

Tallinna Arkaad

P5 | Lindsay Menasse | 5021693

Studio: Methods of Analysis and Imagination: A Matter of Scale

Supervisor 1: Jorge Mejia Hernandez

Supervisor 2: Freek Speksnijder

Supervisor 3: Eric Ferreira Crevels

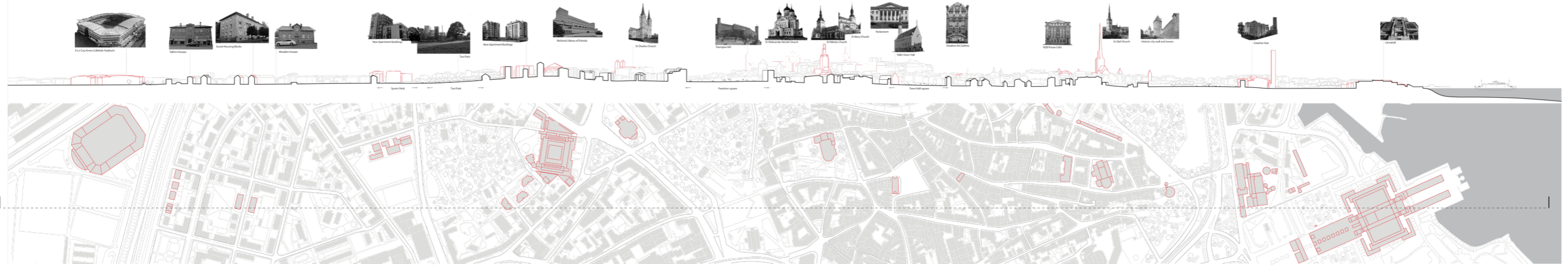
Delft University of Technology (TU Delft) | MSc Architecture track | 21-06-2024

1. Contextual analysis
(Where)
2. Project (Why)
3. Project Documentation
(What)

Tallinn, Estonia



1. Contextual analysis



3 There were a few designated points along the street where pedestrians could be seen.

4 However, as we had already passed the stadium, we continued walking to a large area with a lot of trees and a large amount of greenery that was in very poor condition and covered with graffiti.

5 We were always getting into the residential part of the area, which generally is separated using the edges of the streets.

6 Walking through the residential areas, we encountered various examples of different building typologies, from traditional to modern, which caught our attention with its materials.

7 Besides the predominant wooden siding, we noticed a lot of different materials, such as stone, brick, and metal, which caught our attention with its materials.

8 Walking through the streets, we noticed that the walls had a lot of different colors and textures. We encountered a lot of different building typologies, from traditional to modern, which caught our attention with its materials.

9 As we walked towards the edges of the residential area, we noticed a lot of different building typologies, from traditional to modern, which caught our attention with its materials.

10 On the very edge of the area, we noticed a lot of different building typologies, from traditional to modern, which caught our attention with its materials.

11 We continued our journey through the residential area, which was a mix of different building typologies, from traditional to modern, which caught our attention with its materials.

12 We reached the building of the National Bank, but only we could see it, as the surrounding walls were being built.

13 Directly we got to the Old Town, which was a mix of different building typologies, from traditional to modern, which caught our attention with its materials.

14 A strongly emphasized brick facade was encountered in the residential area as we were walking the street.

15 Here we encountered a building which was undergoing a facade reconstruction.

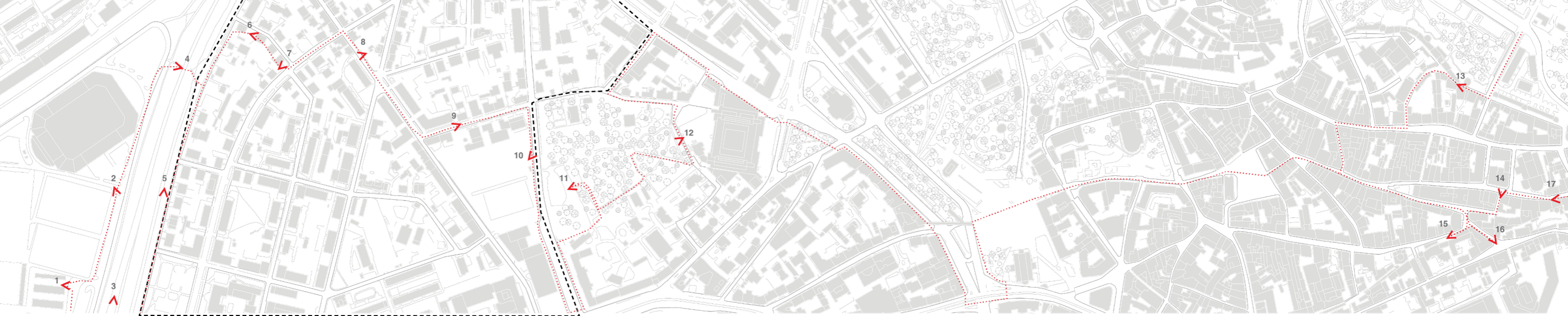
16 Another building in the Old Town displayed a lot of different building typologies, from traditional to modern, which caught our attention with its materials.

17 A strongly emphasized brick facade was encountered in the residential area as we were walking the street.

18 As we arrived at the Church Hill, our attention was drawn to a particular point in it, which appeared only out of place and white.

19 We reached the final destination of our journey - Cathedral. Construction work was going on the roof that was underneath the building. On the left side, a modern building with a glass facade can be seen.

20 Our exploration journey ended here. We took a walk on a bridge in front of the grand view of Ljubljana, marveling at the monument of the city.



Historical town and Uus Maailm



9.



8.



3.

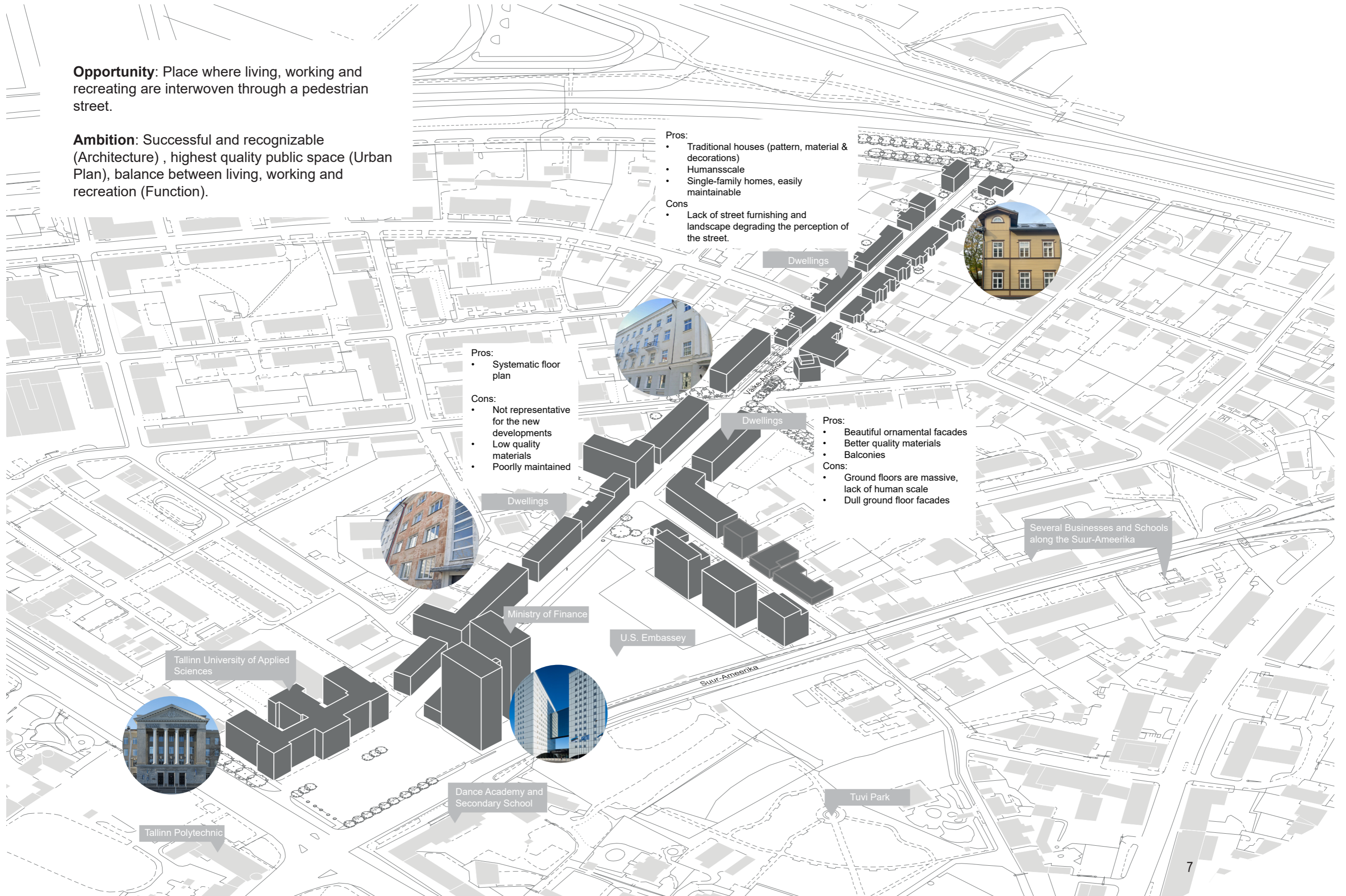
Opportunity: Place where living, working and recreating are interwoven through a pedestrian street.

Ambition: Successful and recognizable (Architecture), highest quality public space (Urban Plan), balance between living, working and recreation (Function).

- Pros:**
- Traditional houses (pattern, material & decorations)
 - Humanscale
 - Single-family homes, easily maintainable
- Cons:**
- Lack of street furnishing and landscape degrading the perception of the street.

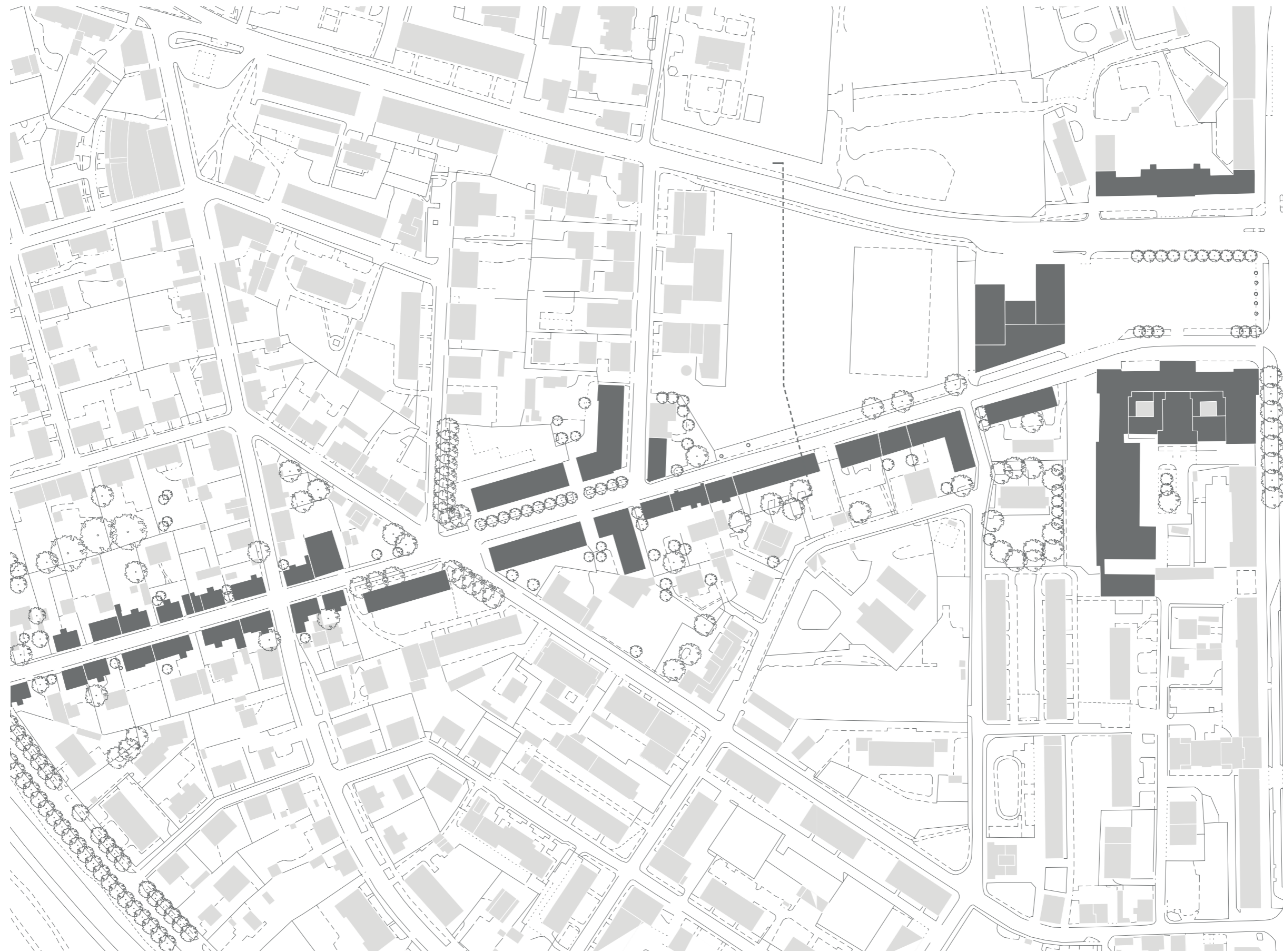
- Pros:**
- Systematic floor plan
- Cons:**
- Not representative for the new developments
 - Low quality materials
 - Poorly maintained

- Pros:**
- Beautiful ornamental facades
 - Better quality materials
 - Balconies
- Cons:**
- Ground floors are massive, lack of human scale
 - Dull ground floor facades



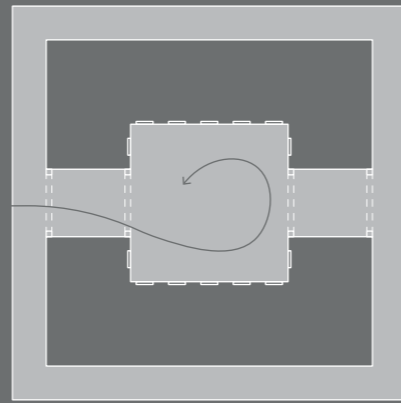
Main research question: How can one design an arcade tailored to the unique urban context of Tallinn?

- (1) How can one design a successful arcade?
- (2) In what ways can the characteristics of Tallinn be harmoniously blended to establish a distinctive image for the locality?

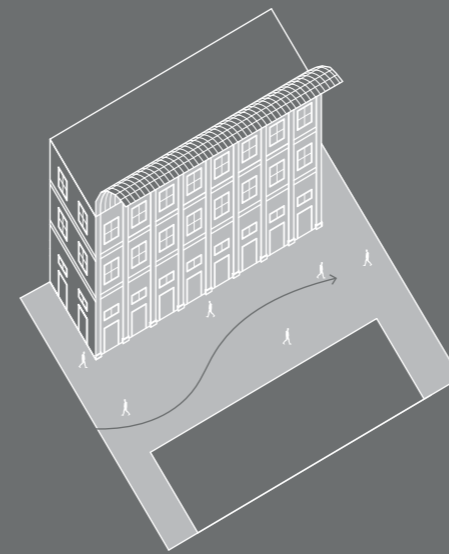
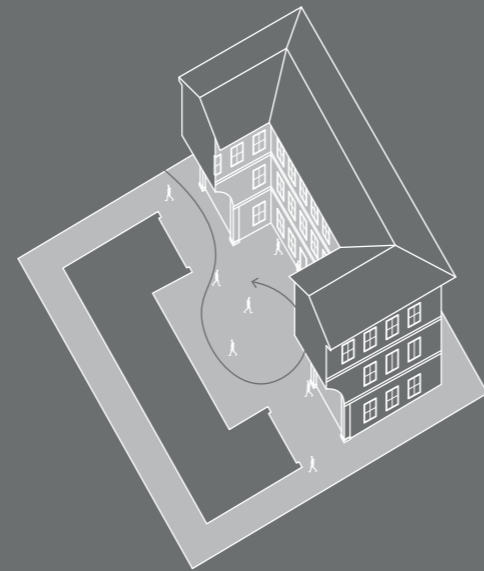
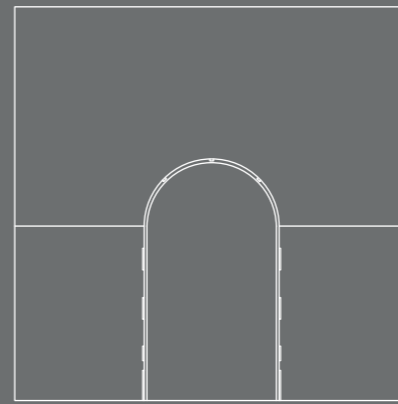
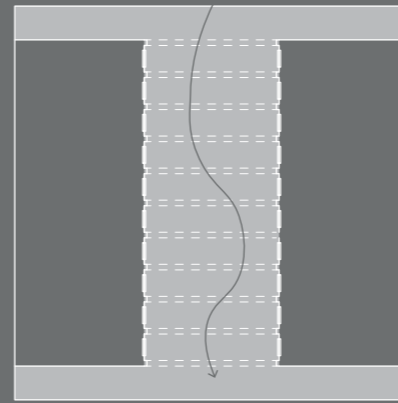


TYPOLGY

Courtyard

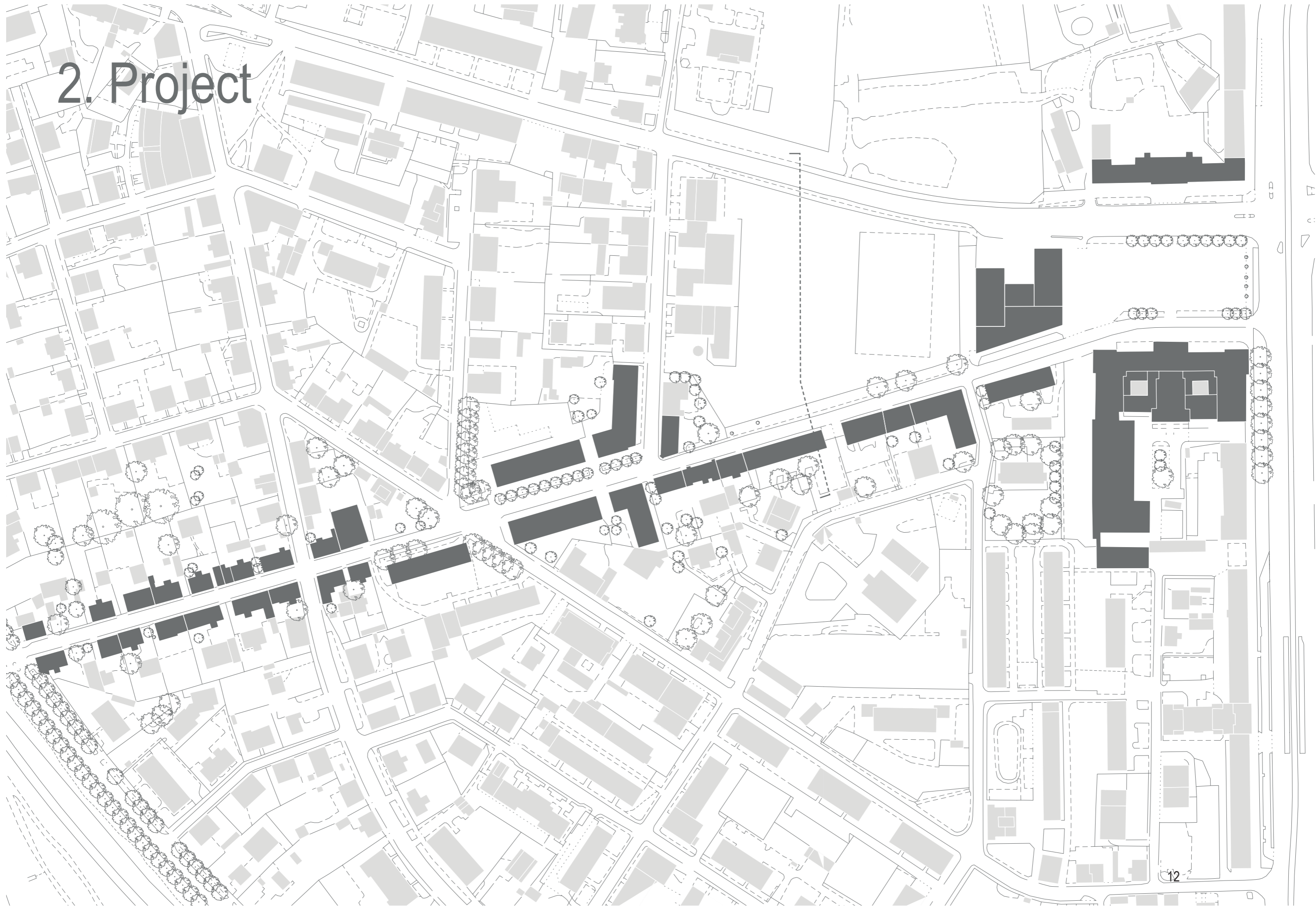


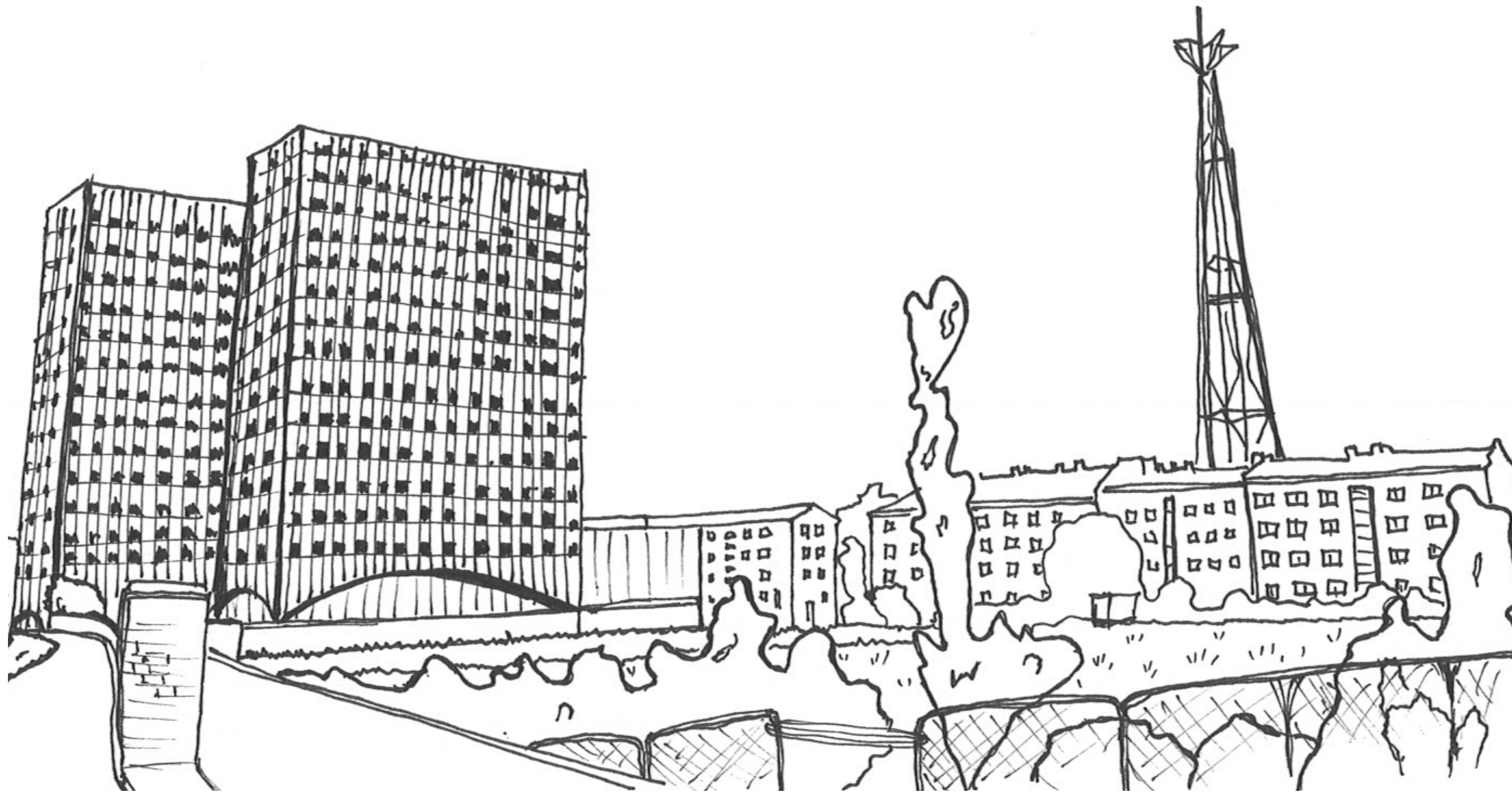
Arcade



Context
Symmetry
Repetition
Uniformity
Inside & Outside

2. Project

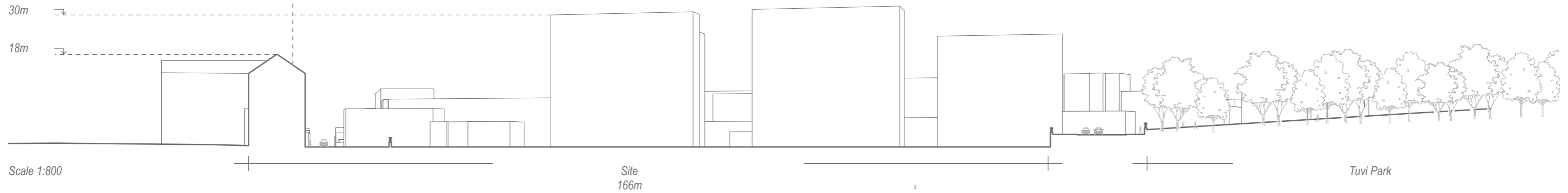




Khrushchevs' House



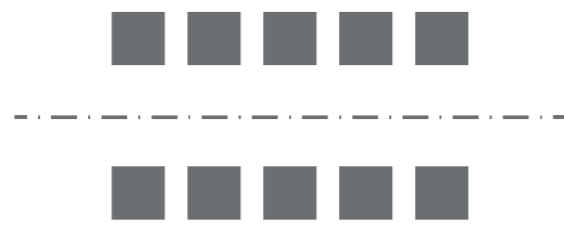
New Apartment Buildings



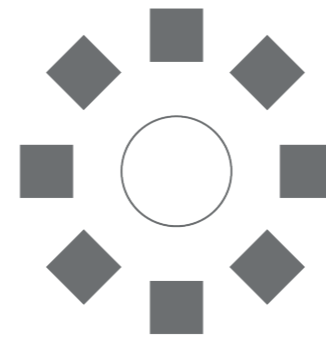
Site



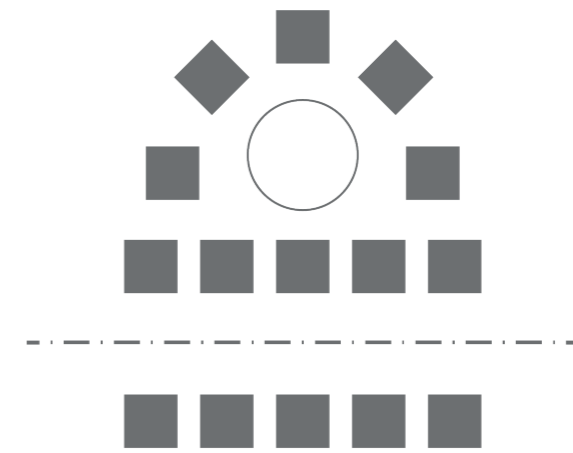
Linear



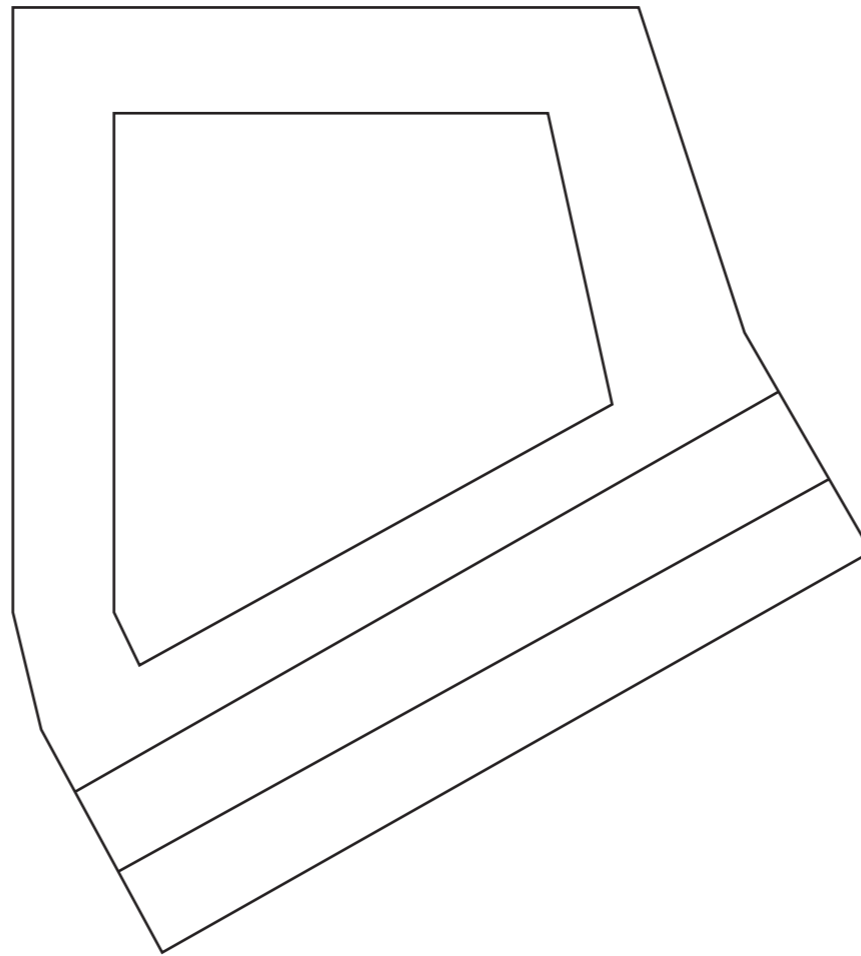
Central



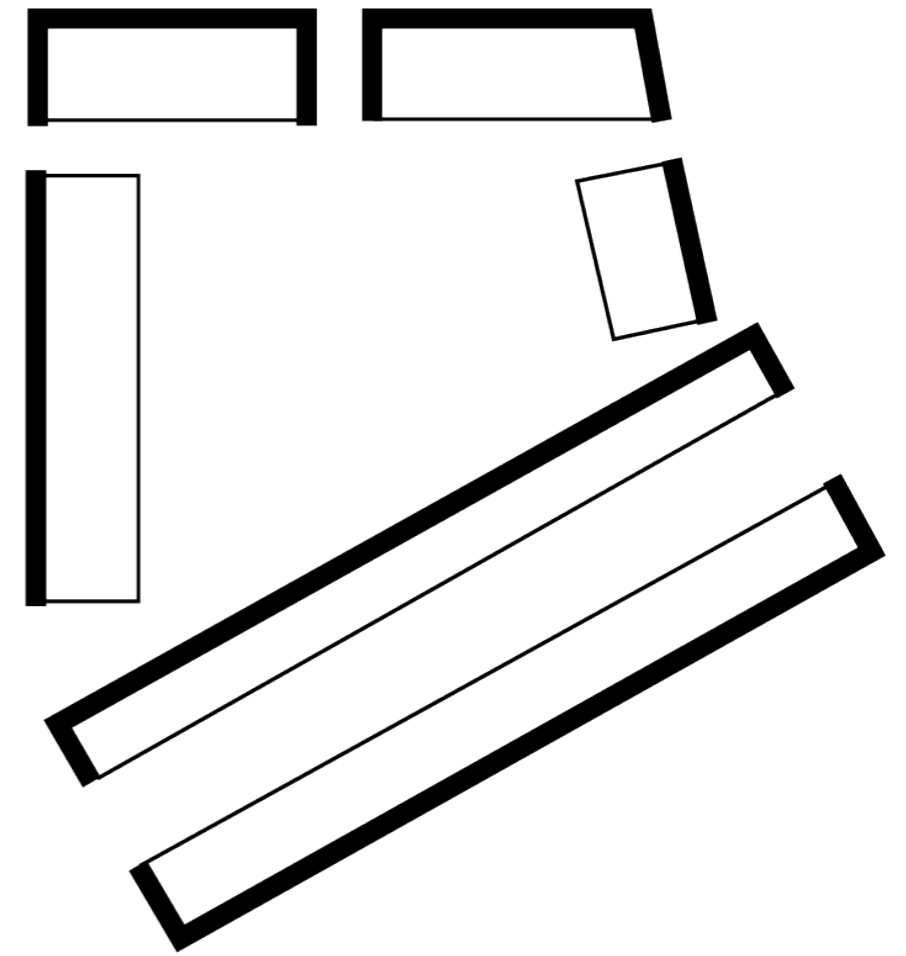
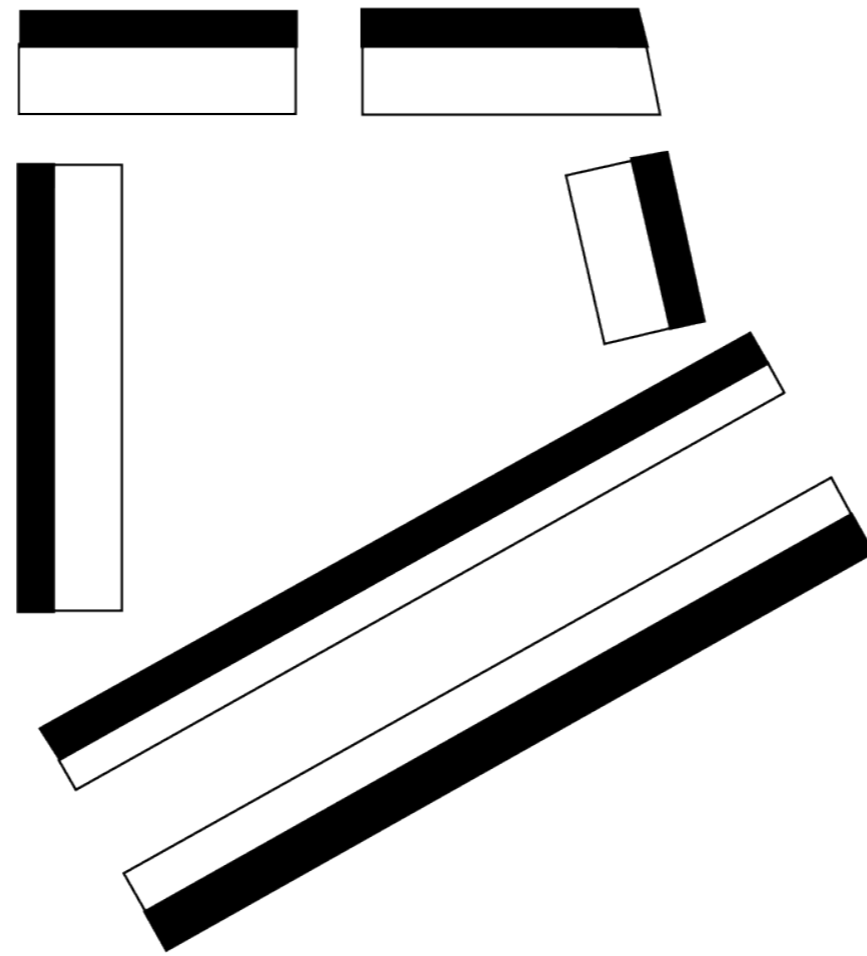
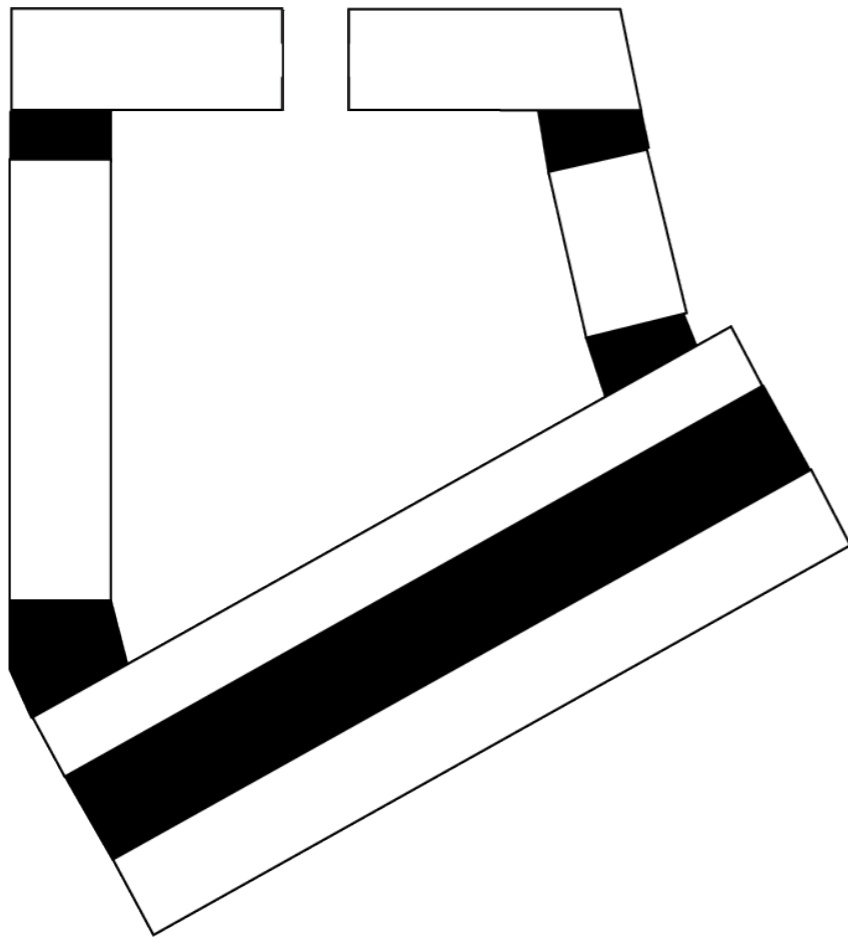
Hybrid



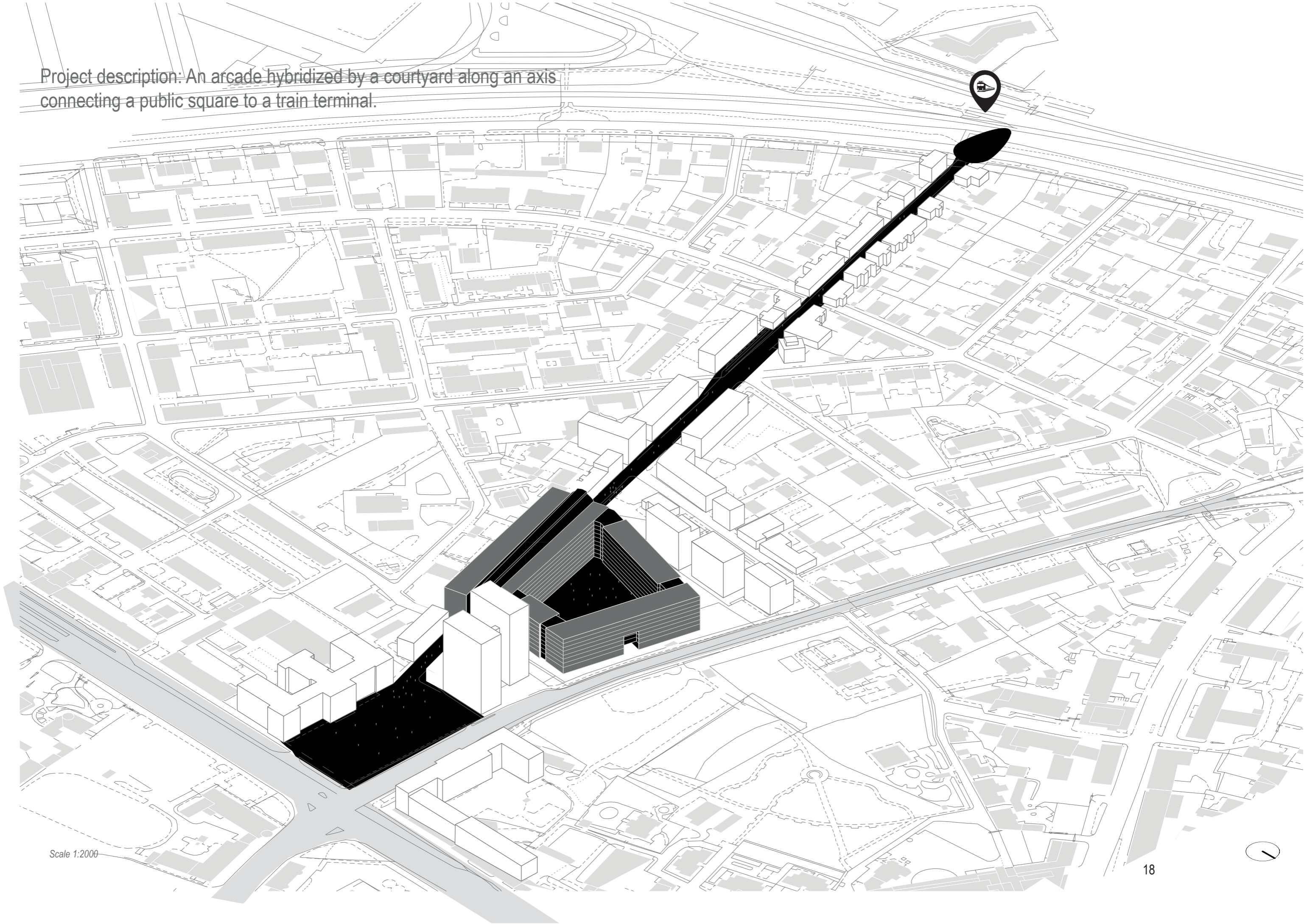
Form



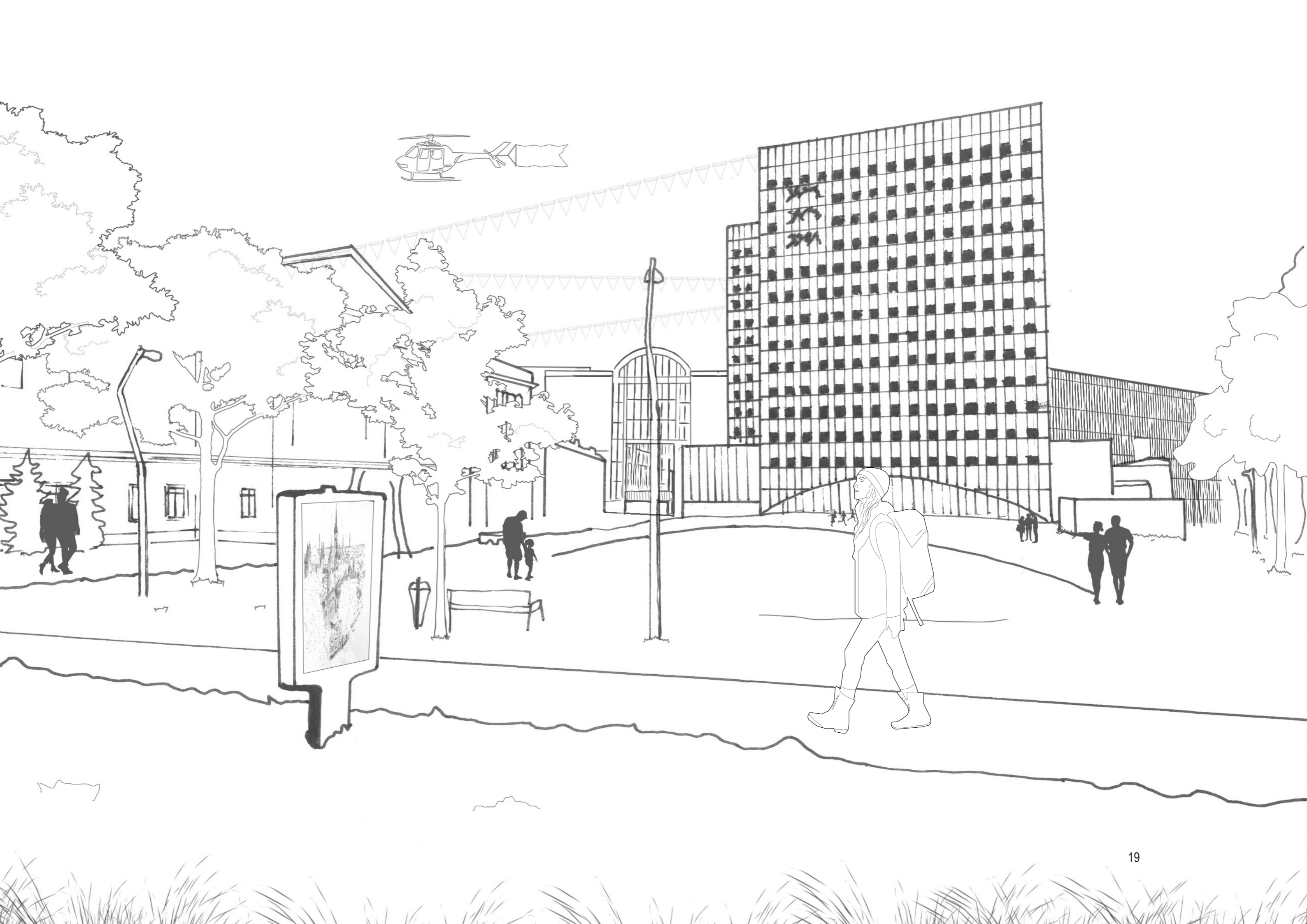
Contrast



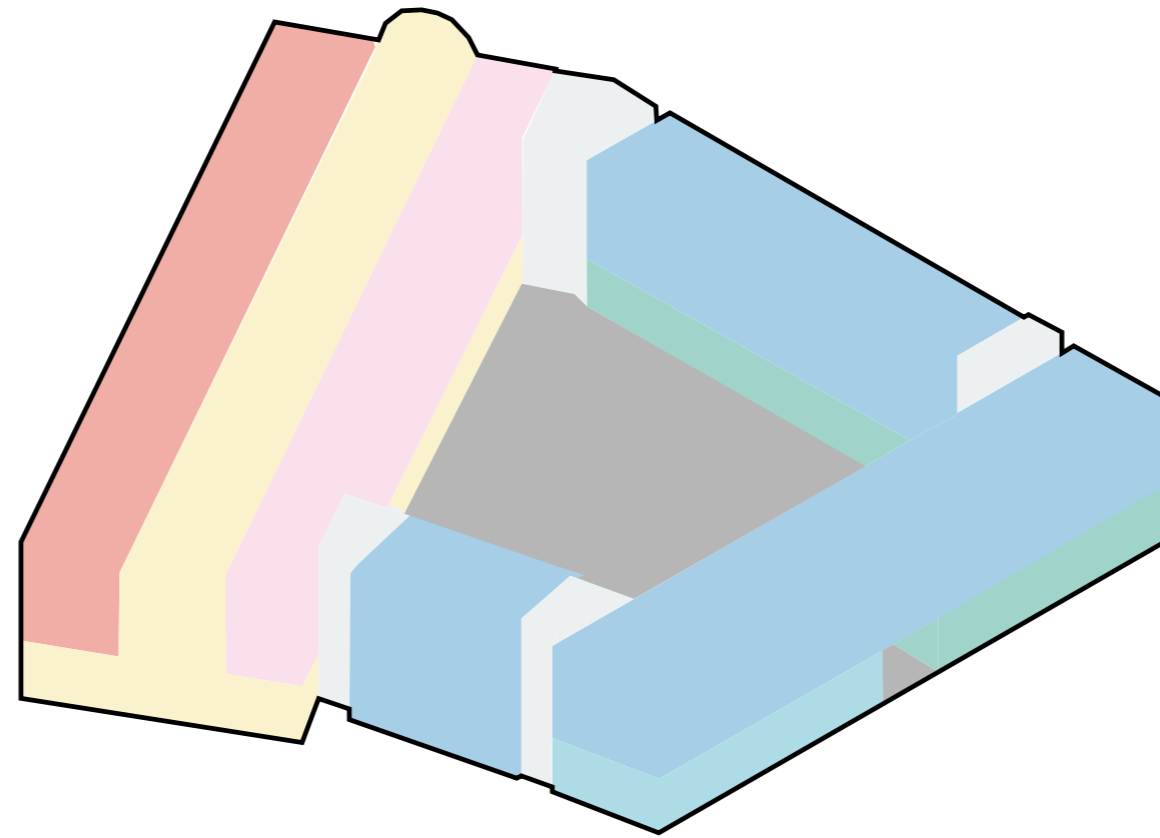
Project description: An arcade hybridized by a courtyard along an axis connecting a public square to a train terminal.



Scale 1:2000



Functions



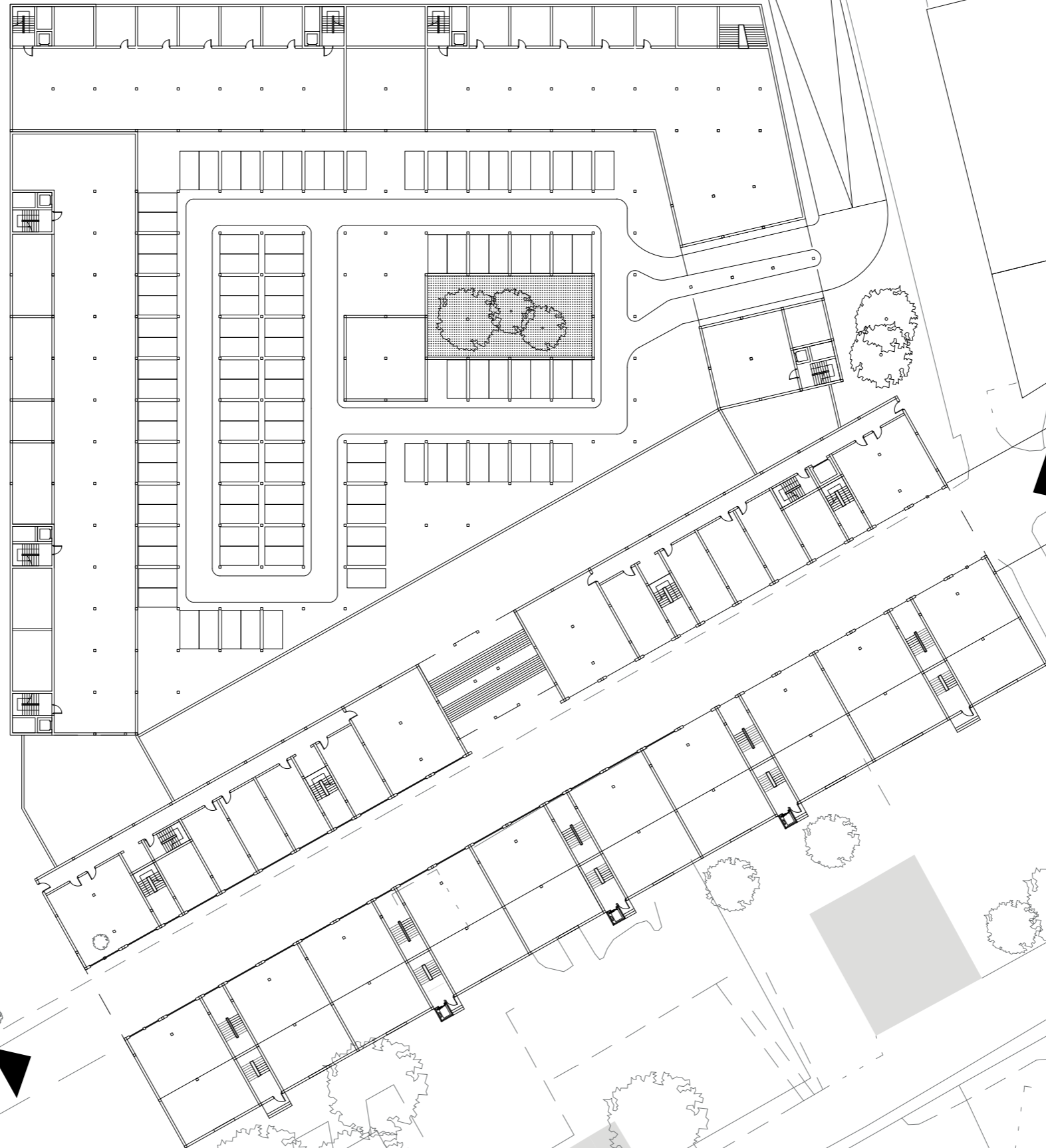
Dwellings
Offices
Commercial

Embassy
Visa service
Education

Parking
Entrées



3. Hybrid

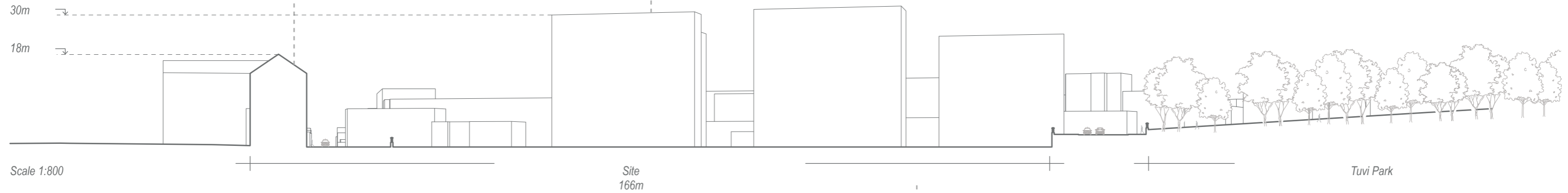


Level 0 : P = -3000 mm

Khrushchevs'
House

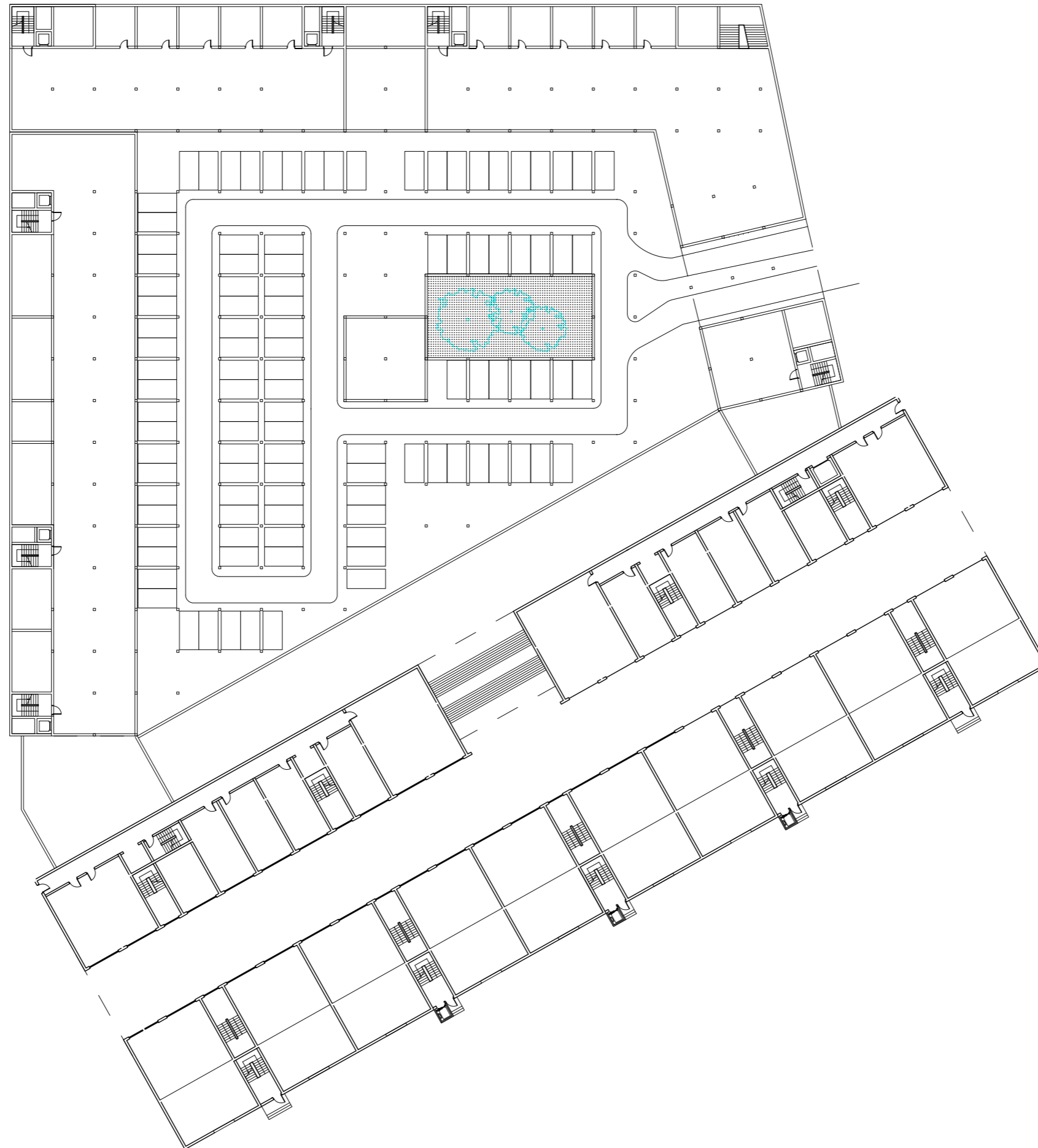


New Apartment Buildings



Site

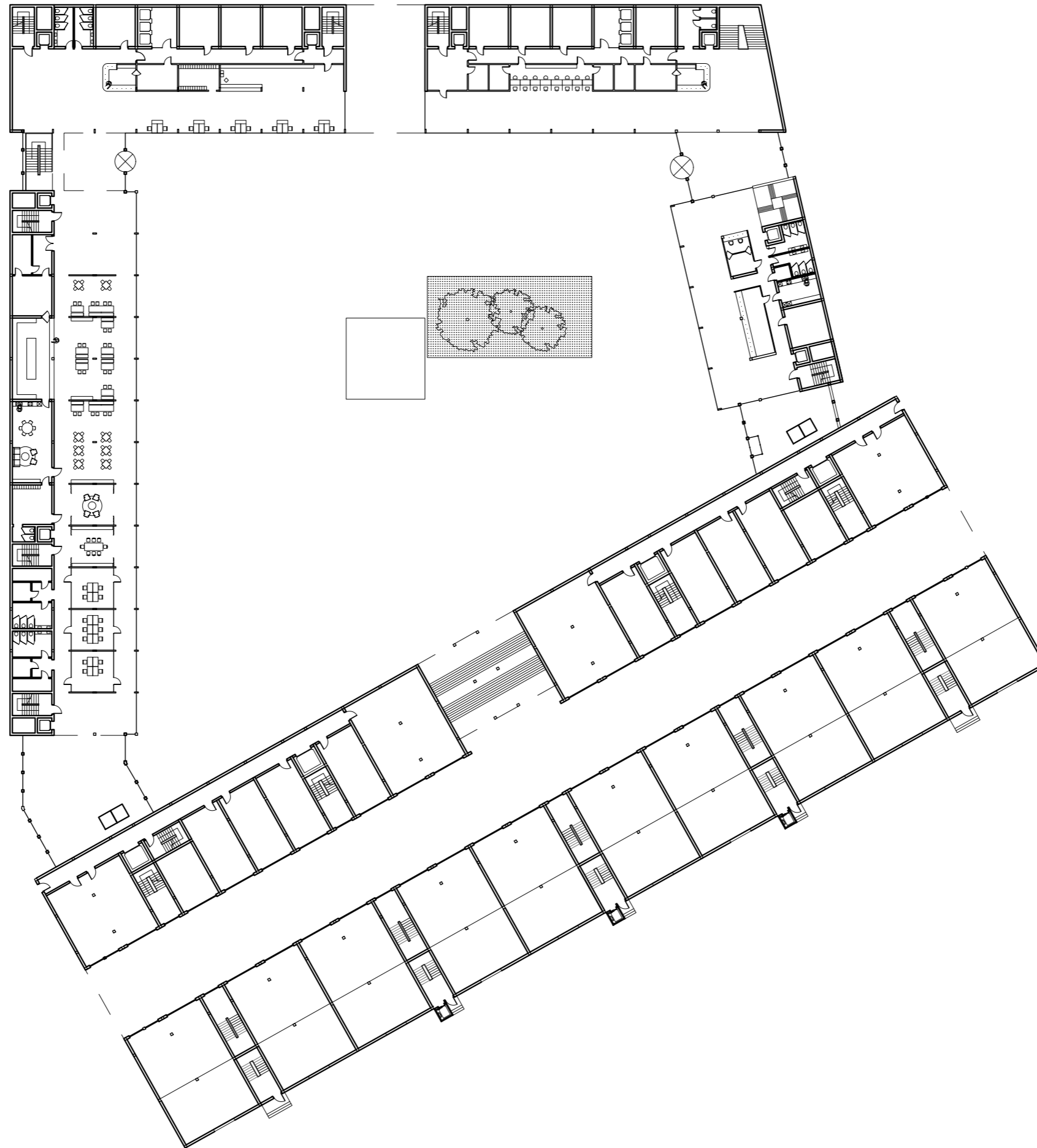




Level 0 : P = -3000 mm

Scale 1:600





Groundfloor : P = 0

Scale 1:600

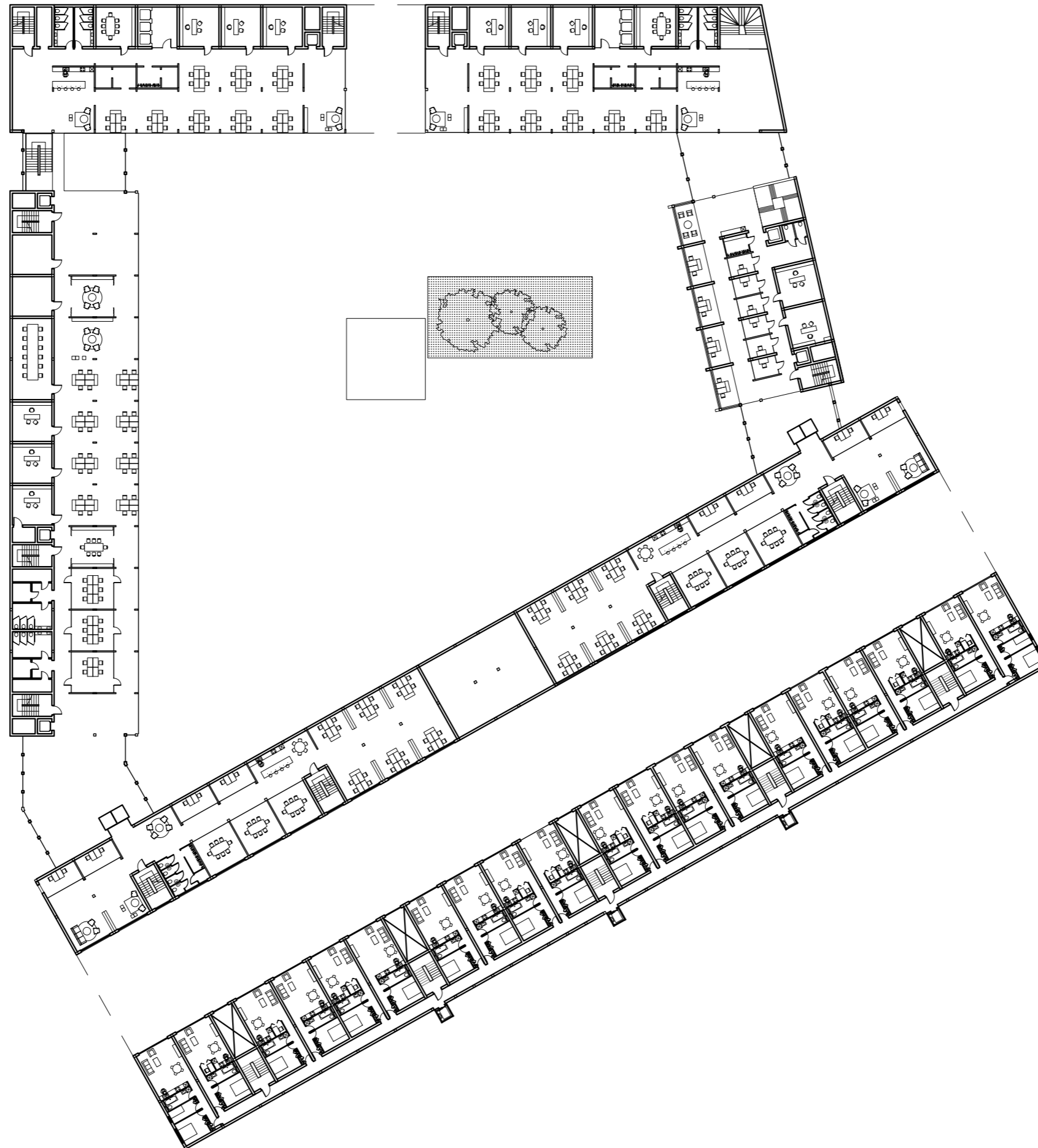




First Floor

Scale 1:600

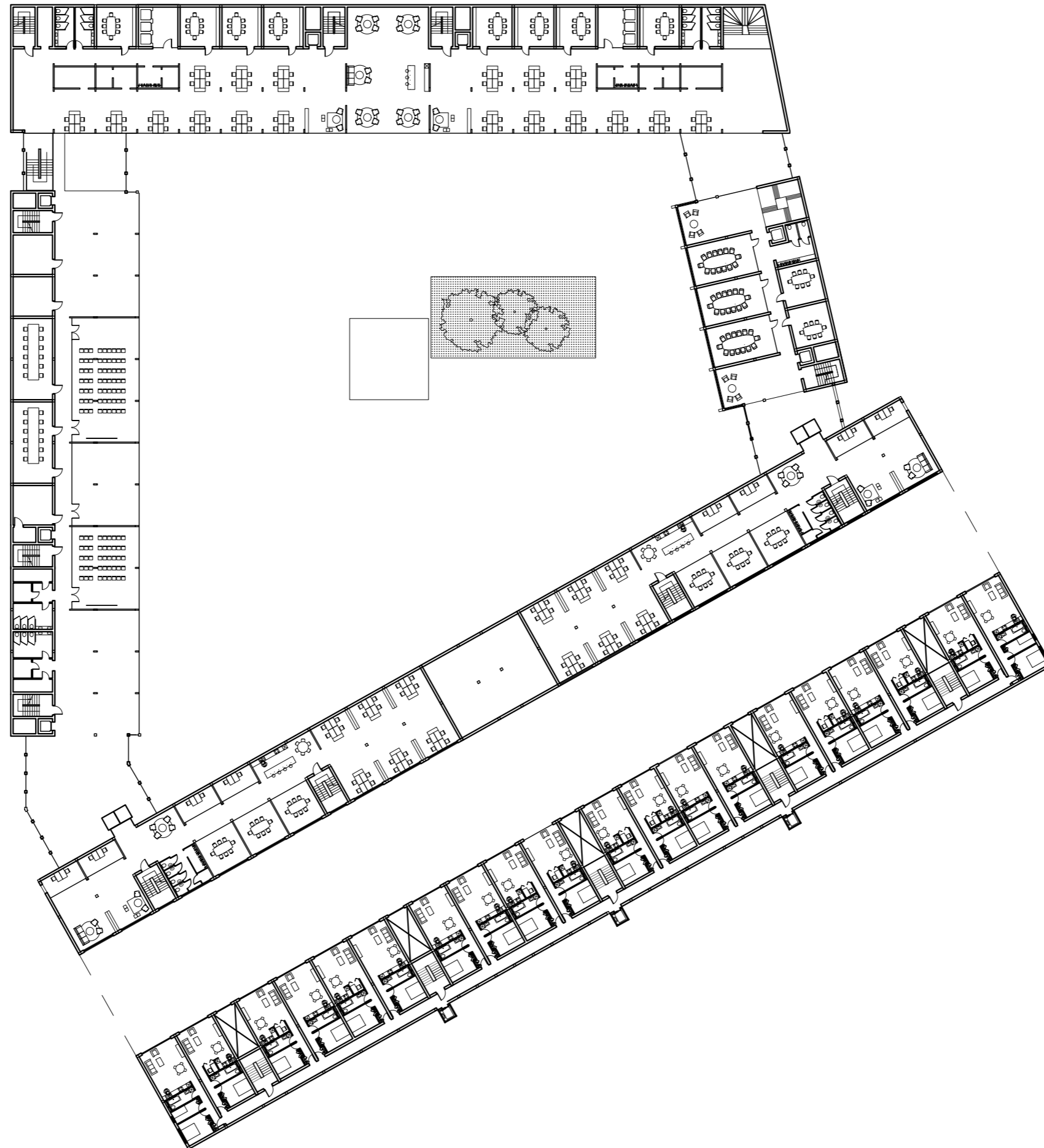




Second and Third Floor

Scale 1:600



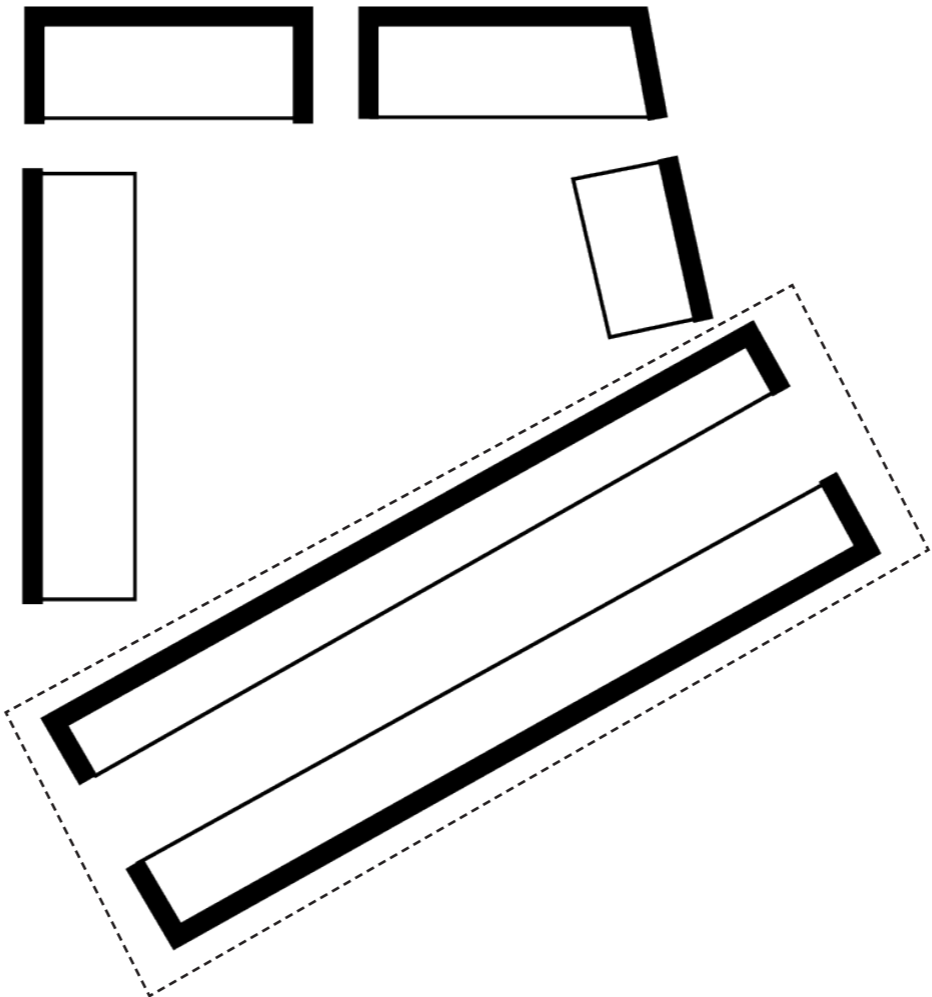


Fourth and Fifth Floor

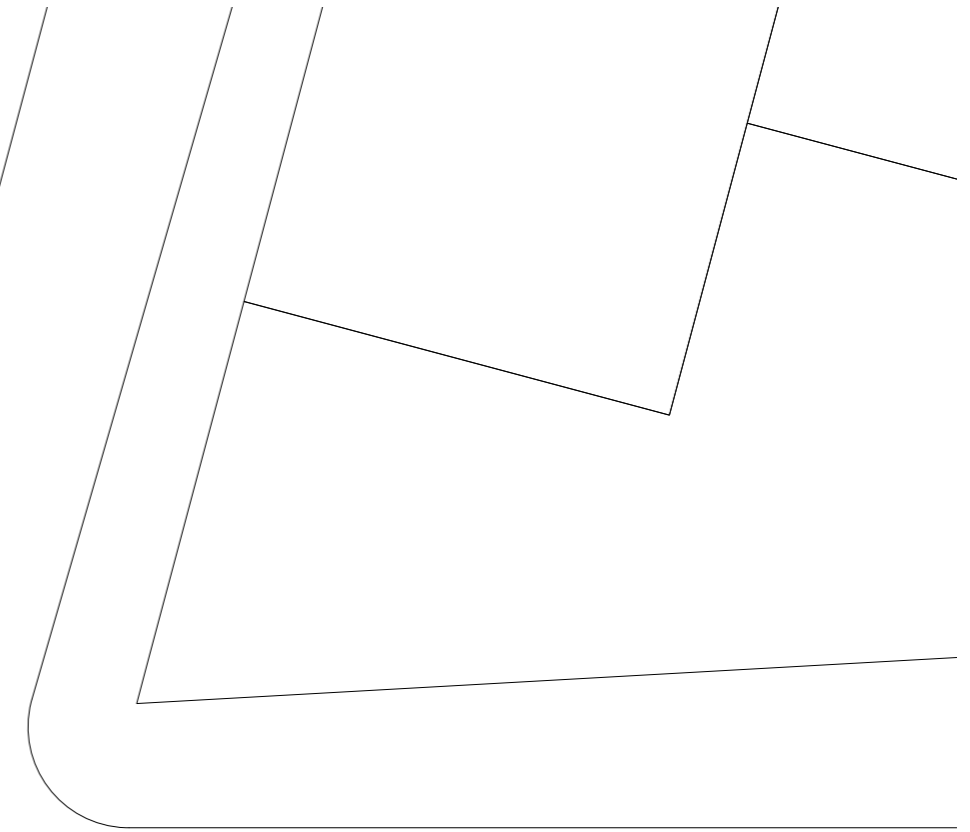
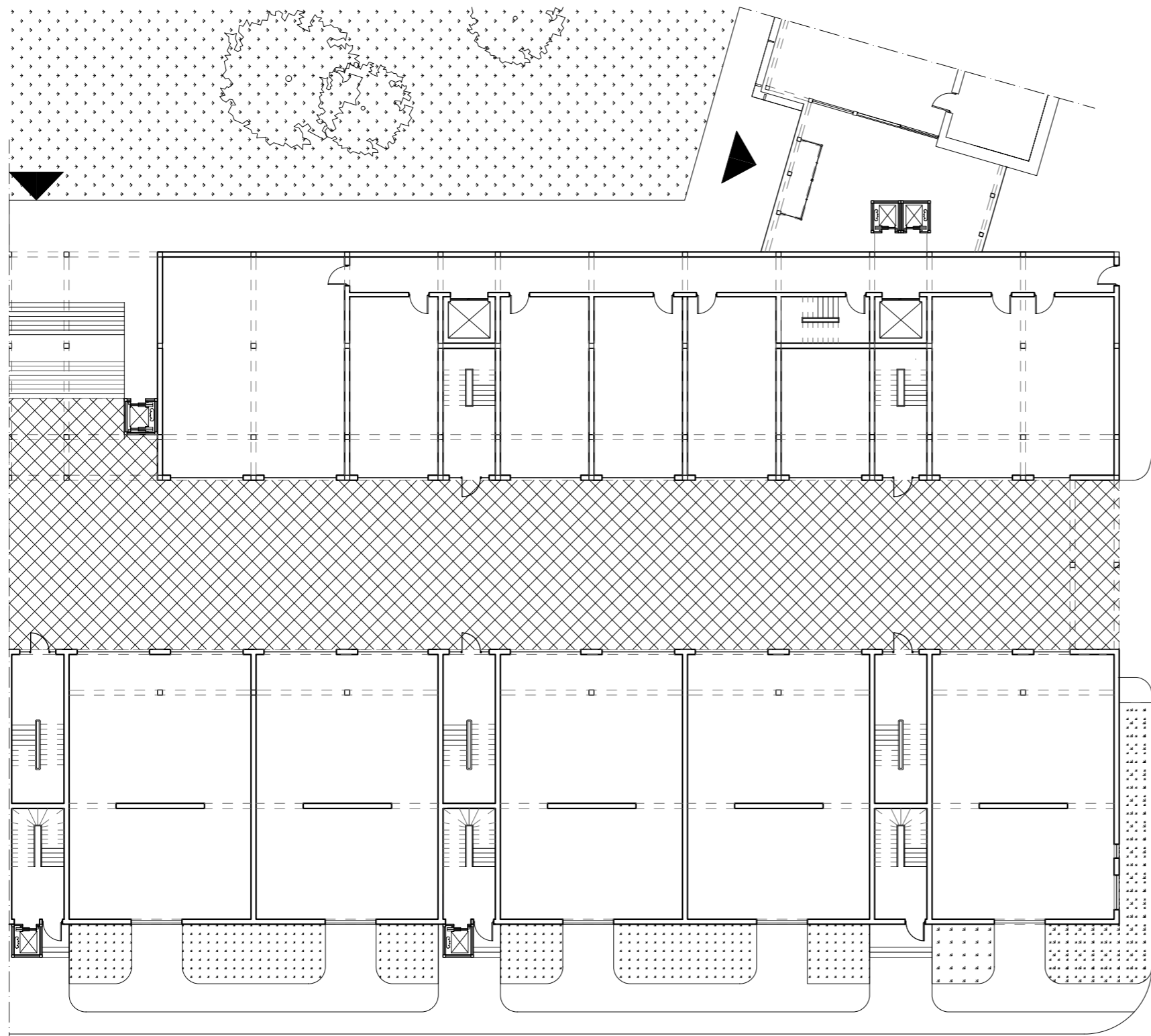
Scale 1:600



Arcade



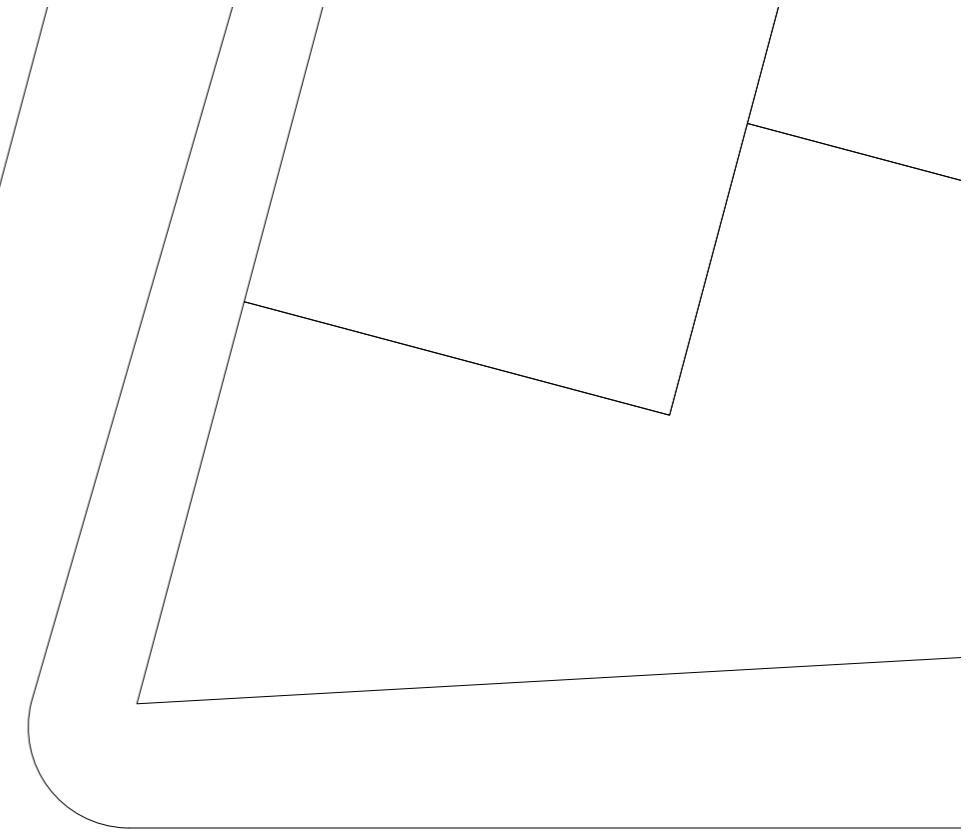
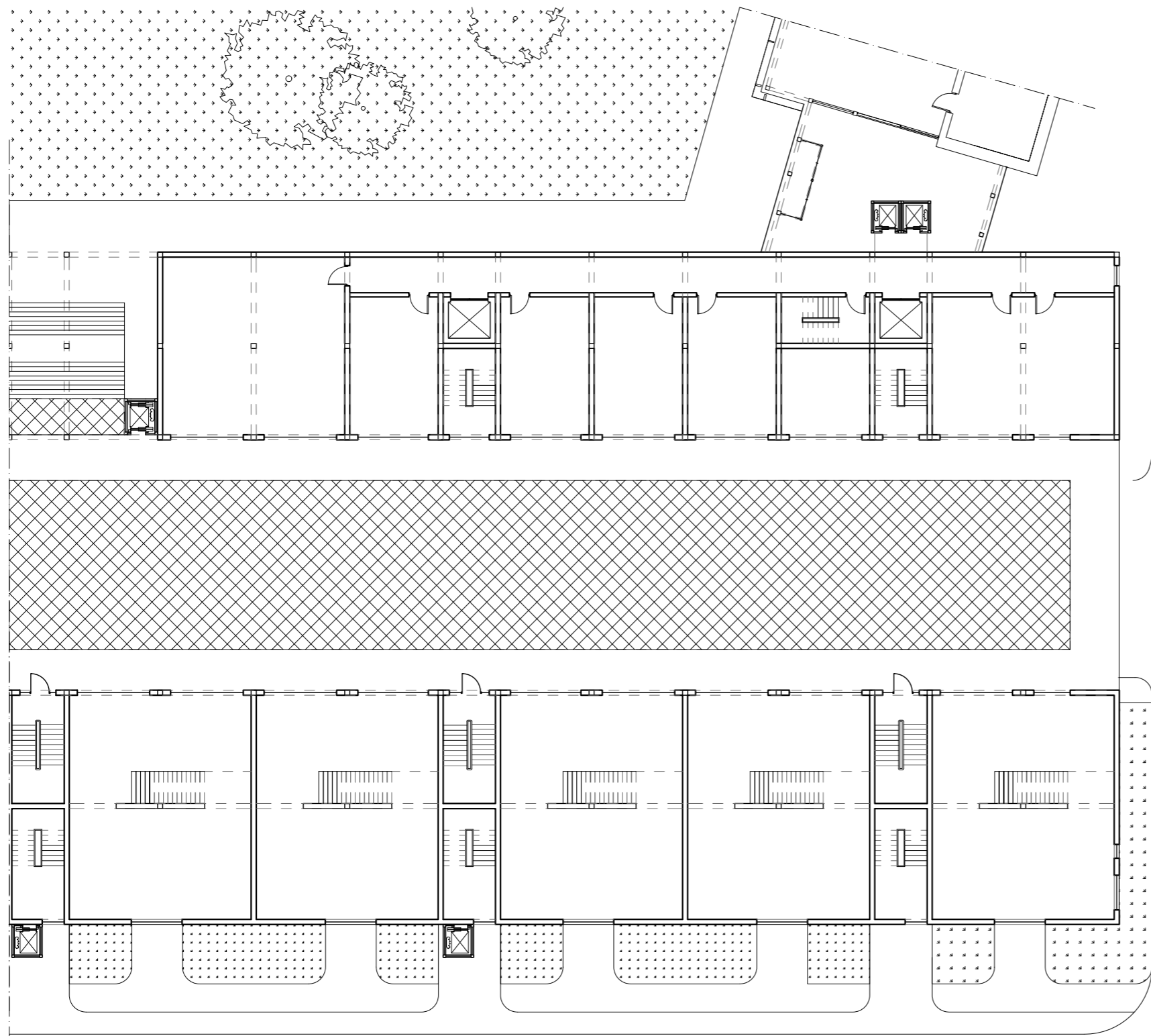




Ground Floor

Scale 1:300

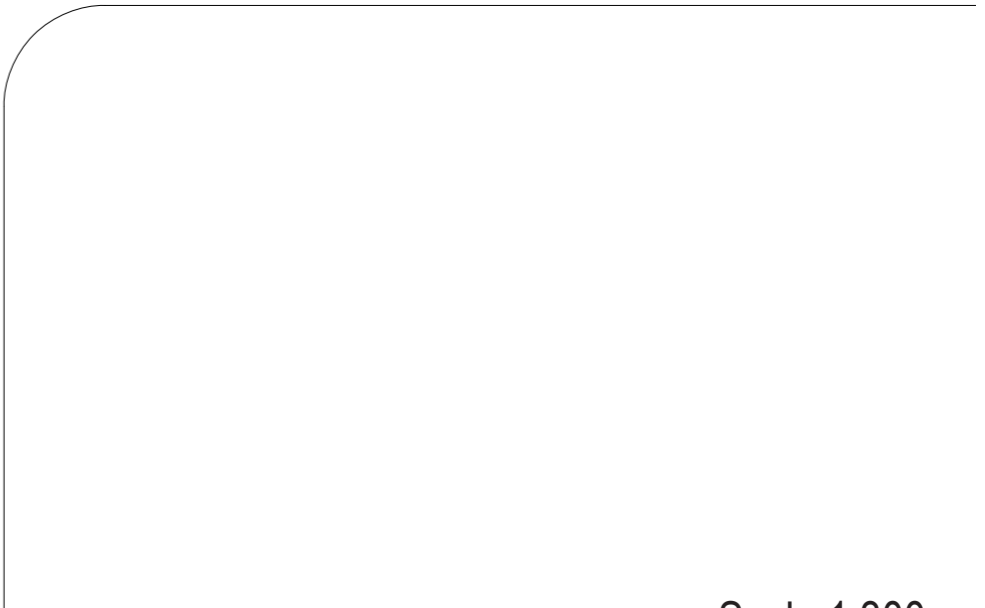
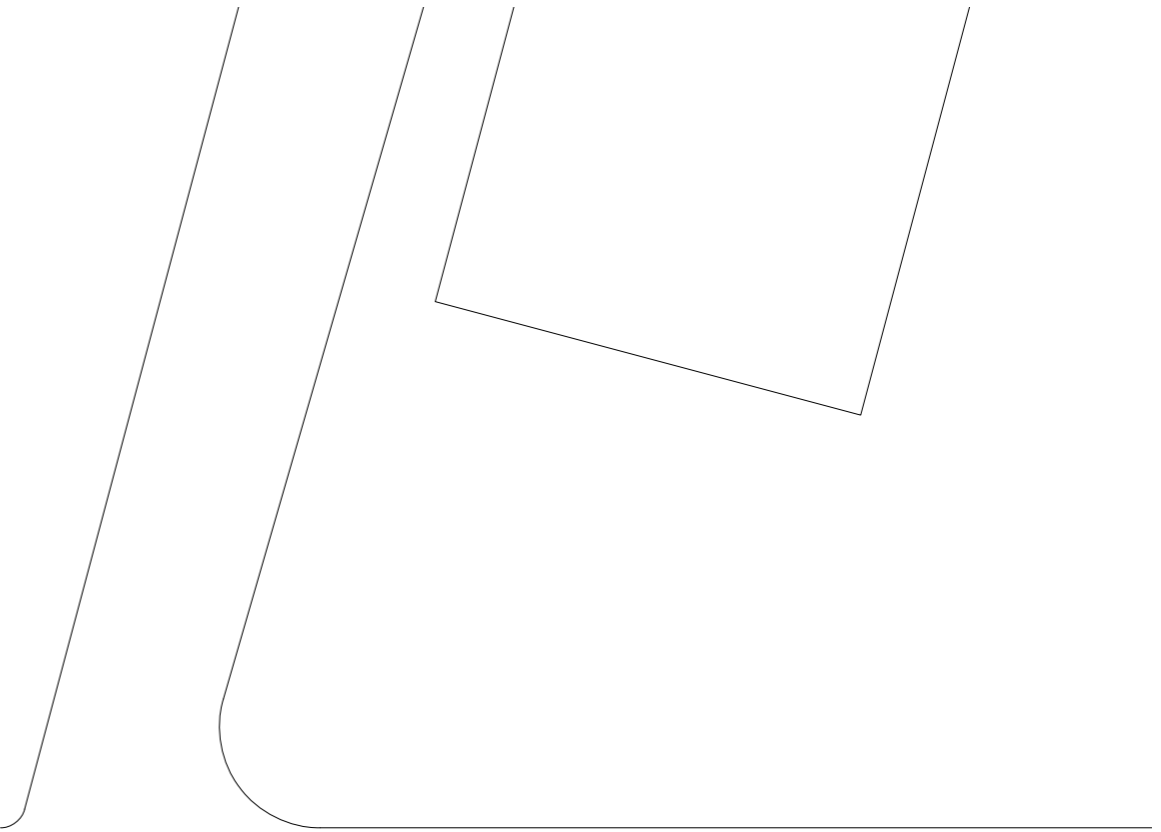
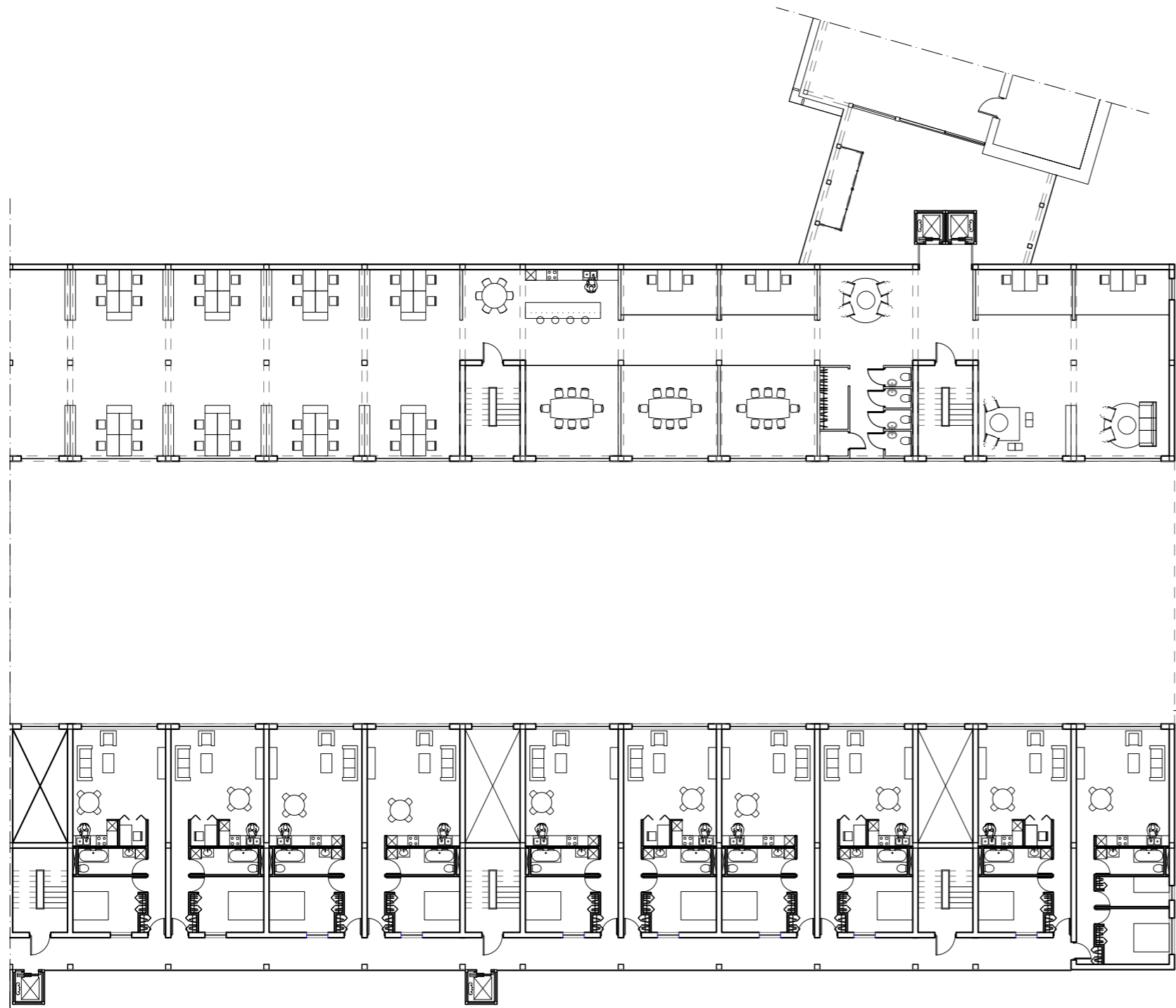




First Floor

Scale 1:300

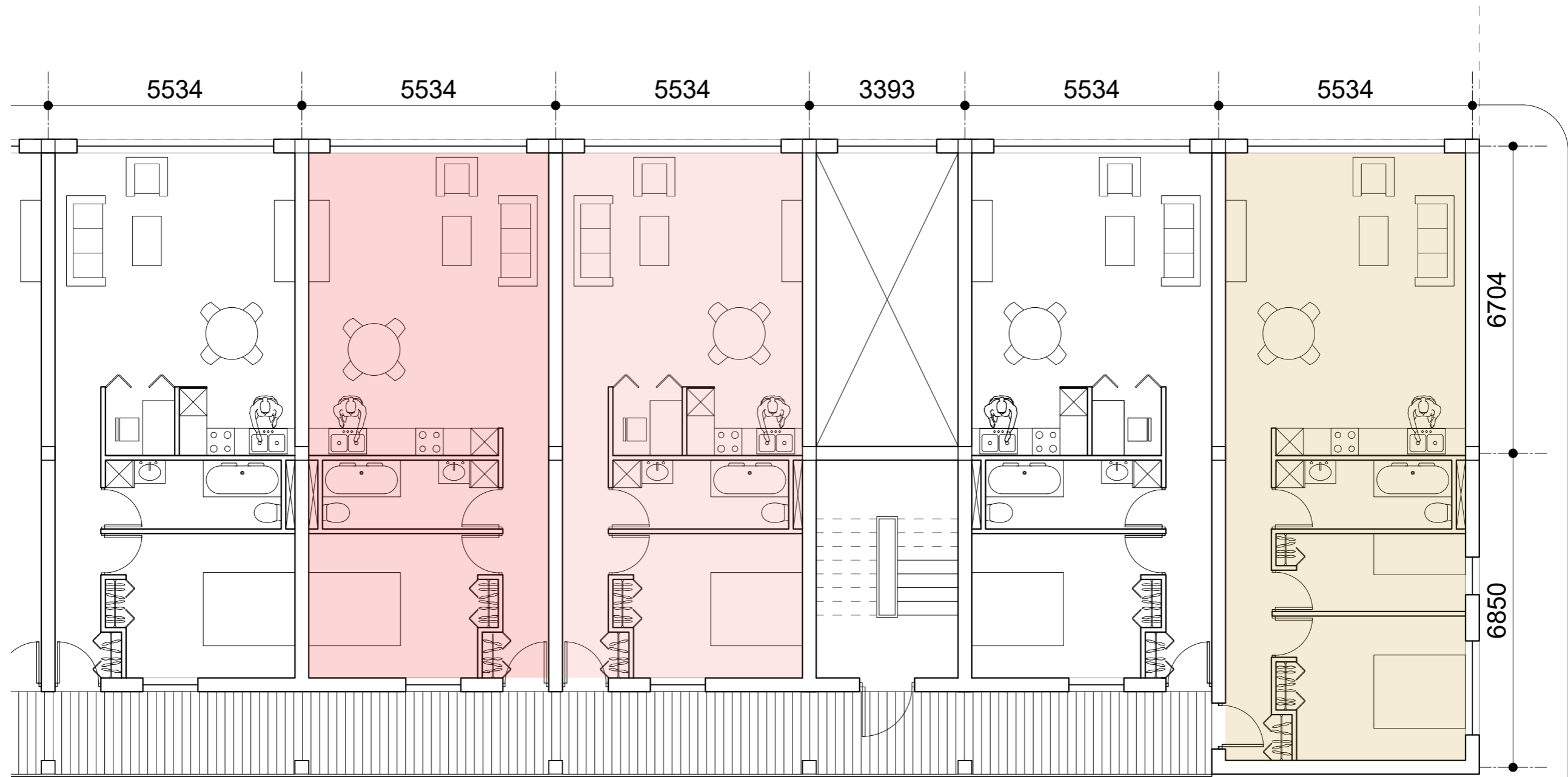


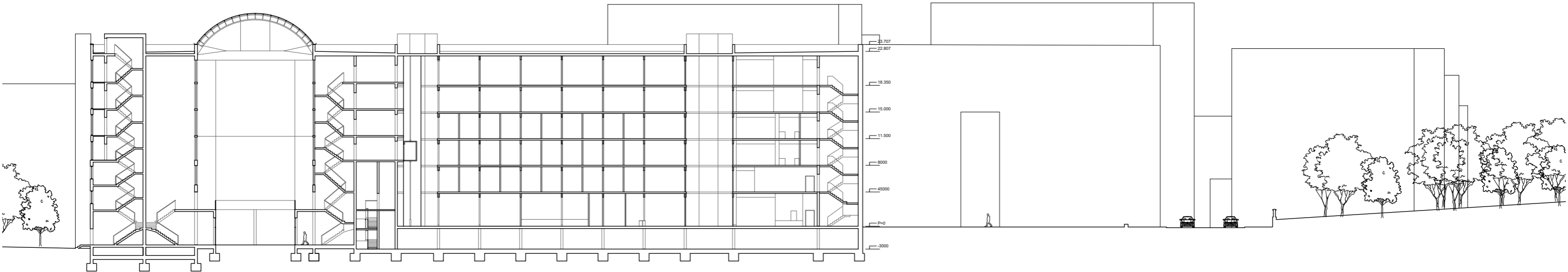


Third Floor Plan

Scale 1:300



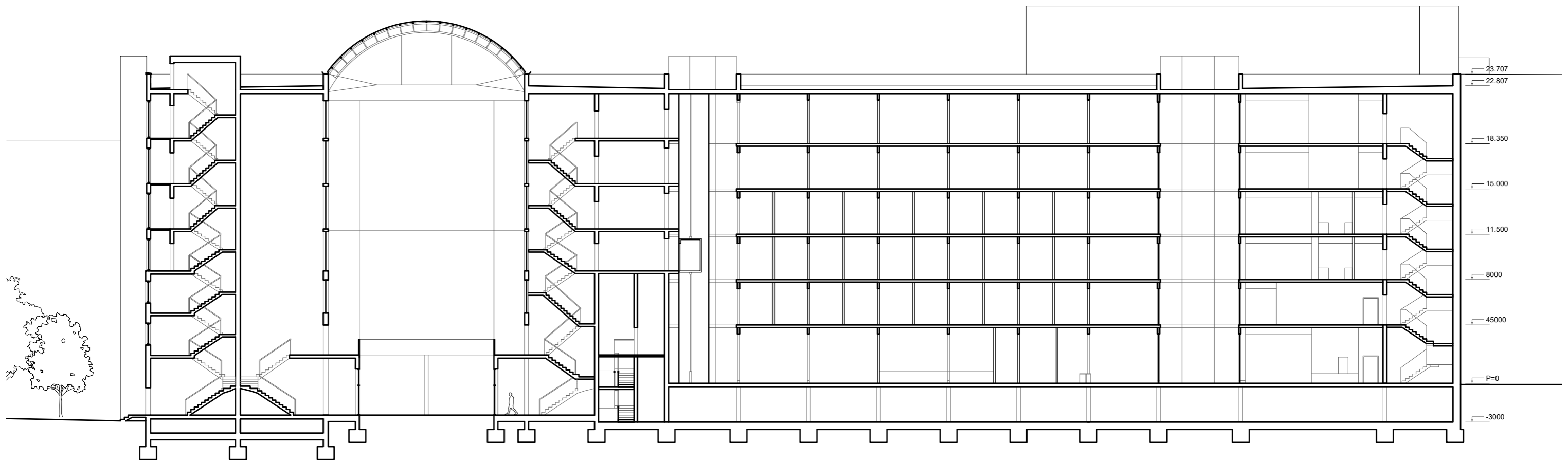




23.707
22.807
19.350
15.000
11.500
8000
65000
P+0
-3000

Scale 1:500

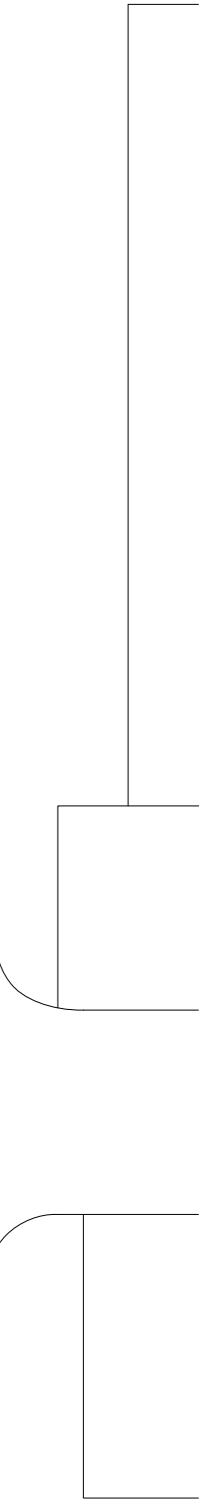
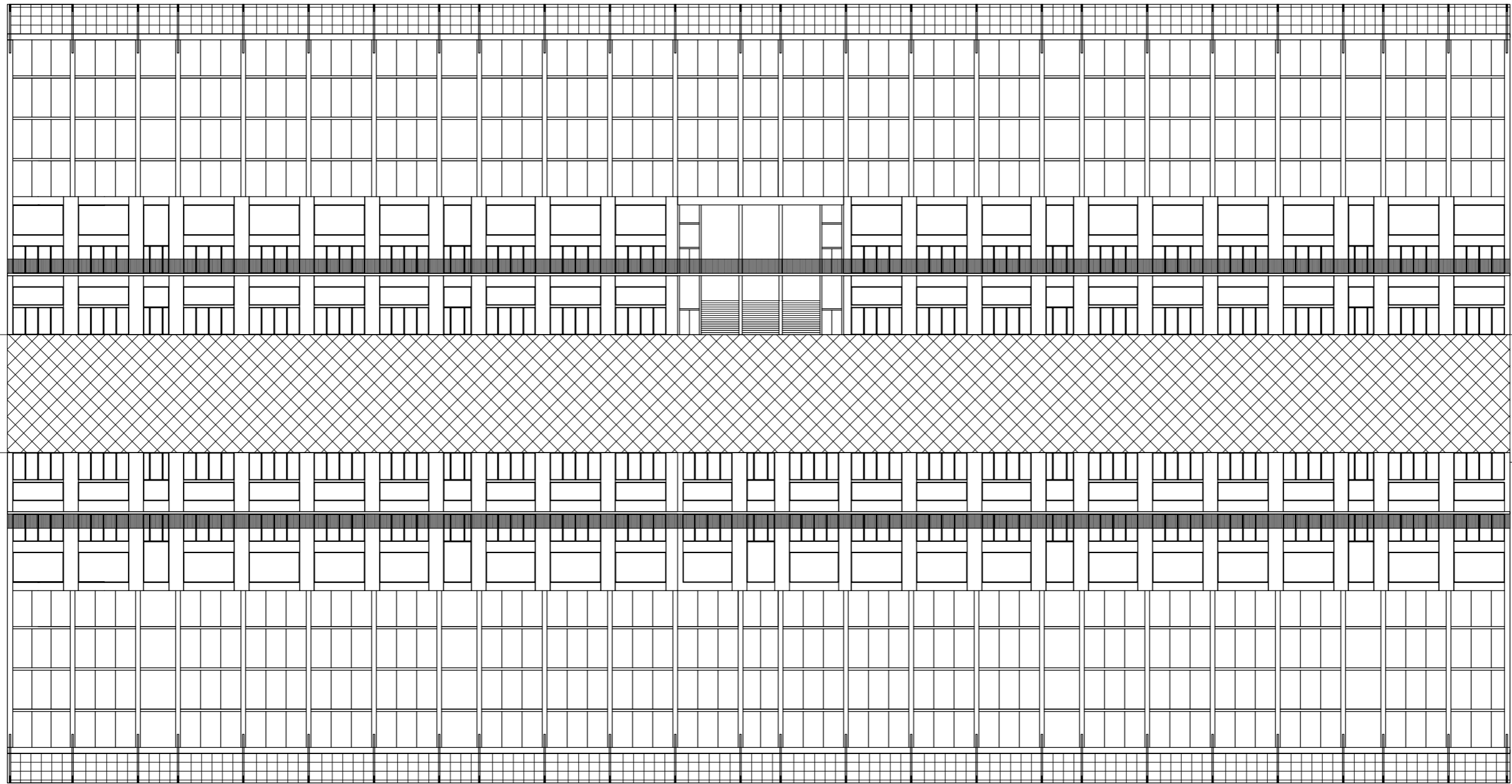
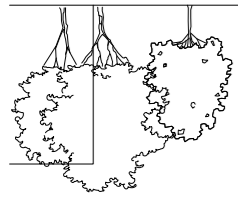




23.707
22.807
18.350
15.000
11.500
8000
45000
P=0
-3000

Scale 1:300





Scale 1:400





ZARA

LE
PETIT ROI



LADIES
Shoes

Eric Sripa
Coiffeur

BRESILOPHILE

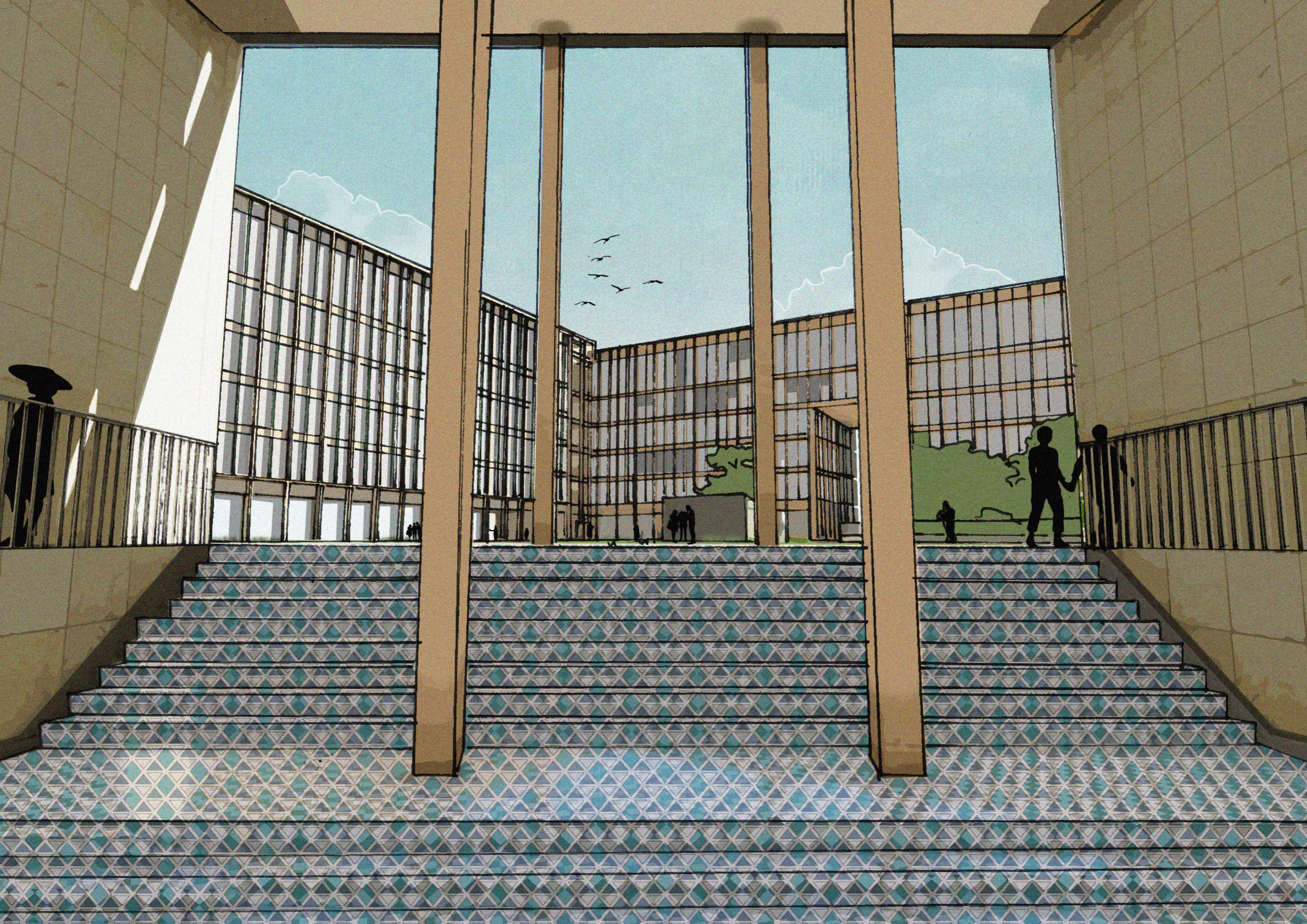


Coffee

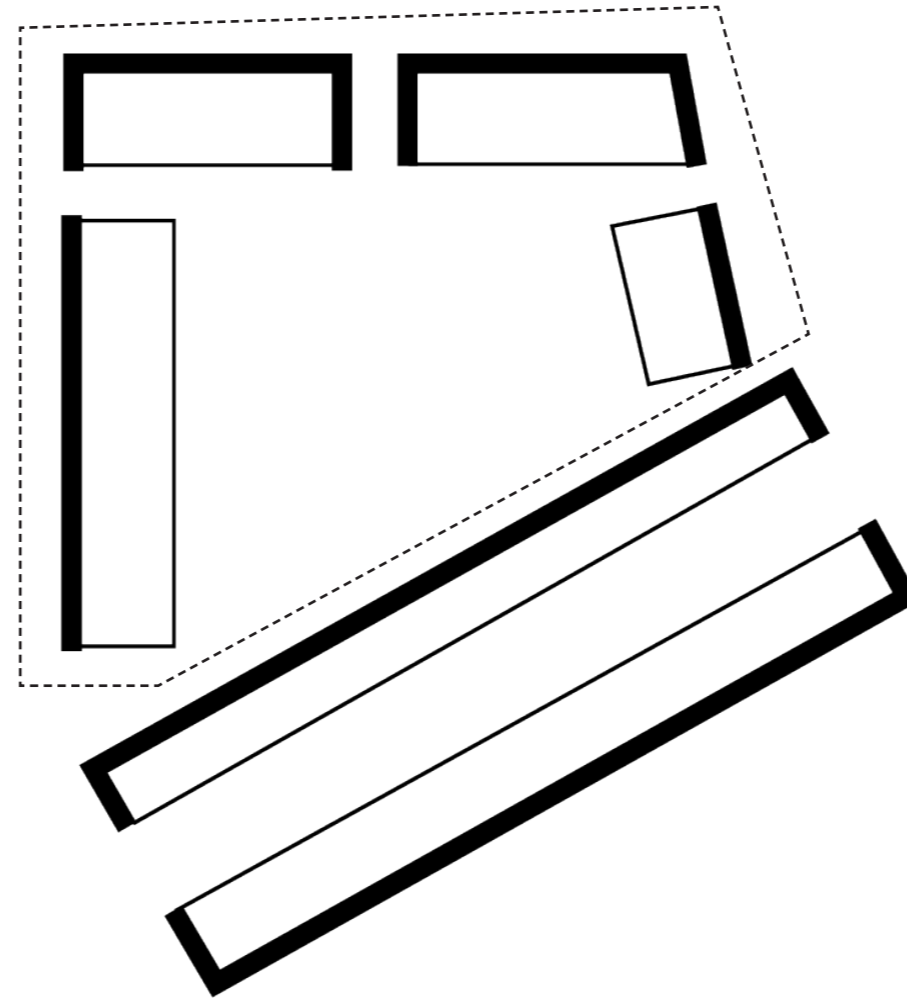


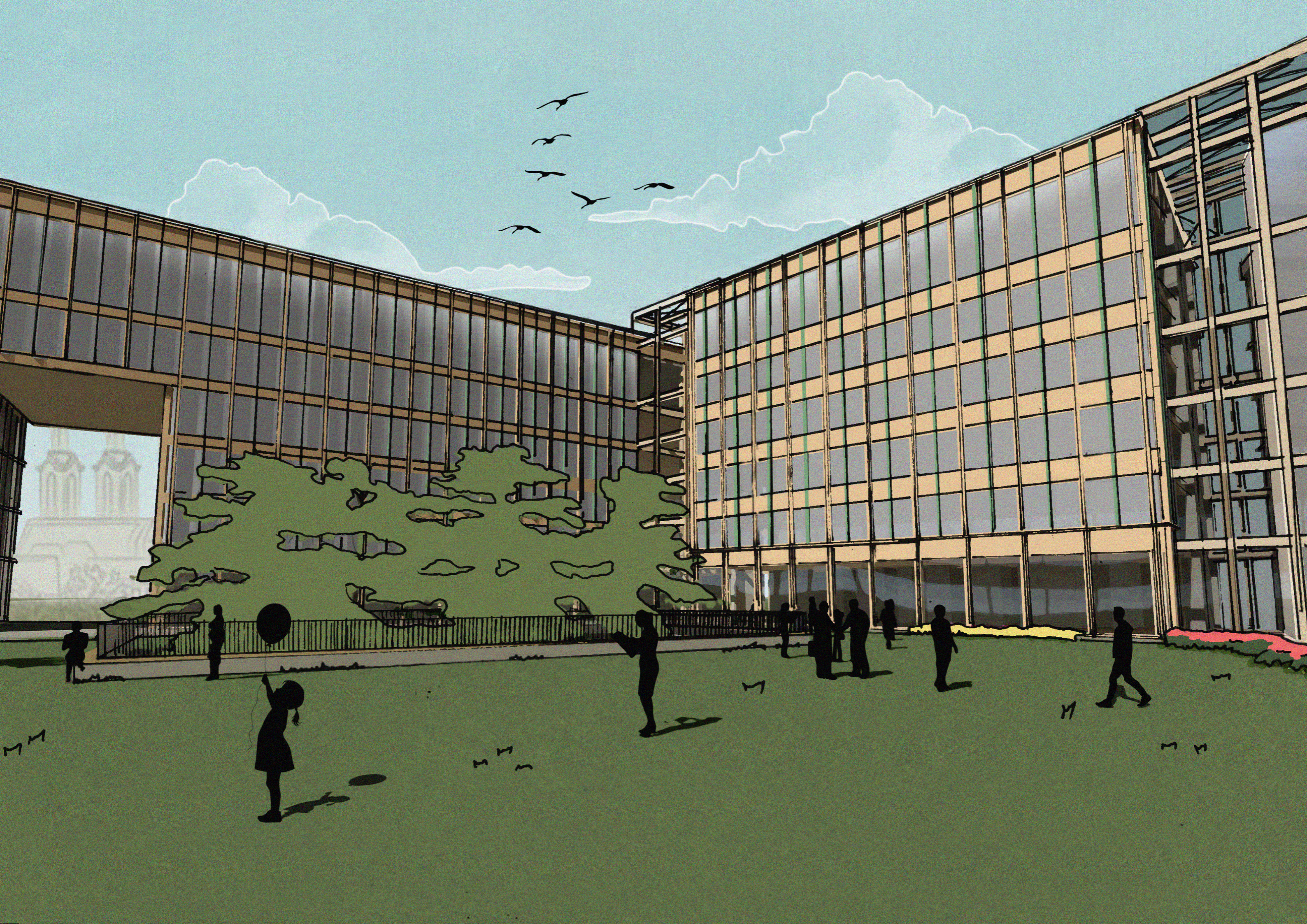
Miss Elegant

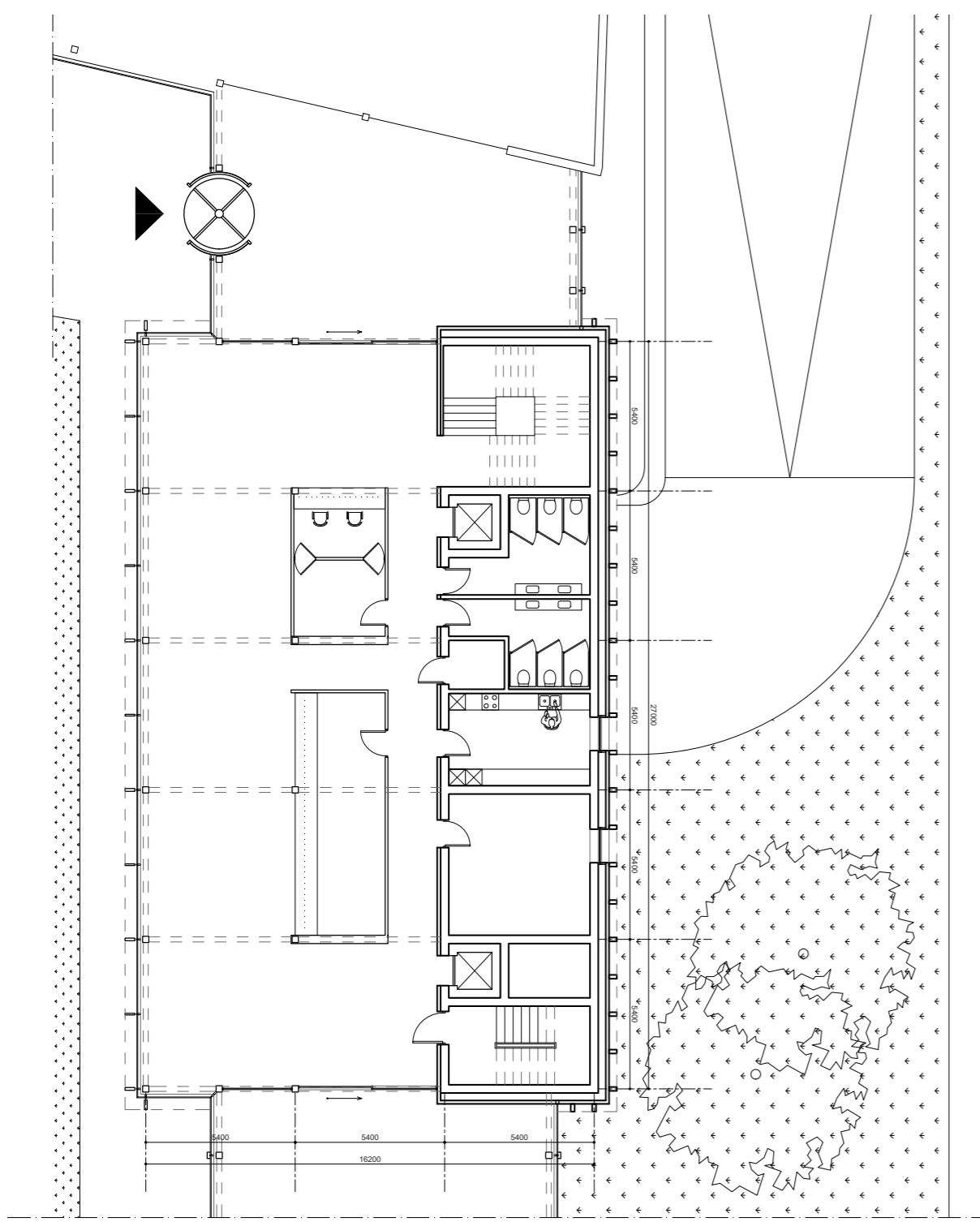
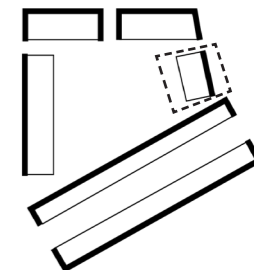
H&M



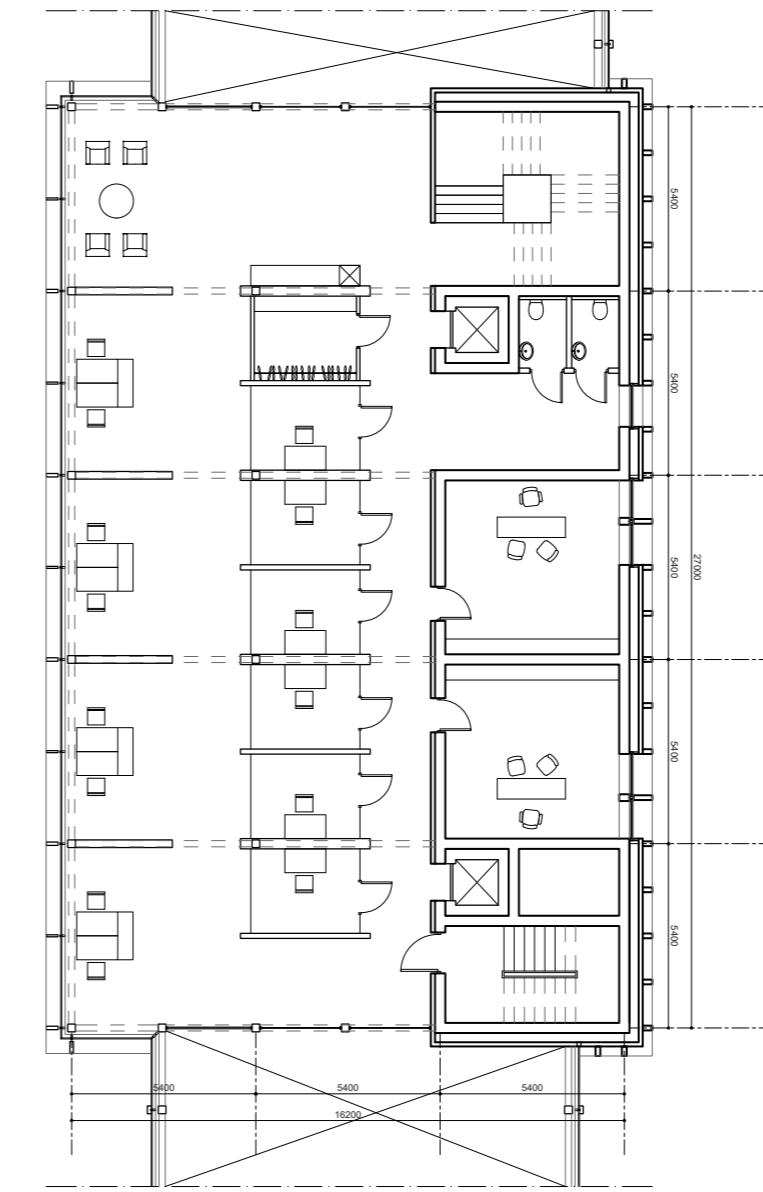
Courtyard



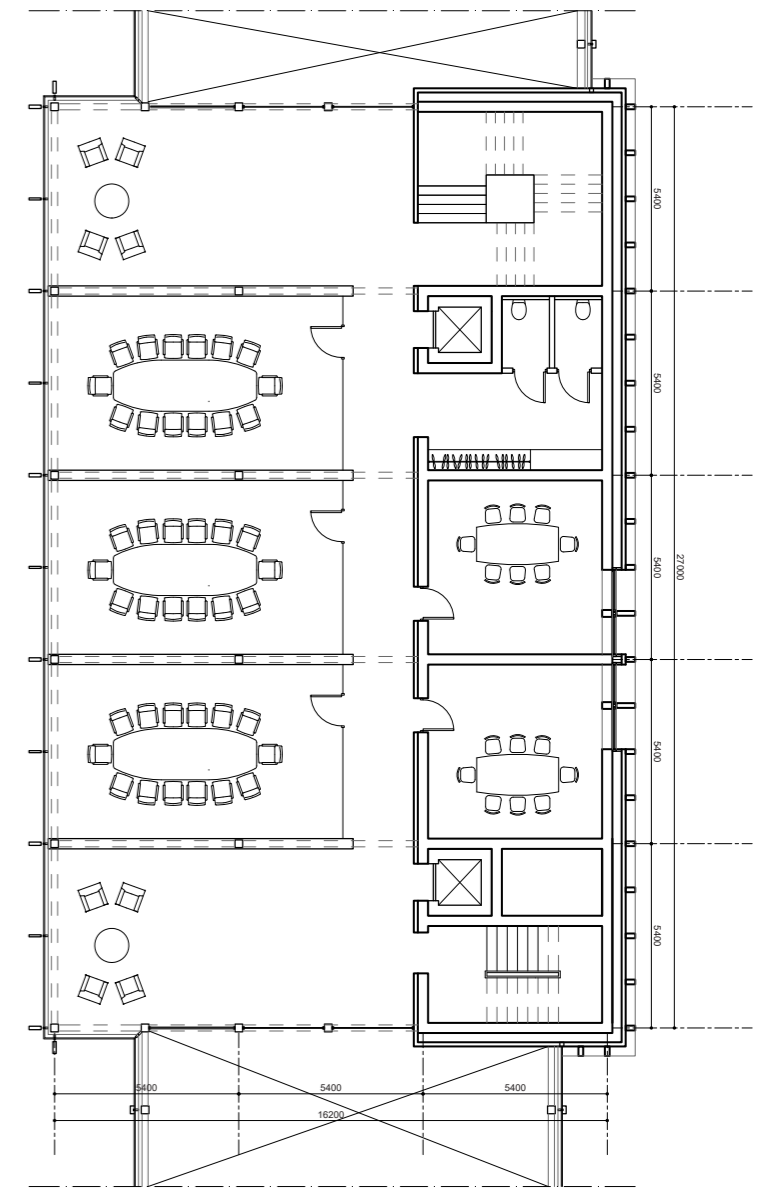




Ground Floor Plan

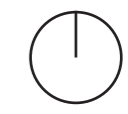


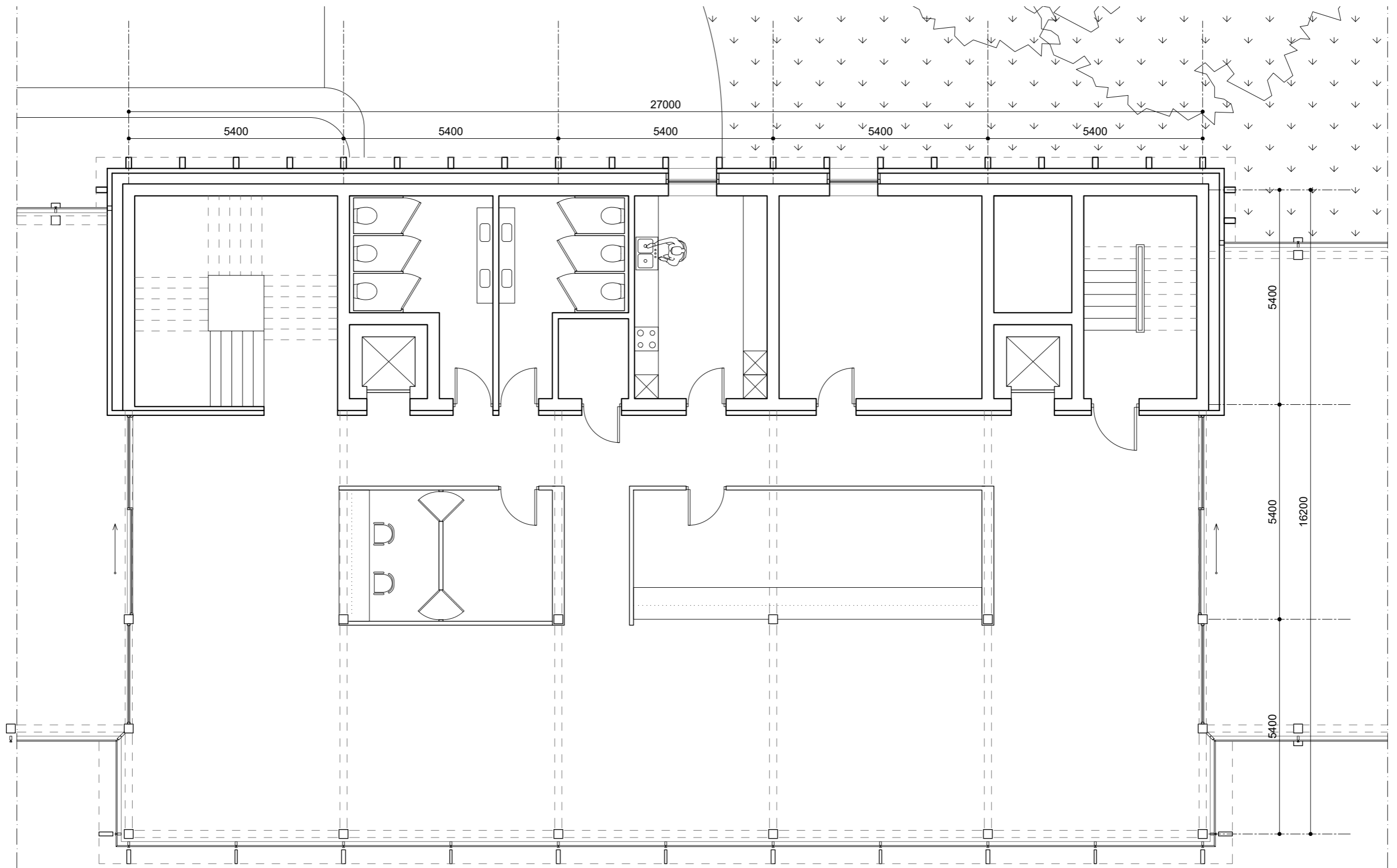
First Floor Plan



Third Floor Plan

Scale 1:200

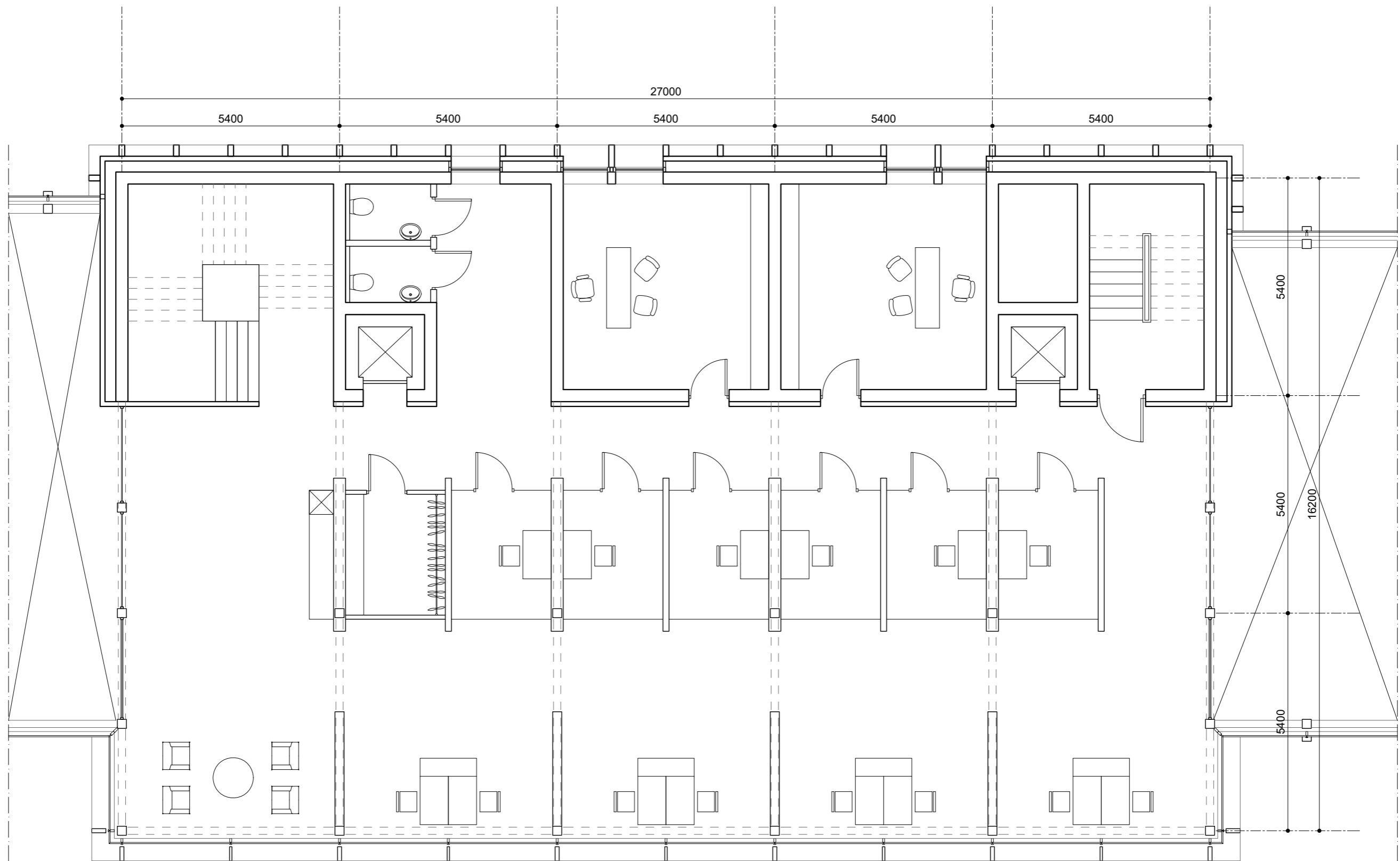




Ground Floor Plan

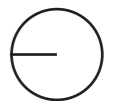
Scale 1:100

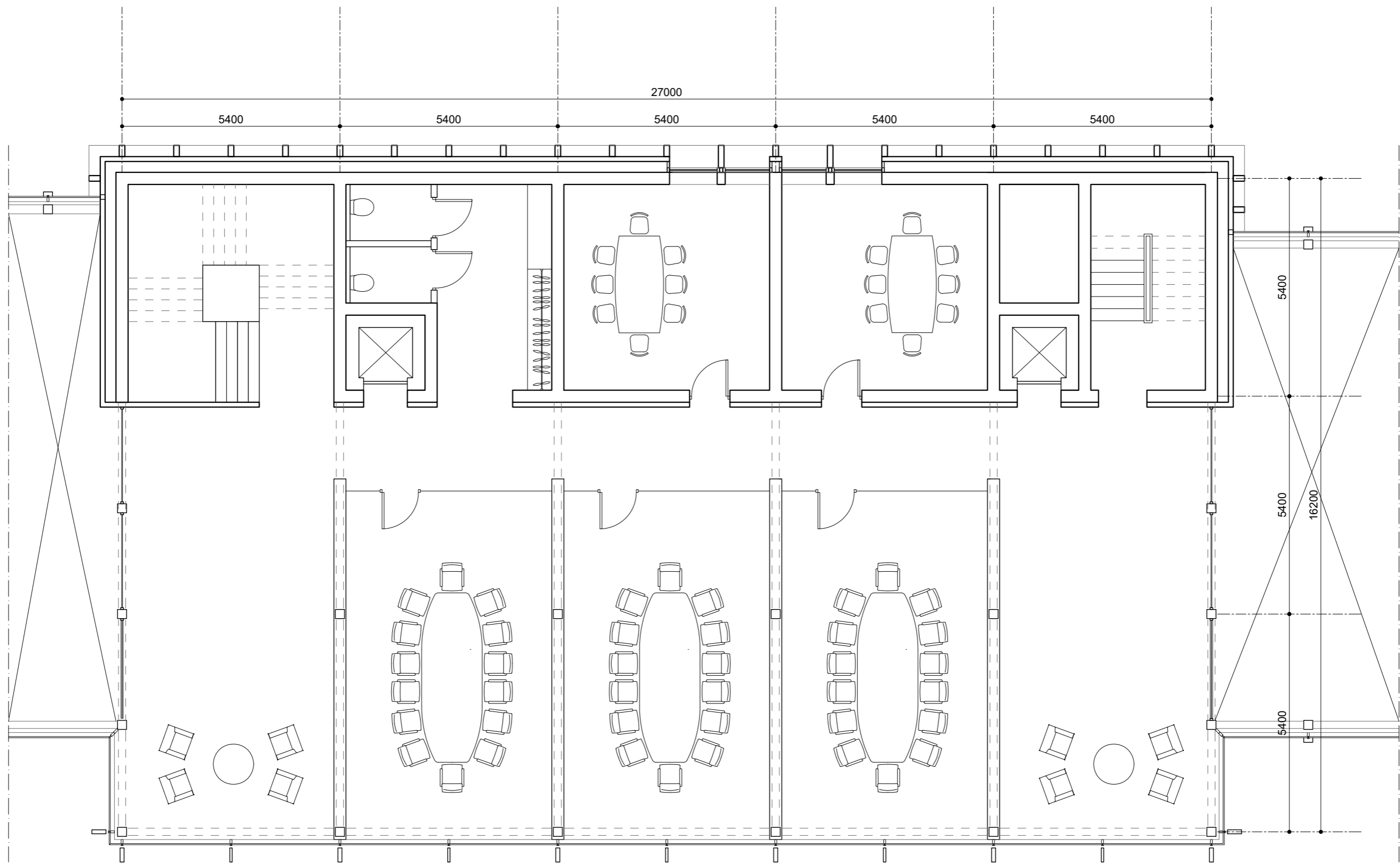




First Floor Plan

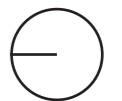
Scale 1:100





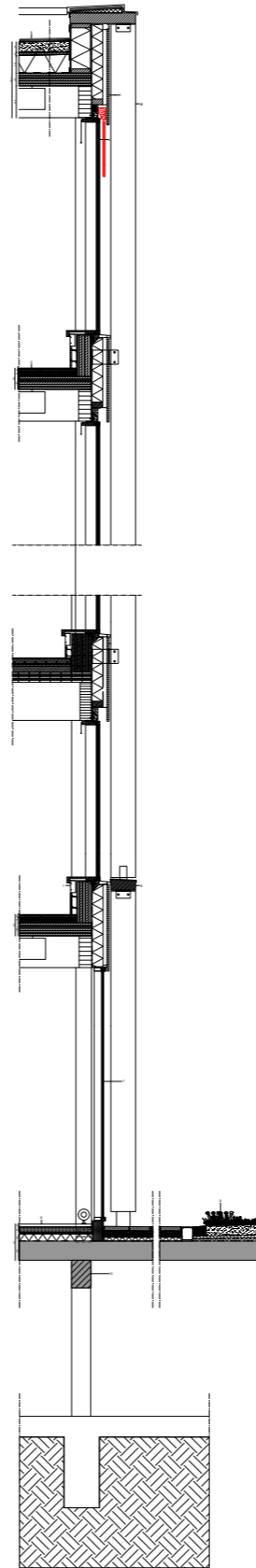
Third Floor Plan

Scale 1:100



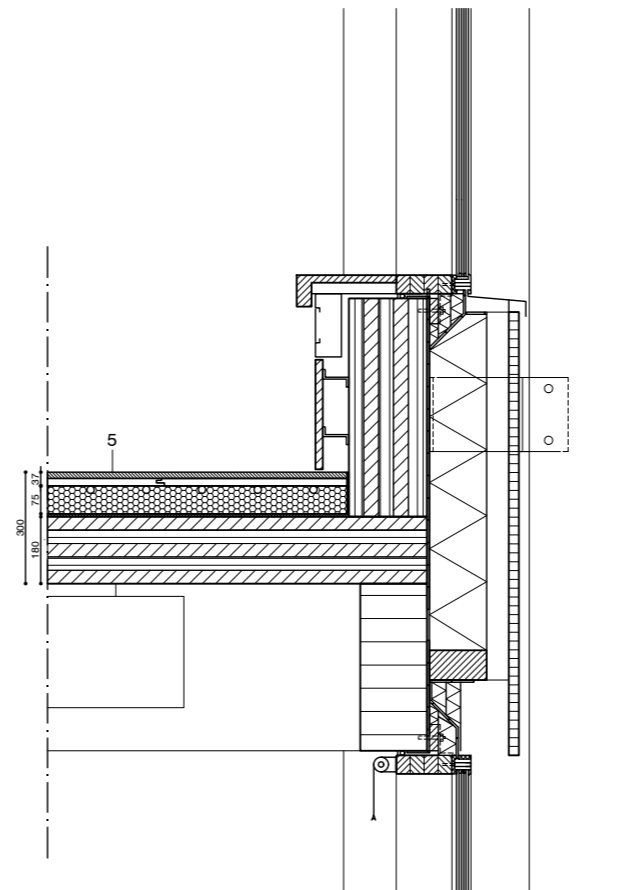
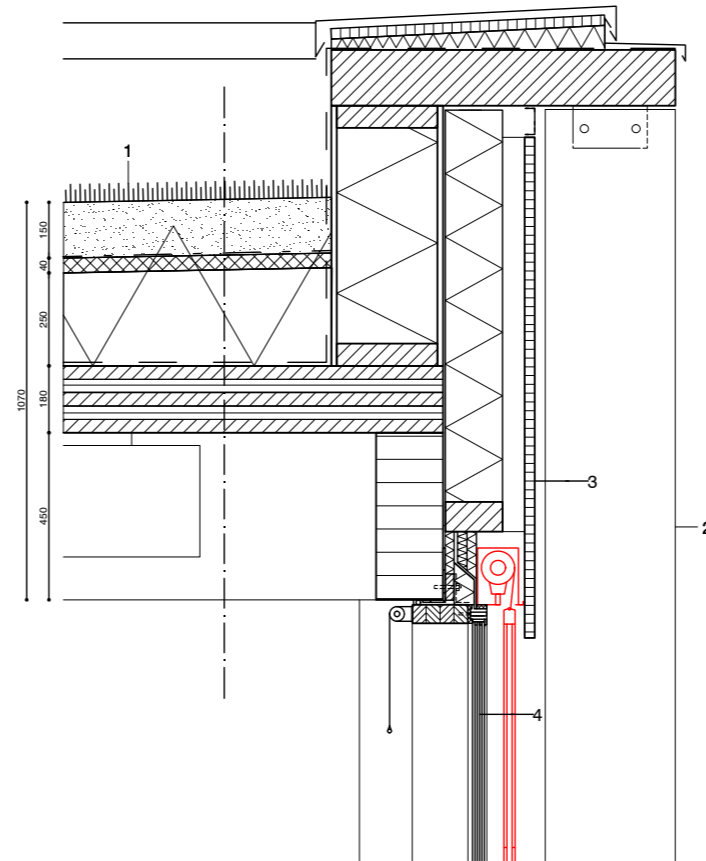


Scale 1:50



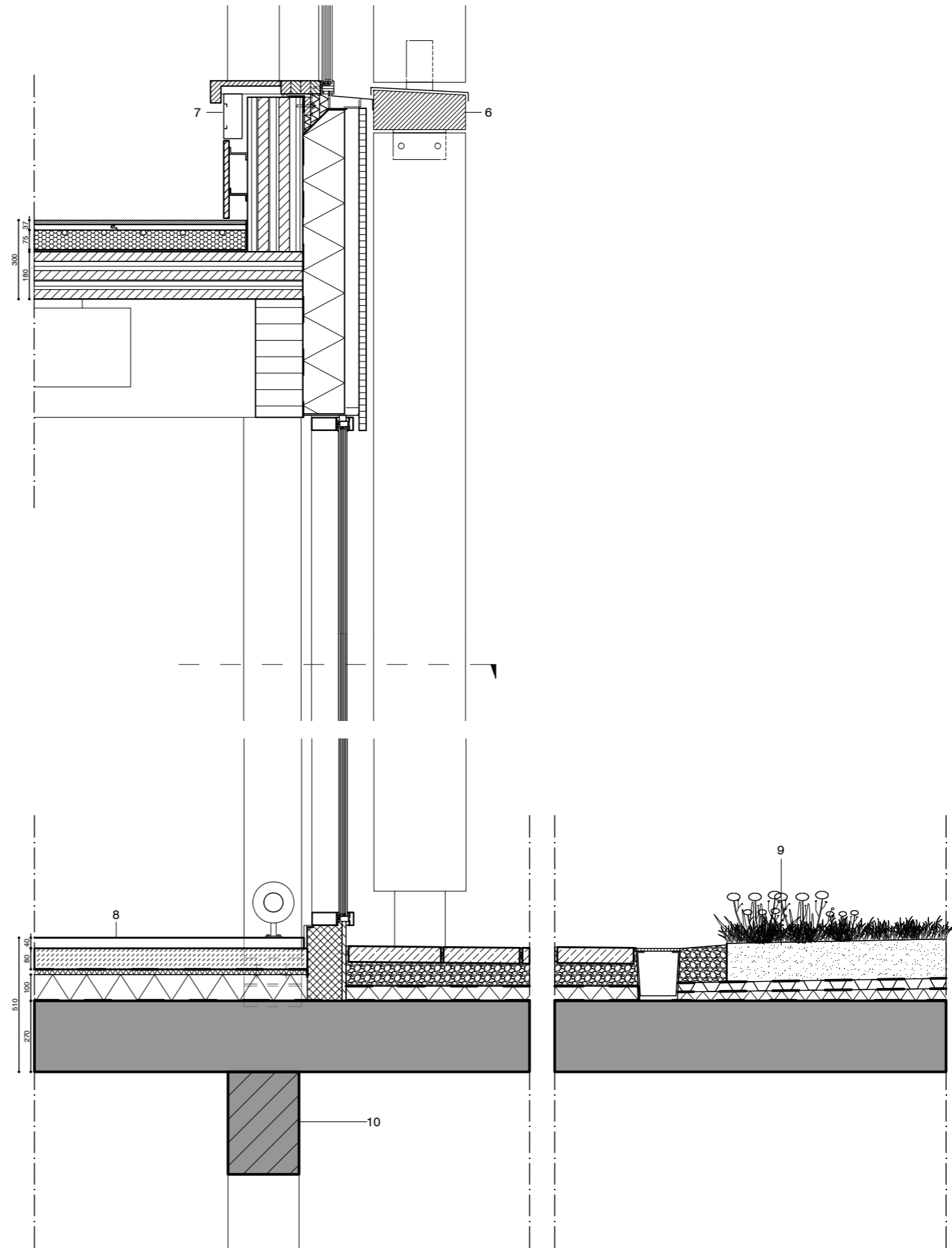
1. extensive greening
 - 150 mm substrate
 - 40 mm drainage layer
 - EPDM sealant
 - 250 mm EPS thermal insulation ($\lambda = 0,038$ (w/mk)) - $R_c: 6,58 \text{ m}^2\text{K/W}$
 - vapour barrier
 - 180 mm CLT ceiling ($\lambda = 0,20$ (w/mk)) - $R_c: 0,9 \text{ m}^2\text{K/W}$
2. 150/350 mm larch lesene
3. Exterior wall construction:
 - 27 mm larch three layer panel
 - 60 mm back ventilation
 - wind barrier
 - 160 mm thermal insulation
 - vapour barrier
 - 180\450 mm glulam beam
4. Triple glazing in spruce/aluminium post beam construction
5. Floor:
 - 17 mm parquet flooring
 - 20 mm CellEcta screedboard
 - Ultraplate (aluminium heat diffuser plate)
 - 150 mm High compressive strength routed XPS insulation
 - 8 mm Fibrefon, high performance resilient layer
 - 180 mm CLT floor

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Scale 1:20

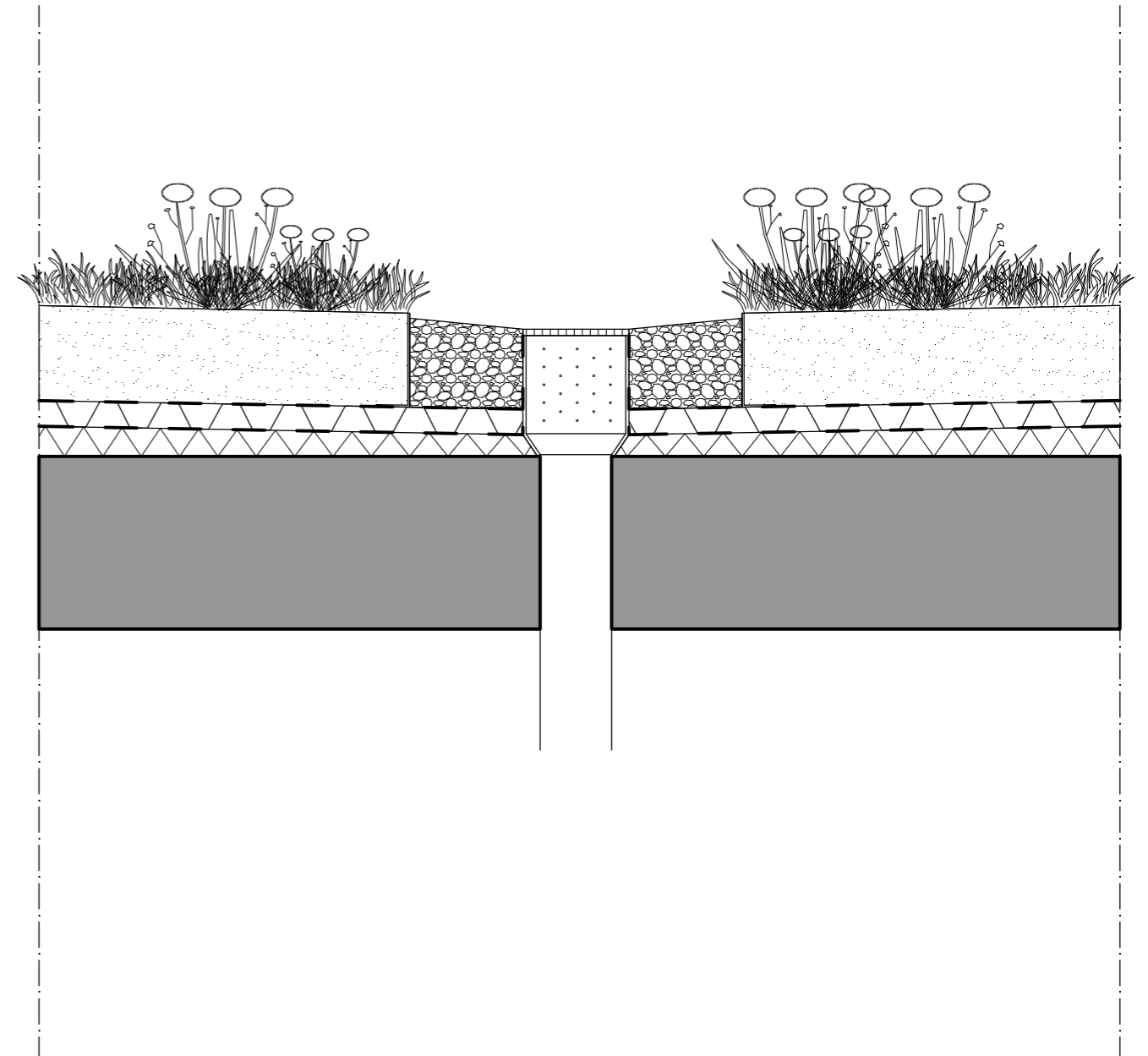
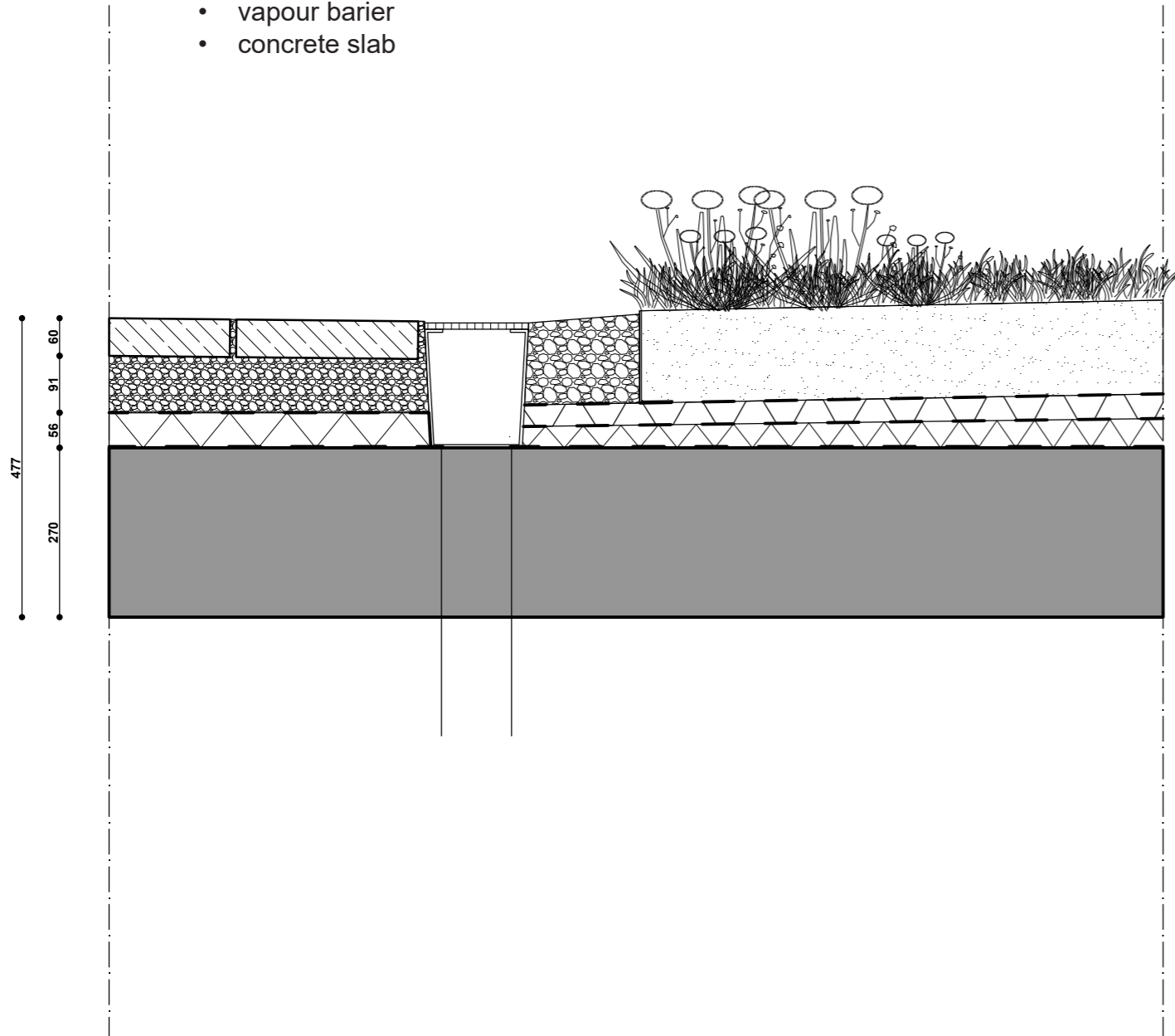
- 6. Large Mullion with sheet metal coping
- 7. Cable duct
- 8. Floor construction:
 - 40 mm stone flooring
 - 80 mm cement and sand
 - smoothed
 - floated screed
 - polythene separating layer
 - 100 mm EPS insulation
 - waterproofing layer
 - 300 mm reinf. conc. floor slab
- 9. Semi-intensive greenroof:
 - vegetation (grass, wildflowers and herbs)
 - soil (150mm-200mm)
 - filter layer
 - drainage/reservoir (40mm)
 - root-resistant waterproof membrane
 - XPS insulation
 - vapour barrier
 - concrete slab
- 10. 400/270 precast concrete beam

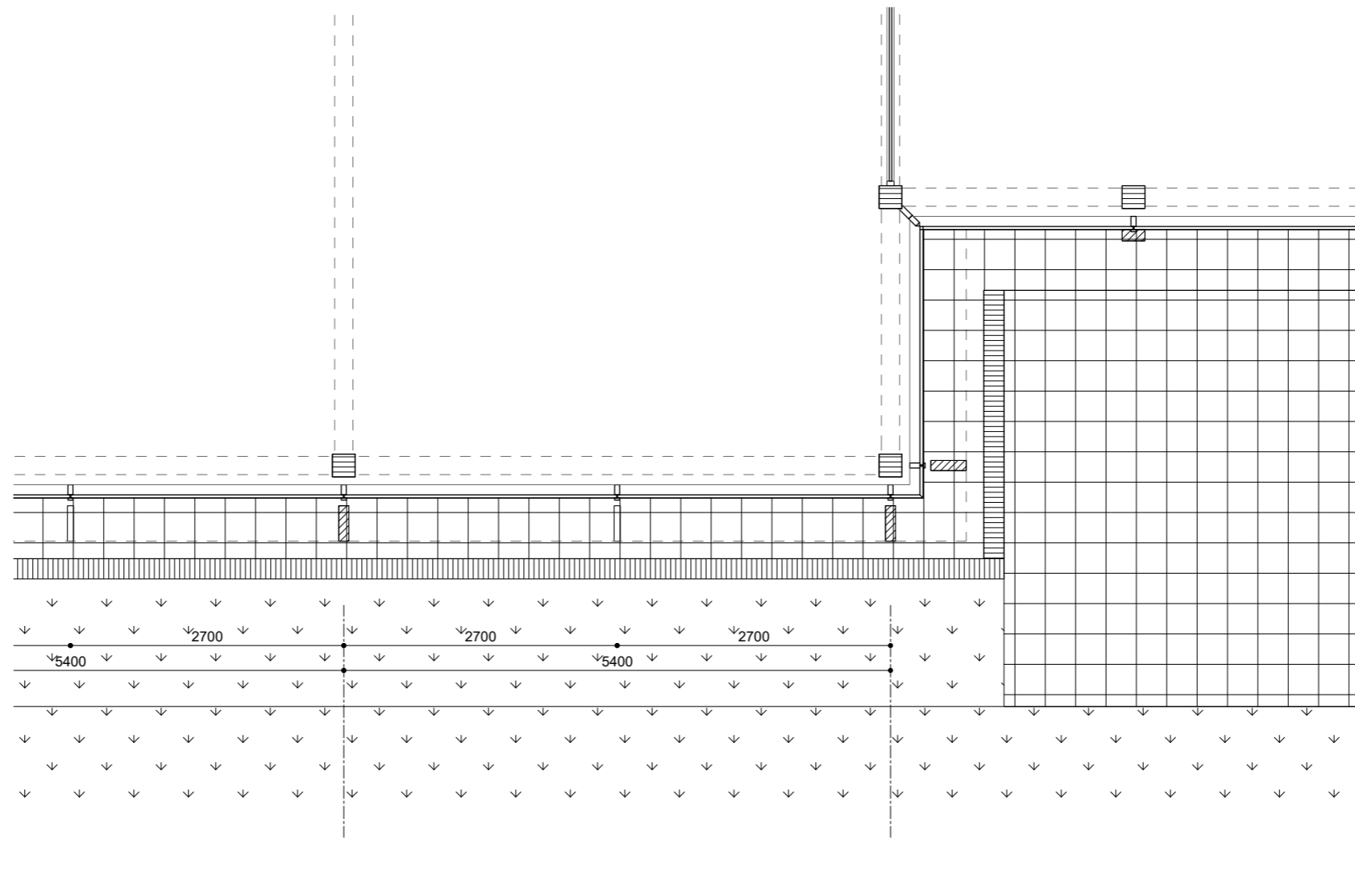


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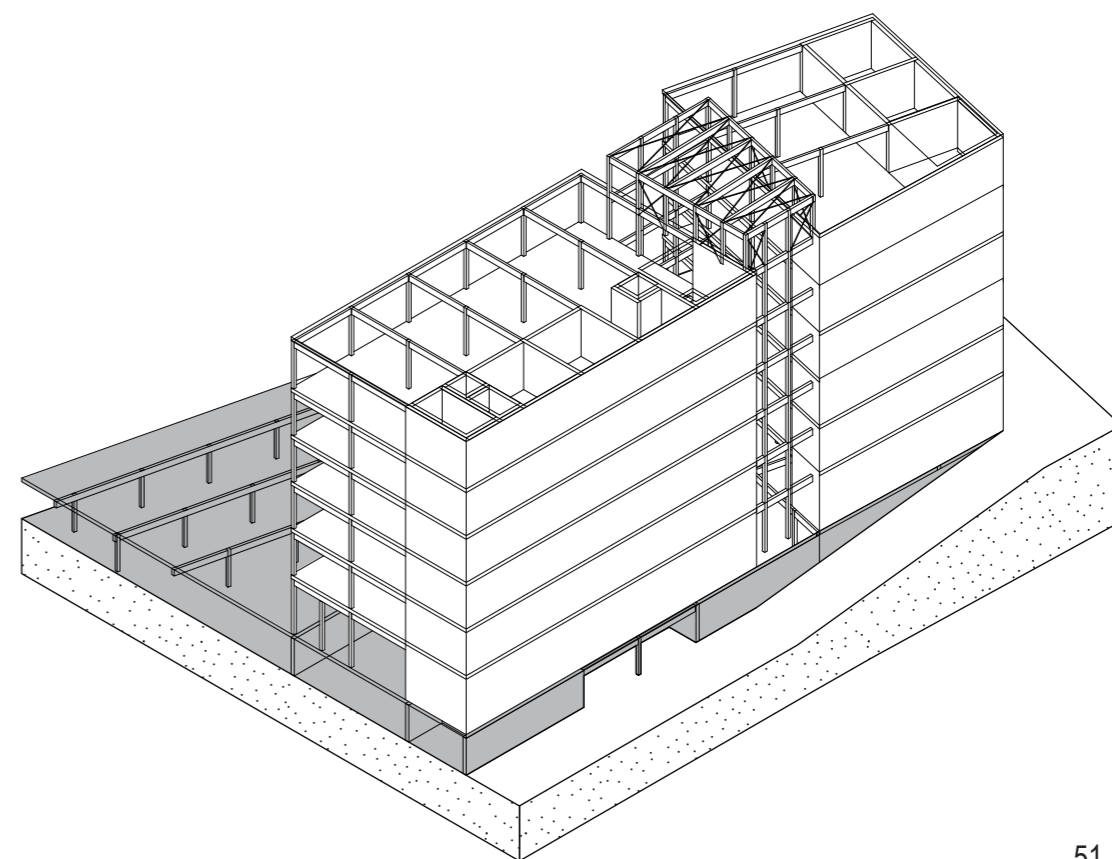
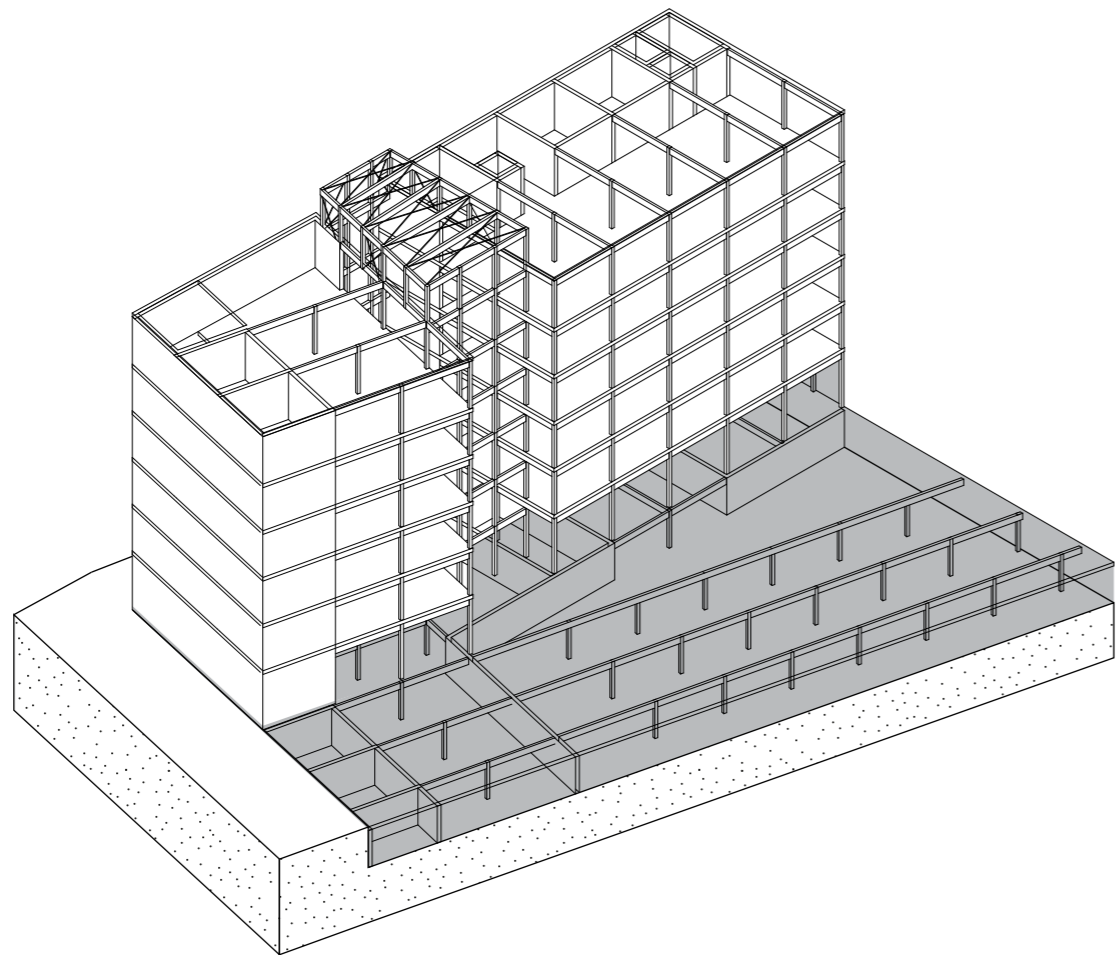
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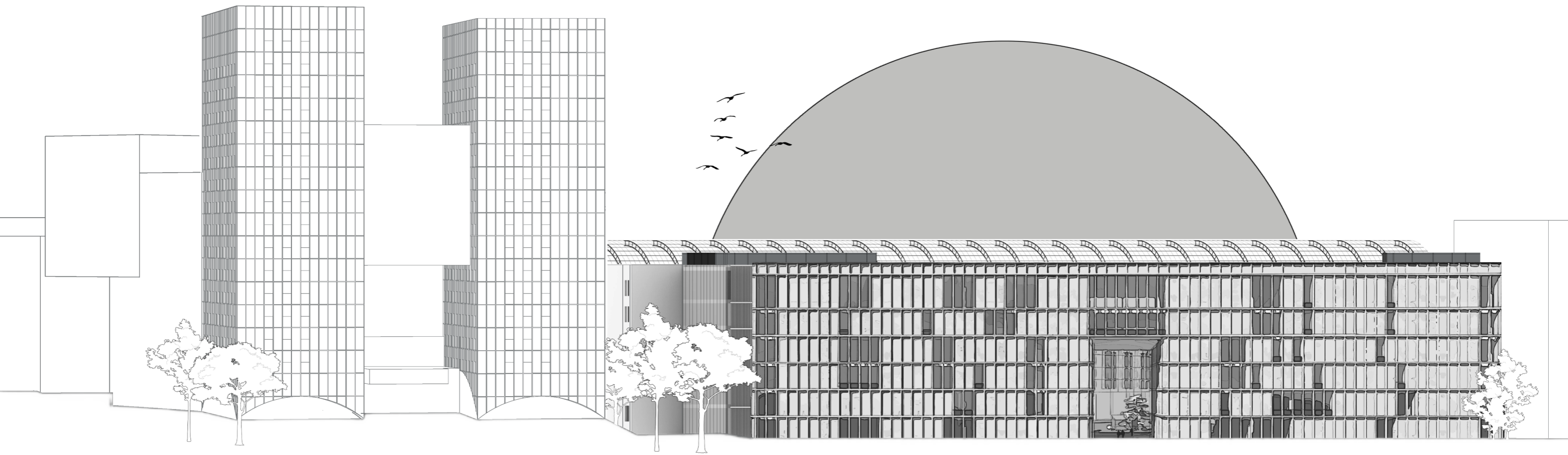


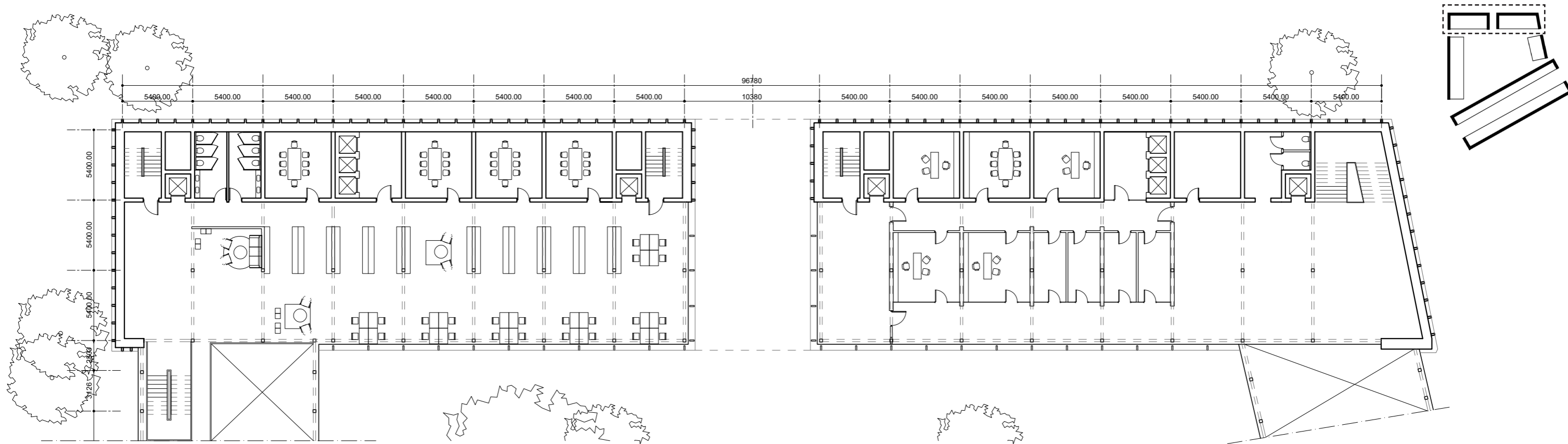


Scale 1:50

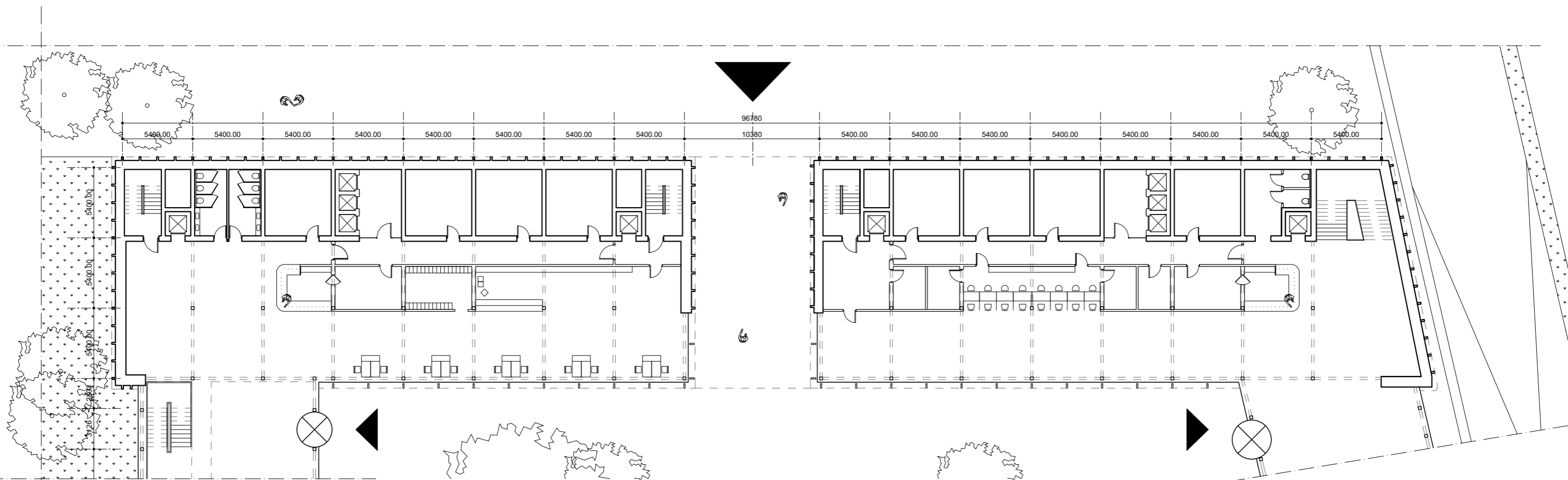


Scale 1:500





First Floor Plan

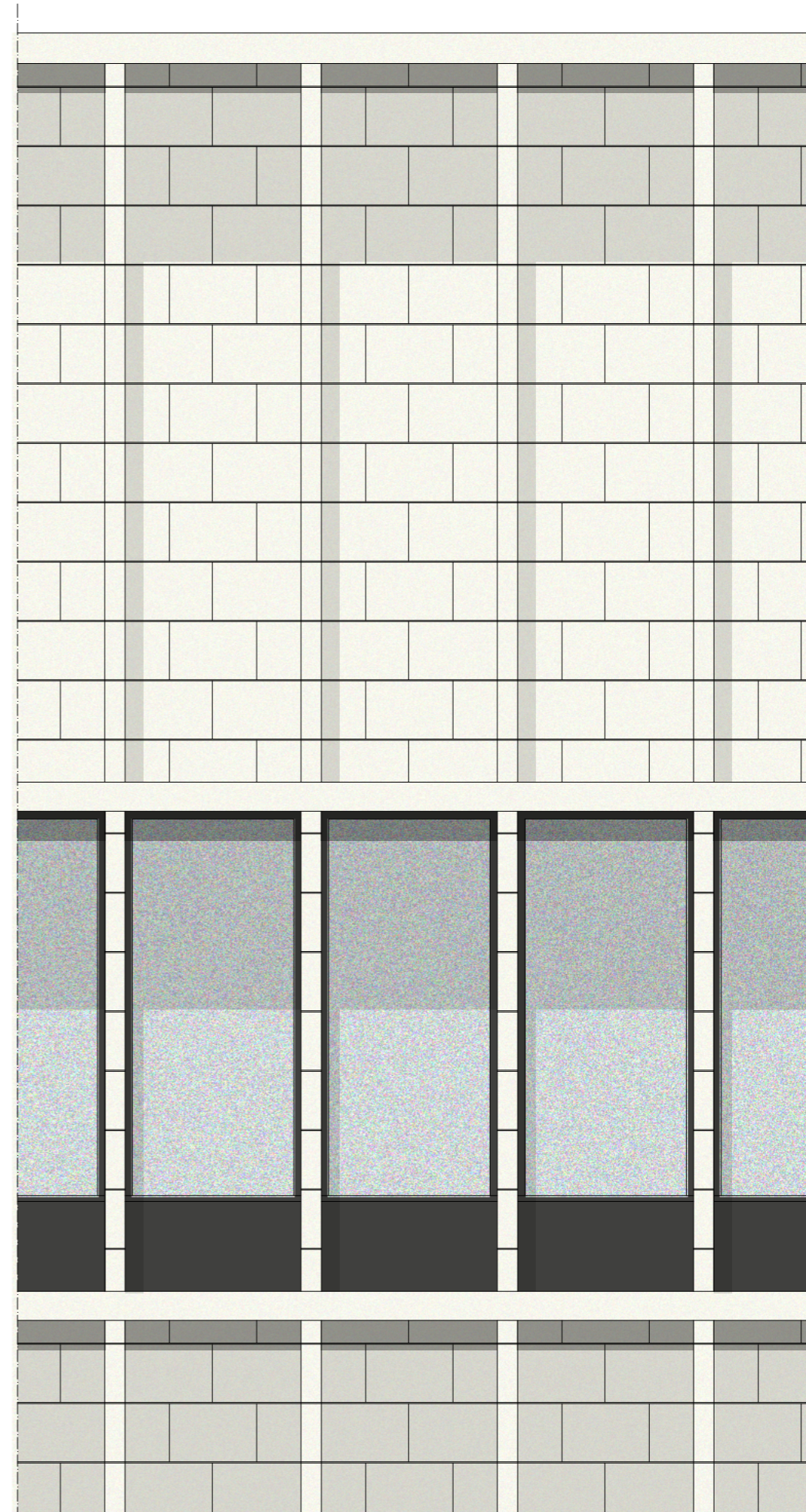
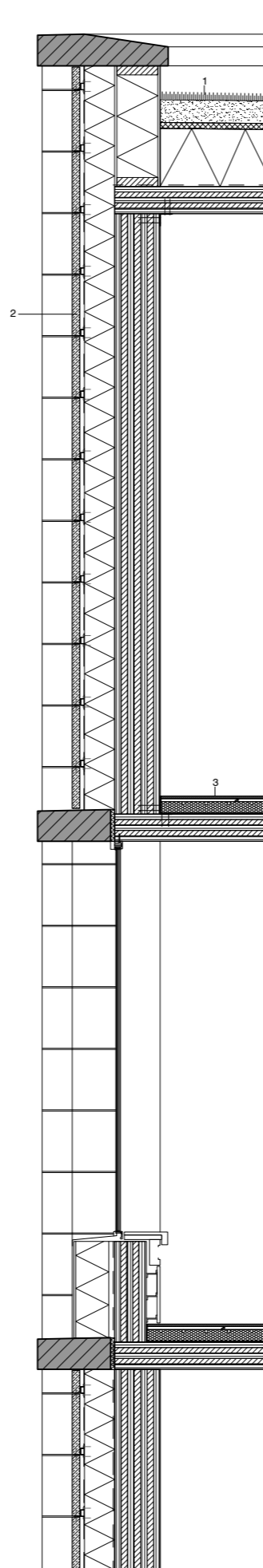


Ground Floor Plan

Scale 1:300

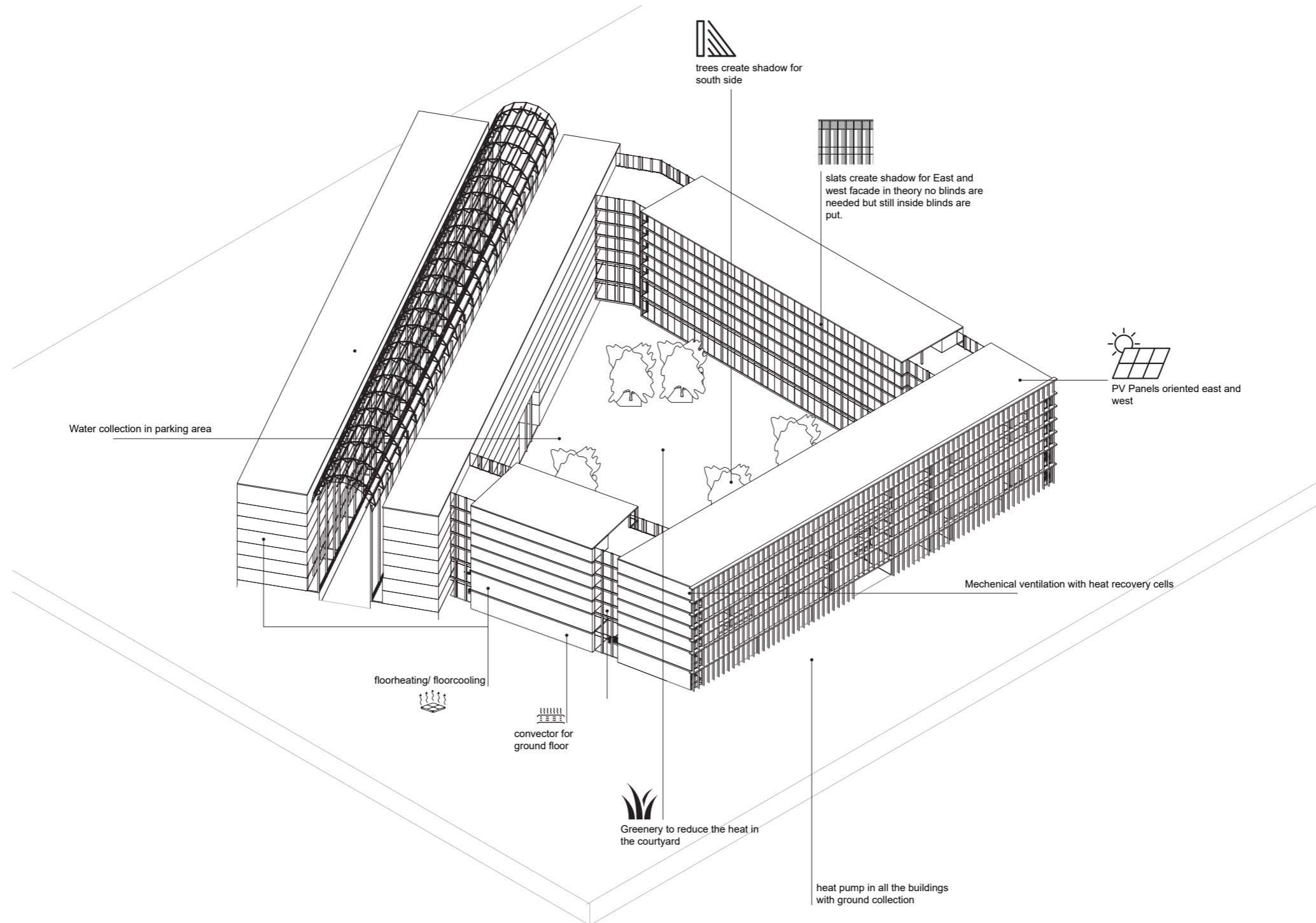


1. extensive greening
 - 150 mm substrate
 - 40 mm drainage layer
 - EPDM sealent
 - 250 mm EPS thermal insulation ($\lambda = 0,038$ (w/mk)) - Rc: 6,58 m²K/W
 - vapour barrier
 - 180 mm CLT ceiling ($\lambda = 0,20$ (w/mk)) - Rc: 0,9 m²K/W
2. Facade: (outside - inside)
 - 50 mm Orgita dolomite limestone panels (Manufacturer: Reval Stones)
 - 30 mm airgap
 - Waterproofing layer
 - 200 mm Rockwool insulation
 - vapour barrier
 - 300 mm CLT wall ($\lambda = 0,20$ (w/mk)) - Rc: 1,5 m²K/W
 - plaster
3. Floor:
 - 17 mm parquet flooring
 - 20 mm CellEcta screedboard
 - Ultraplate (aluminium heat diffuser plate)
 - 150 mm High compressive strength routed XPS insulation
 - 8 mm Fibrefon, high performance resilient layer
 - 180 mm CLT floor



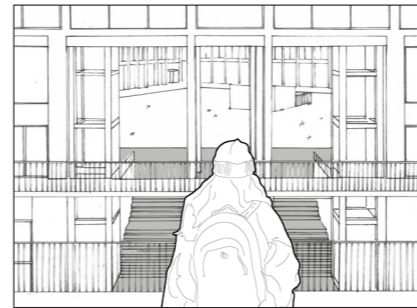
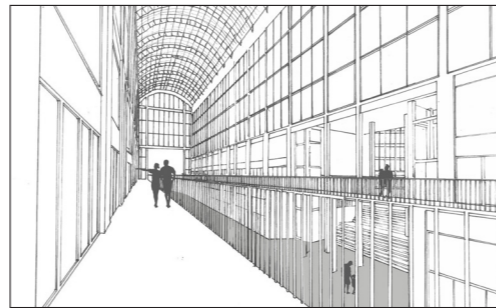
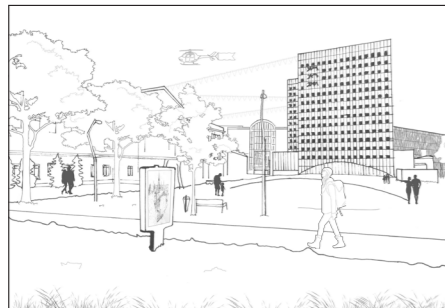
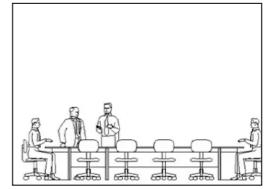
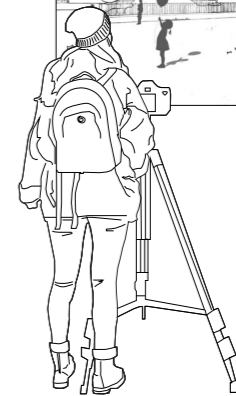
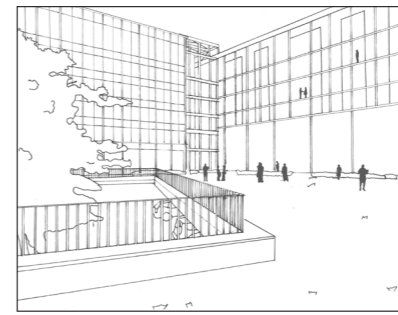
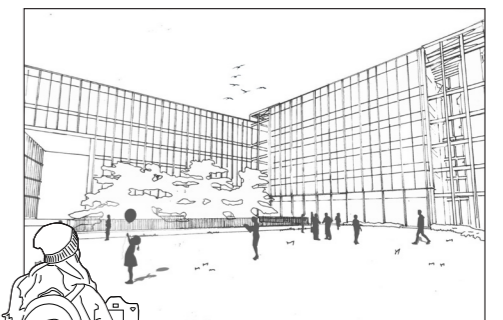
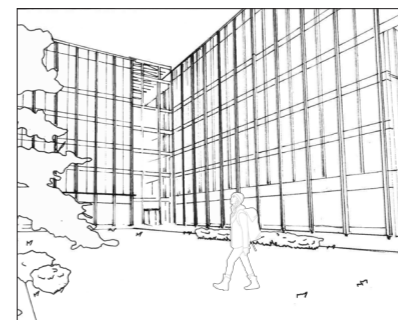
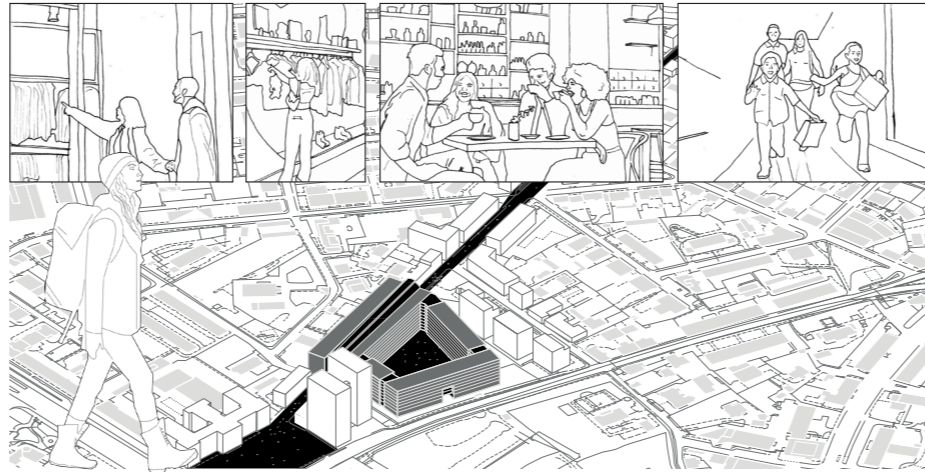
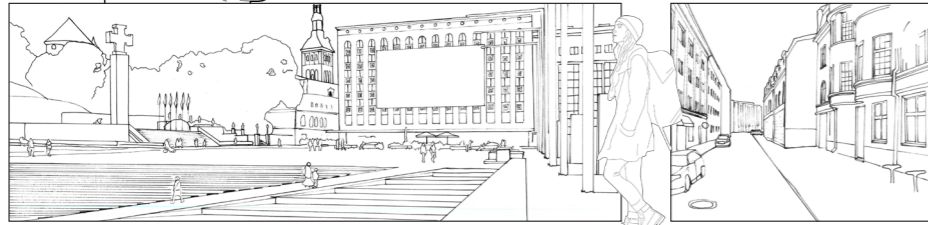
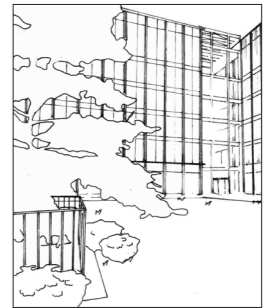
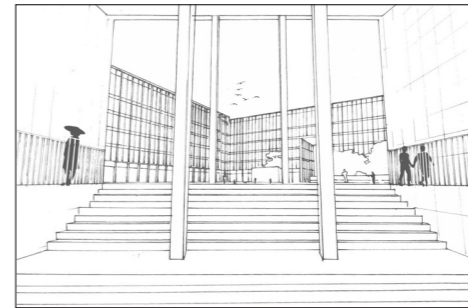
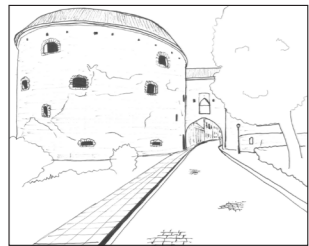
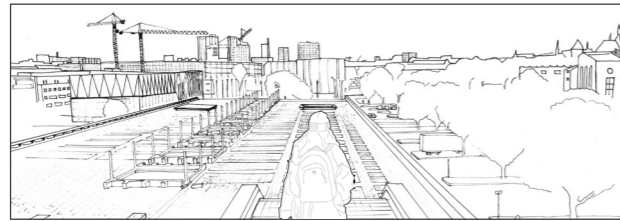
Scaled to 1:40

Climate





The Road to
Tallinna
Arkaad



The End?...

