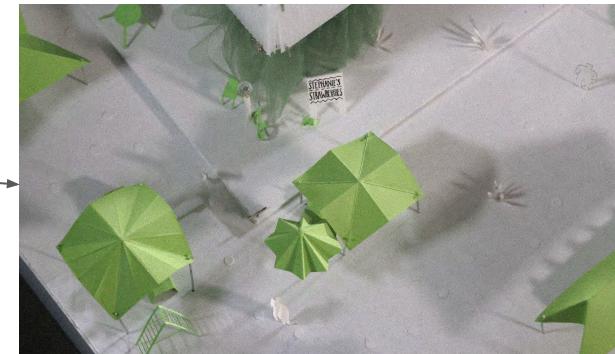
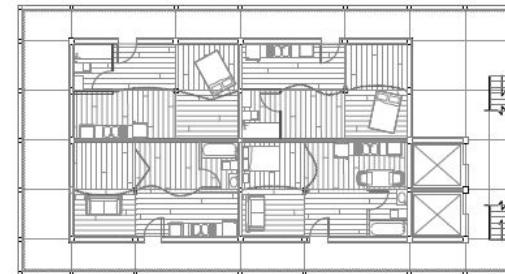
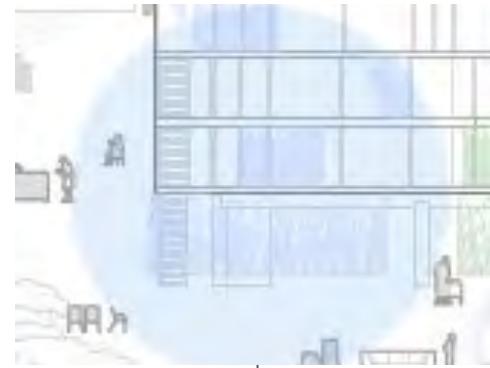


# Incremental Zoning



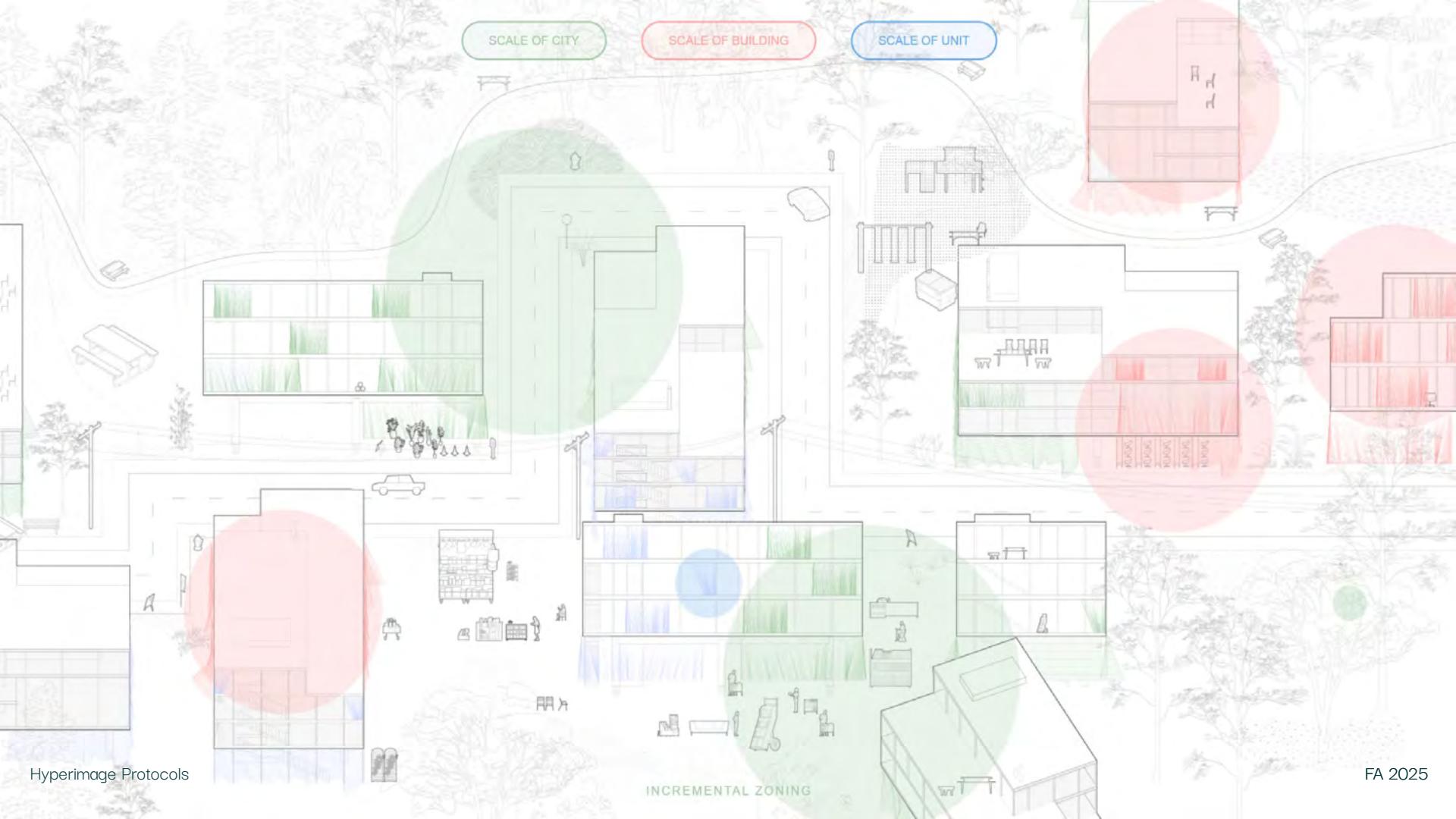


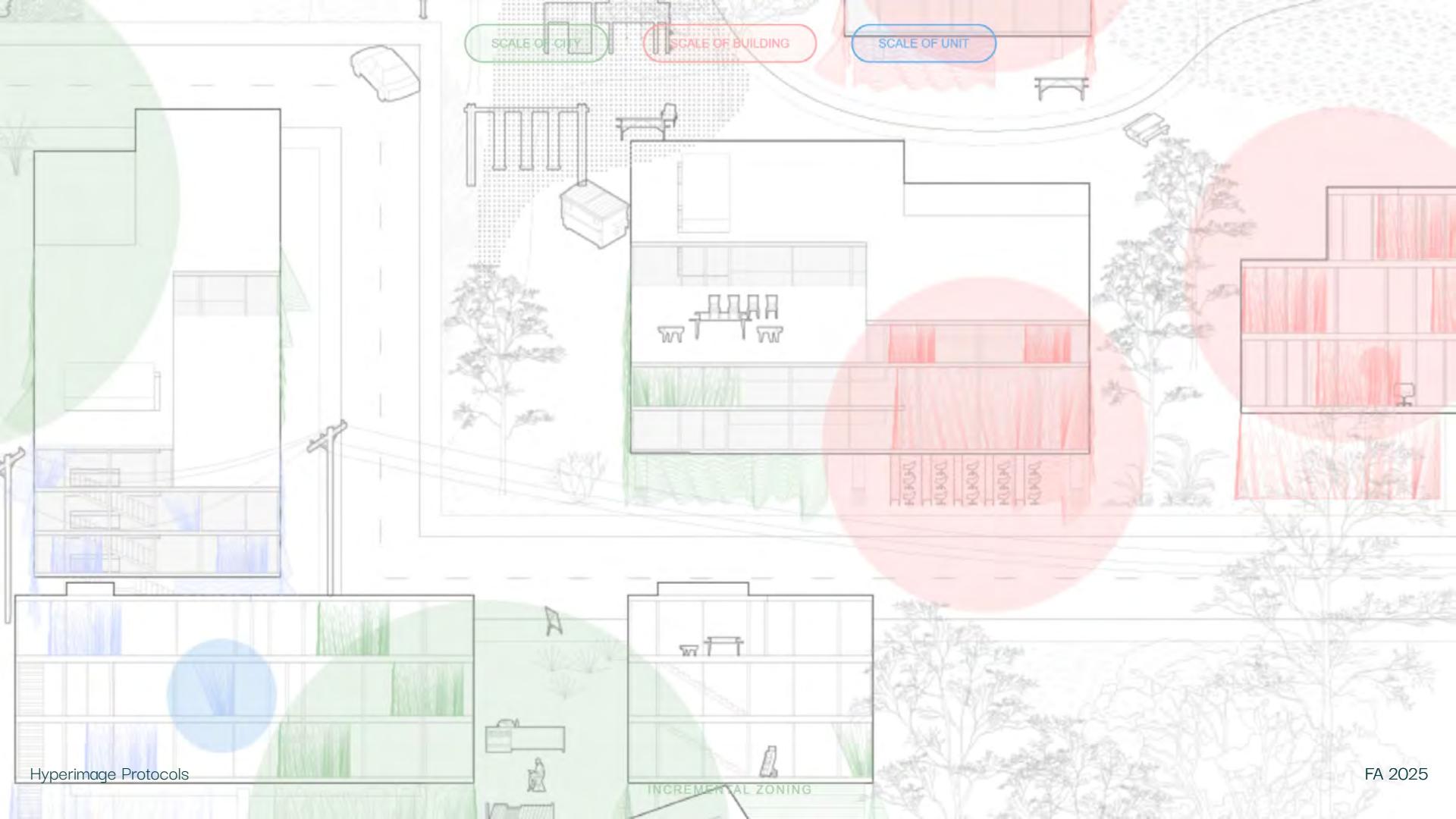


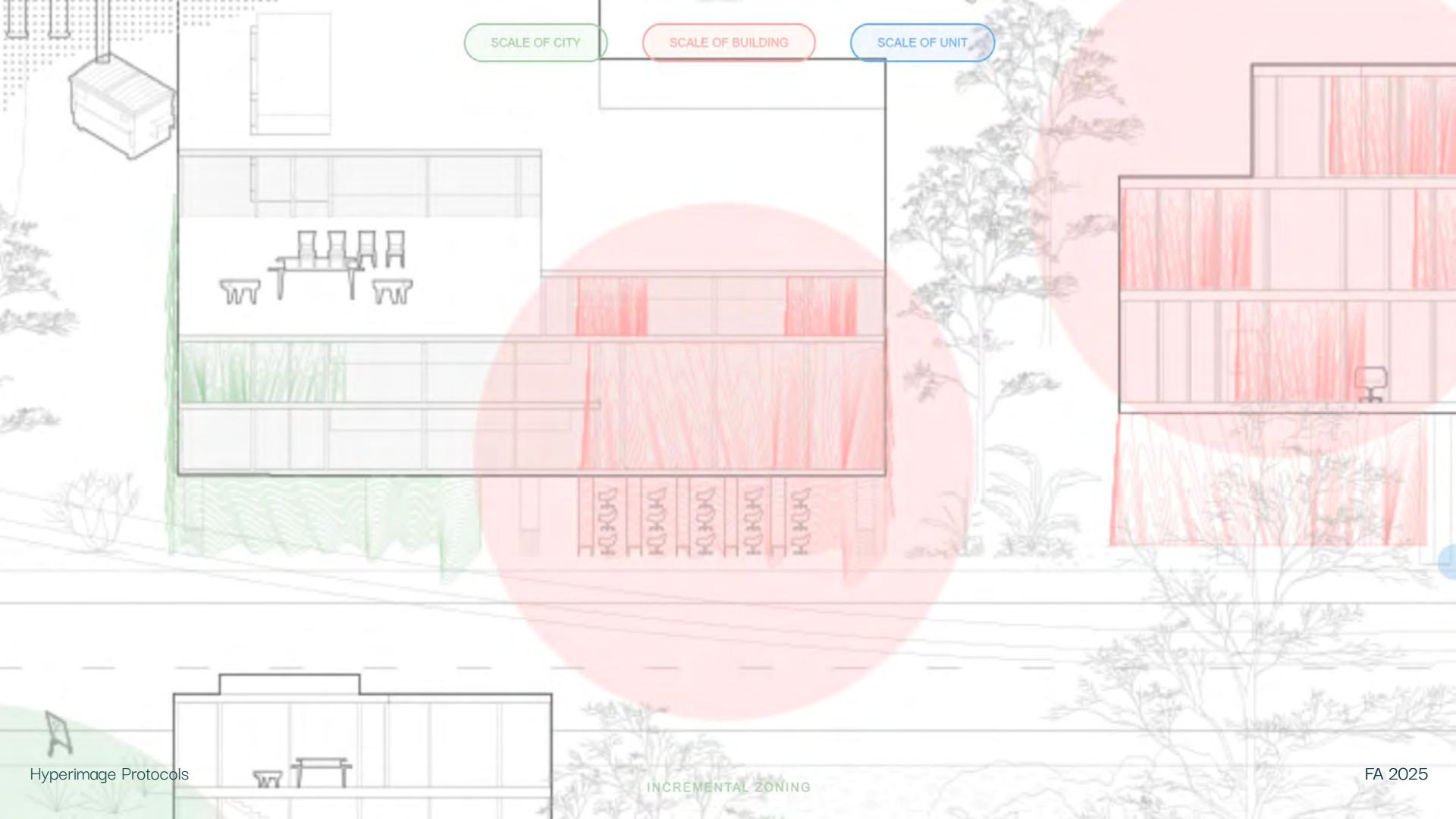


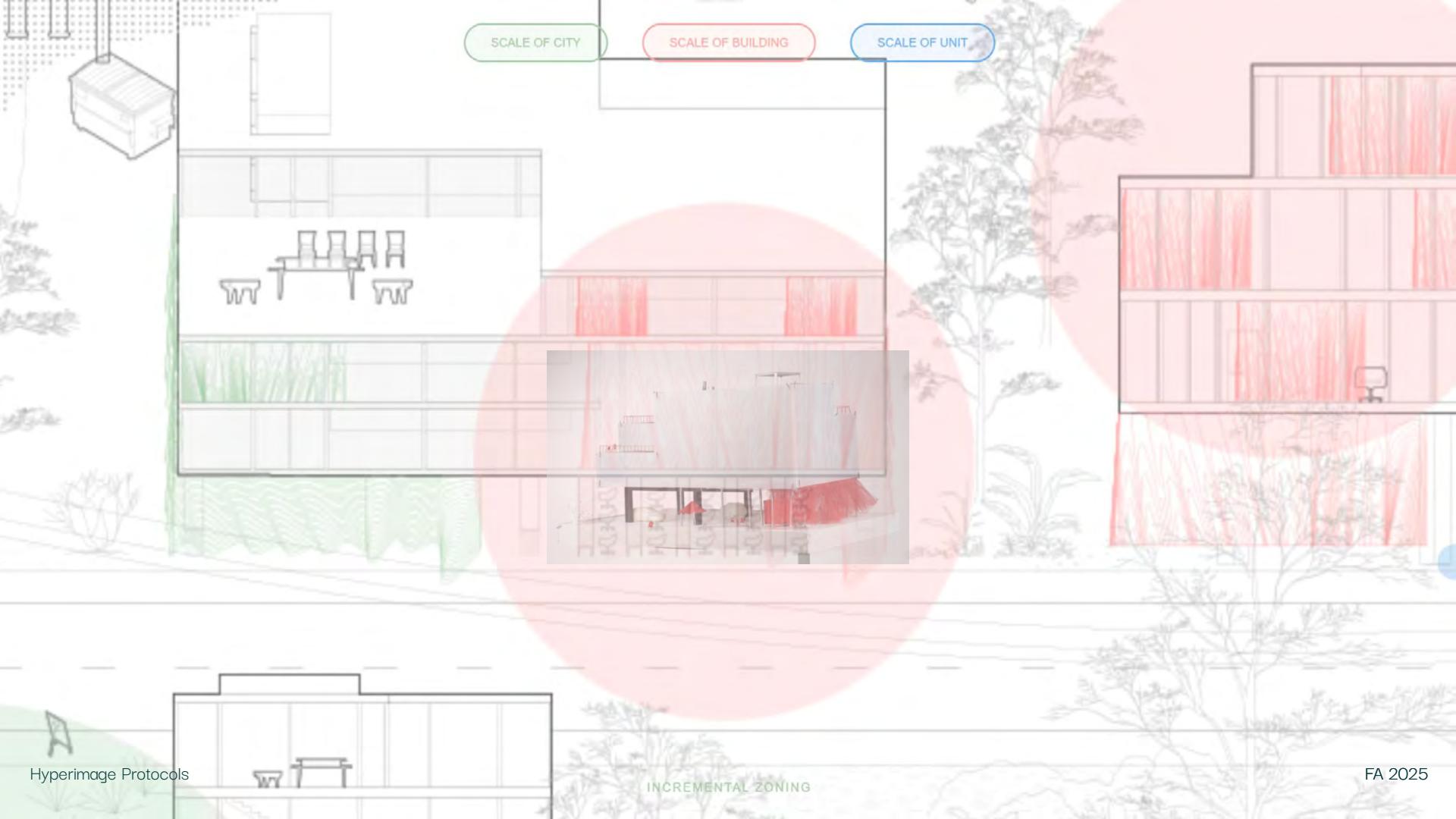
## Incremental Zoning:

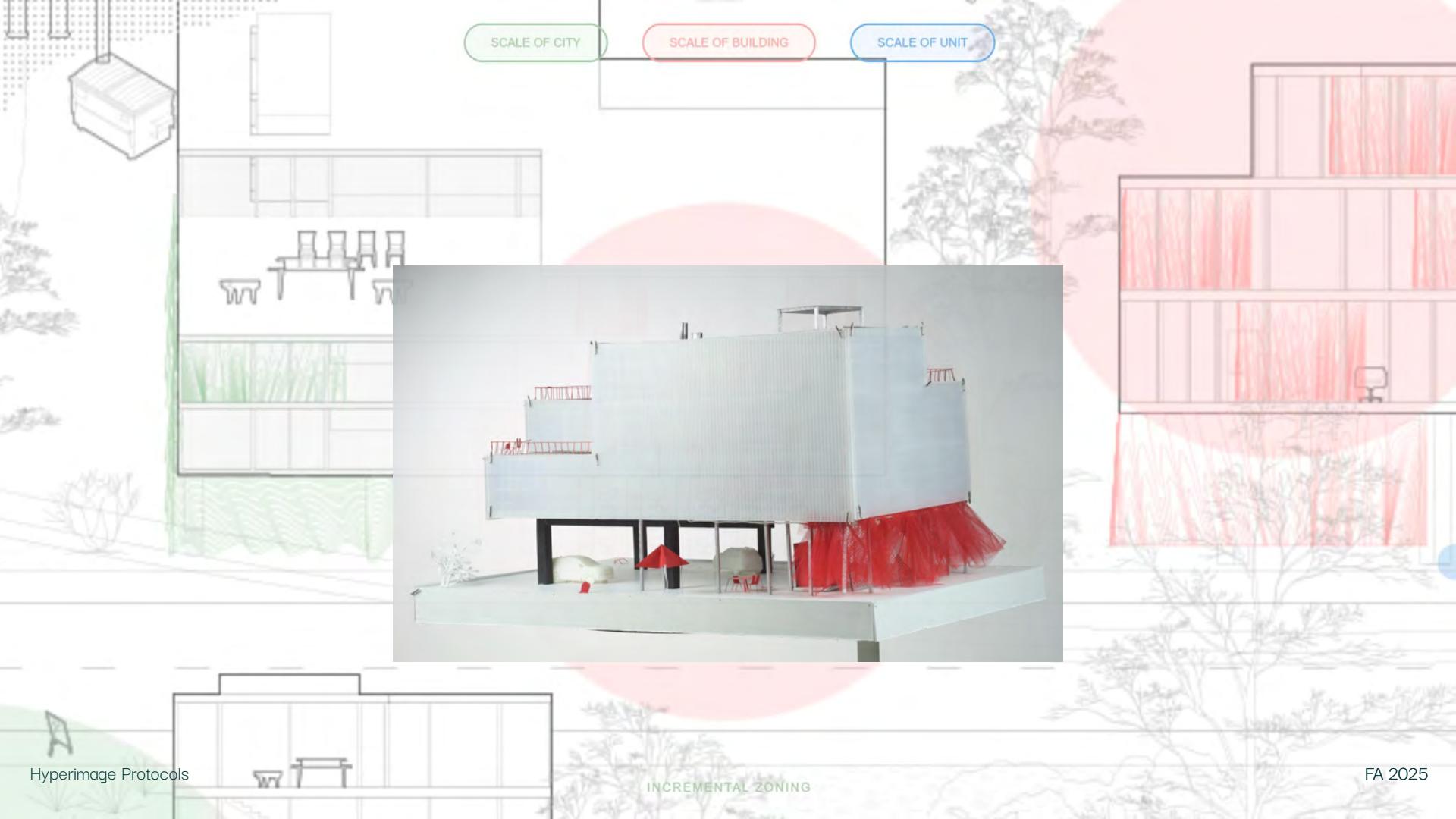
<https://sps249.github.io/Website-1/>

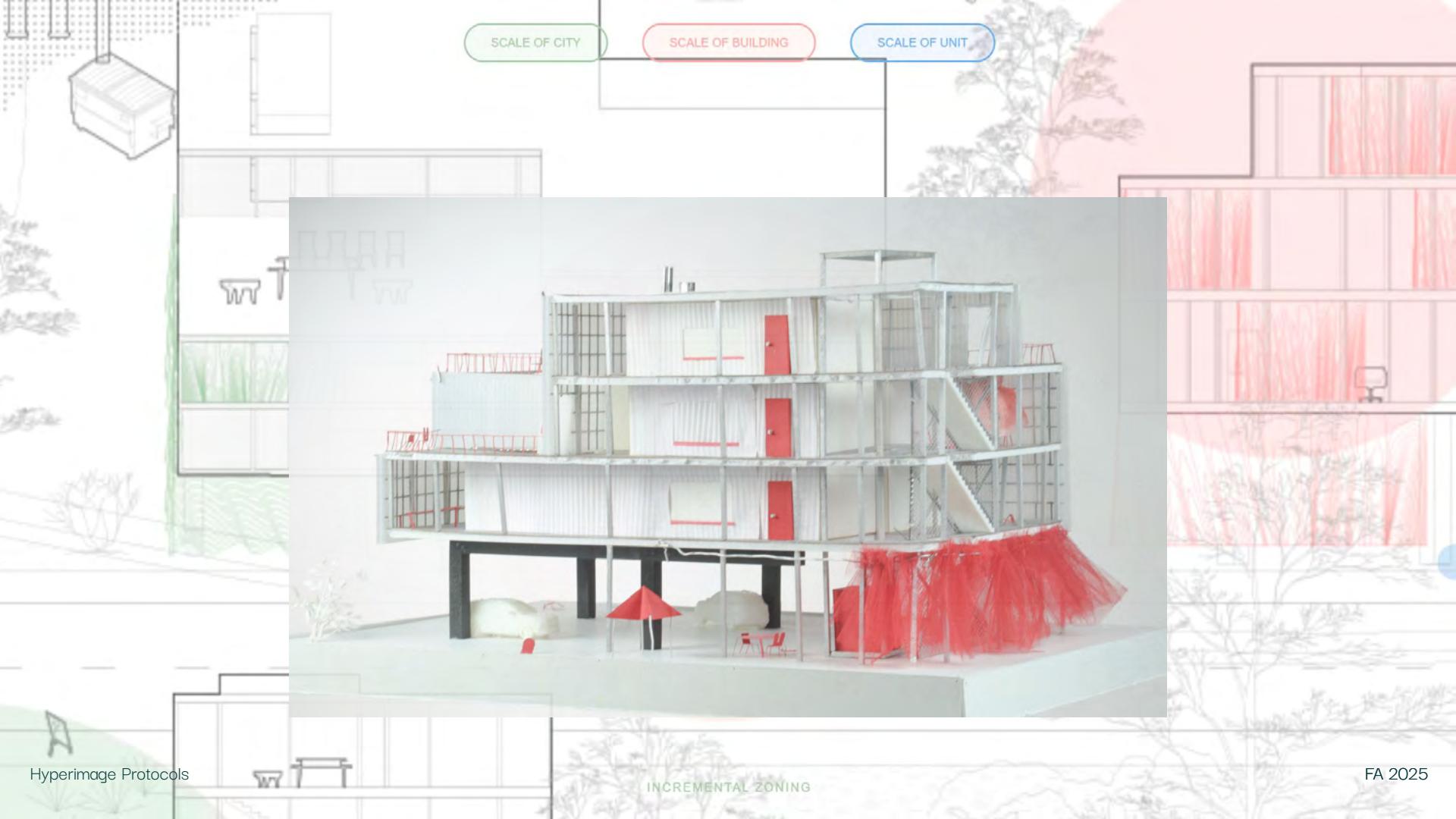


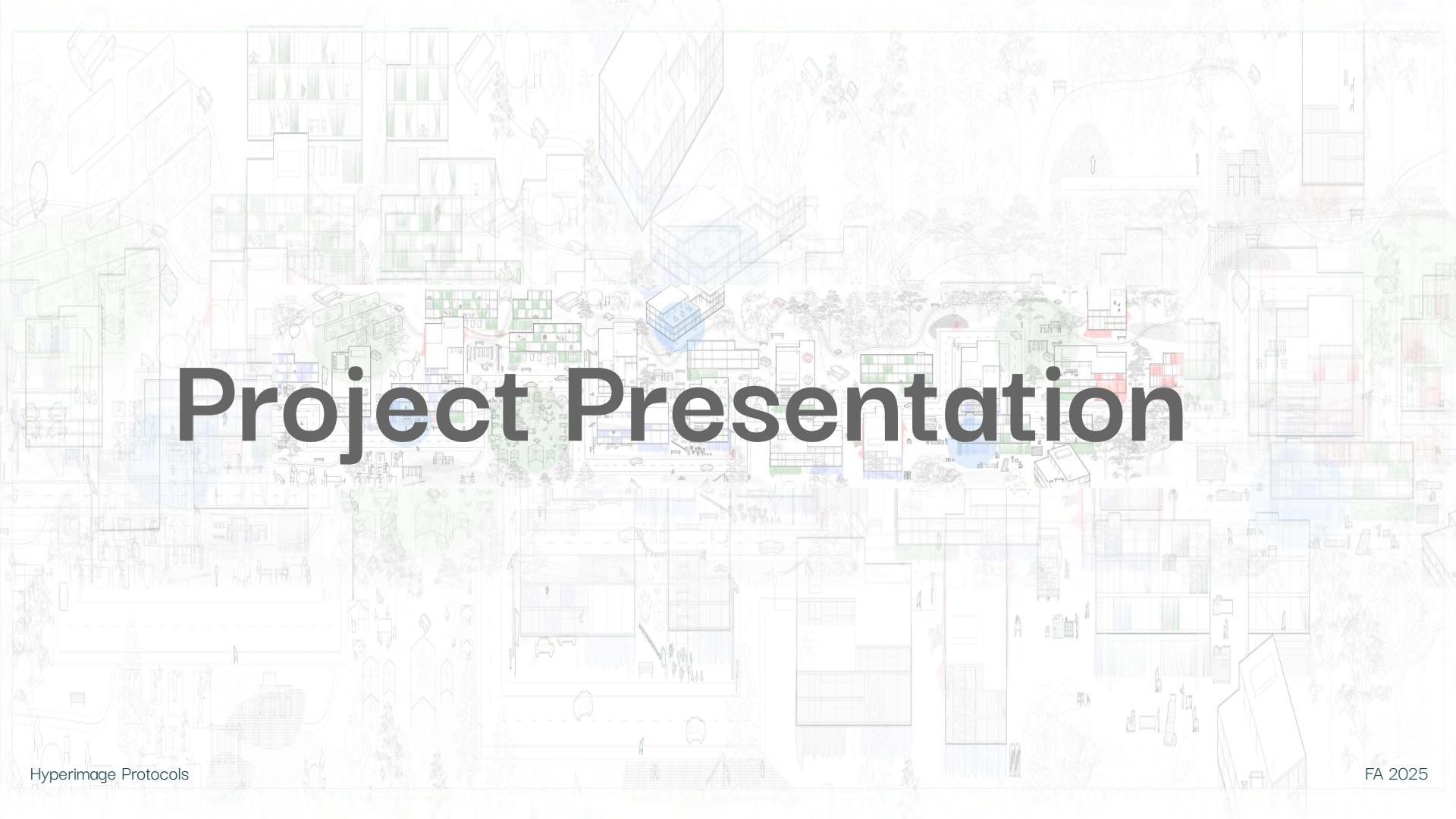




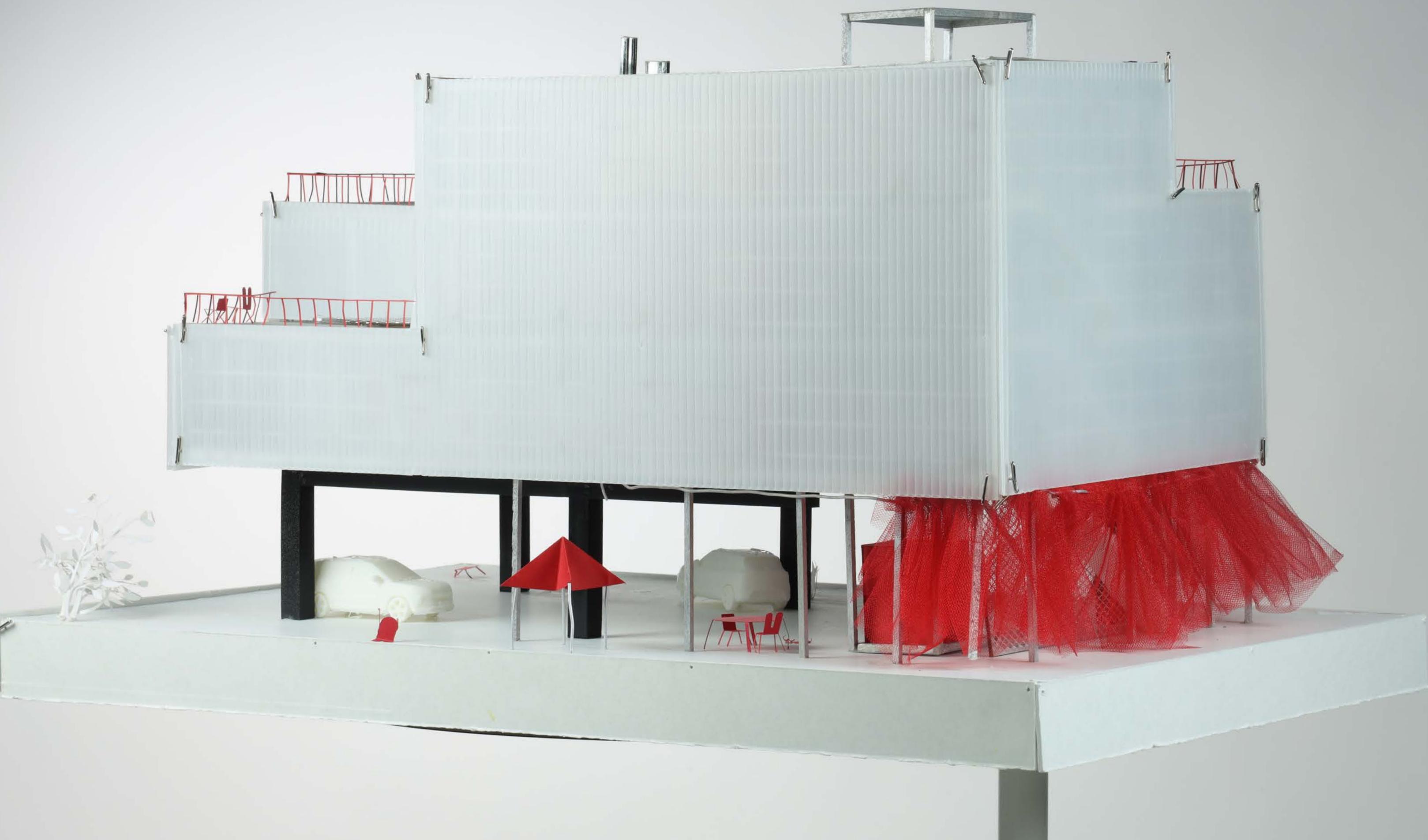


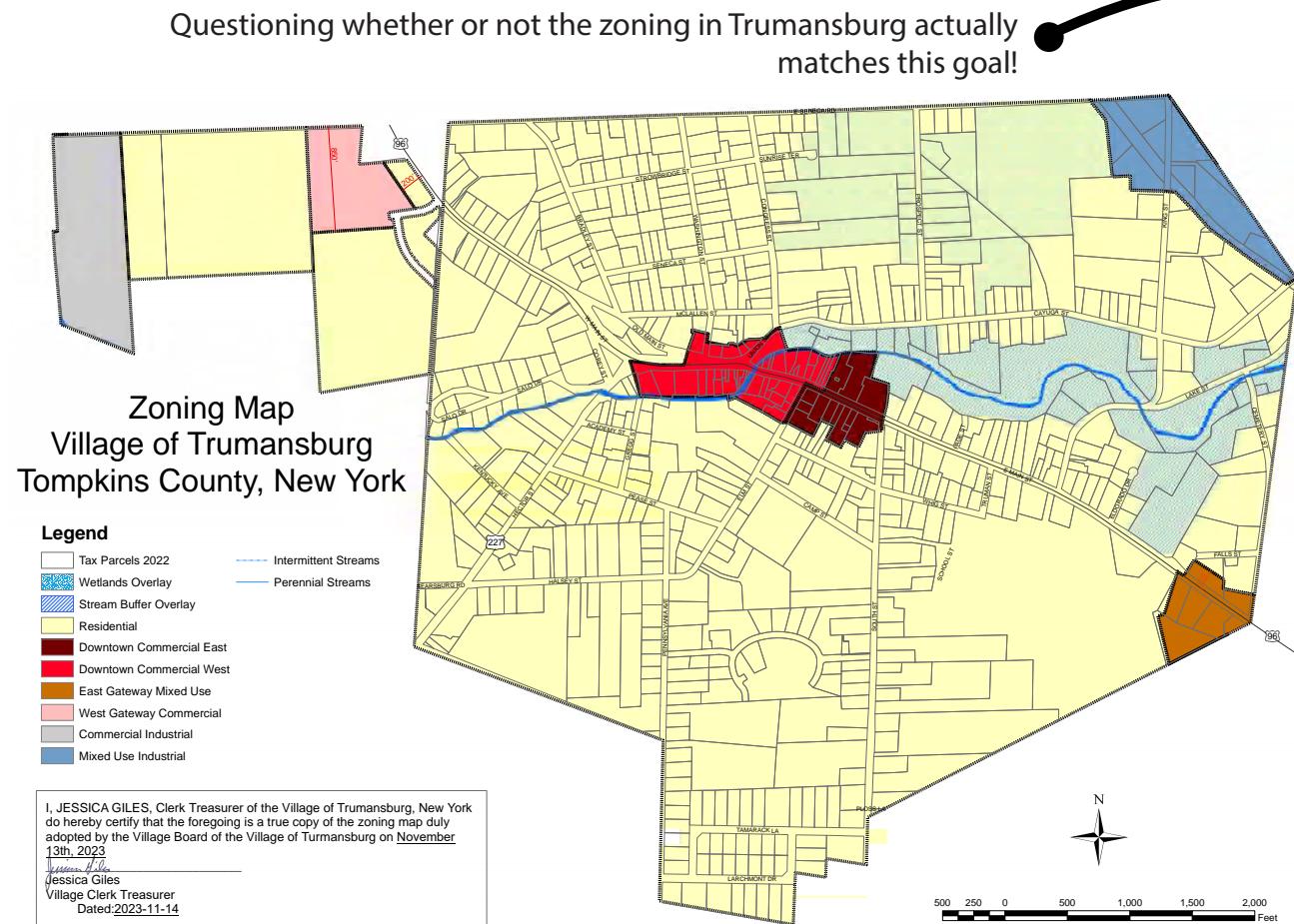






# Project Presentation

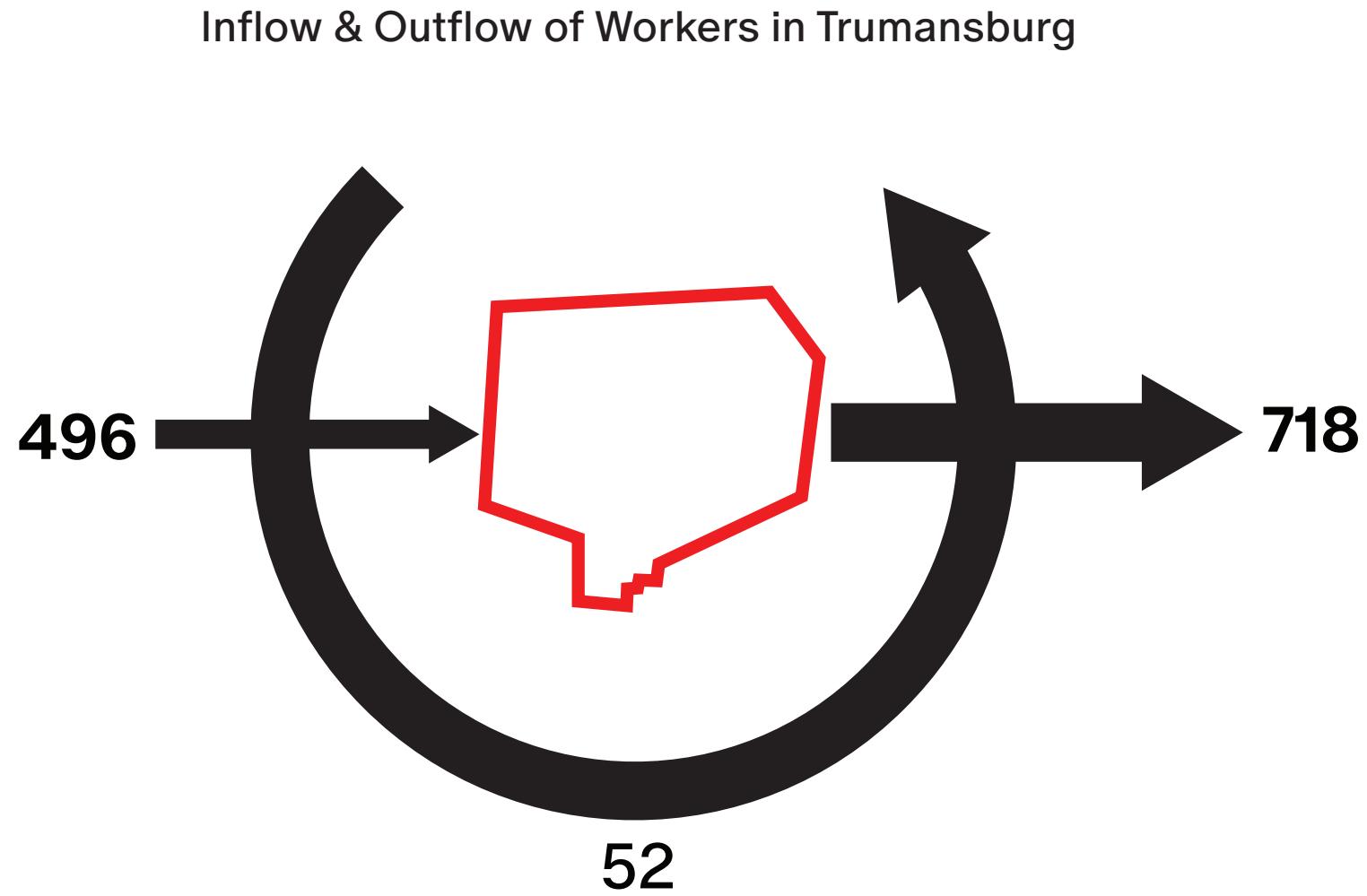




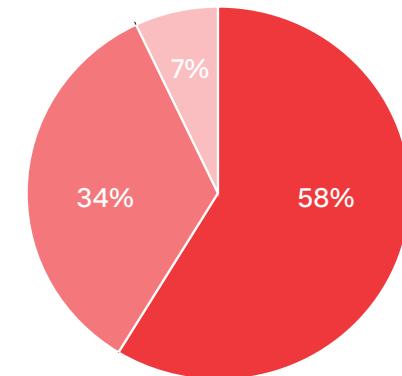
- Trumansburg 20 year goals:  
as defined in the 2021 trumansburg comprehensive plan.
1. Offers ample, diverse, and inclusive opportunities for employment, education, and housing;
  2. Encourages social interaction and community engagement in all aspects of Village life by people of all age groups, income levels, and cultural backgrounds
  3. Advances environmental and economic sustainability by encouraging moderate population growth while protecting open space and natural resources

## 01C Research

The first segment of research focused on observing the zoning ordinances within Trumansburg and questioning the actual effectiveness of the system in achieving Trumansburg's 20-year goals. Trumansburg follows a concentric zone city model of zoning, which is typically meant for more urban typologies. This led us to believe that there is a type of 'systematic mismatch' within the zoning, stemming from the history of U.S. zoning ordinances based on New York City typologies.

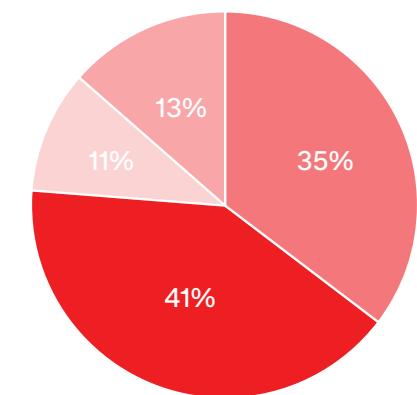


■ Owner Occupied ■ Renter Occupied ■ Vacant

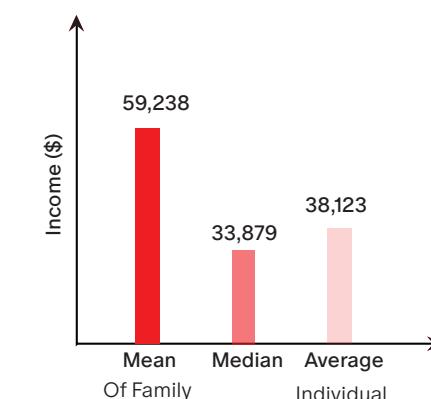


Housing Occupancy in Trumansburg

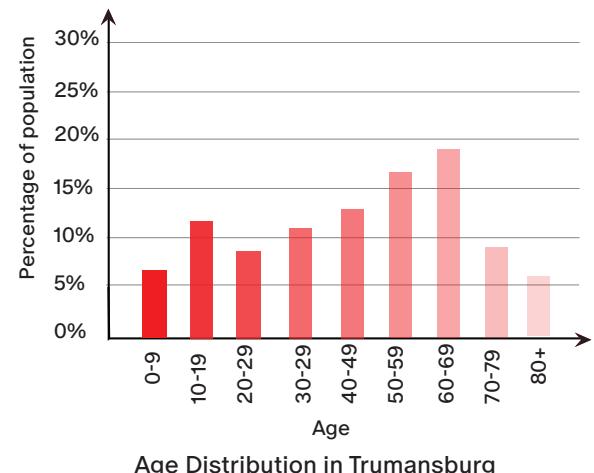
■ 1-Person ■ 2-Person ■ 3-Person ■ 4-or-More



Household Size in Trumansburg



Income Distribution in Trumansburg



Age Distribution in Trumansburg

Source: Trumansburg Comprehensive Plan

## 01C Research

Our research supported our conclusion that the zoning ordinance was clearly ineffective in achieving the 20-year goal for Trumansburg. This led us to question the possibility of alternative zoning systems, how to prioritize people's needs in design, and other systemic mismatches that pervade architectural design.

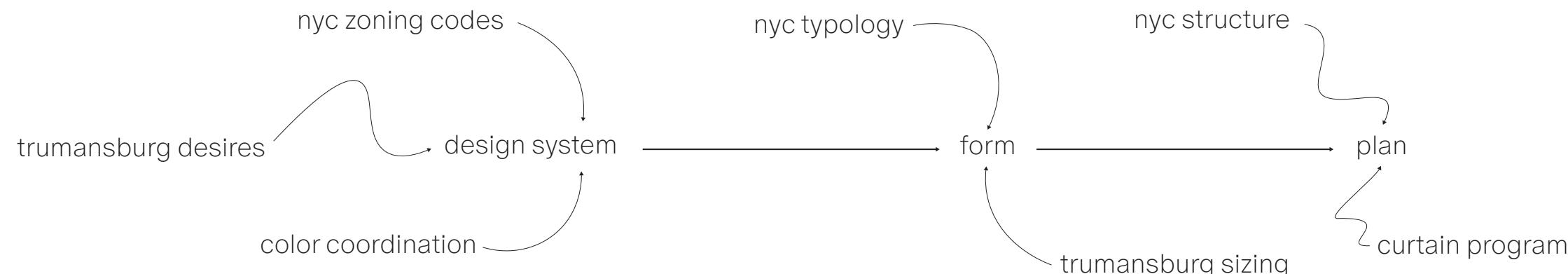
# system > people

current Trumansburg zoning + systems.



# system < people

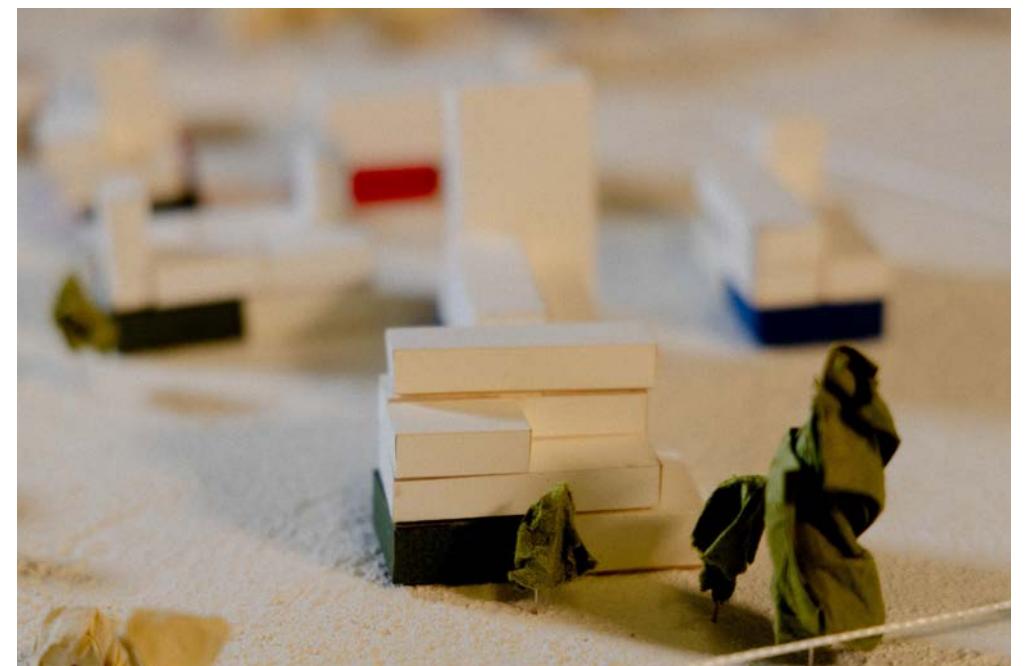
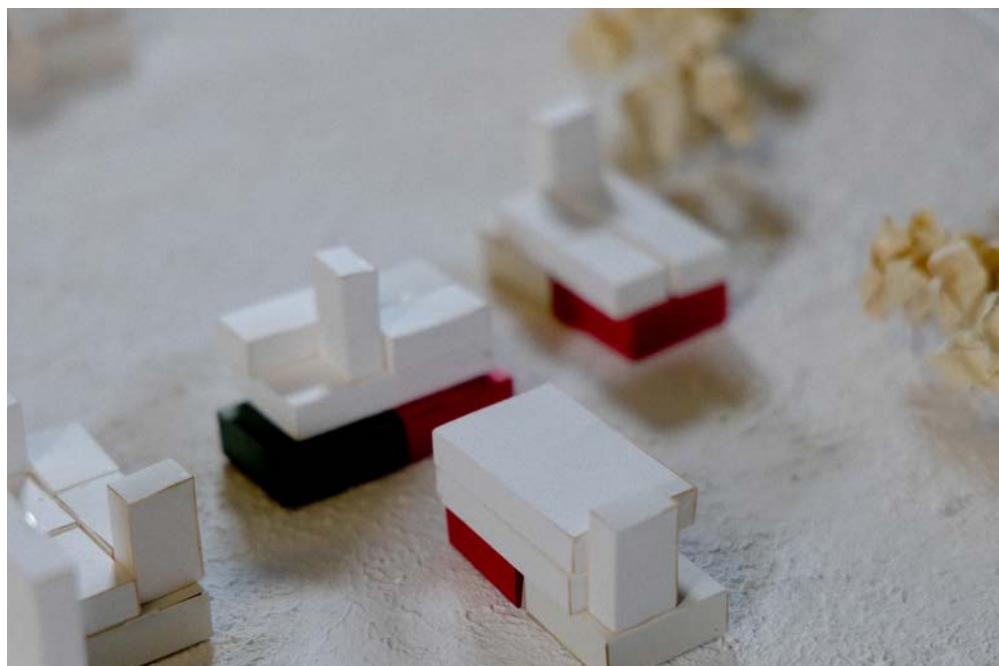
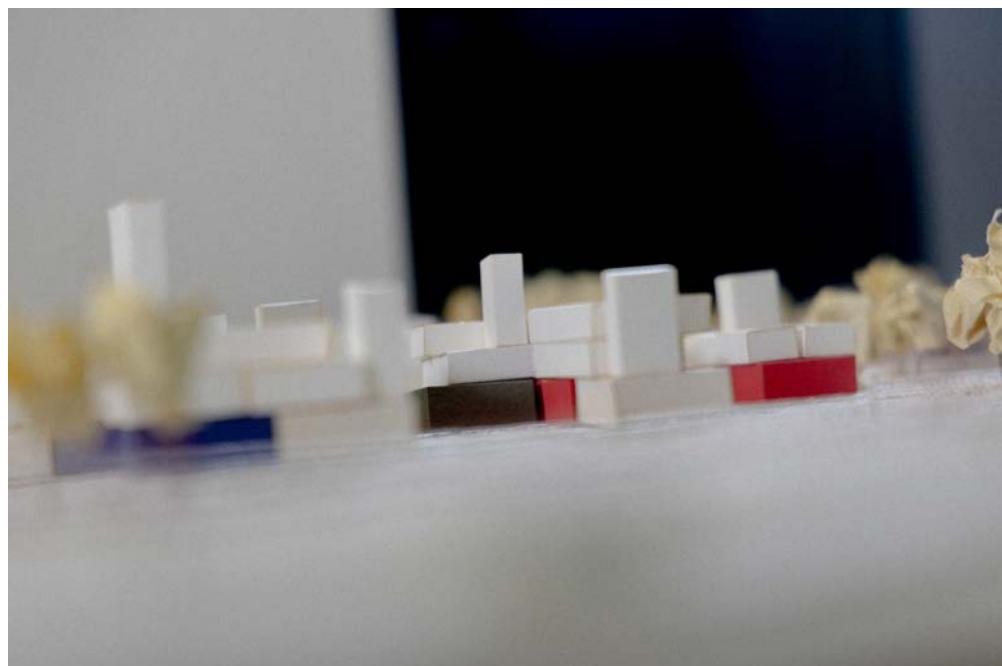
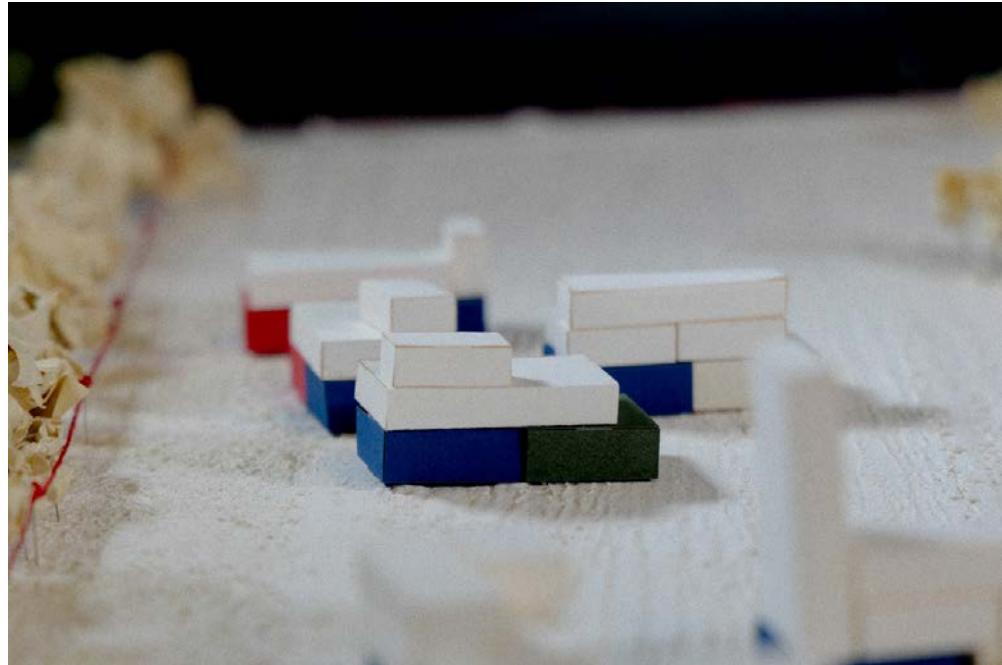
superimposition of people's decisions over architectural system.



## 01D Argument

This project argues for and tests the possibility of a type of architecture that completely prioritizes people in the design, where the zone, building, and plan are all determined by the preferences of individuals living in the units, rather than by the architect's design. It challenges the notion of buildings as designed objects, viewing them instead as essentially empty units that are given

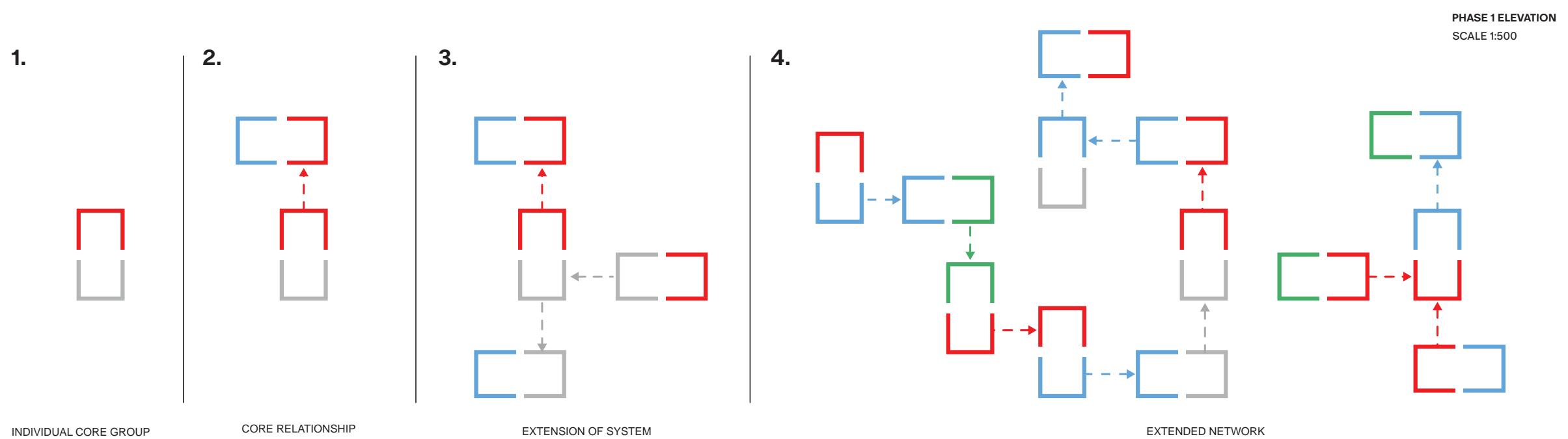
## 02 scale of the city (1:300)

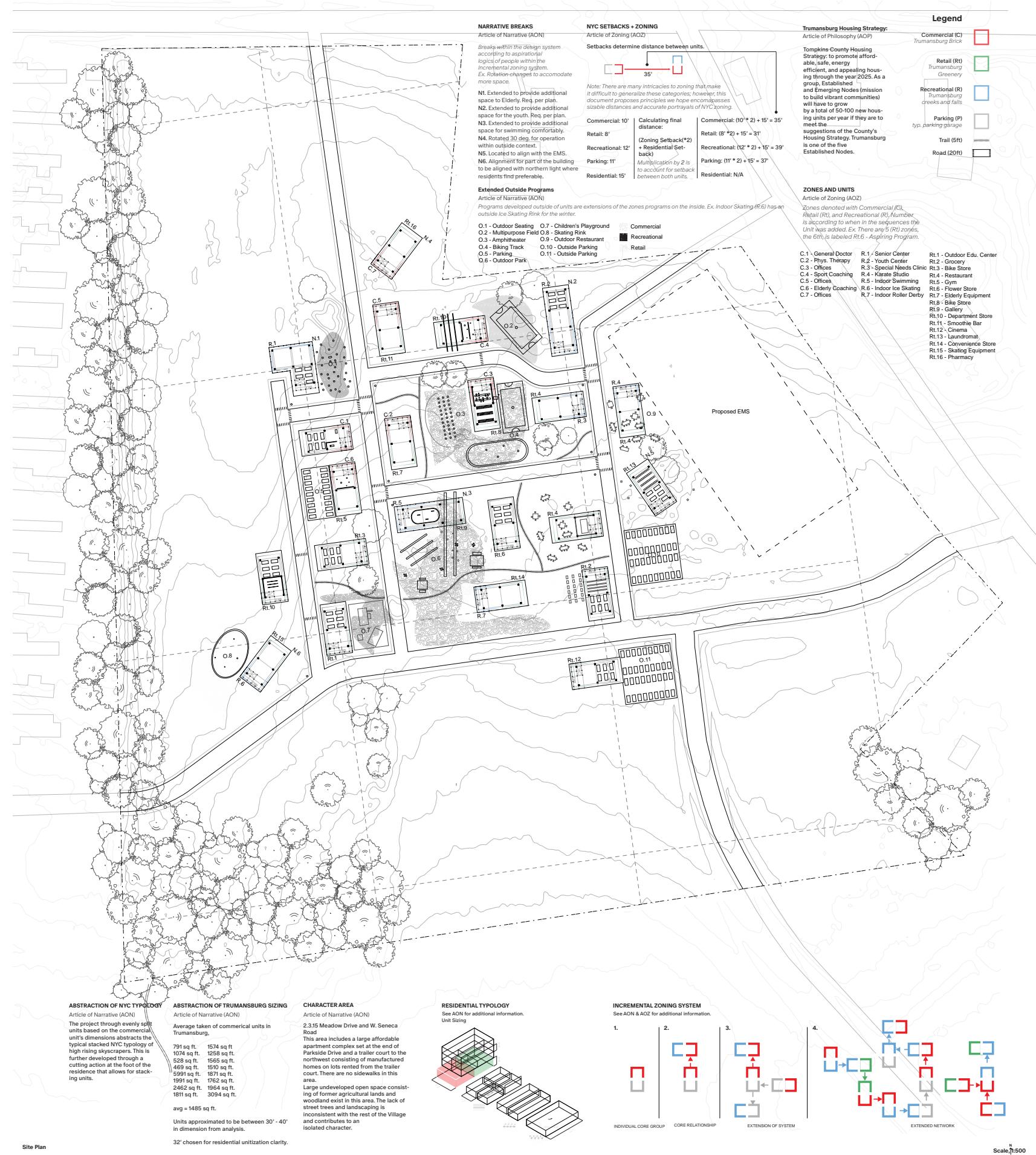


### 02A The Incremental Zone

The most zoomed-out part of the project, the site plan, examines how an incremental zoning process constructs a different type of cityscape. Units are designated for coordinated efforts by people in the previously constructed units, where they gather for regular meetings to decide what they would like to incrementally construct next.

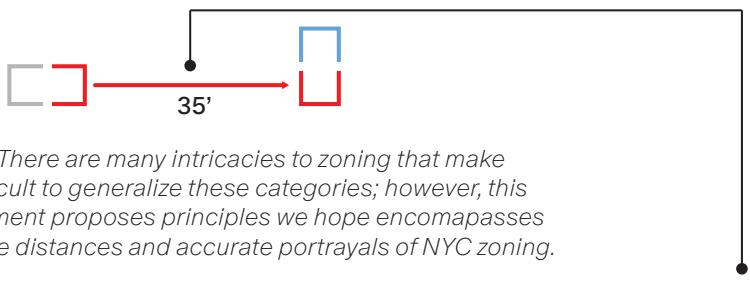






## NYC SETBACKS + ZONING

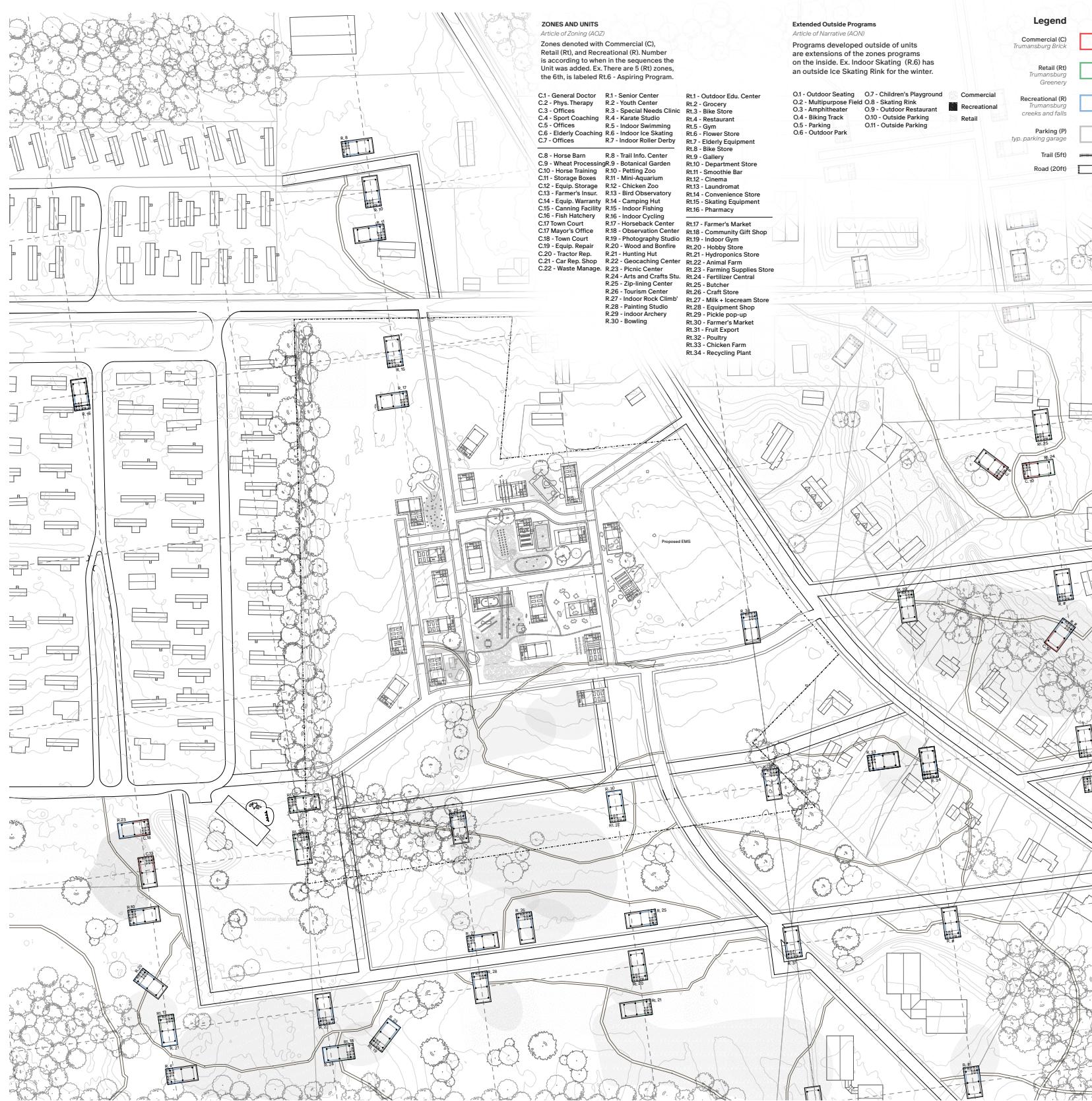
Setbacks determine distance between units.



<b>Commercial: 10'</b>	<b>Calculating final distance:</b>	<b>Commercial: <math>(10' \times 2) + 15' = 35'</math></b>
<b>Retail: 8'</b>	<b>Retail: <math>(8' \times 2) + 15' = 31'</math></b>	
<b>Recreational: 12'</b>	<b>Recreational: <math>(12' \times 2) + 15' = 39'</math></b>	
<b>Parking: 11'</b>	<b>Parking: <math>(11' \times 2) + 15' = 37'</math></b>	
<b>Residential: 15'</b>	<b>Residential: N/A</b>	

## 02B Plans and Cityscape Imprints

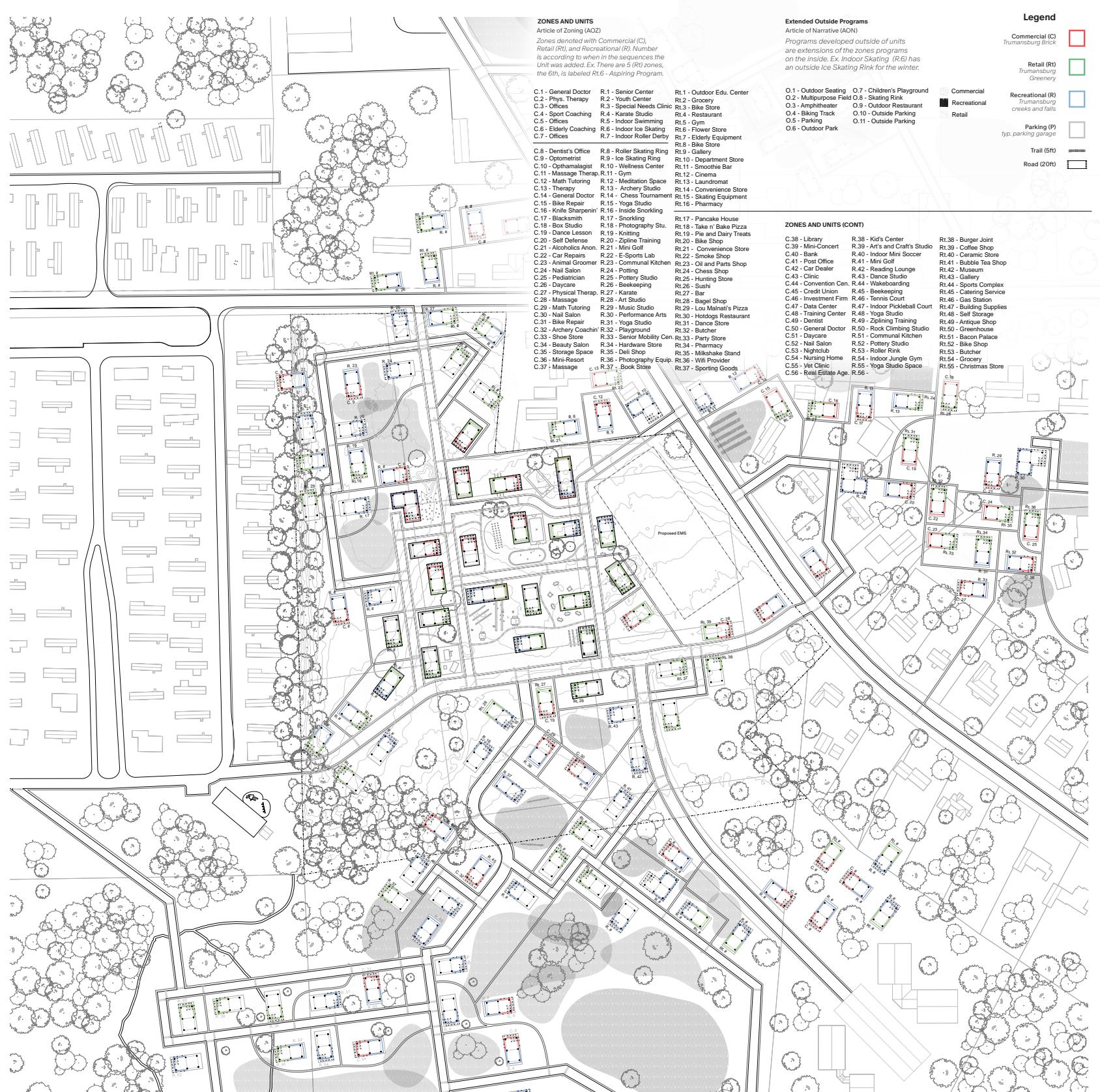
Drawing from NYC zoning, as mentioned earlier, to juxtapose the original Trumansburg plan and implicitly incorporate commerce, the zoning system is based on a series of units that rotate 90 degrees each time a new unit is added. The distance between units is defined by subverting the original NYC zoning setbacks and recalculating them to create an appropriate size. This approach comments on how previous systems continue to influence the way we design, much like how the new zoning in Trumansburg that we propose will always retain remnants of past zoning ordinances. However, we can subvert, rethink, and adapt these ideas into something new and specific to people's desires and aptitudes.



## 02C Agrarian Plan

When we considered how to push the idea of the incrementally zoned building to its limit, we saw a distinct parallel to local politics in Tompkins County. Specifically, there were people in conflict with the current zoning paradigm in their area, going as far as putting up signs that say 'NO ZONING,' calling for action and an alternative. Well, here's an alternative—one that we attempt to demonstrate can be Agrarian, less dense, or take on a peak dense/commercial state.

The Agrarian plan achieves this sparse layout by expanding the original grid overlaid on the site and placing units around the area. The incremental process can take the form of expanding across more grids that extend farther out.



## Upper Manhatten

As defined in the 1811 Commissioner's Plan as well as the 1916 Zoning Ordinance.



## Downtown Manhatten

### 02D Commercial Plan

The Commercial plan, in contrast to the Agrarian plan, expands the original base site plan by simply adding more units. This creates an interesting intersection in the way roads and infrastructure are planned in relation to the buildings. This type of incremental planning in design fosters an engaging conversation between rectilinearly planned cities and those planned over time.

To compare with New York City specifically, it's the difference between Lower Manhattan and the rest of Manhattan. Lower Manhattan's city planning was established before the 1811 Commissioner's Plan, when there was significantly less emphasis on creating regularly planned cities. Instead, cities were developed over time based on what was needed, stemming from a lack of resources for large-scale city planning efforts—unlike Upper Manhattan, which was shaped by the rectilinear plan defined in the 1811 Commissioner's Plan.

Today, many people enjoy downtown Manhattan more because its city planning features numerous idiosyncrasies that give the area more character, whereas the rest of NYC, defined by rectilinear planning, can make navigation feel monotonous and difficult to remember. This brings up questions of efficiency versus comfort in city planning.

# 03 scale of the building (1:50)



## 03A Building-to-Building Relationships

The next step was to observe the relationship between the ground and this zoning solution in city planning. The color coordination and city relationships developed could create a dynamic superground where dozens of events could take place, fostering interaction within communities.



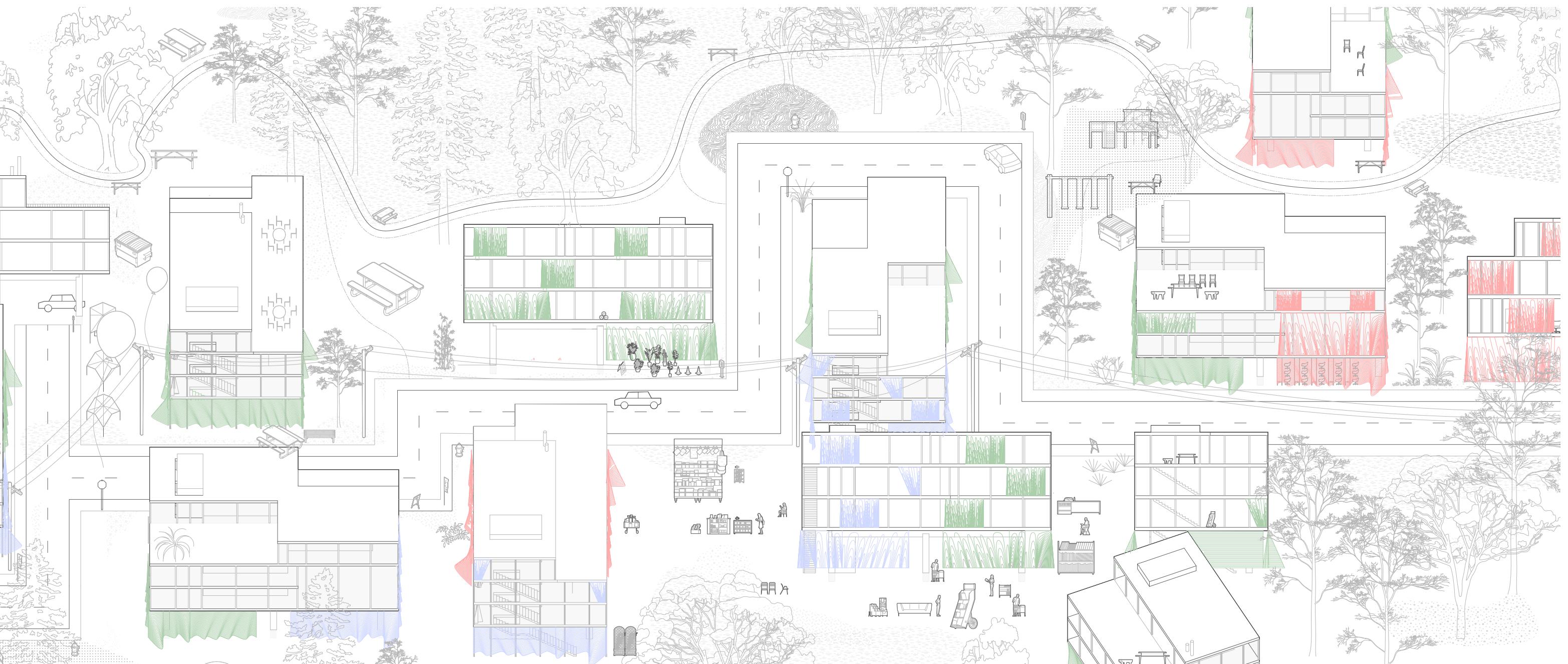
### 03B Populated Events

We then experimented with how this would look in the two different scenarios, whether more densely populated or not the events here demonstrate the multifaceted nature of the incremental zoning.

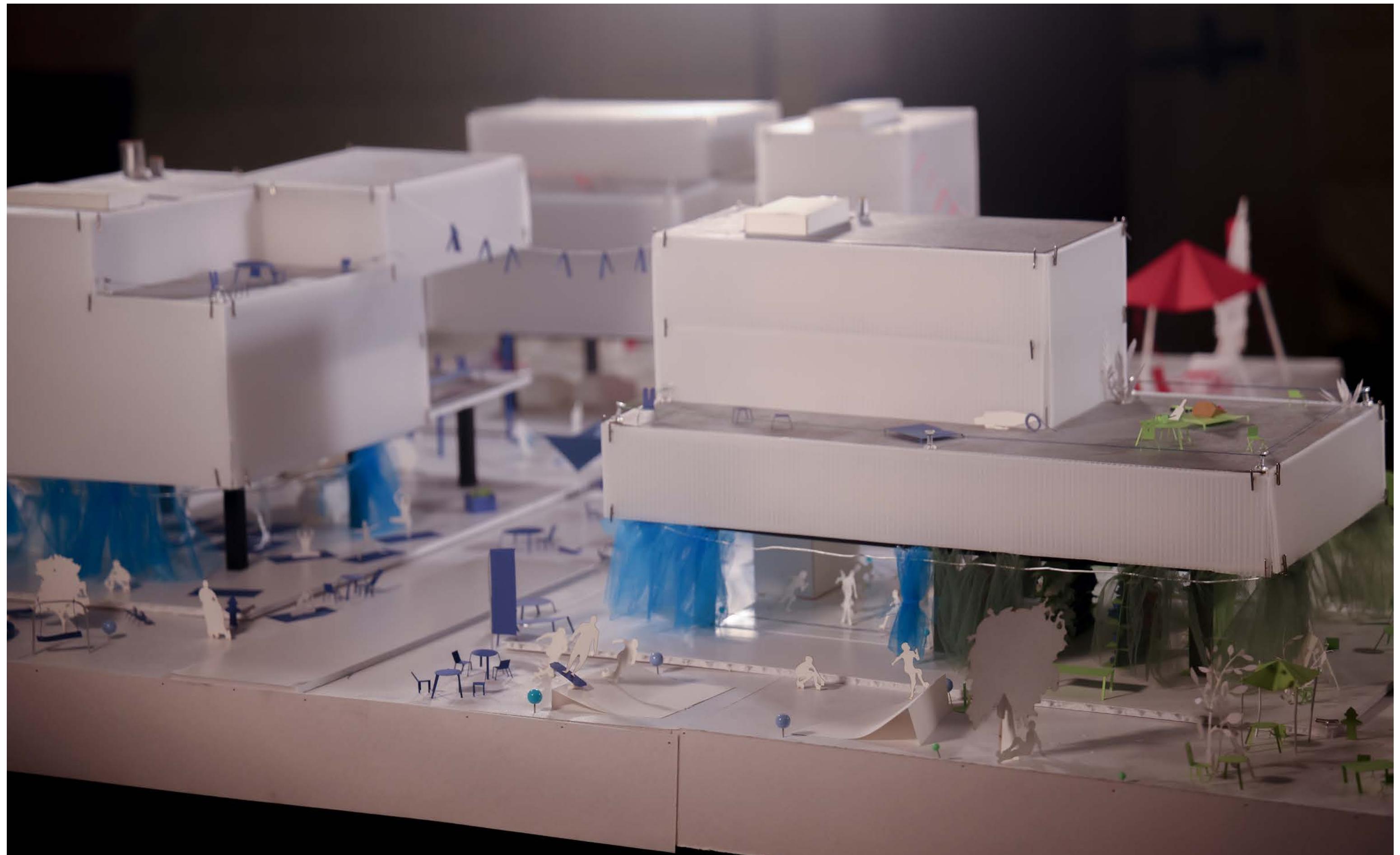


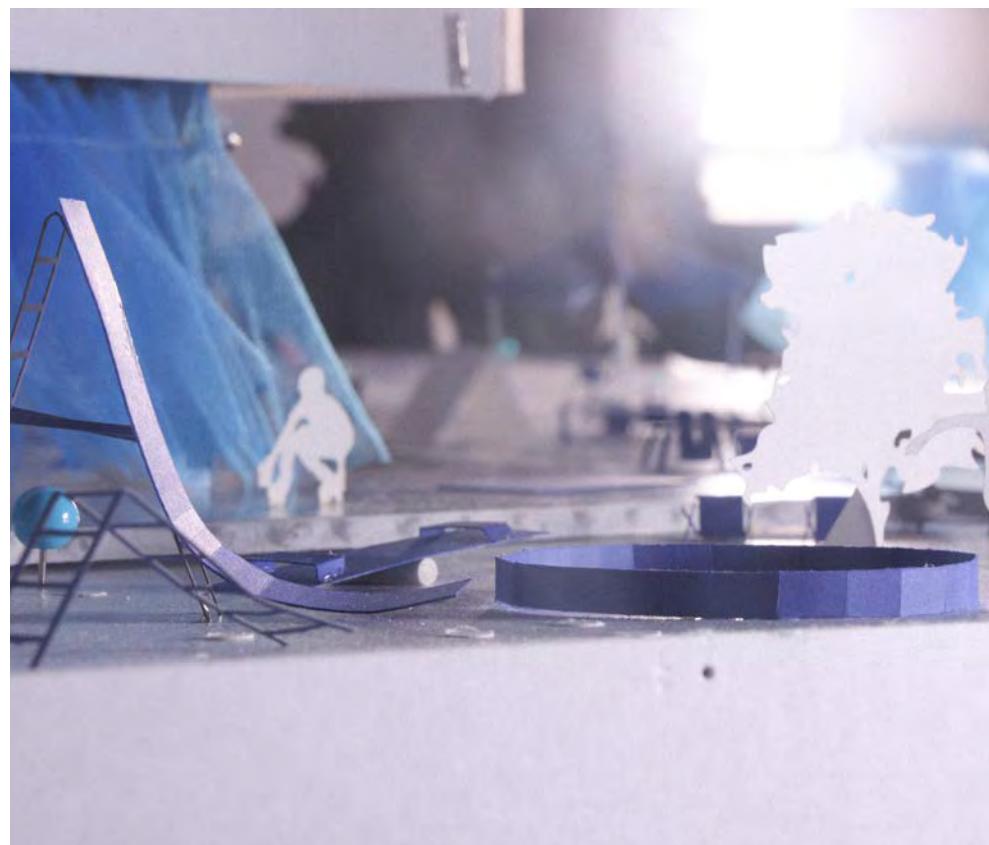
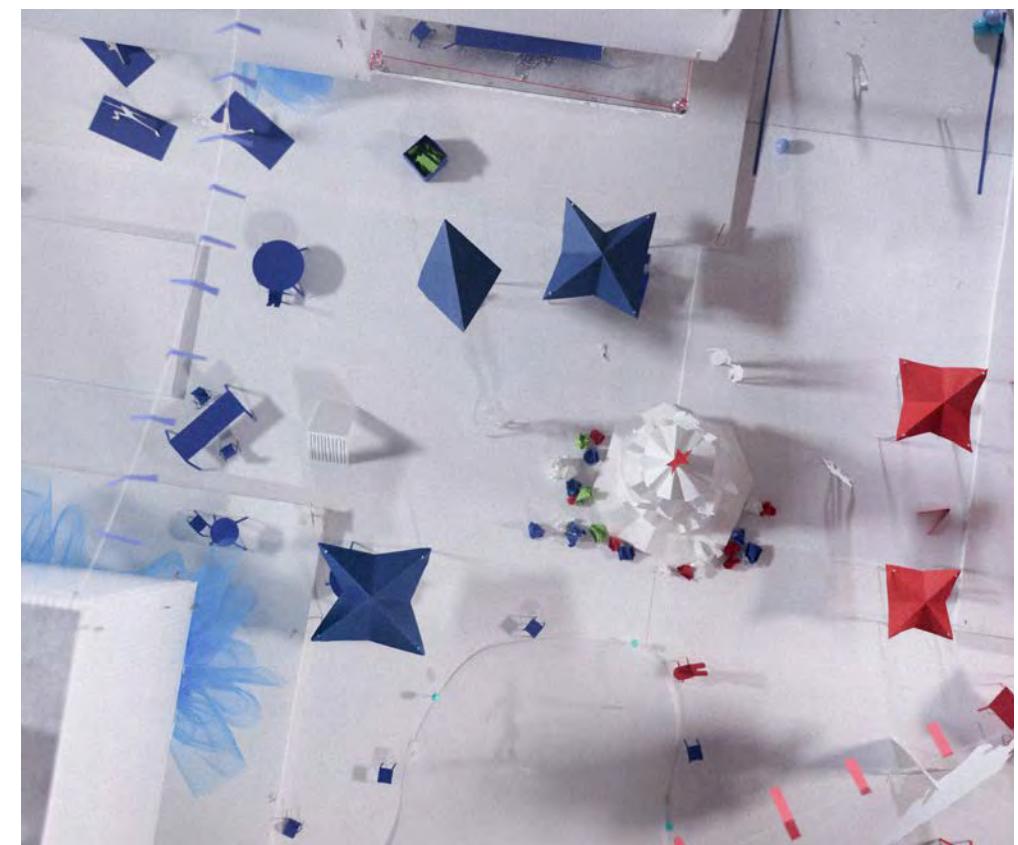
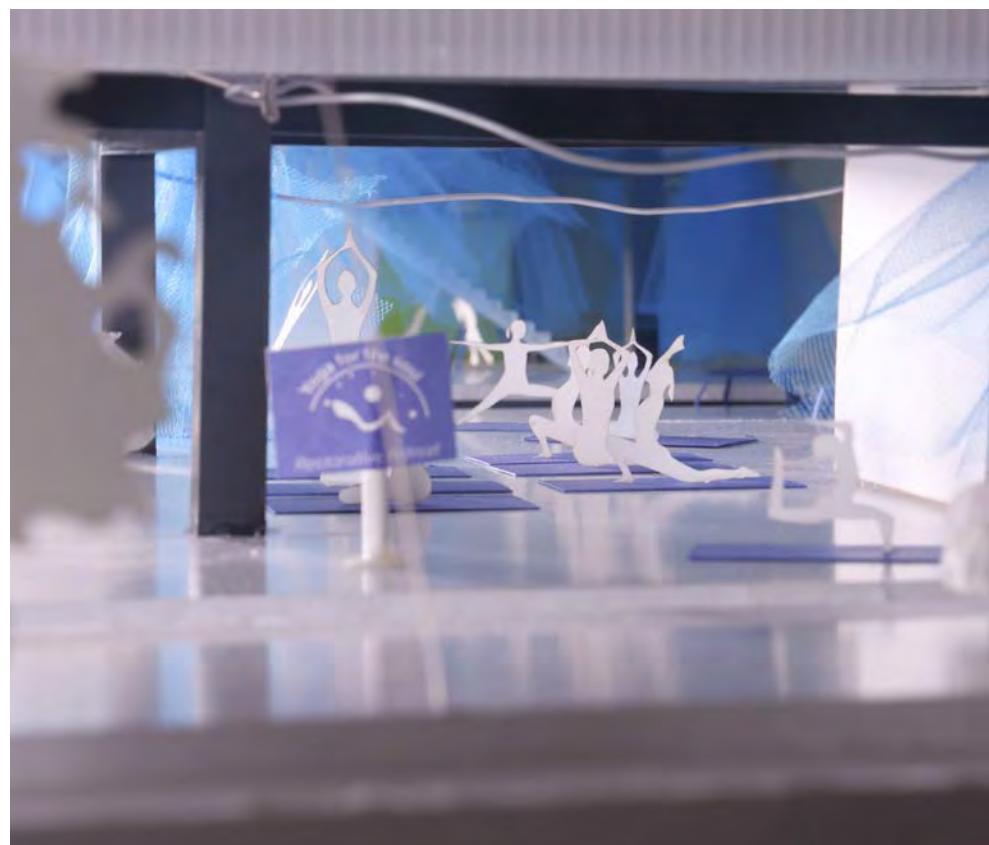
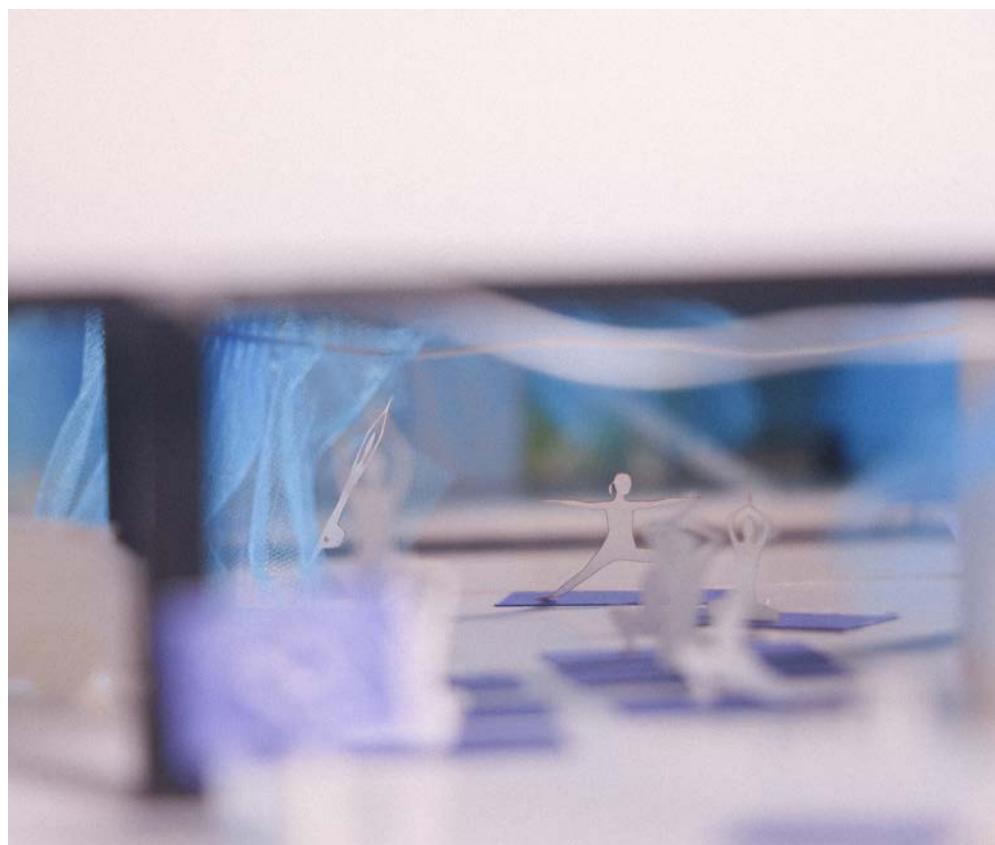
### 03B Populated Events

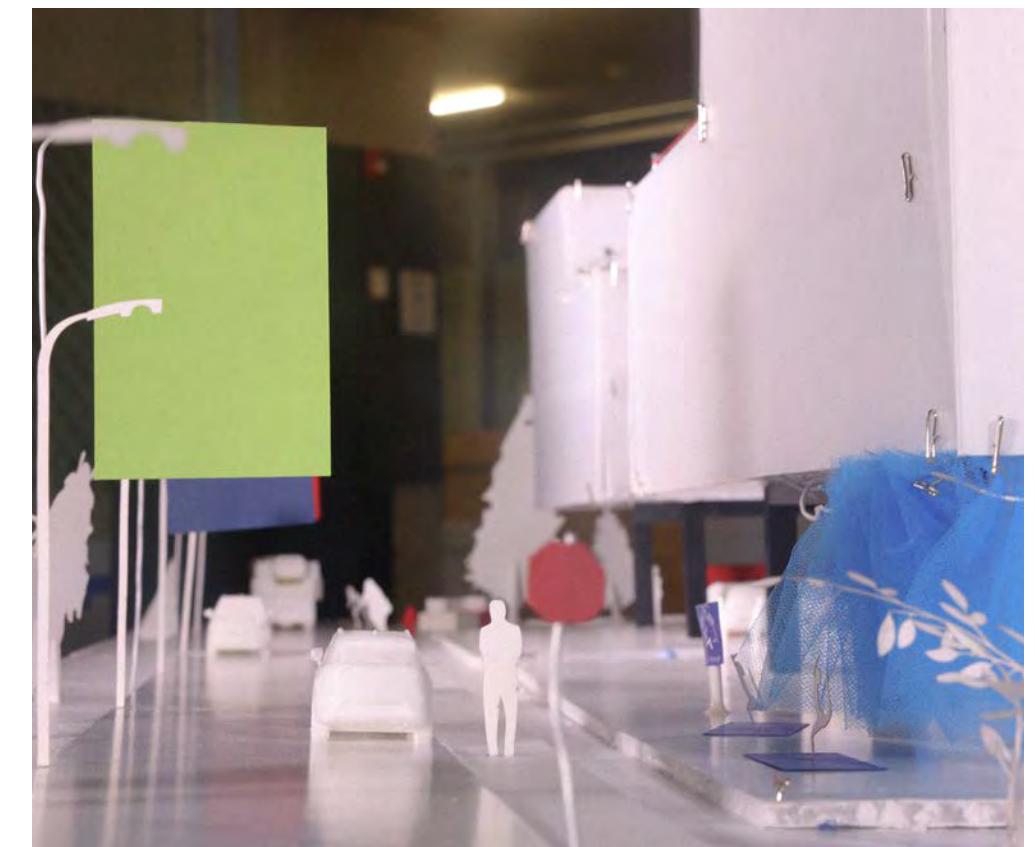
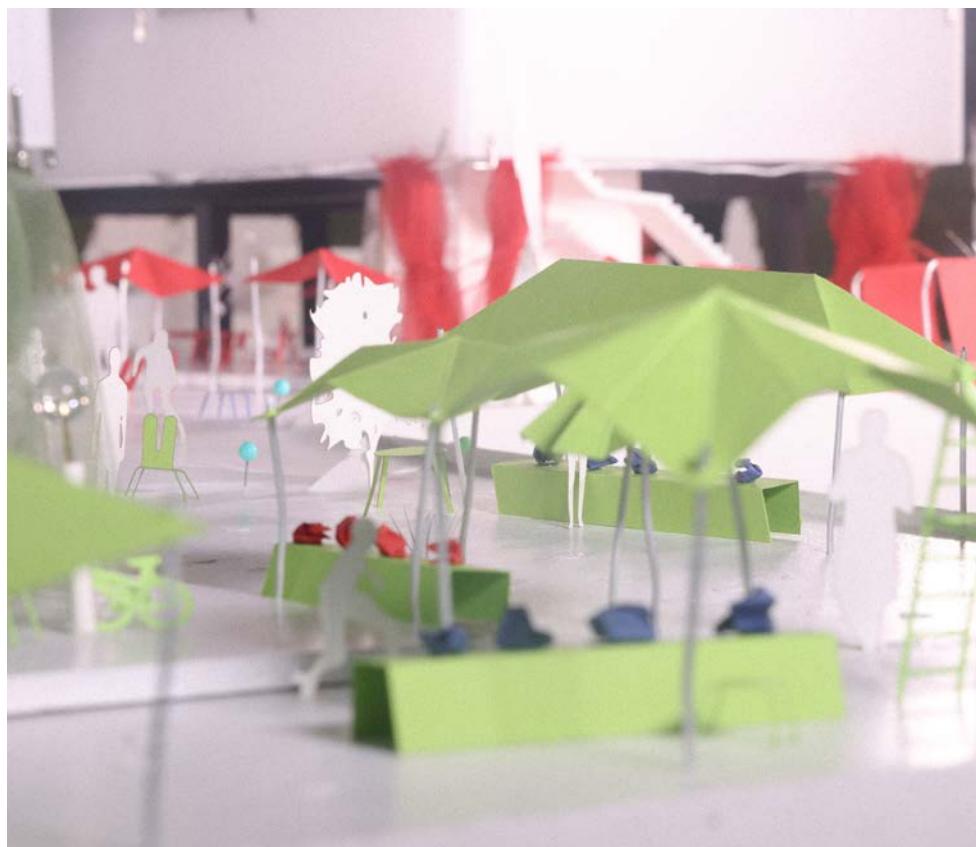
Through dioramas, both in drawings and models, we explored how these events could be exaggerated or performative to illustrate the experience of the superground created through incremental zoning. The project would not only develop its own agenda, but also perform in a way that rethinks how people can use the spaces it provides.



Short Caption/Citation

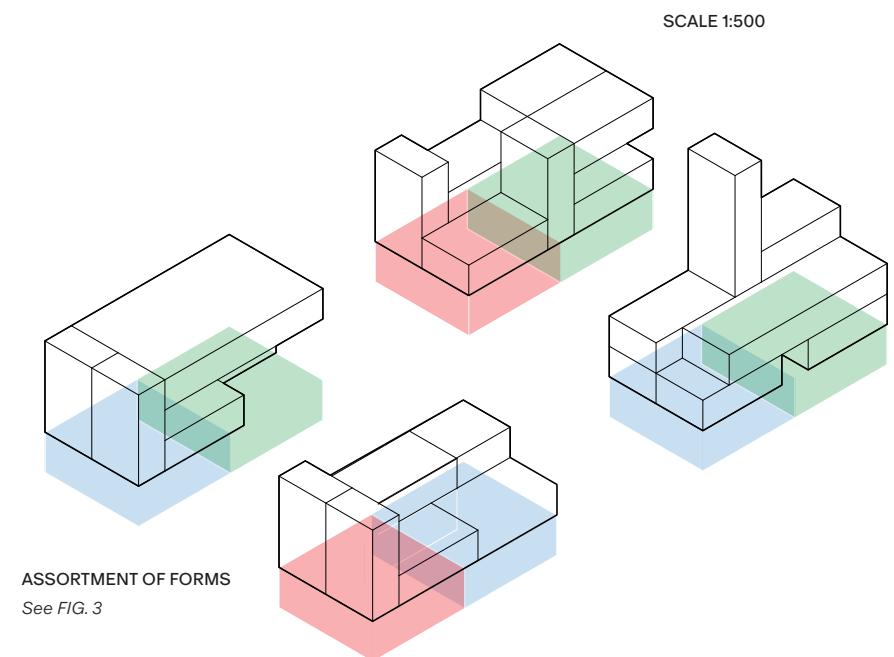
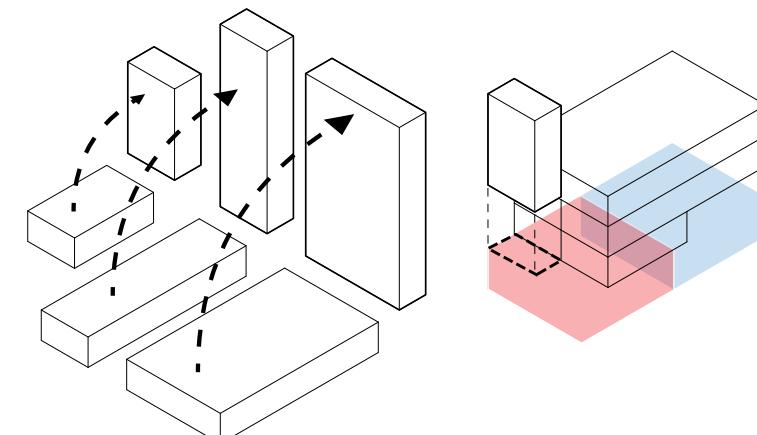
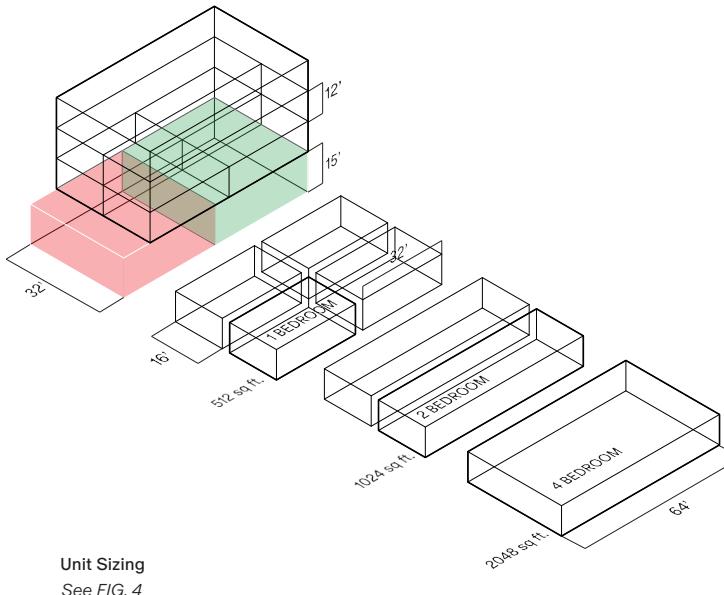
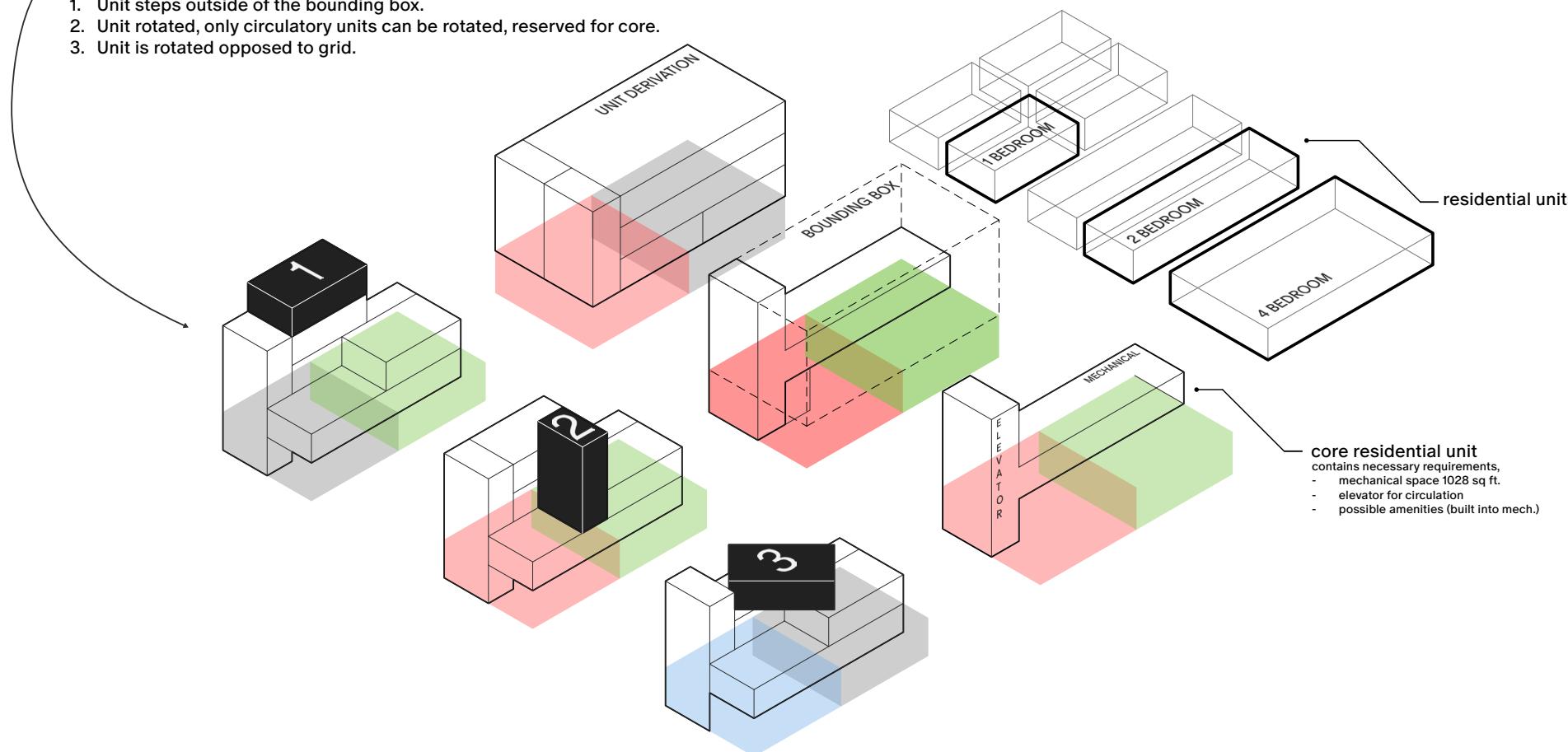






## RULE BREAKS

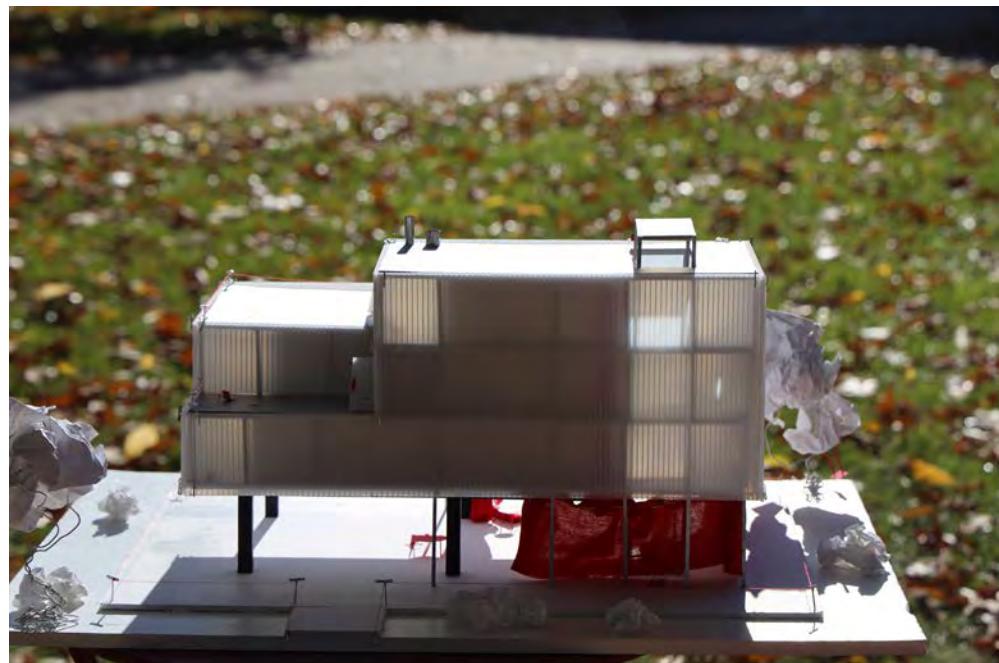
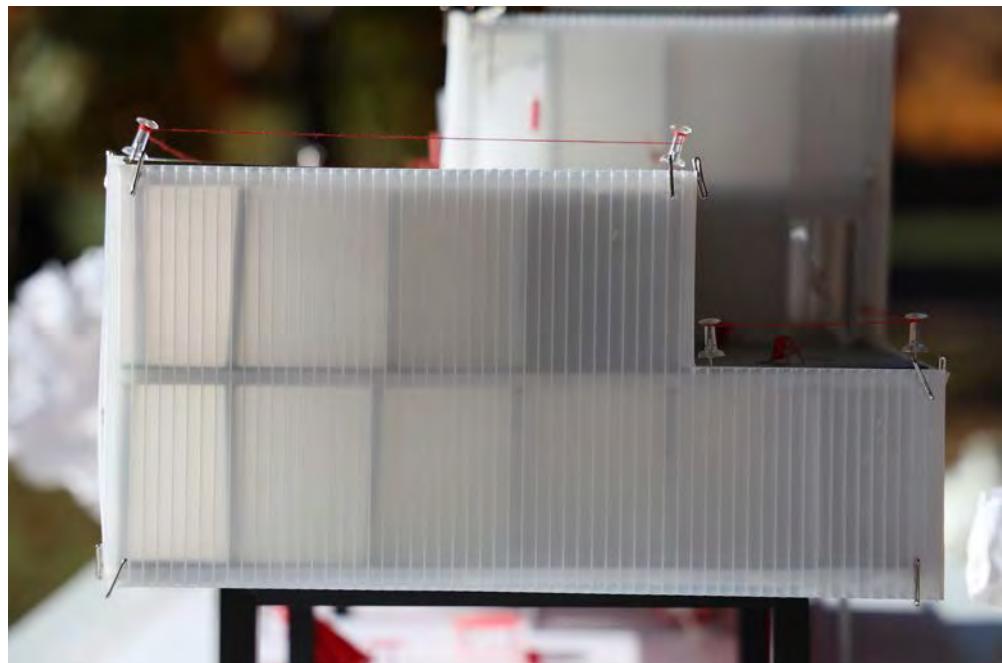
1. Unit steps outside of the bounding box.
2. Unit rotated, only circulatory units can be rotated, reserved for core.
3. Unit is rotated opposed to grid.

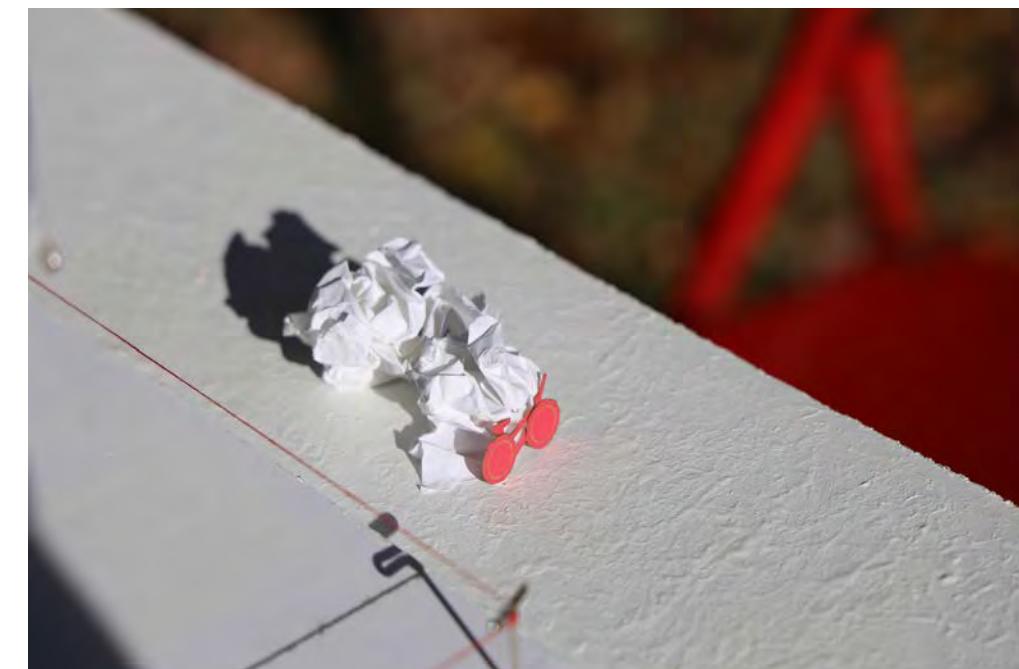
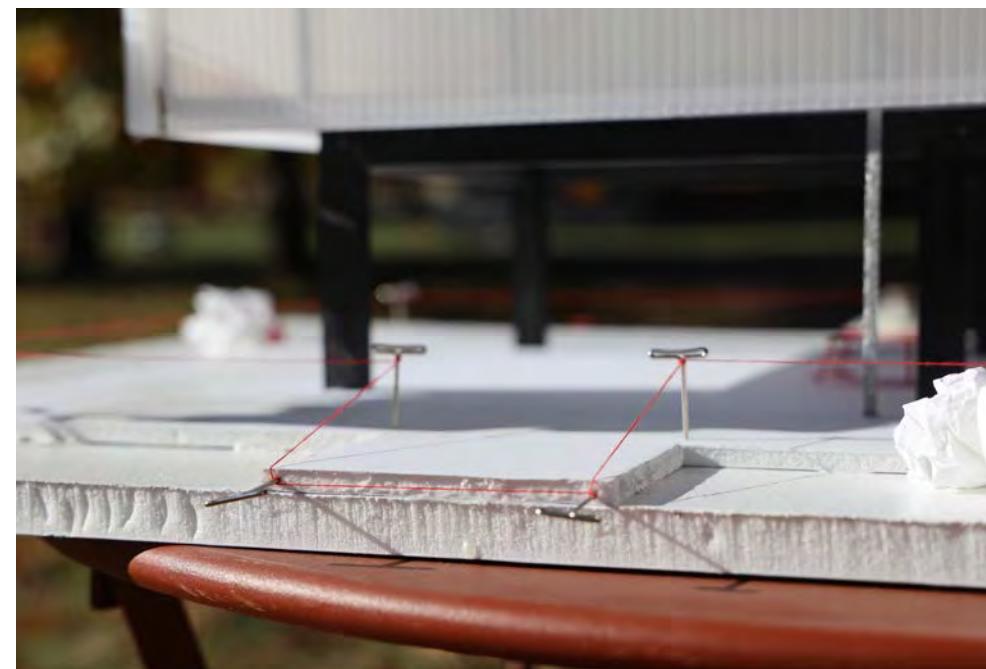
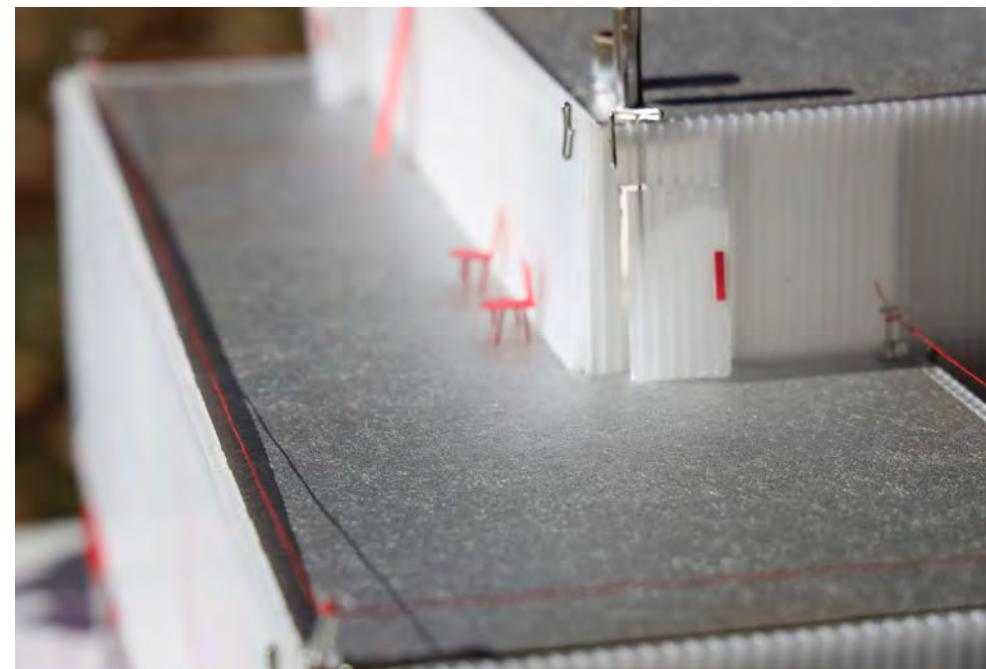
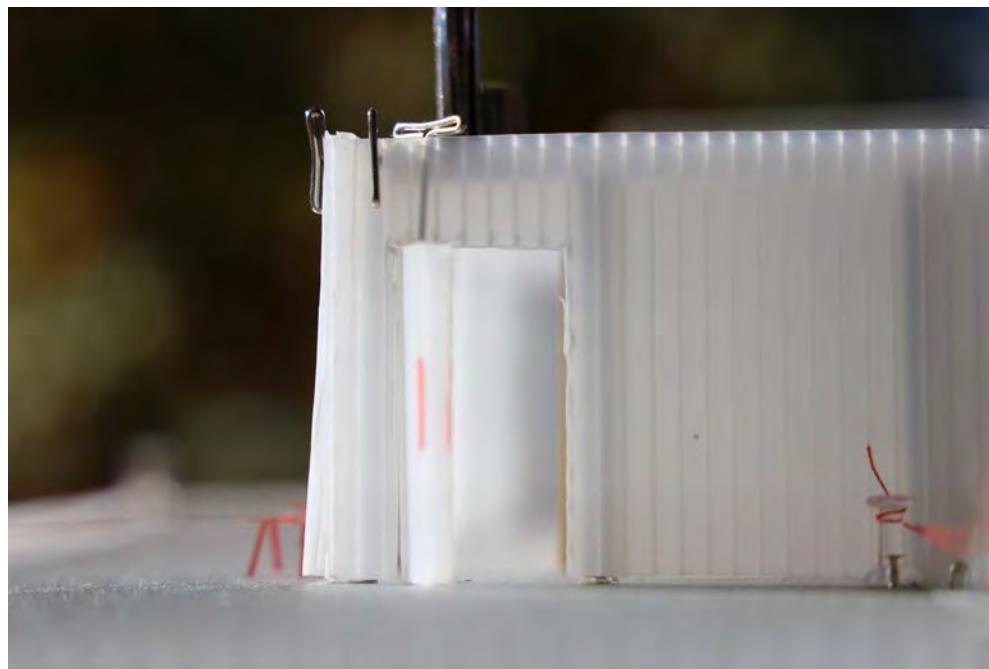


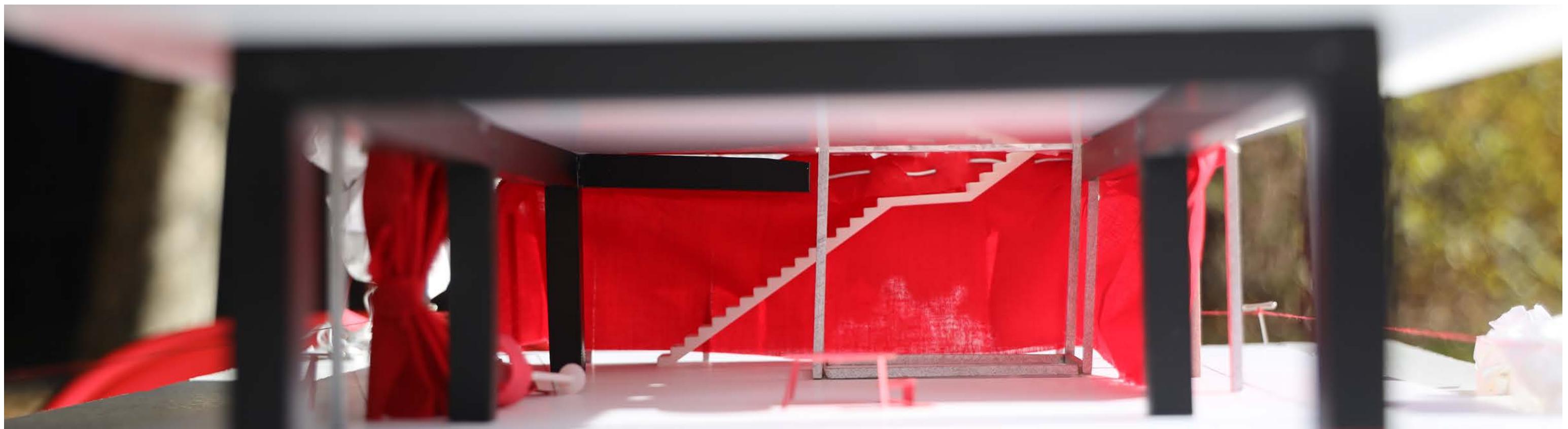
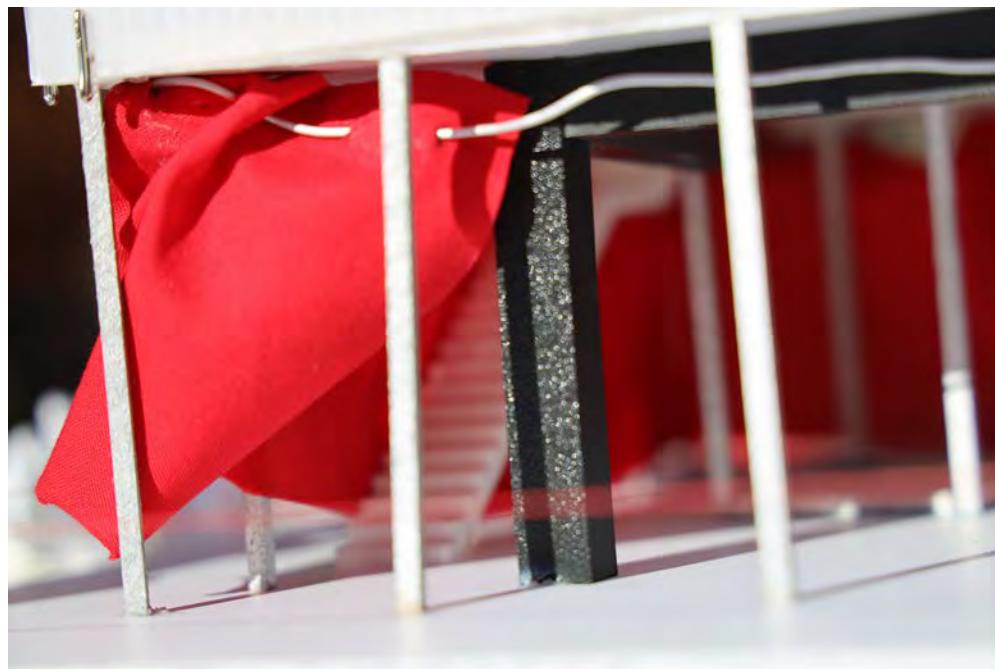
## 03D Residential Units

Then we questioned how we could incorporate NYC ideas and principles and subvert them to create the housing unit for the project. We decided to use the NYC typology—a highly efficient subdivided grid—and juxtapose it with the commercial unit sizing from Trumansburg. This contrast would create an interesting comparison between the two very different contexts.

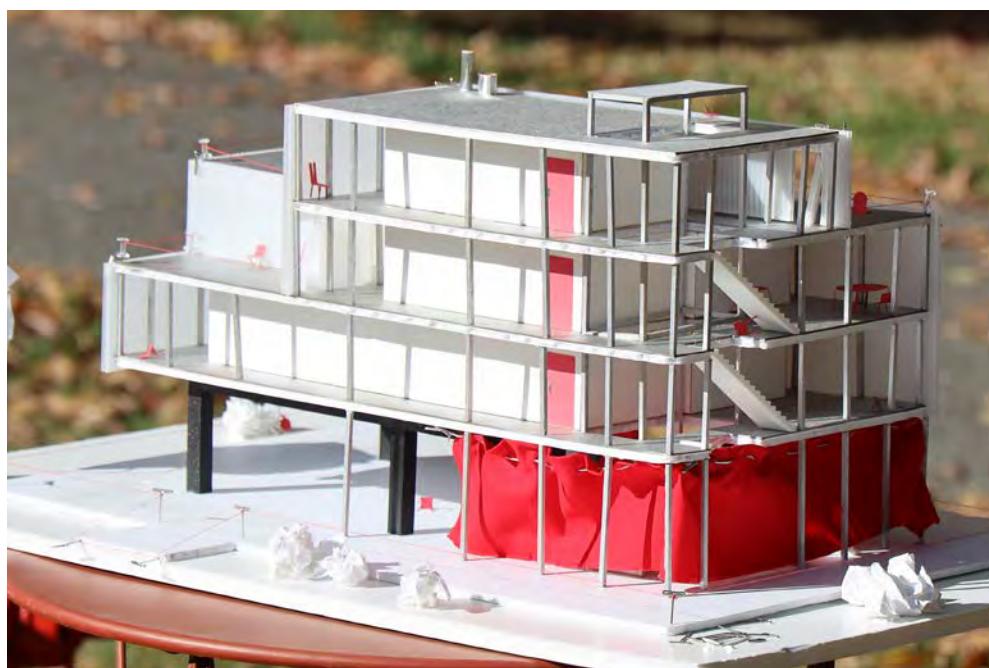
Polycarbonate was used as a material, both as an effective and cheaper alternative to glass, and to subtly allude to the program inside. Polycarbonate challenges both original contexts: it is typically not used in the U.S., but it also draws inspiration from foreign architects and designers, such as Lacaton & Vassal.



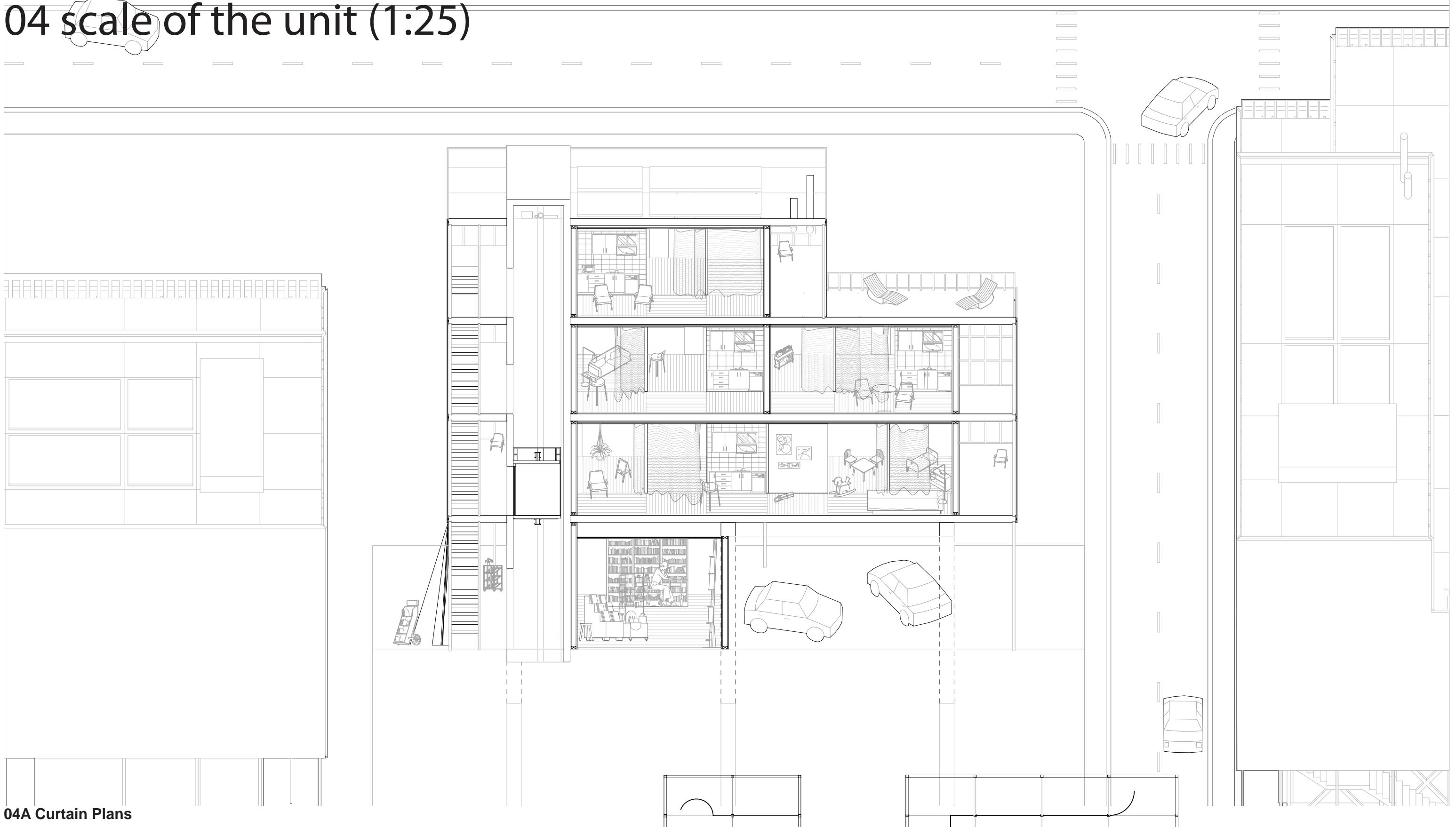






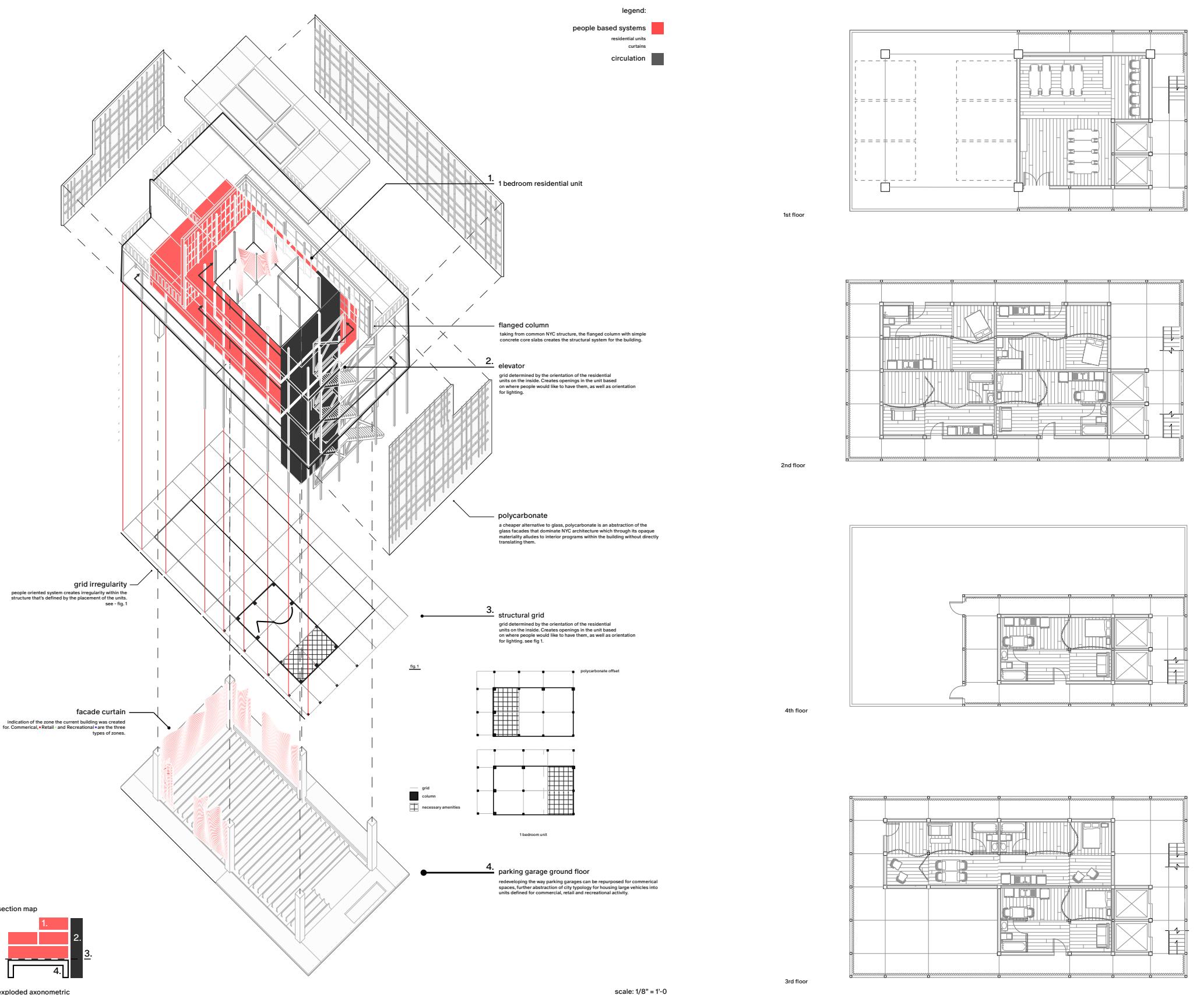


# 04 scale of the unit (1:25)



## 04A Curtain Plans

To adapt the plans into the 'people > system' approach, we began to observe how curtains could serve as an imprint of desires, based on a free-form curtain track. This would allow people to move the curtains wherever they wanted, depending on the room layout, and adapt them to their own interests. There are flaws with this approach, such as how amenities can be placed, but we pushed this idea as far as we could in order to question the way we develop plans.



## 04B Structural Grids

It should also be noted that the structural grid of the building is determined by the placement of the units inside. The grid is informed by how people want their units oriented within the overall plan of the building, which also shapes the way we think about structural grids being influenced by people's needs and preferences.



