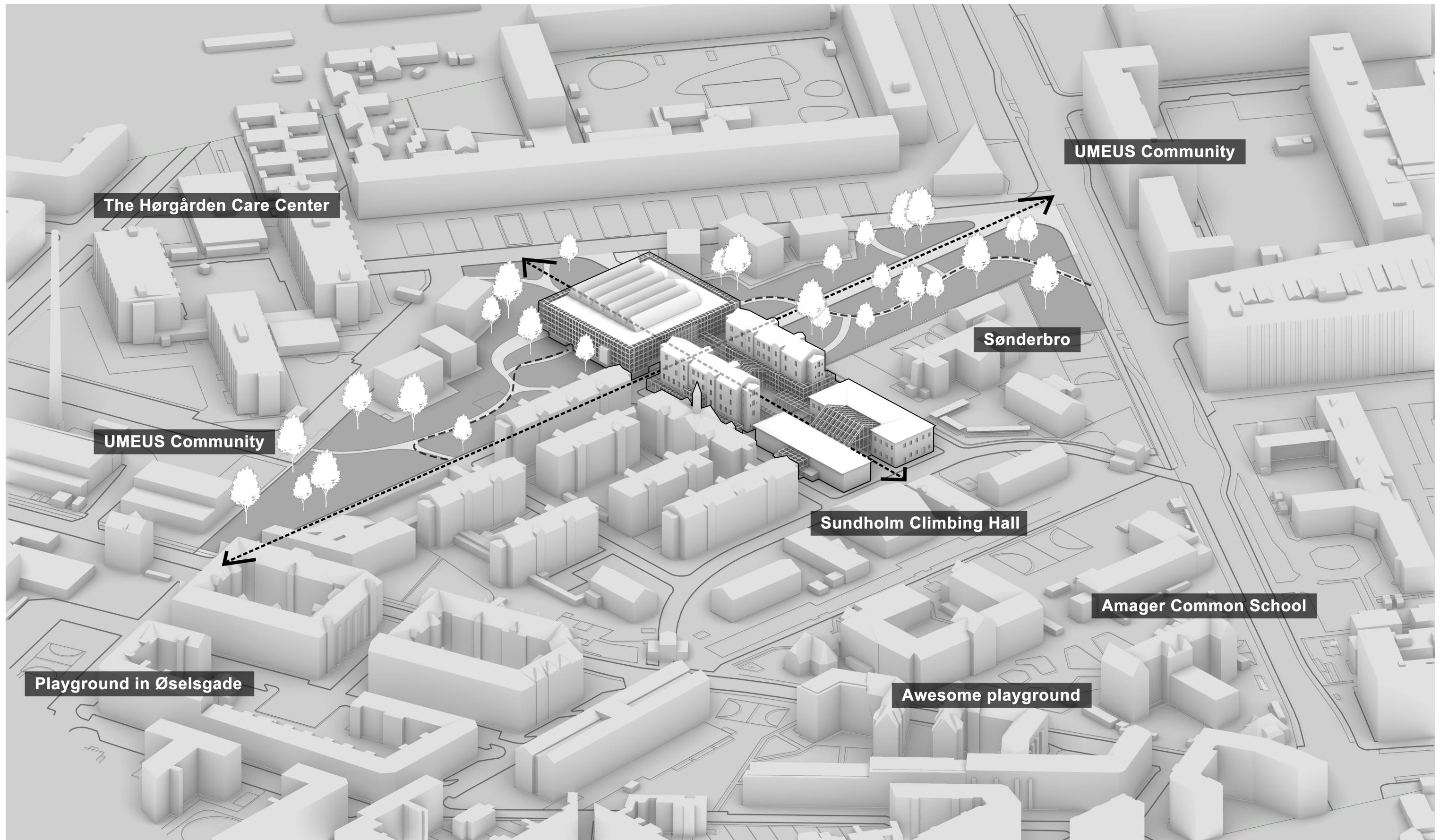
Problems Overview







Axonometric Diagram

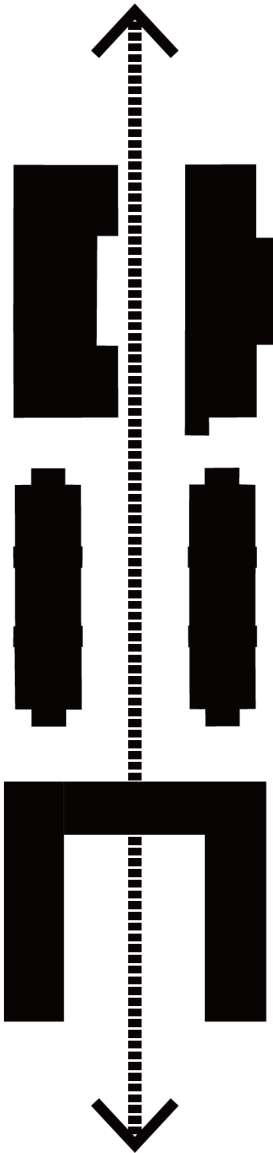


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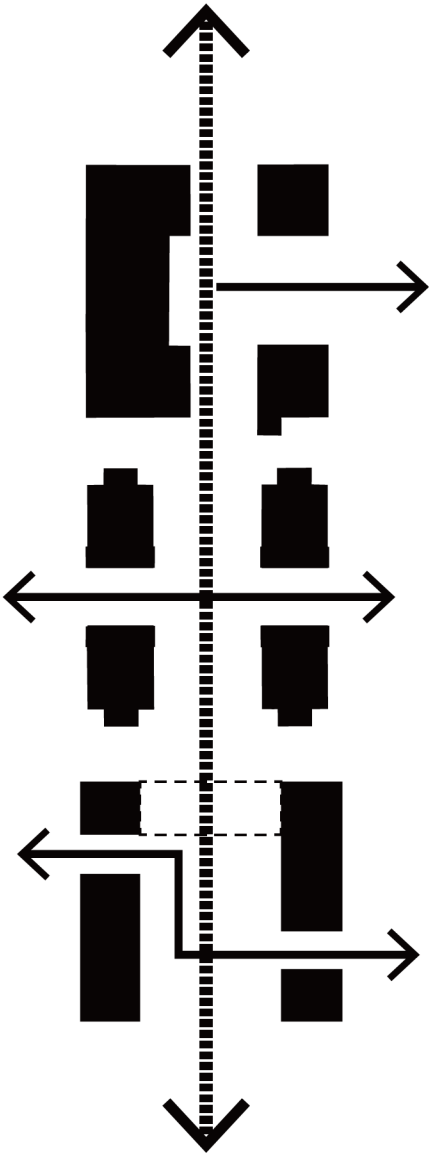
Conceptual Plan



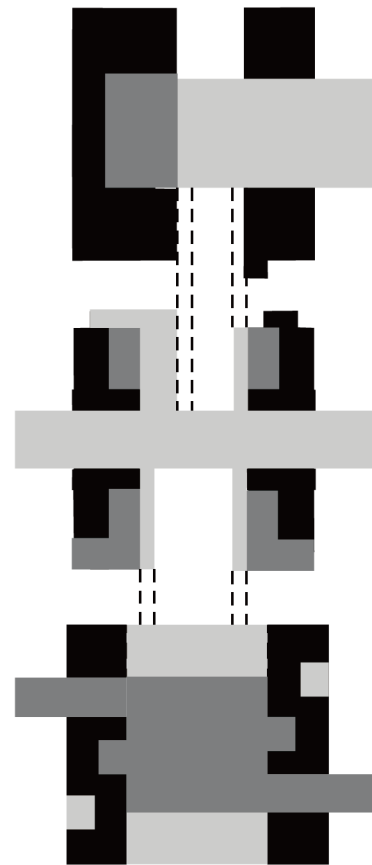
Original



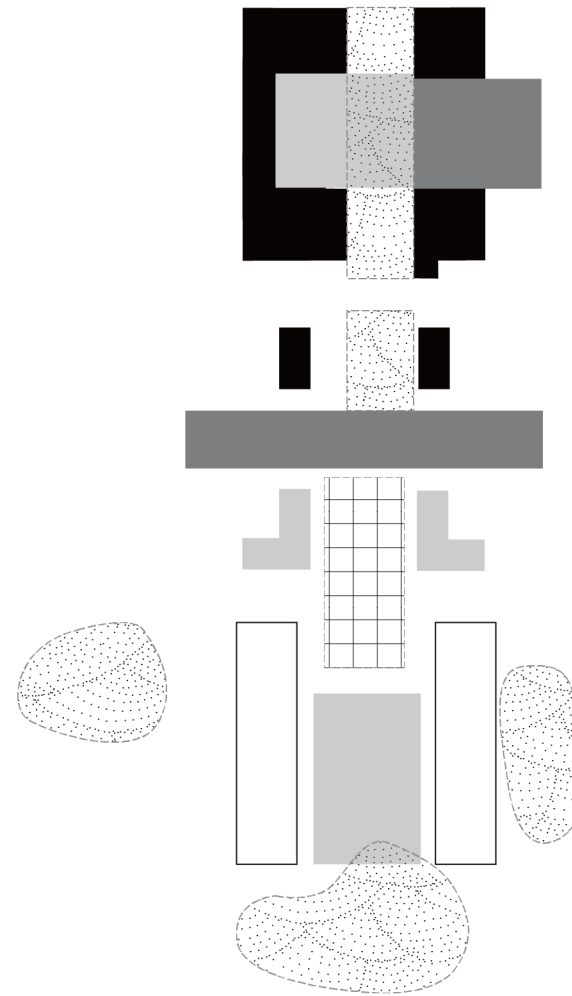
Axis



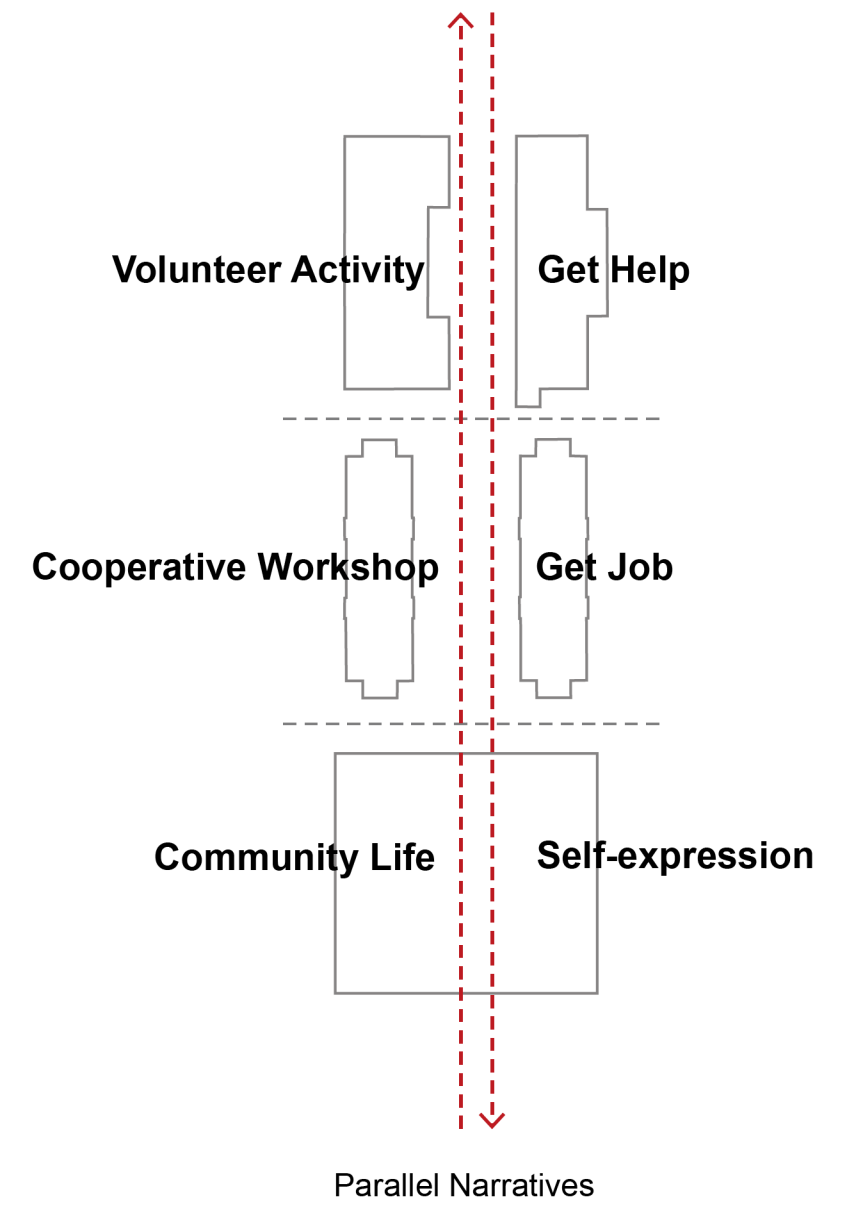
Connection



Inside and Outside

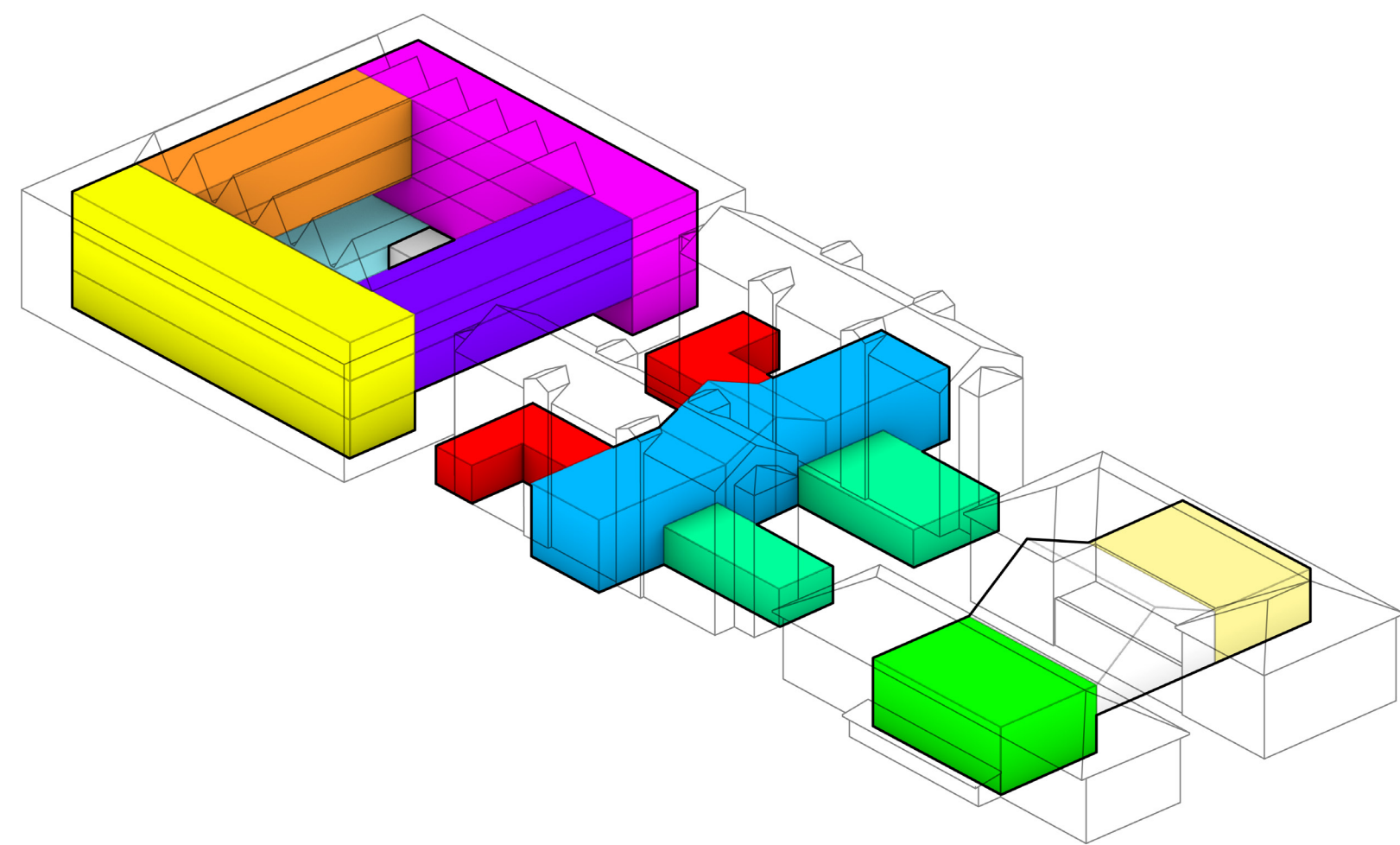


Zoning

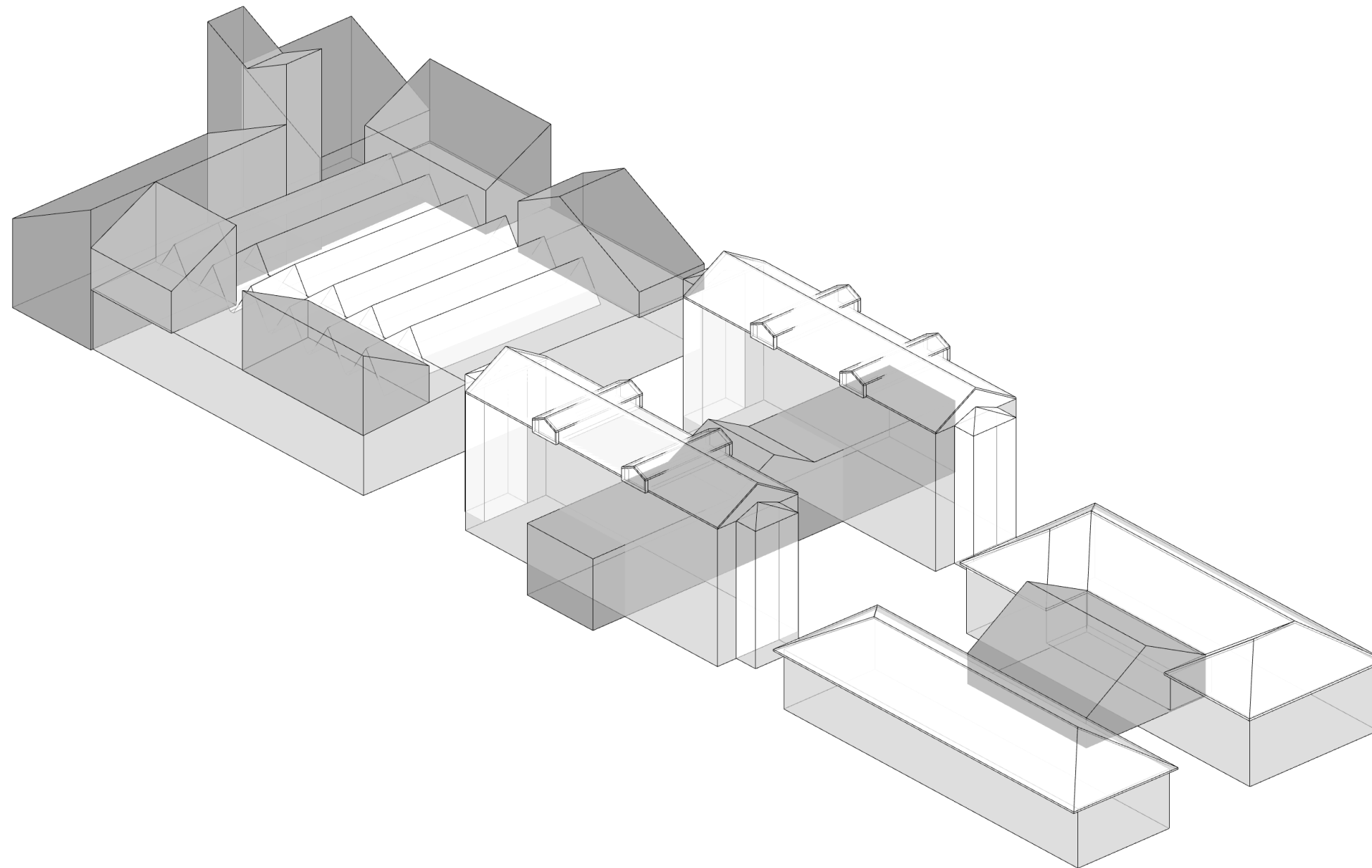


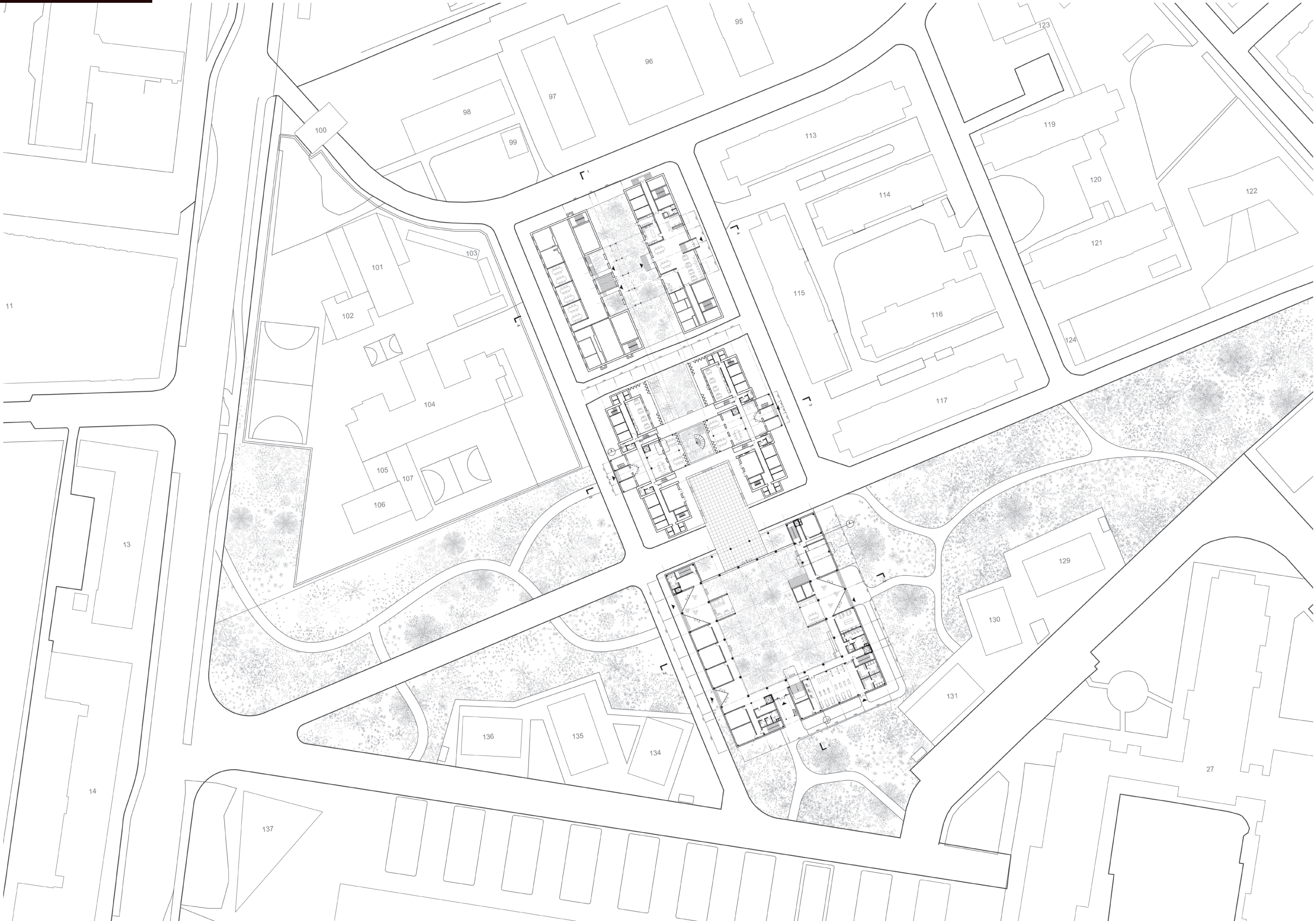
Parallel Narratives

Program Analysis



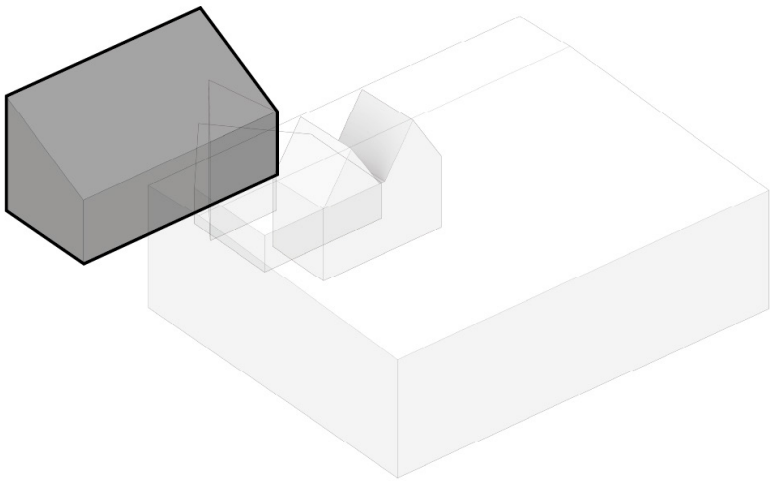
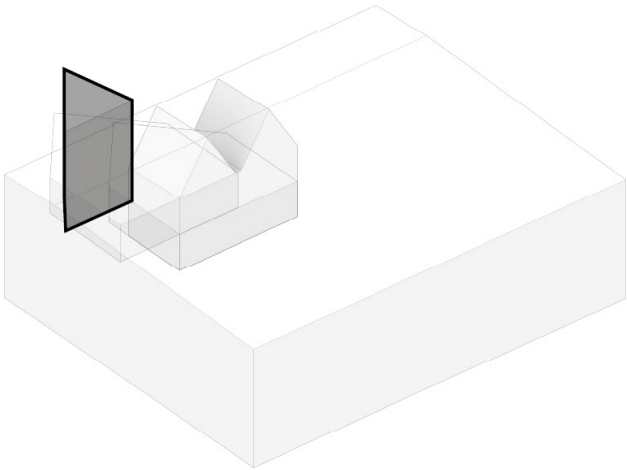
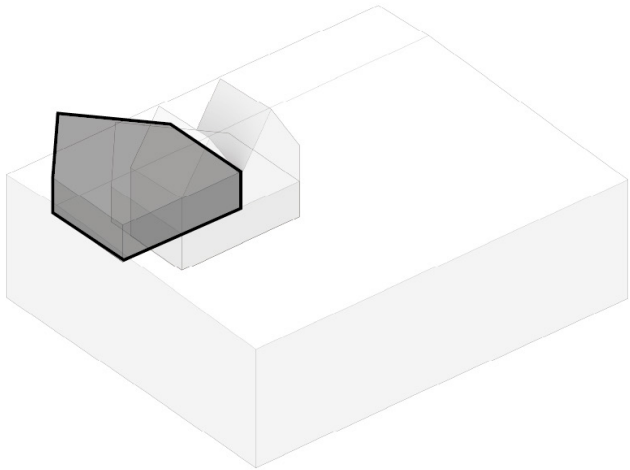
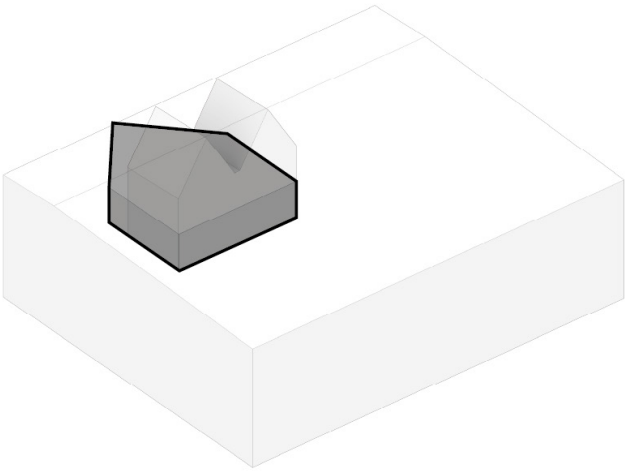
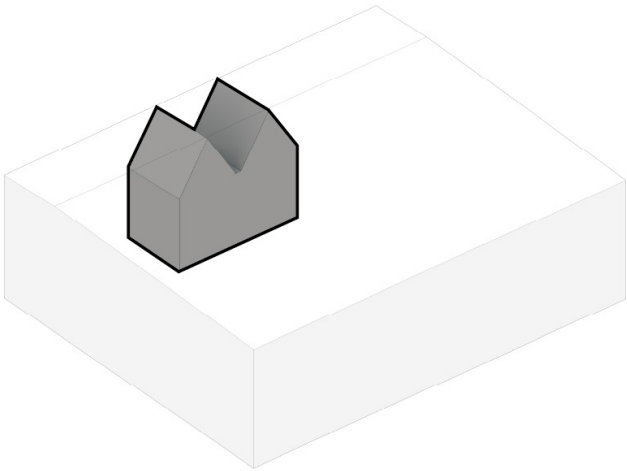
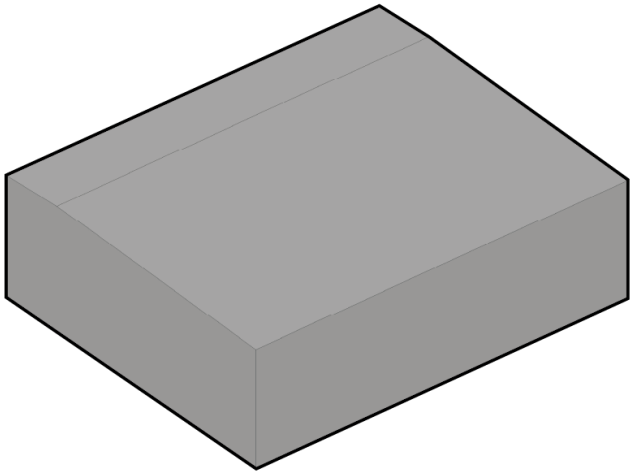
- | | |
|-----------------|---------------|
| Community space | Exhibition |
| Art studios | Library |
| Art lab | Workshop |
| Stores and cafe | Commen living |
| Skill training | Dining hall |

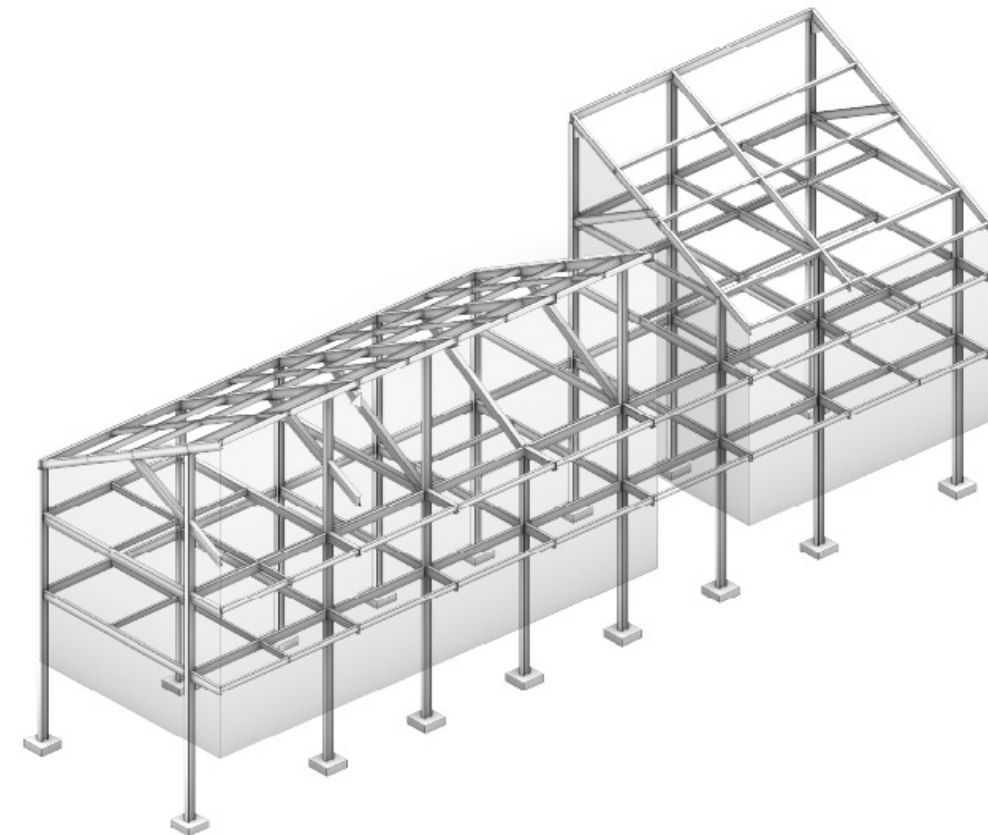
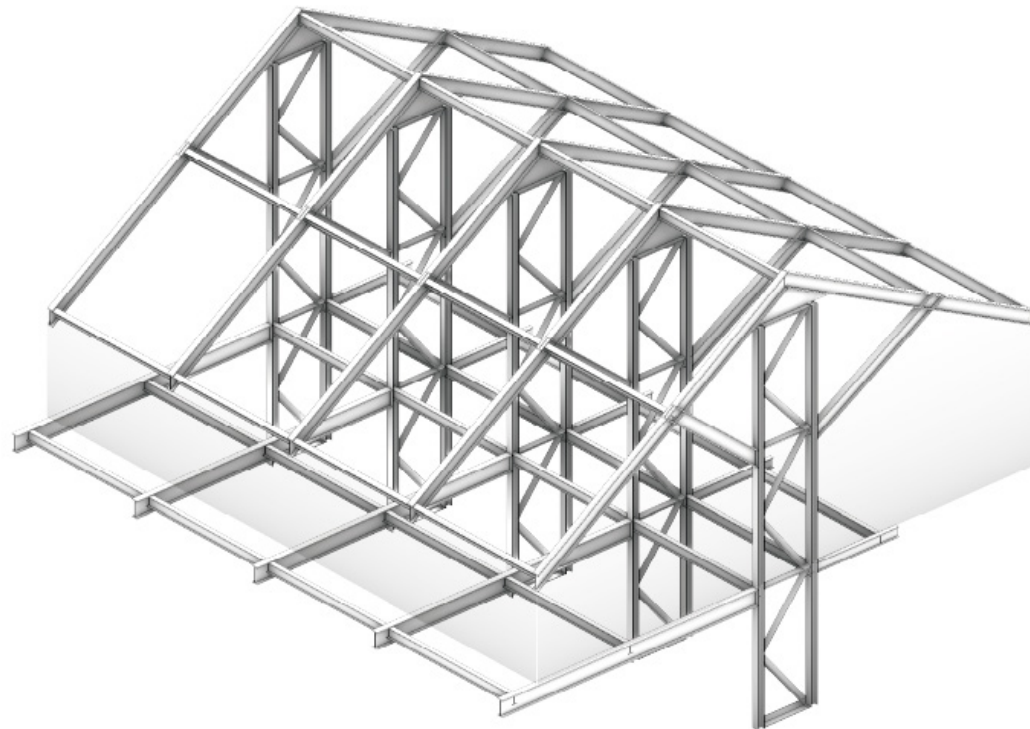
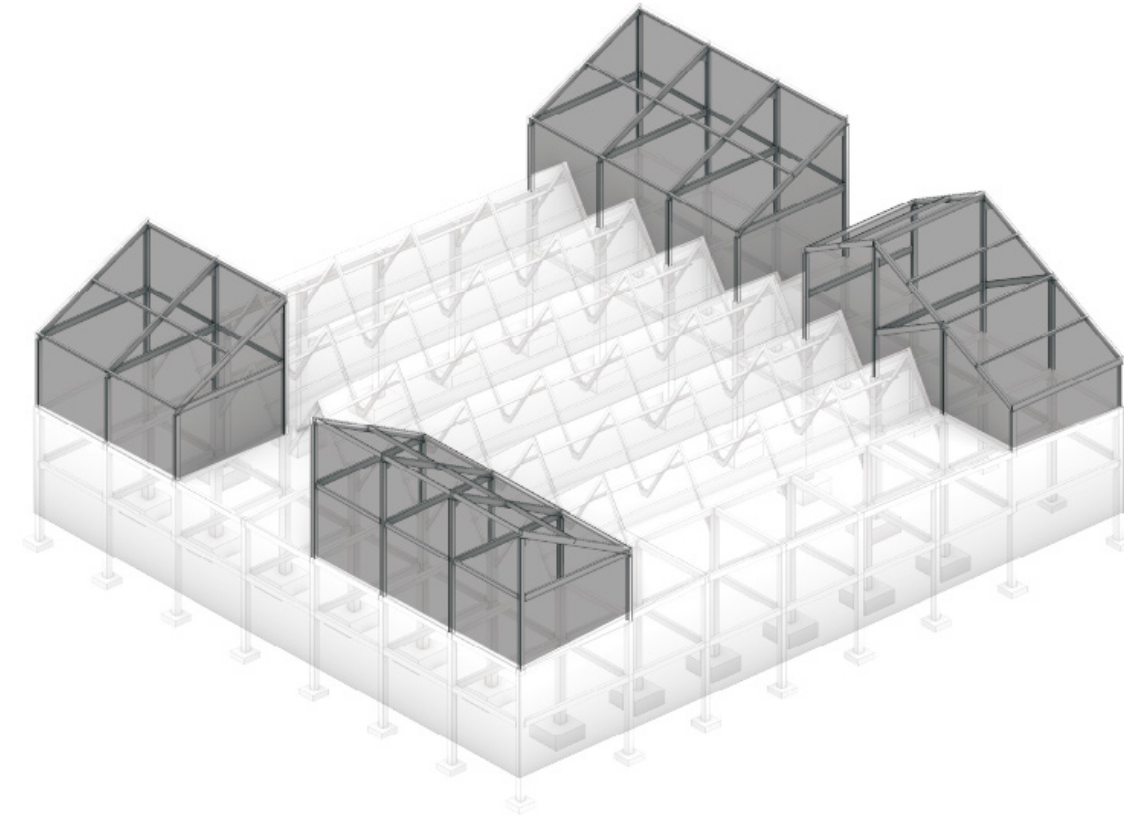
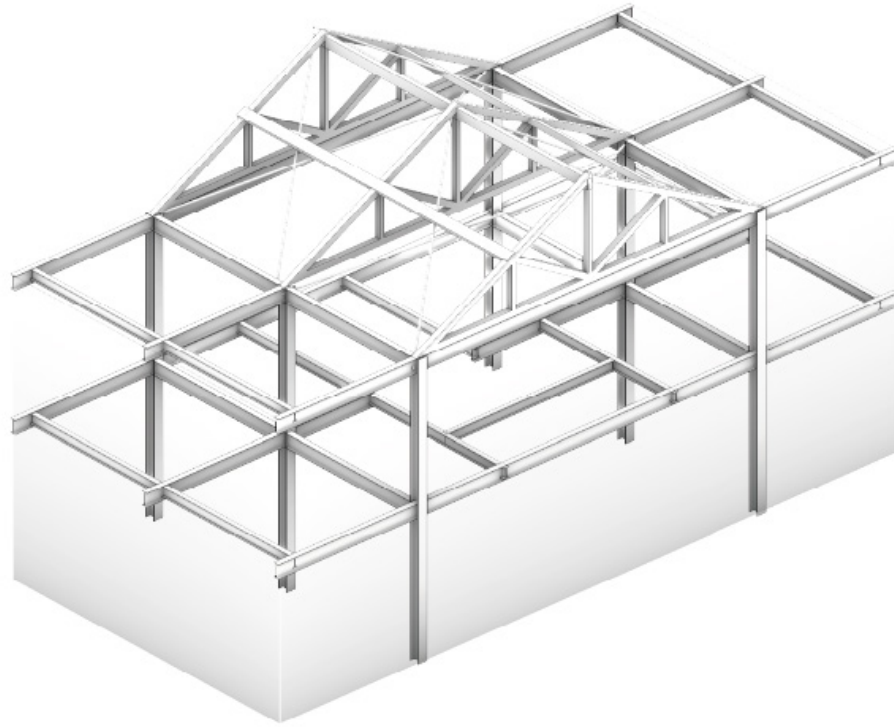




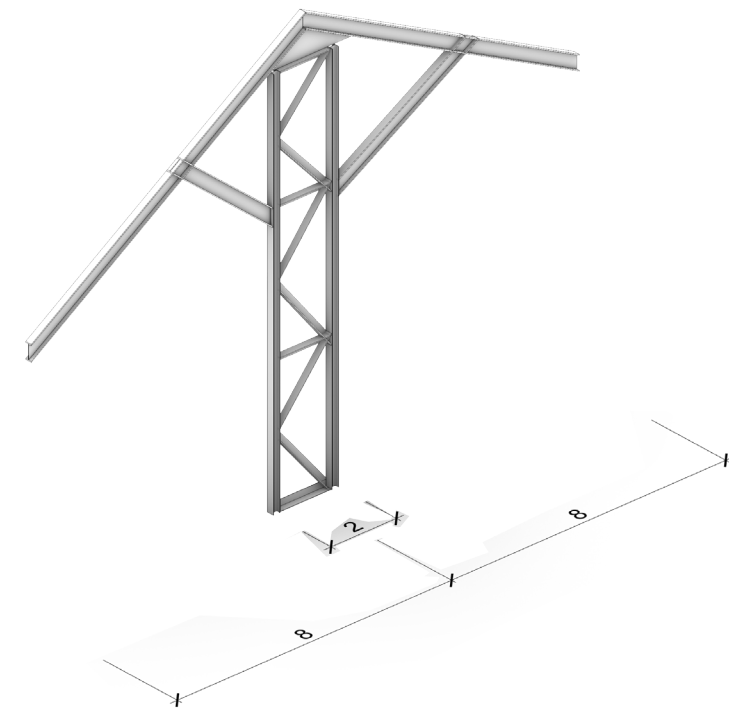
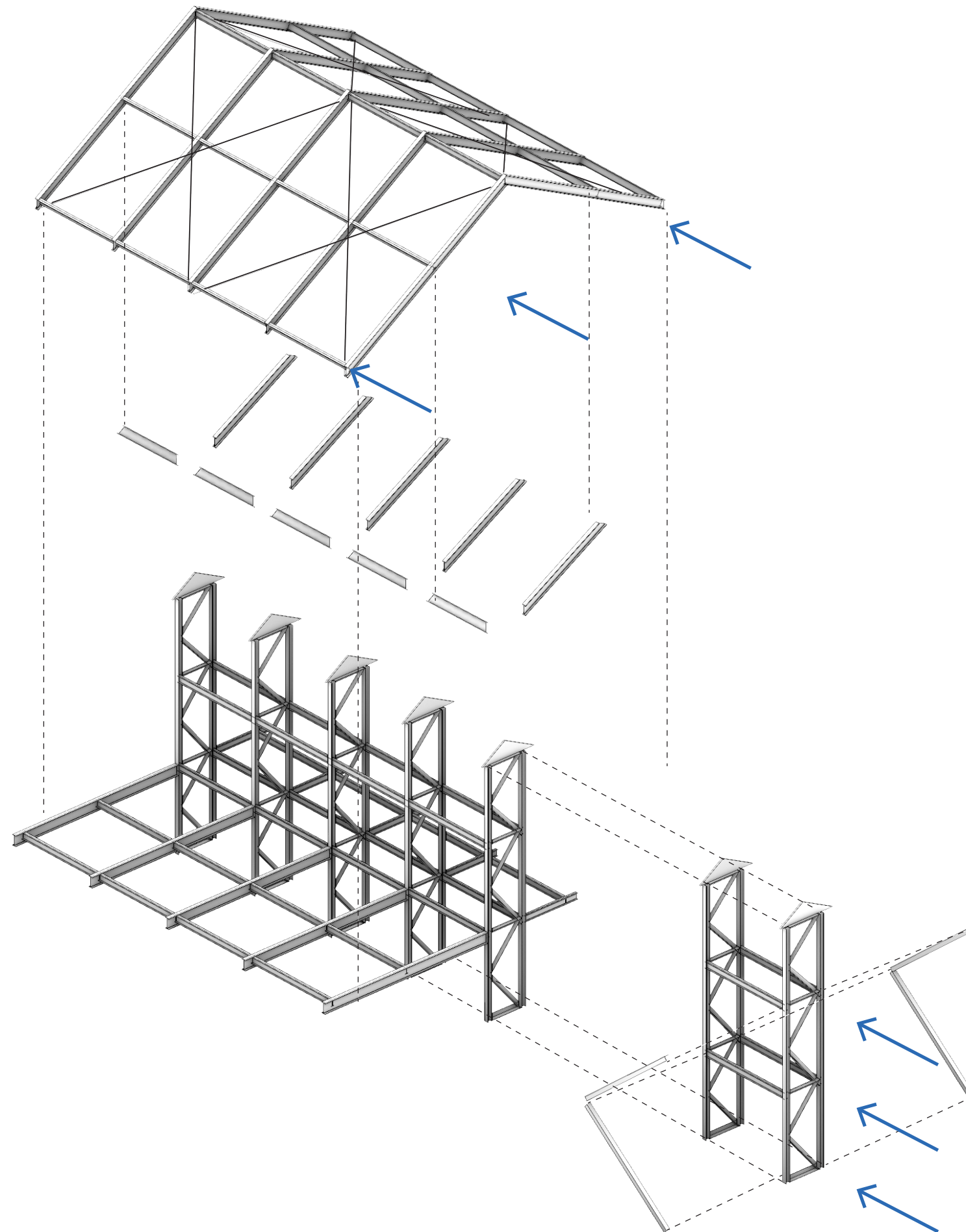
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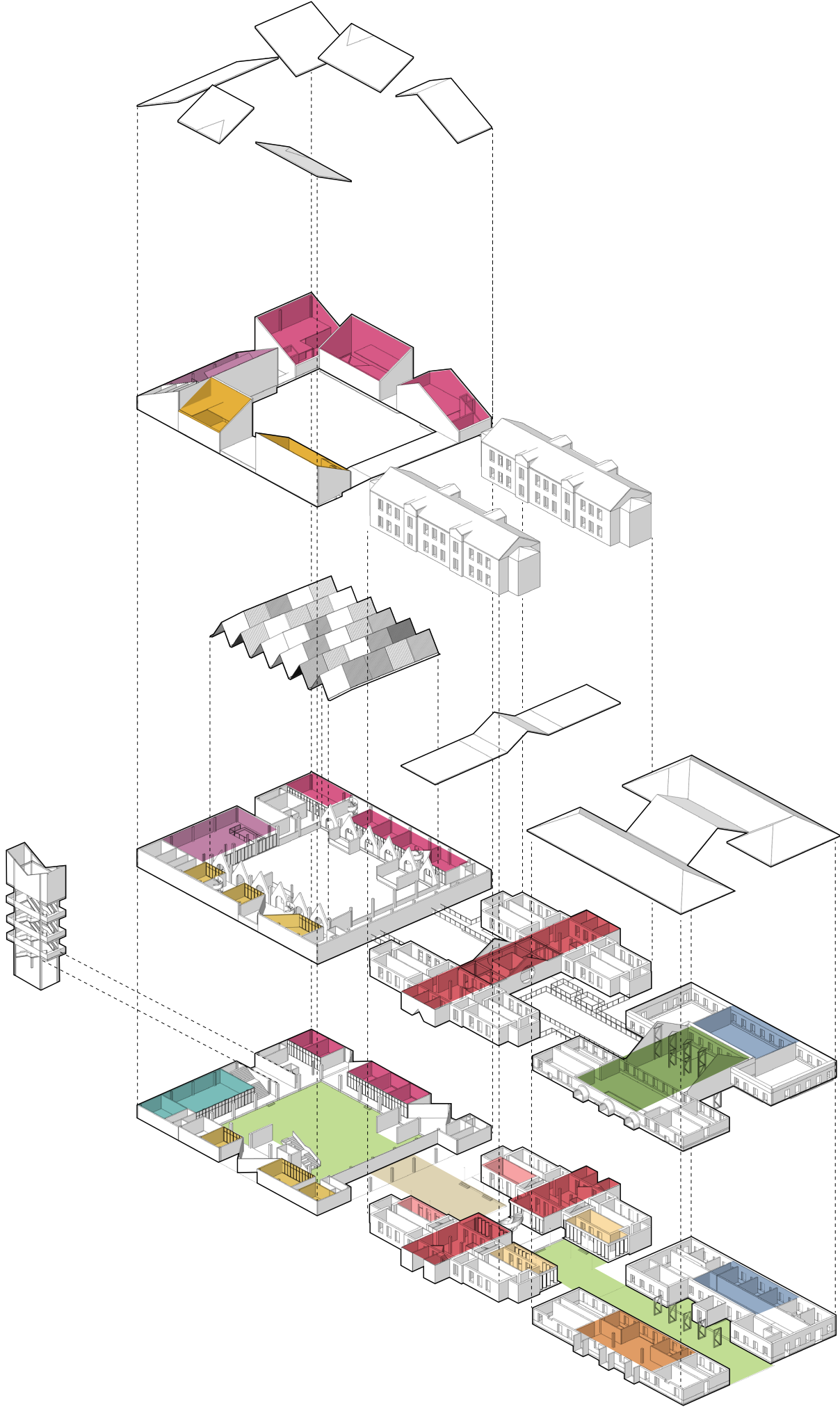
House in house

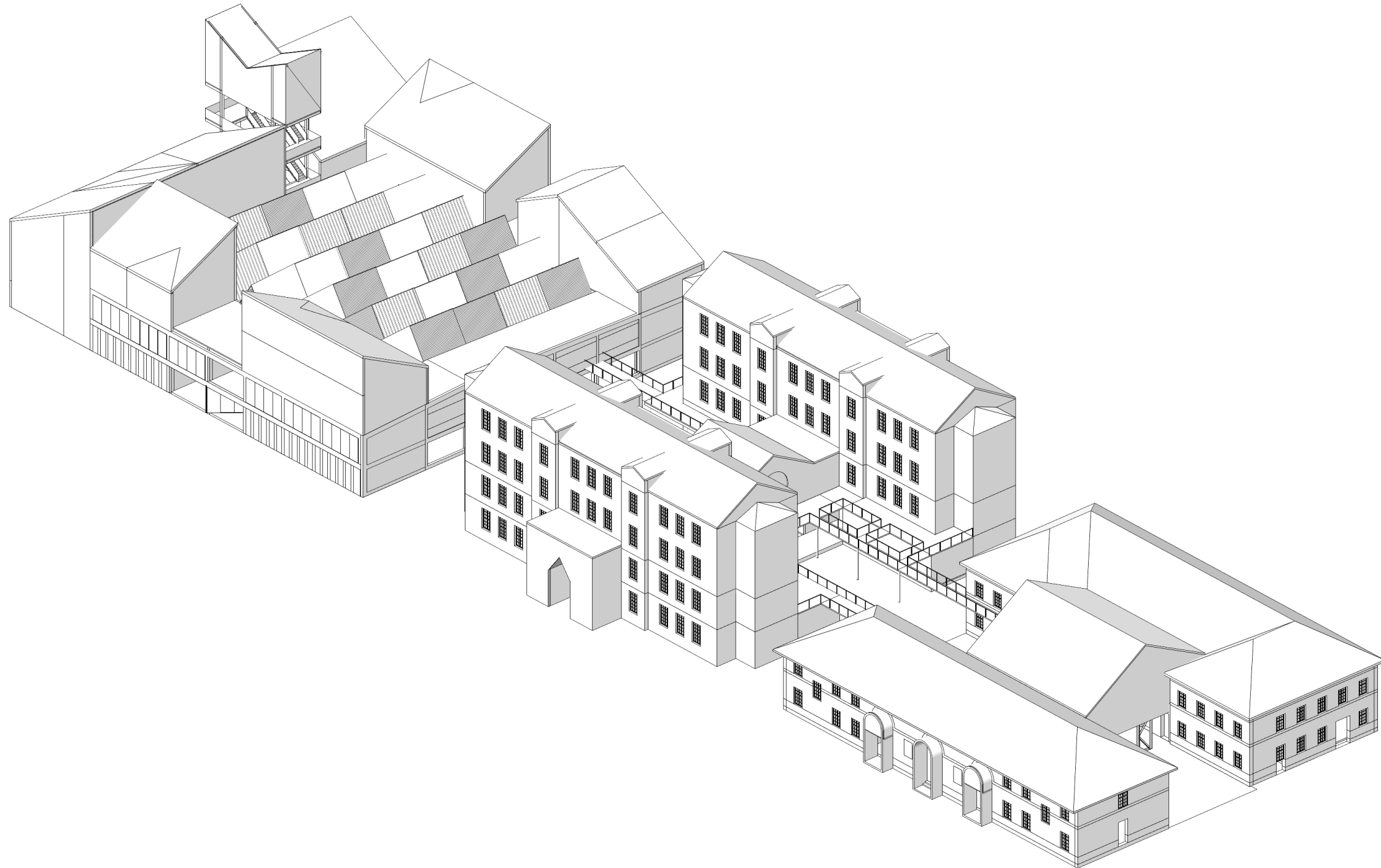




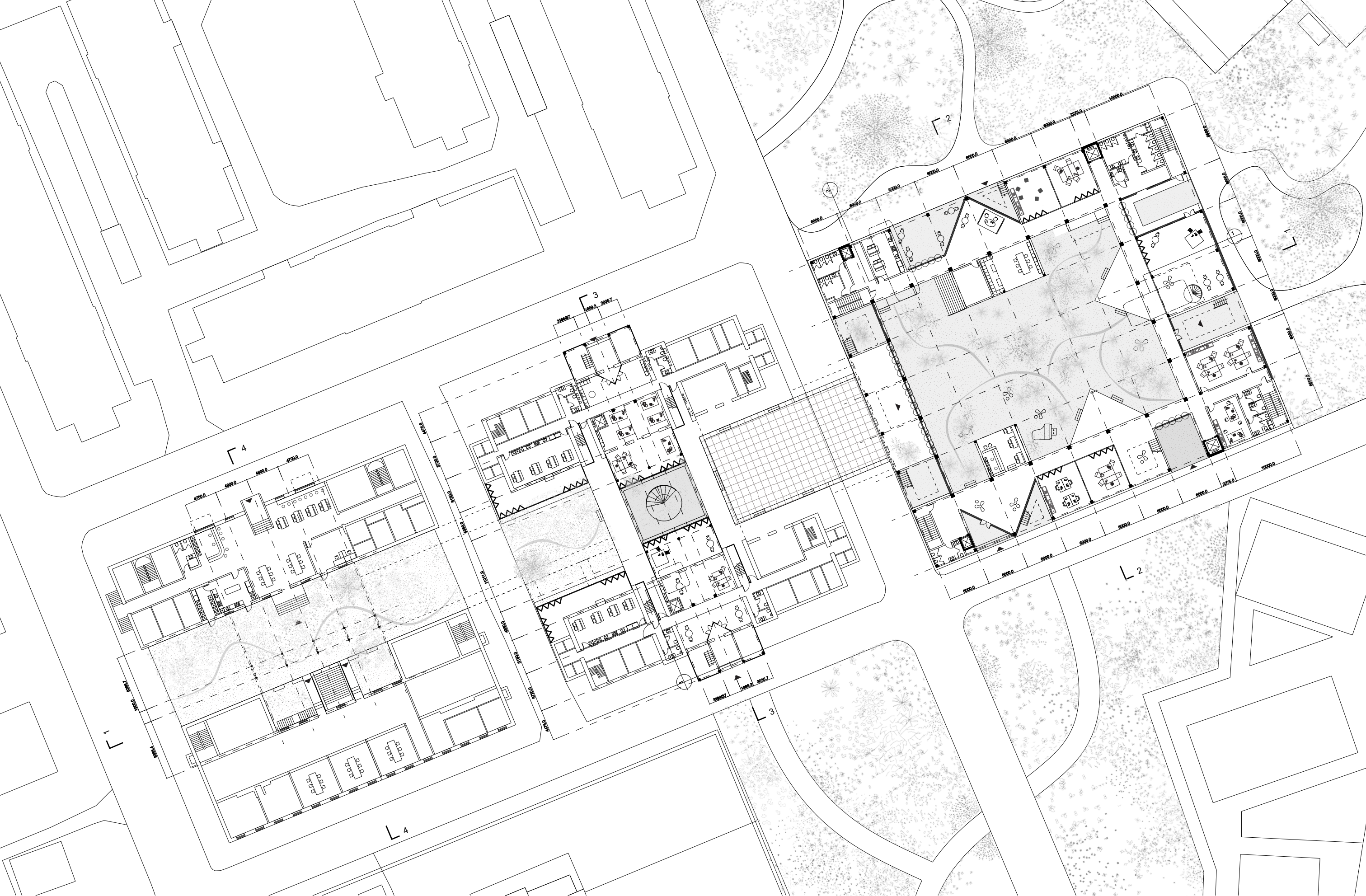
Structure analysis



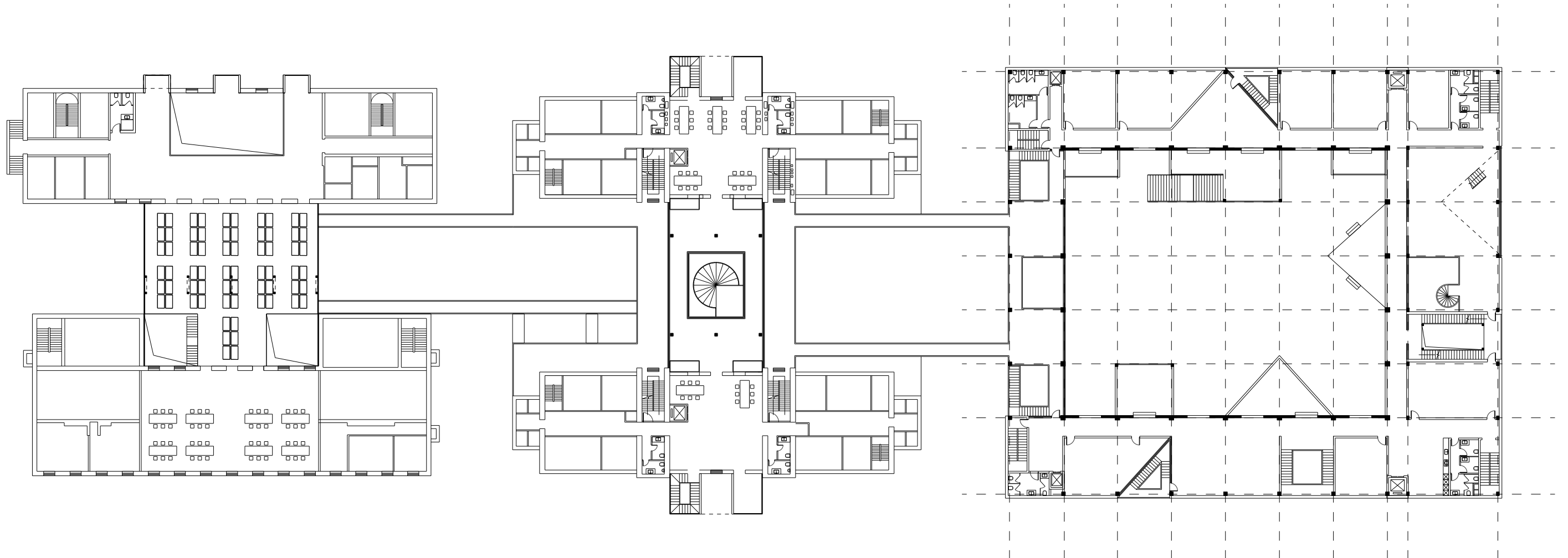




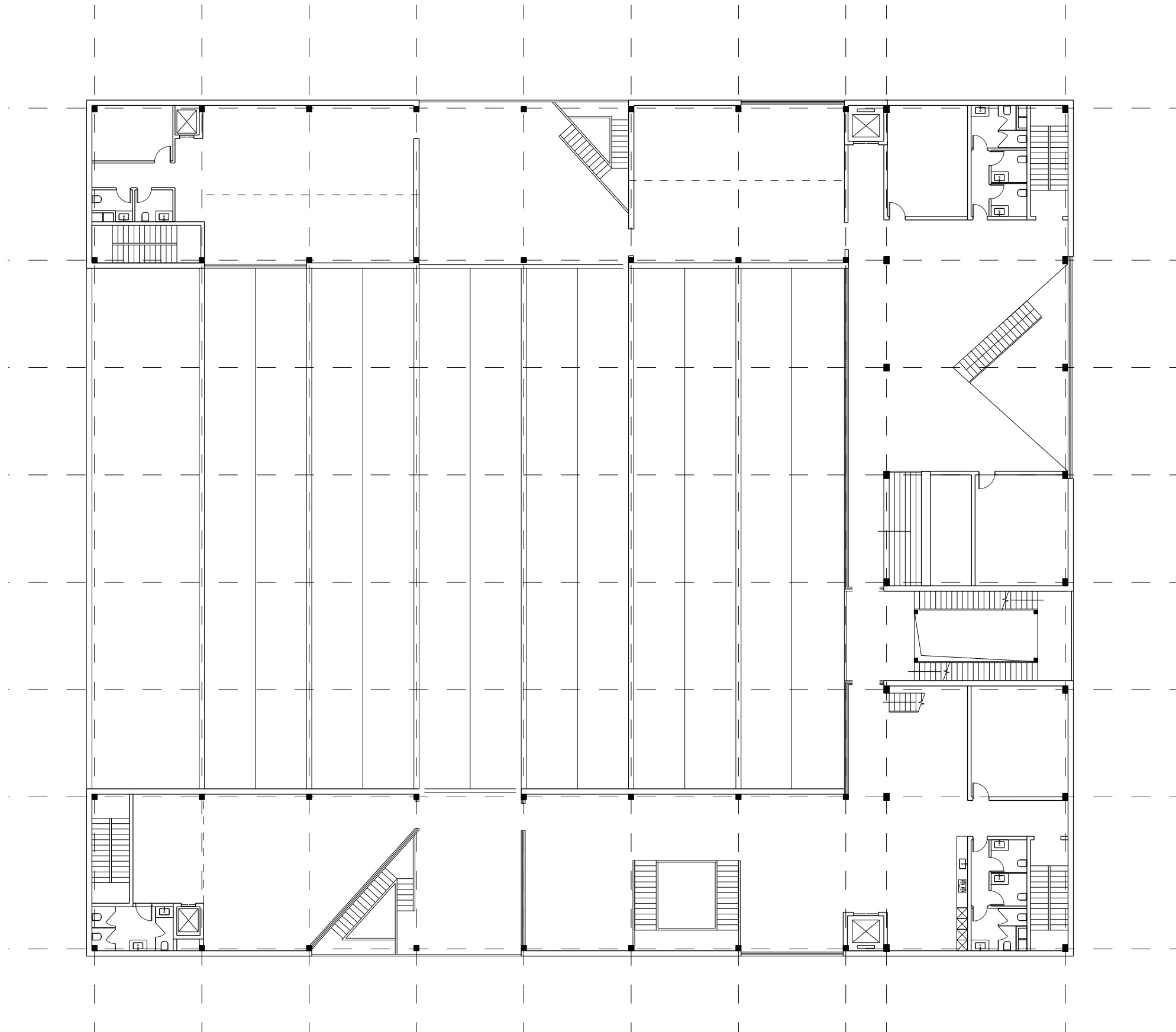
Floorplan



Floorplan



Floorplan



Section

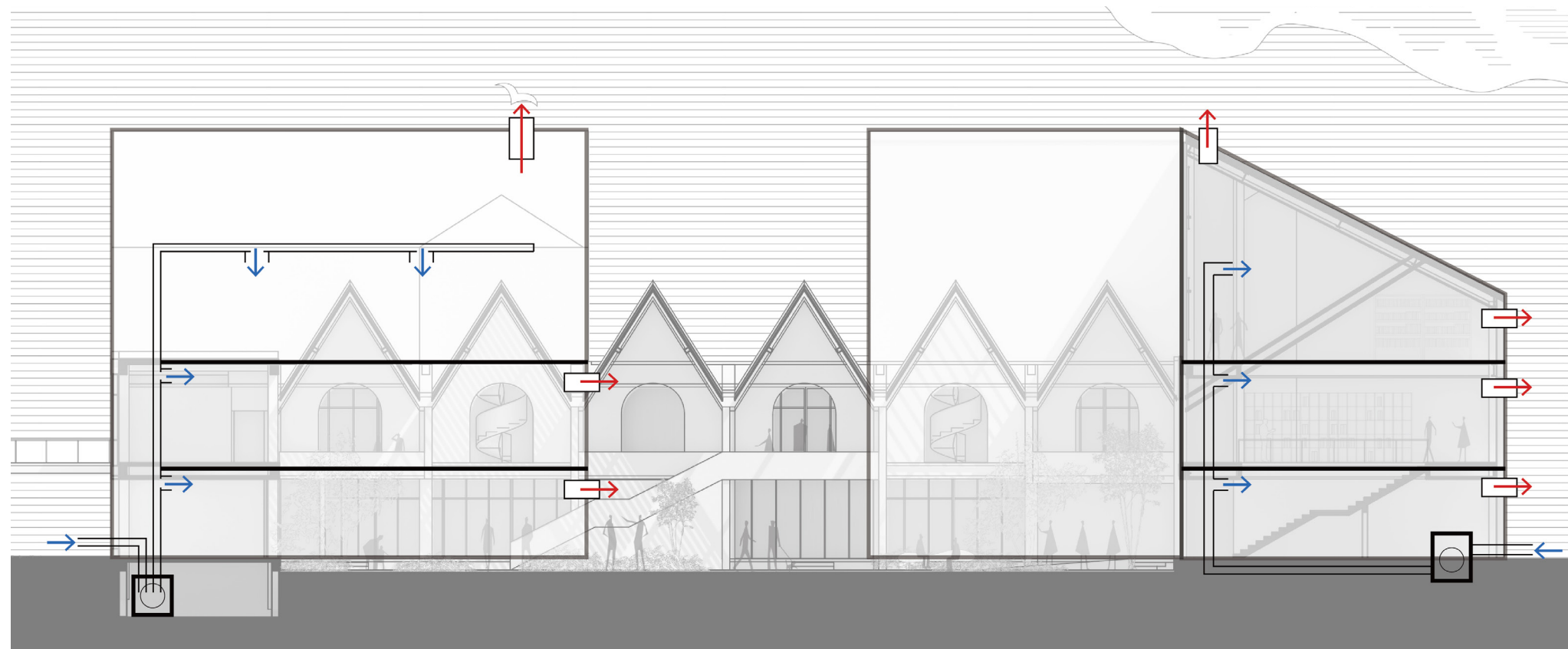
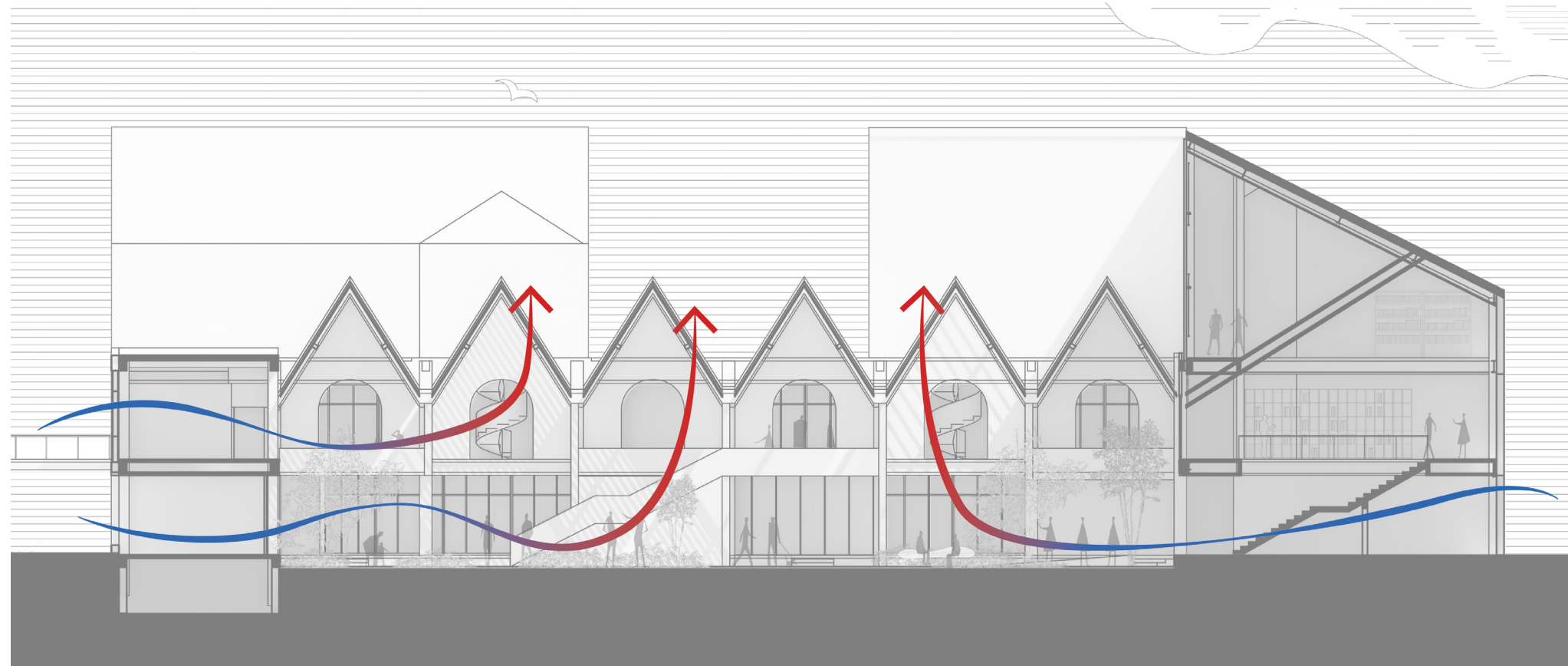




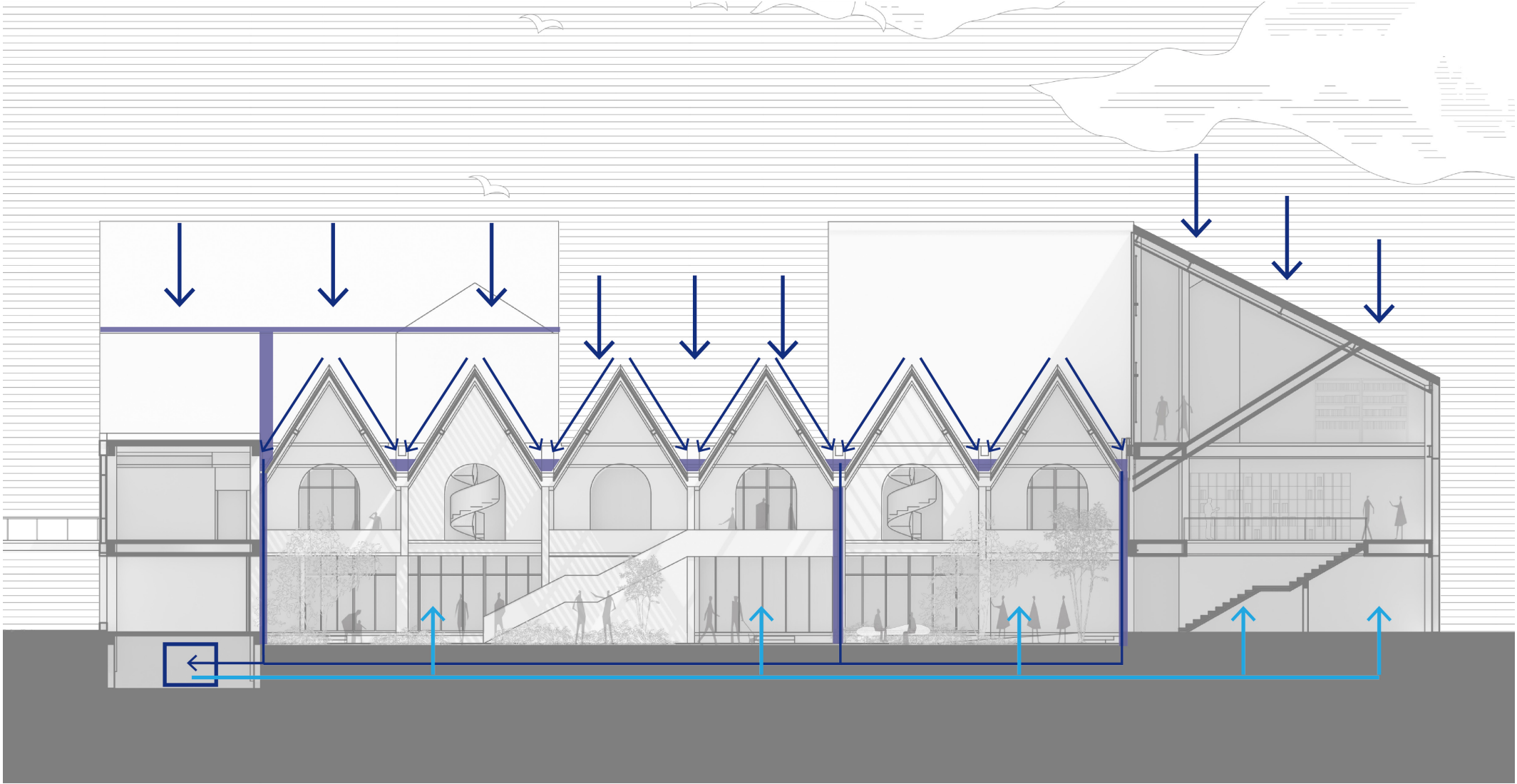




Ventilation Analysis



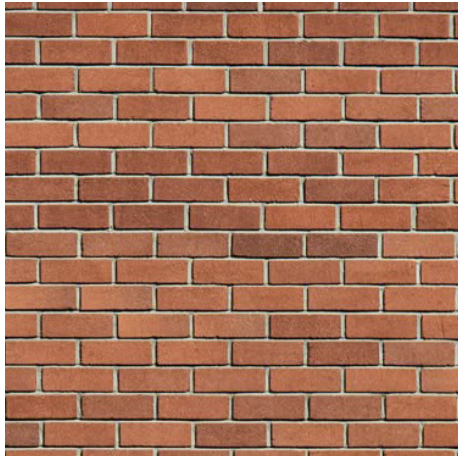
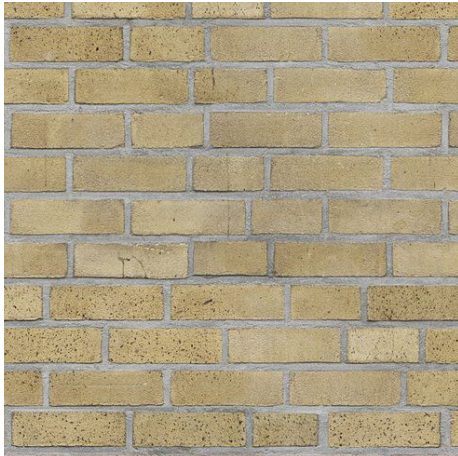
Rainwater Collection



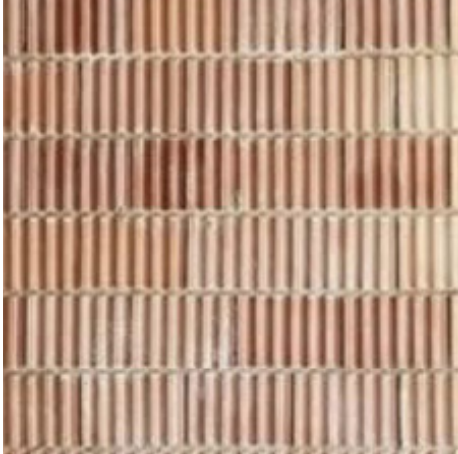
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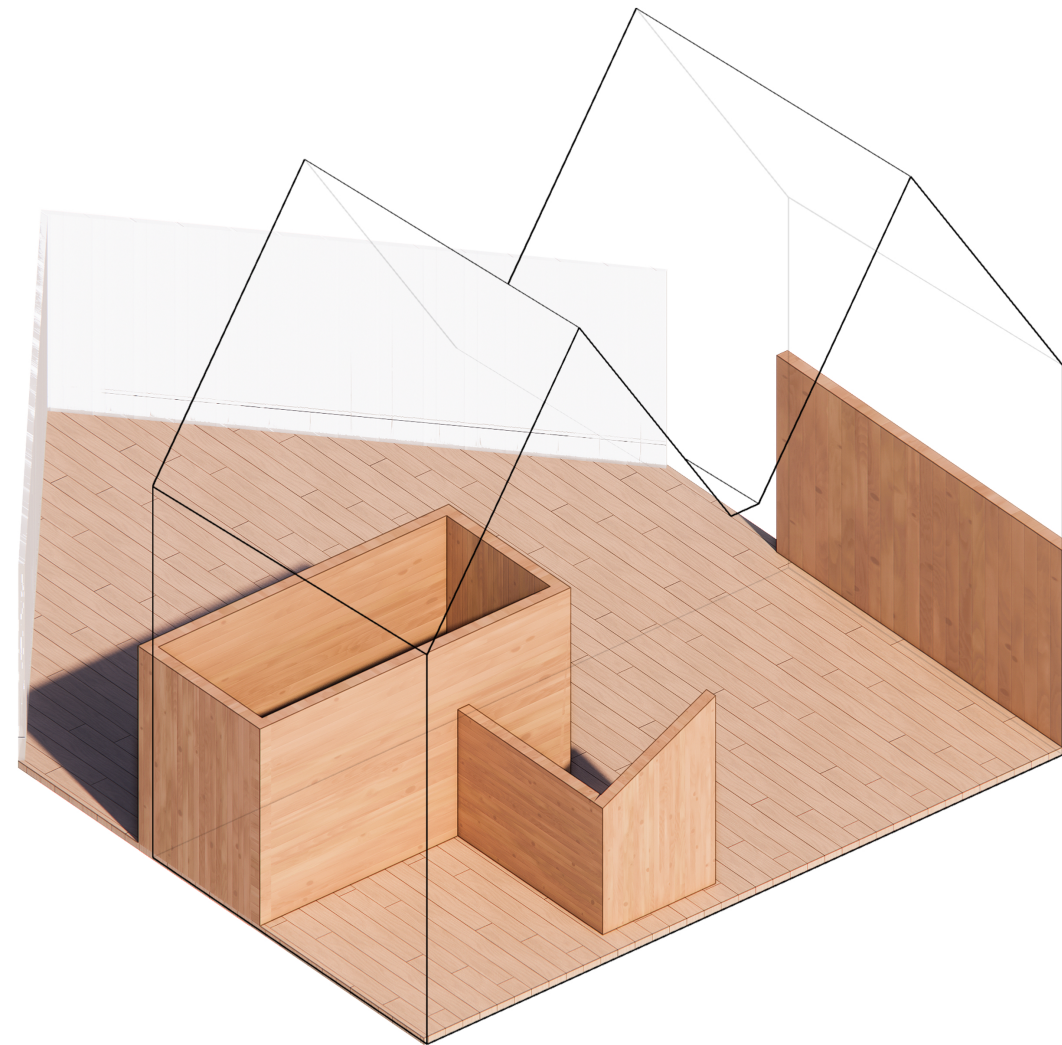
Materialization

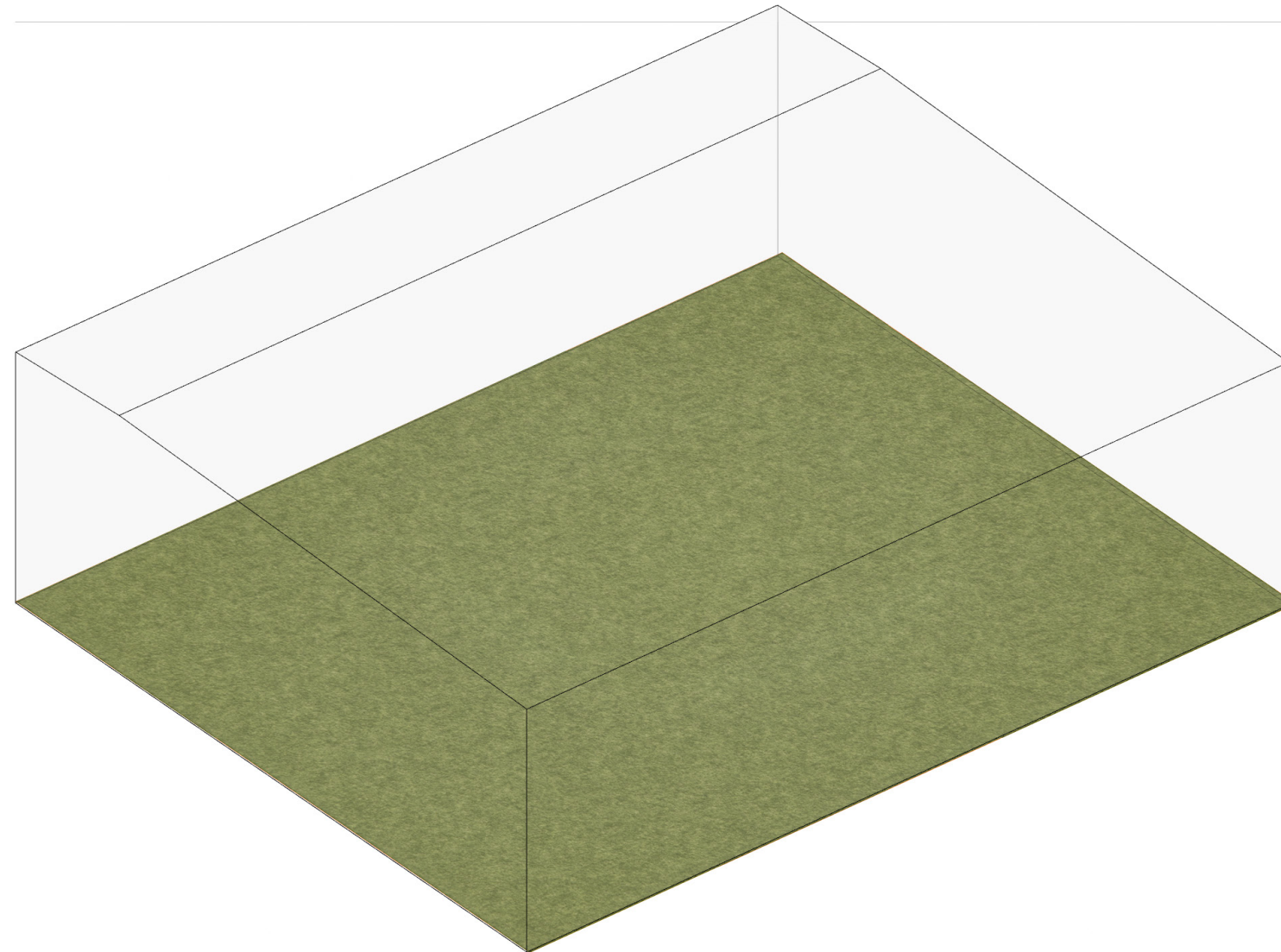
Old
bricks
concrete

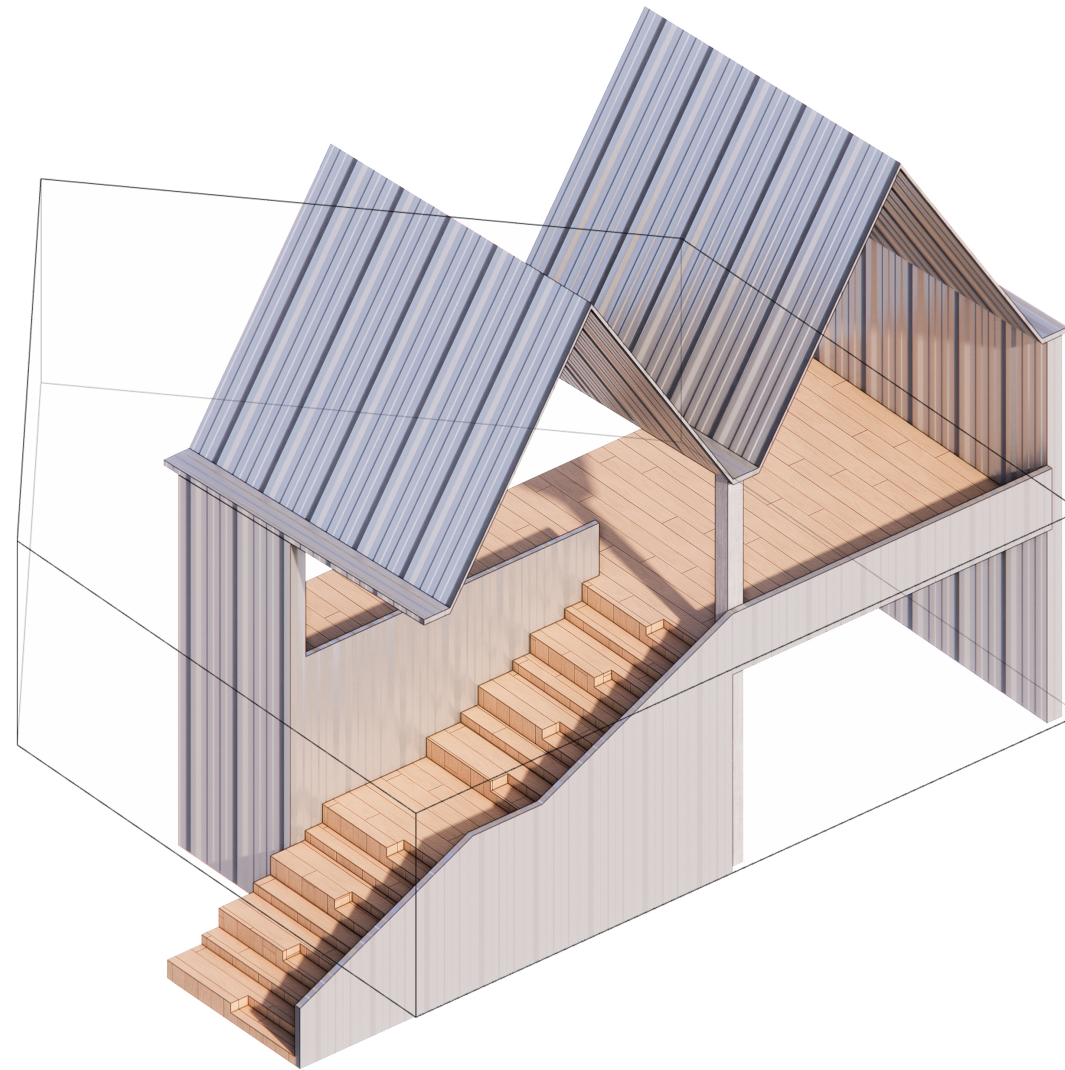


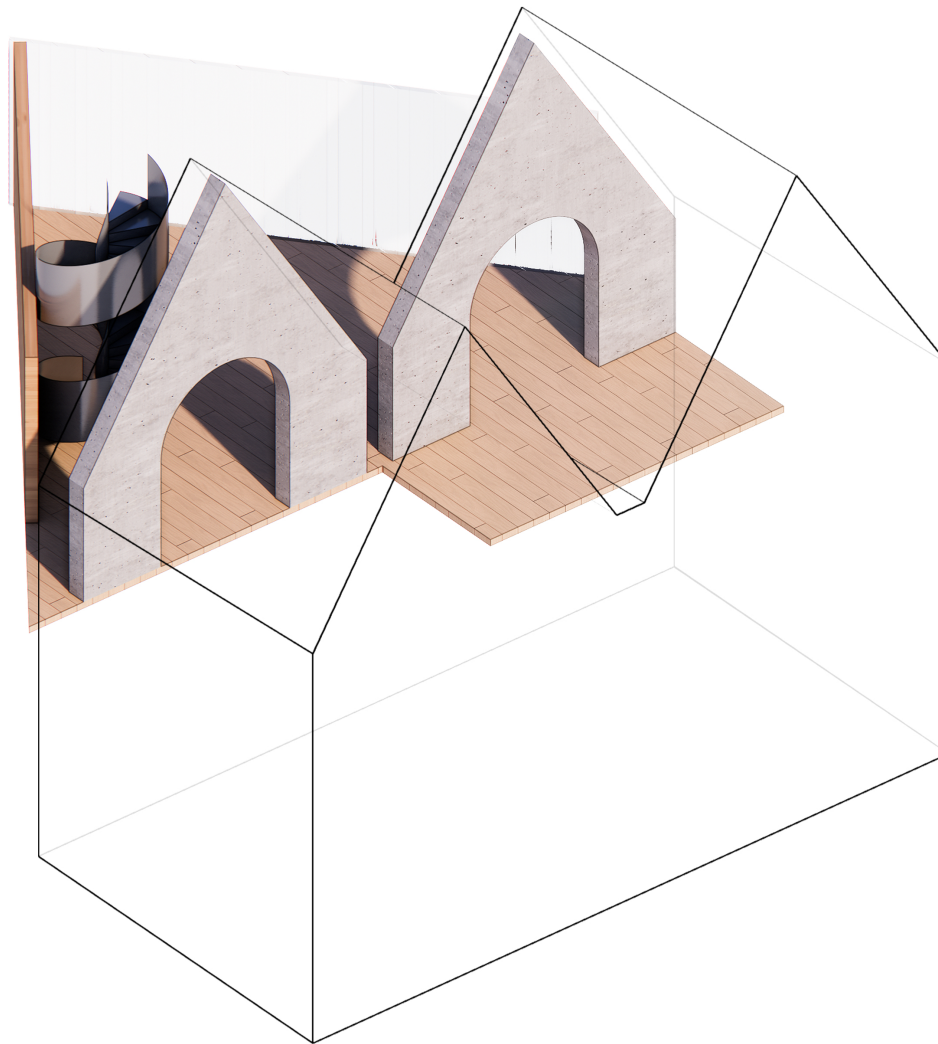
New
polycarbonate
matel cladding
bricks
plywood

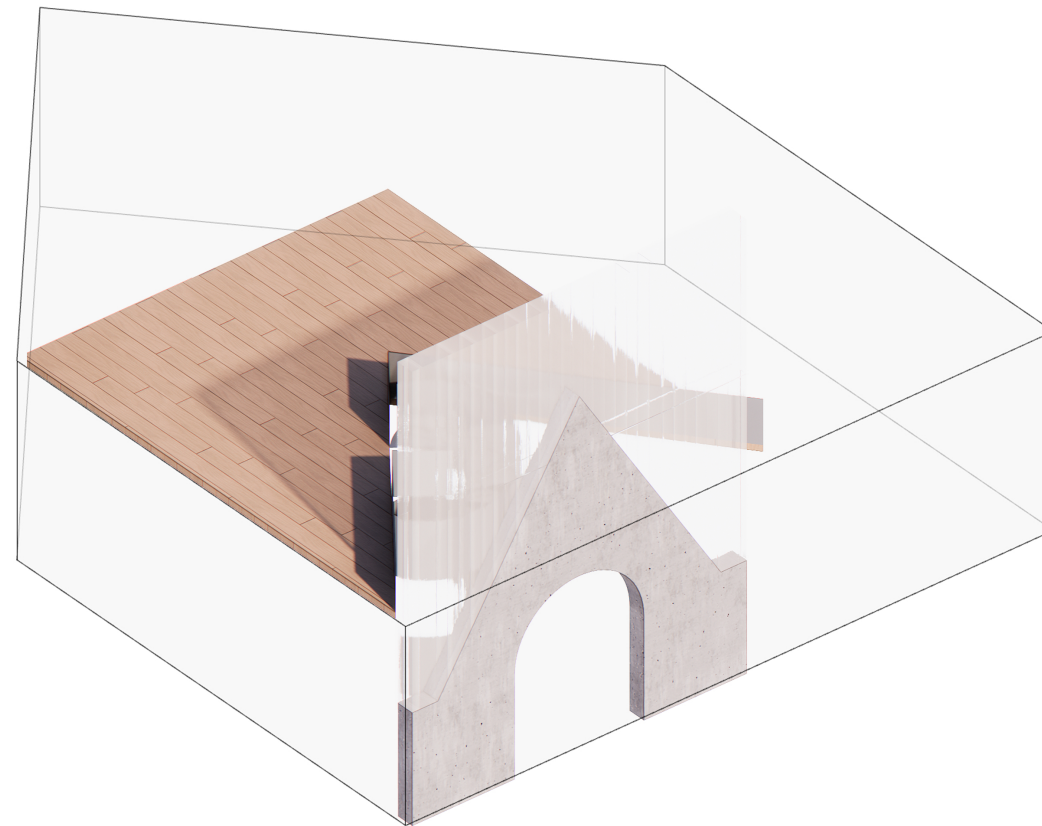


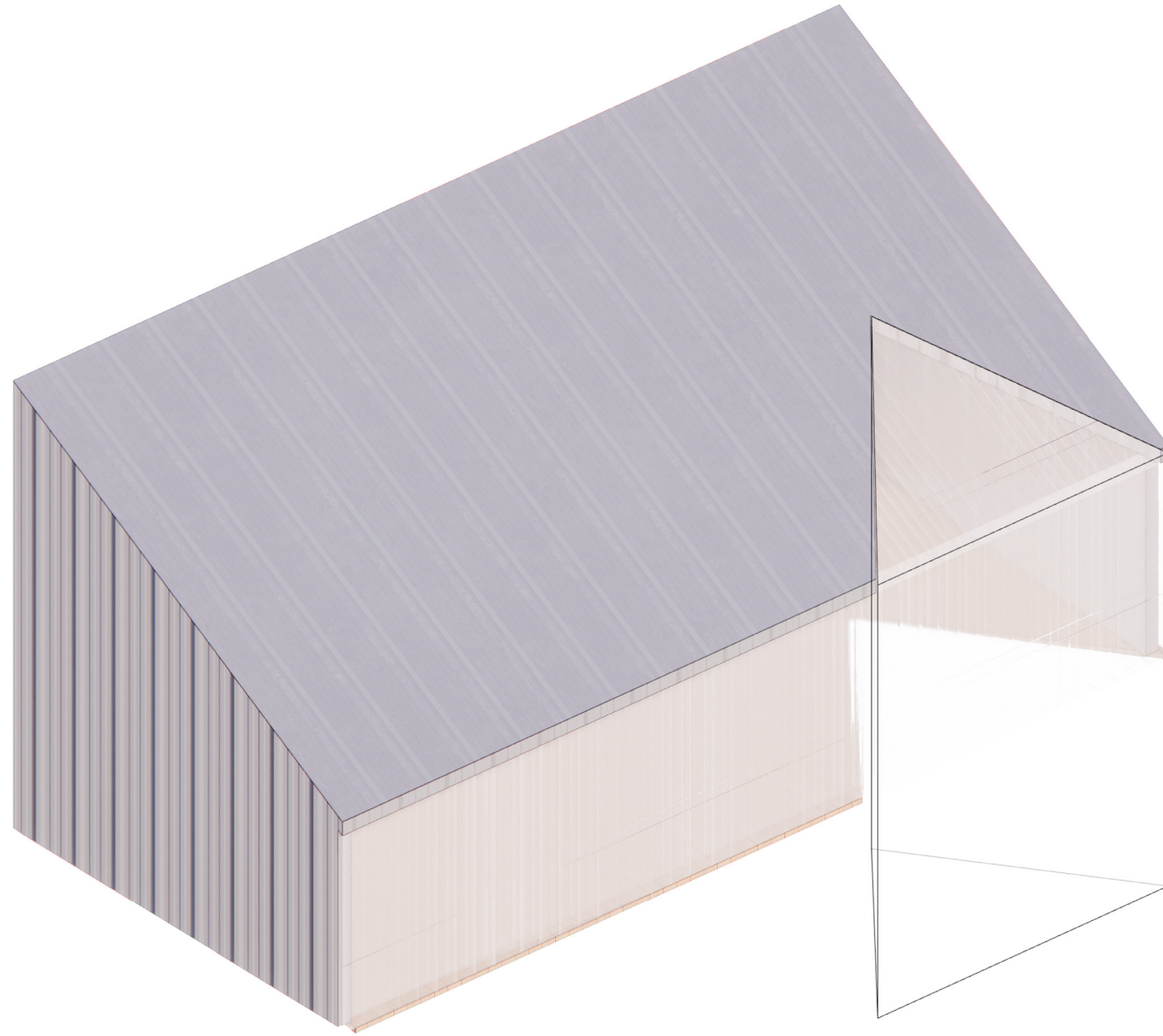




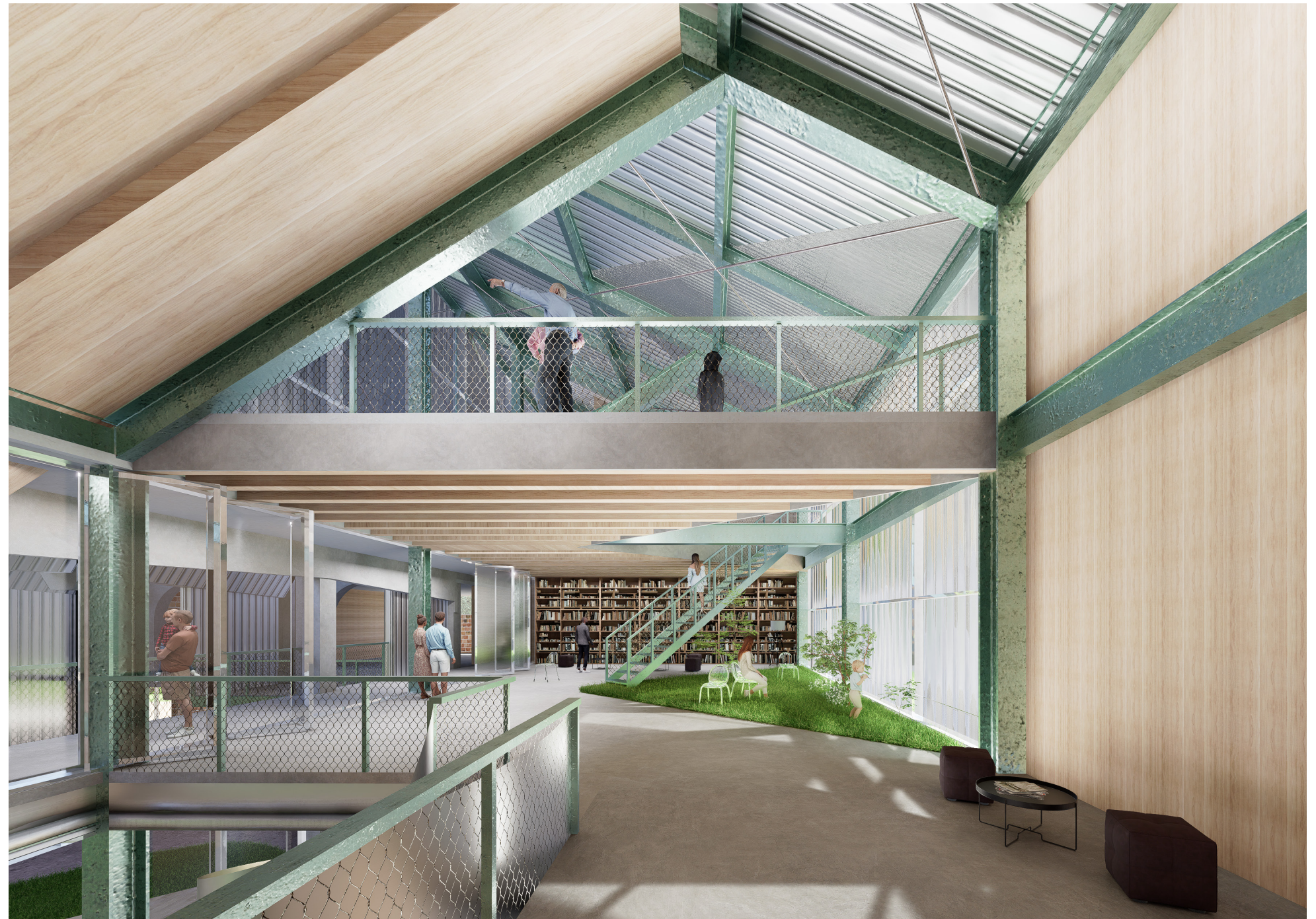
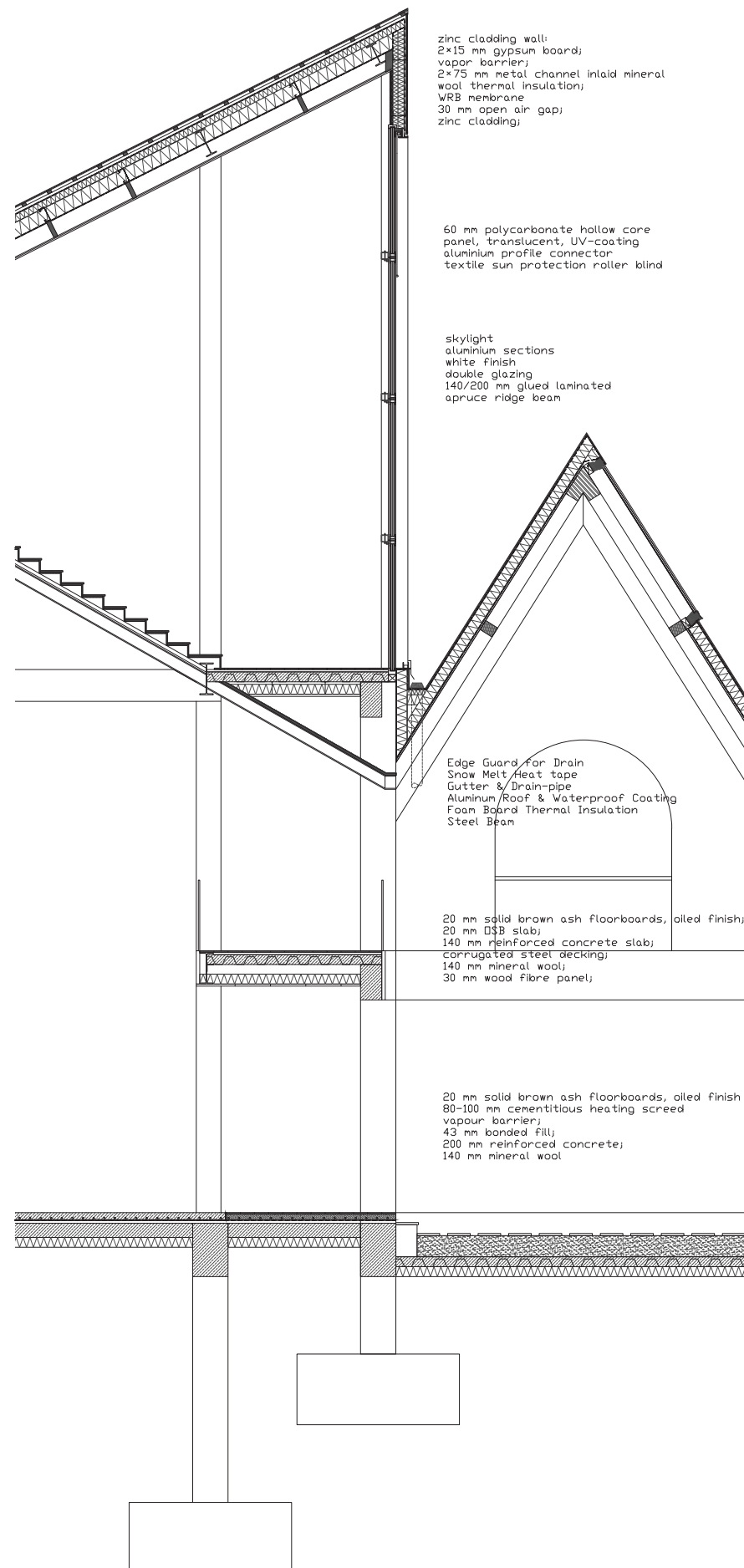


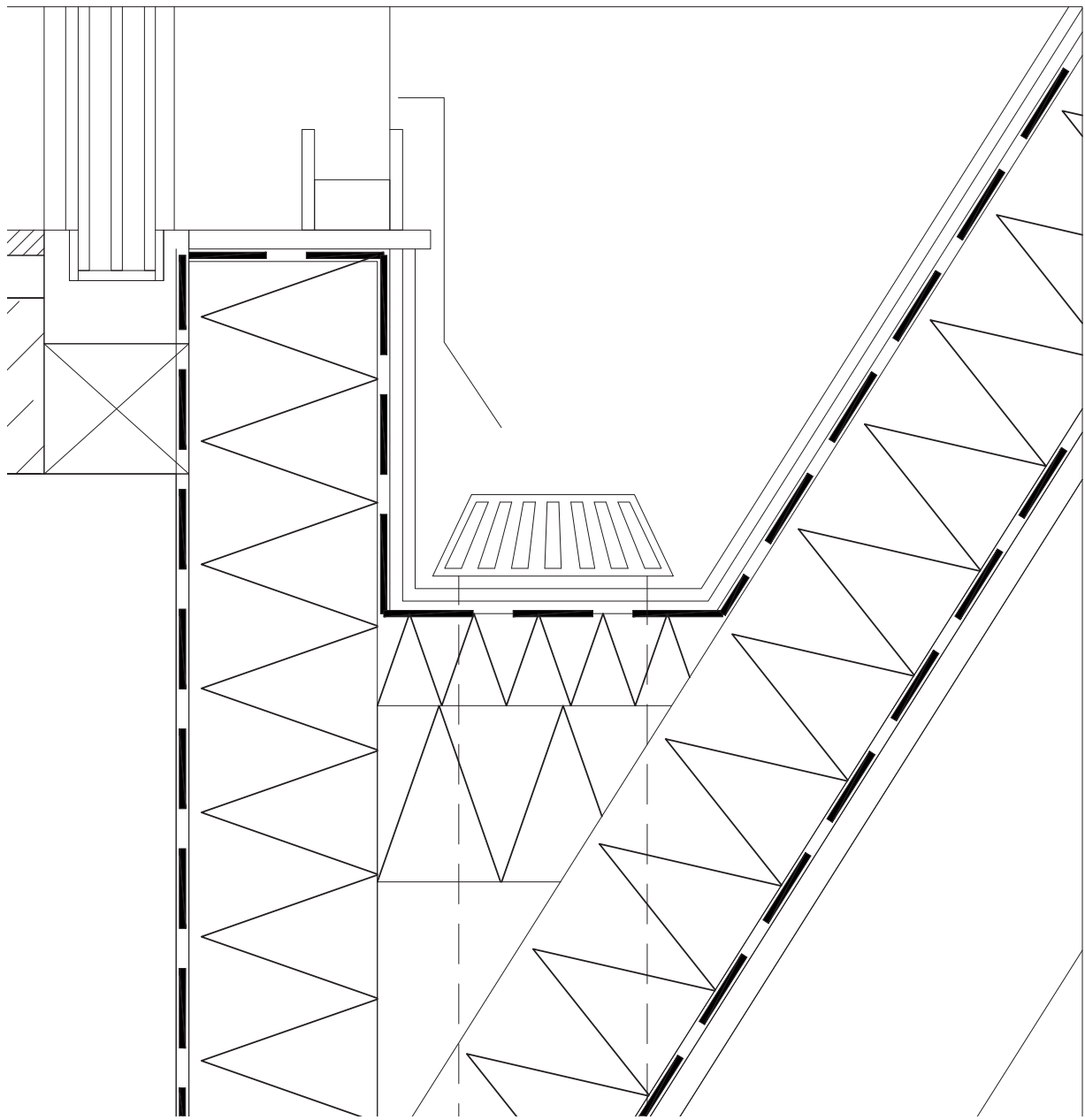






Detail





Detail



Facade construction:

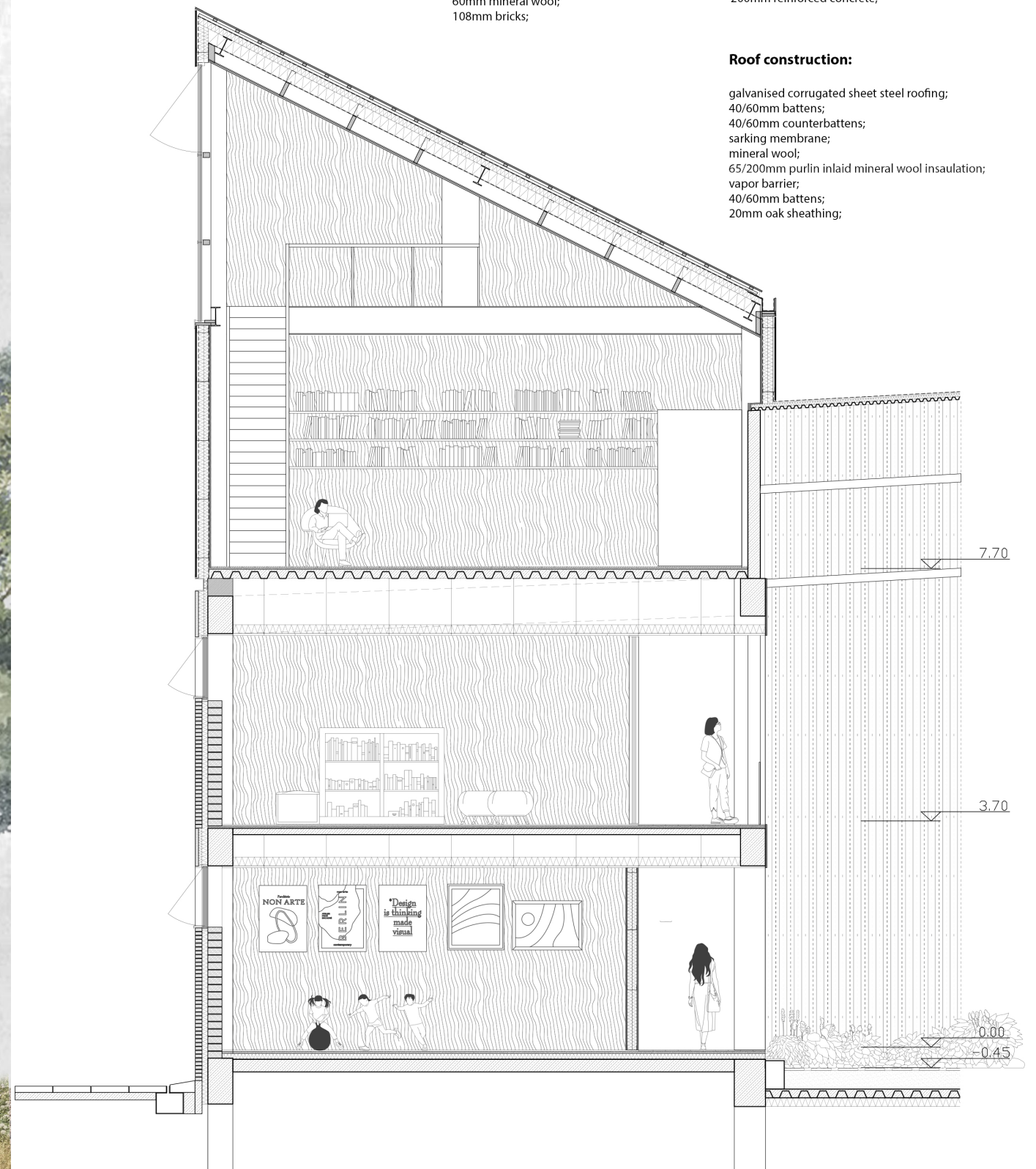
- **Metal facade**
2*15mm gypsum board;
vapor barrier;
2*75mm metal channel
inlaid mineral wool thermal insulation;
WRB membrane;
30mm open air gap;
zinc cladding;
- **Brick wall**
20mm wood wall finish;
228mm bricks;
60mm mineral wool;
108mm bricks;

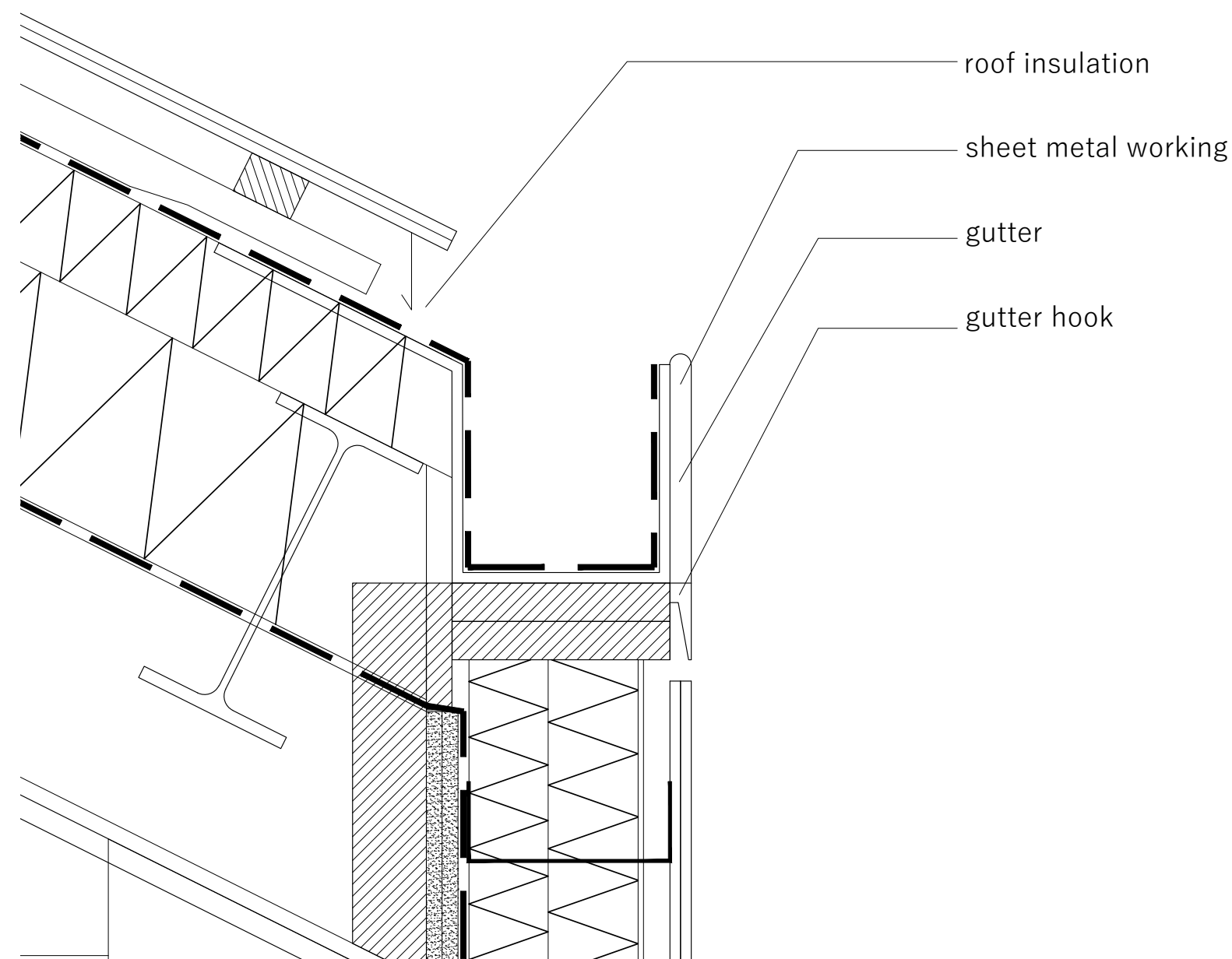
Floor construction:

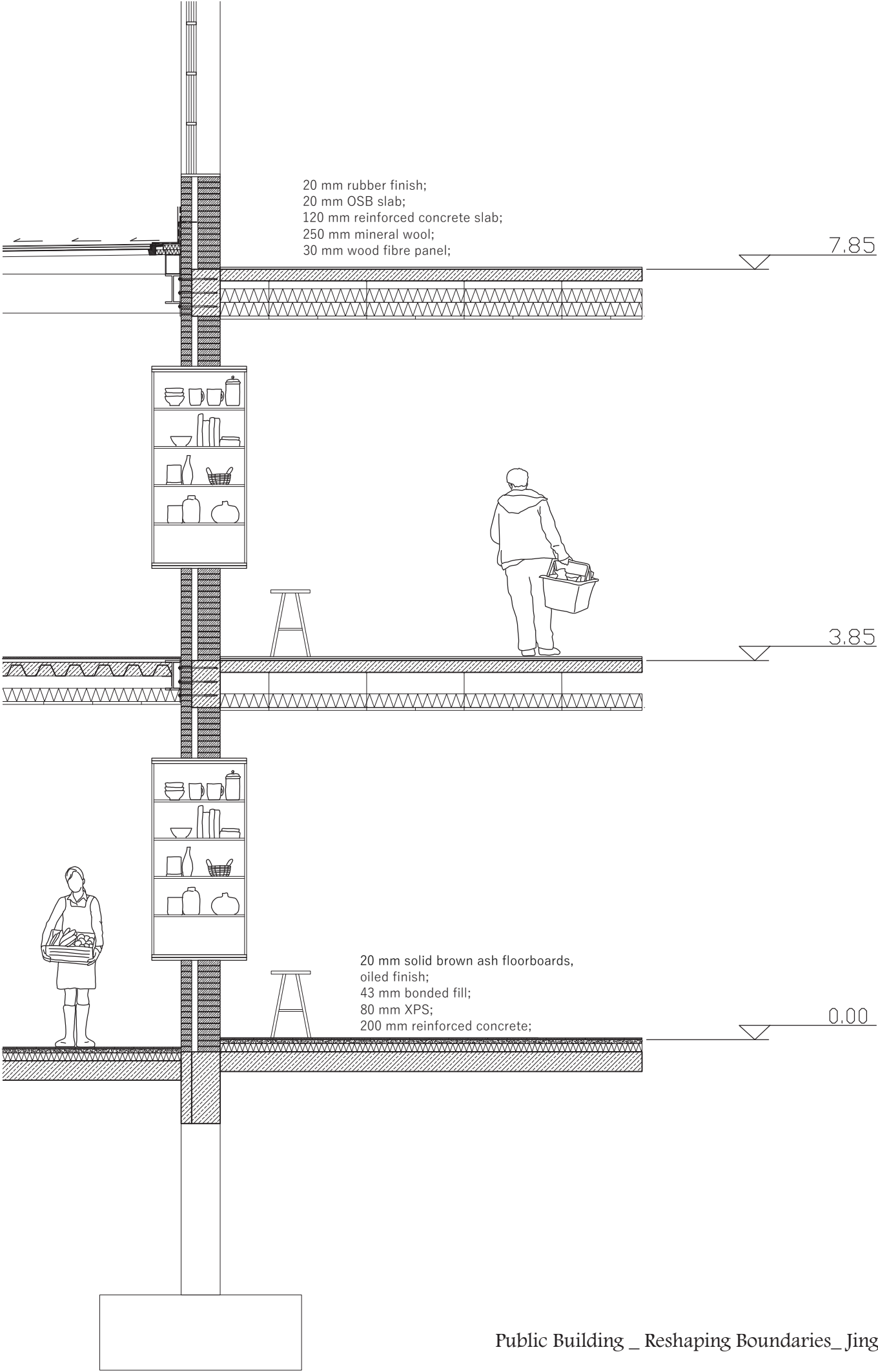
- **New light floor**
20mm solid brown ash floorboards, oiled finish;
20mm OSB slab;
140mm reinforced concrete slab;
corrugated steel decking;
140mm mineral wool;
30mm wood fibre panel;
- **Old floor renovation**
20mm solid brown ash floorboards, oiled finish;
43mm bonded fill;
80mm XPS;
200mm reinforced concrete;

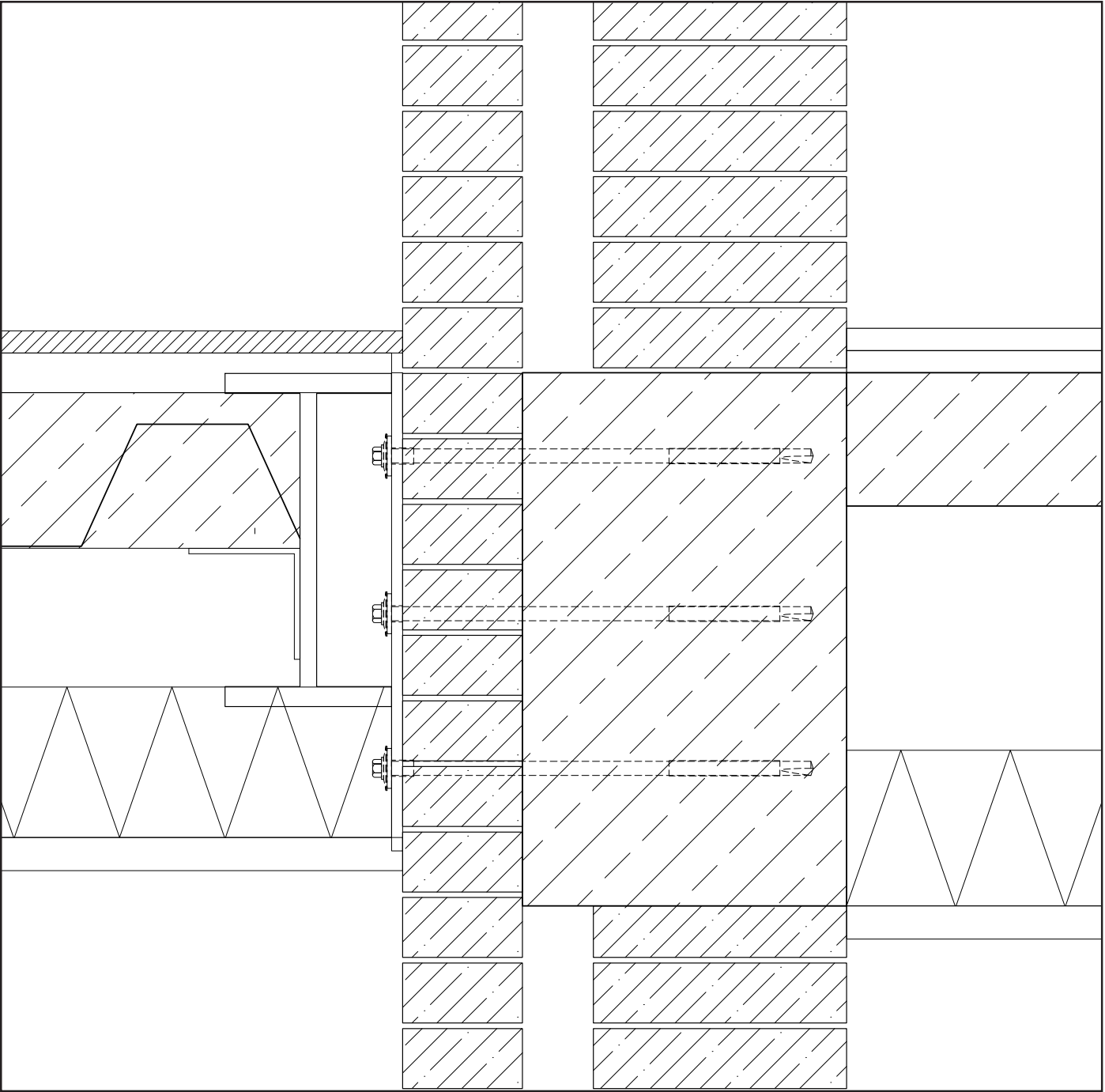
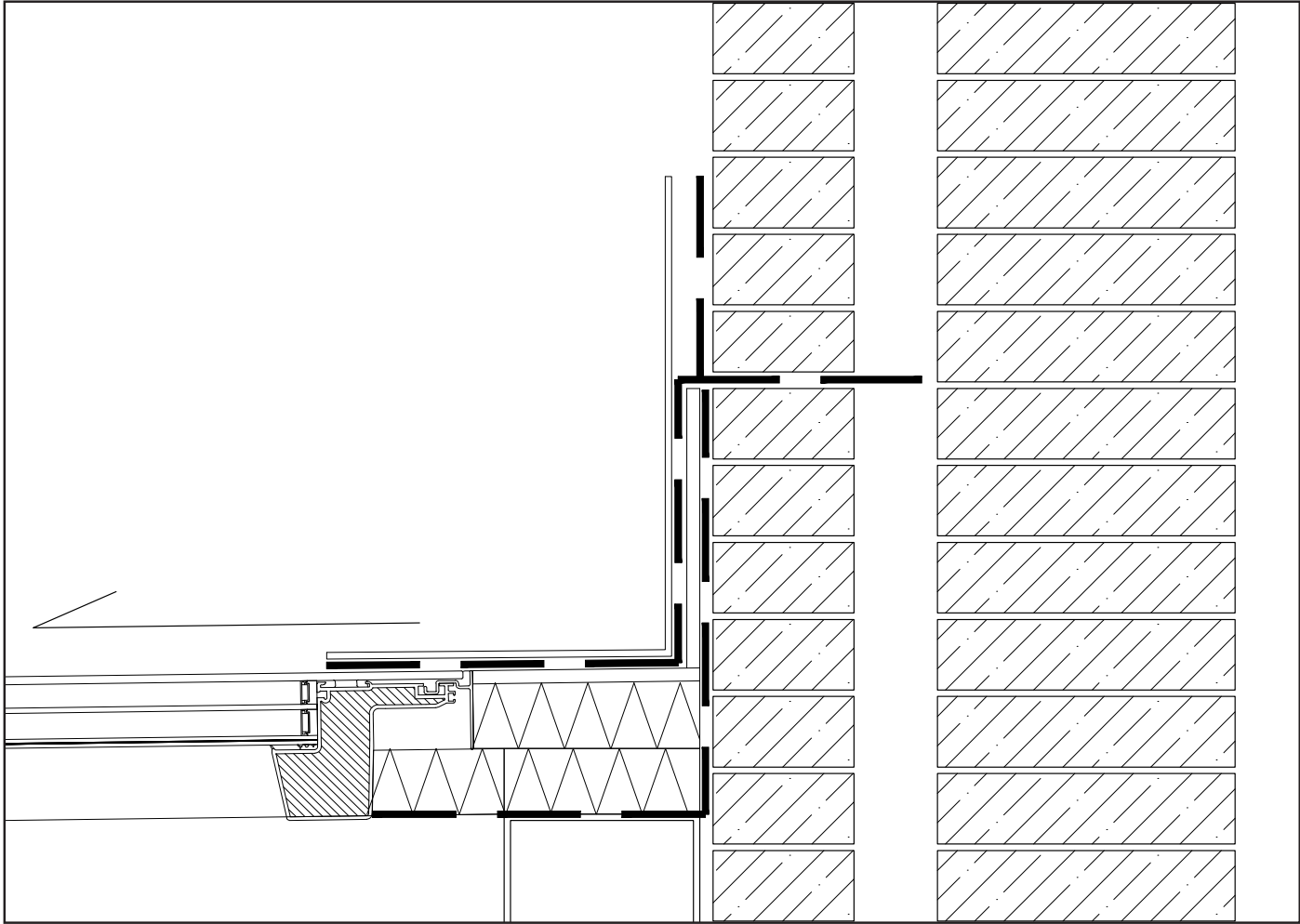
Roof construction:

- galvanised corrugated sheet steel roofing;
40/60mm battens;
40/60mm counterbattens;
sarking membrane;
mineral wool;
65/200mm purlin inlaid mineral wool insulation;
vapor barrier;
40/60mm battens;
20mm oak sheathing;



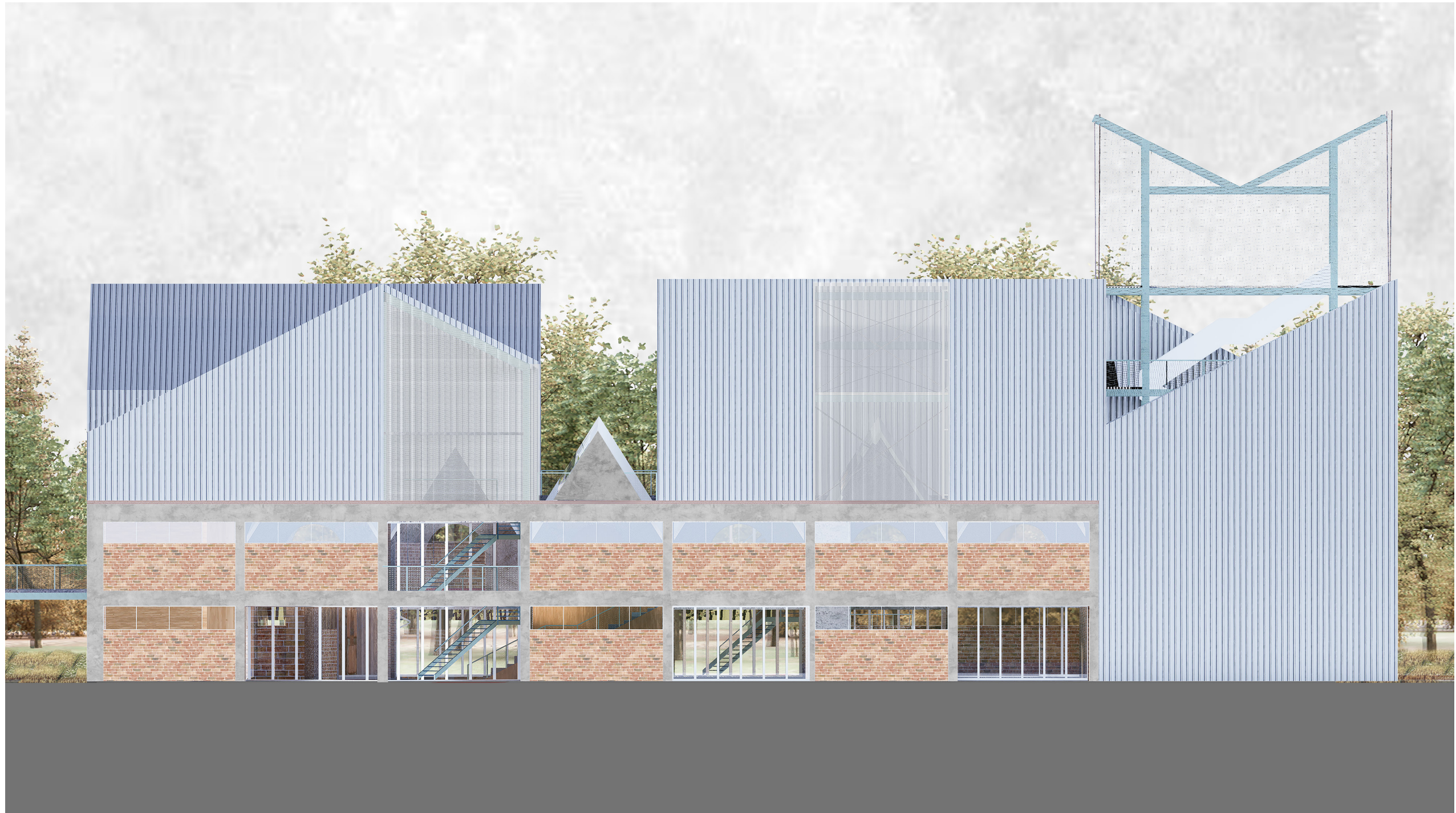


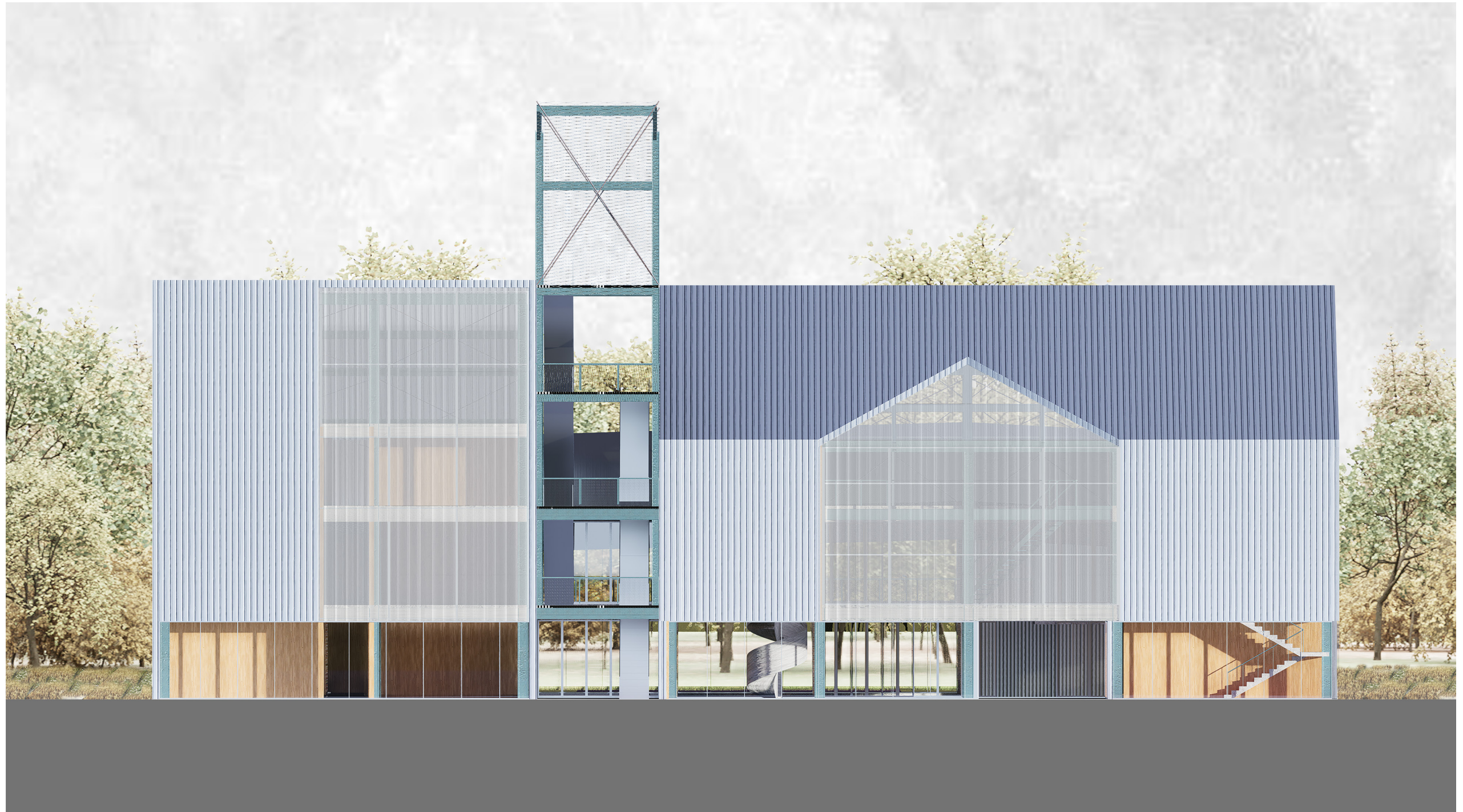




Elevations





















Conclusion

