

*Design For All: The Neutral Ground Market in  
Freret, New Orleans*

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University in partial fulfillment of the requirements for the degree of

Master of Architecture  
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## ABSTRACT

This project is a celebration. Inspired by time spent in Baltimore, this thesis examines how standardized elements can be utilized to create Architecture and make astute, functional, contextually sensitive, and pleasurable design accessible for all.

With the heavy, stuccoed buildings of New Orleans as precedent, the Neutral Grounds Market utilizes CMUs for both practical and aesthetic purposes. Drawing from a rich lineage of structural polychromy and through knitting CMUs together into a subtle pattern, the building speaks to its colorful context, despite the lack of CMU structures in the area.

Weaving ethics and aesthetics, the site sits within a Food Desert and this thesis begins at the seam of three neighborhoods - Freret, Milan, and Uptown. Block by block varies tremendously within these neighborhoods, and the static images of both the opulence and desolation of New Orleans becomes clear here. Aiming to bring not only fresh food into the neighborhood, but to work realistically within the diverse backgrounds of the residents' lives, the program integrates a Farmer's Market with a Grocery Store so fresh food will constantly be available and can meet the needs of all the citizens.

In addressing context as a matter of both the material, built environment and the personal, human milieu this thesis addresses the economic and the emotional as a pair, realizing the importance of each. This integrated program creates a new civic space which will bolster the vibrant growth already begun on Freret St. and throughout the neighborhoods. This project is a celebration.

## ACKNOWLEDGMENTS

To my mother, Gina Jones, you are an endless source of inspiration for me to grow, to strive to do better, and to continually and constantly remain fiercely passionate about all that I do.

To my family, there are far too many of you to list here but your kind words and support have buoyed me as I have navigated the past years, your wisdom and encouragement has guided me to a place I could not have found without you.

To my friends, in particular David Speedlin, Jennifer Rasmussen, and Jason Hiser, your advocacy and advice has been invaluable, and your friendship has been a rock to me.

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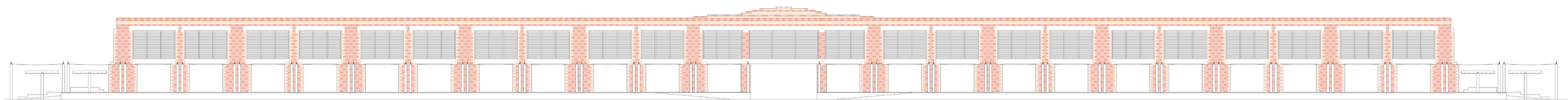
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# *The Neutral Ground Market*

Freret, New Orleans

Situated between three diverse neighborhoods in New Orleans, the Neutral Ground Market functions both as a farmer's market and a grocery store. Drawing on the rich history of markets throughout New Orleans, and in particular the French Market situated in the French Quarter, the Neutral Ground Market's programmatic purpose is threefold:

To address the Food Desert in the area by creating a place which not only brings farmers and fresh food into the city, but is convenient for all the citizens

To create a place which reflects the diverse and varied backgrounds of those who live in Freret, Milan, and Uptown and acts as a seam between the neighborhoods

To establish a permanent home for the Freret Market which currently only operates once a month ten times a year and to continue the vibrant growth and expansion of Freret St.

I intentionally choose to focus on the Freret St. area because of the recent explosive growth of the street as a dynamic civic and commercial corridor. However, I also choose Freret and the surrounding neighborhoods because of the extremes in socioeconomic status which vary drastically from block to block. While New Orleans is well-known for the city's culinary scene, the majority of these neighborhoods are in a Food Desert.

Drawing upon the vivacious character of the city as a whole, as well as each particular neighborhood, the Neutral Ground Market seeks to create a seam where all of the residents may gather together and to provide place for citizens to celebrate and strengthen their neighborhood.





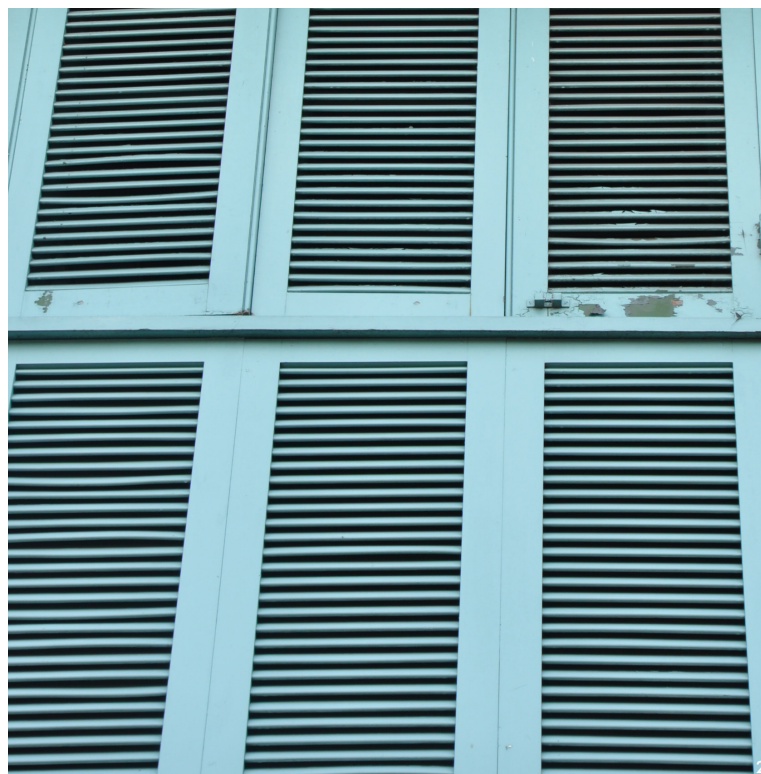












Surrounding the site exists a diverse collection of schools, businesses, churches, and more.

Within .5mi of the Site lies:

Ochsner Baptist Medical Center

Commercial Corridor on Freret St., which includes two yoga studios, a bike store, a family-run hardware store, an auto-repair shop, and over a dozen restaurants, bars, and coffee shops

Ten places of worship

Two cemeteries

Three schools

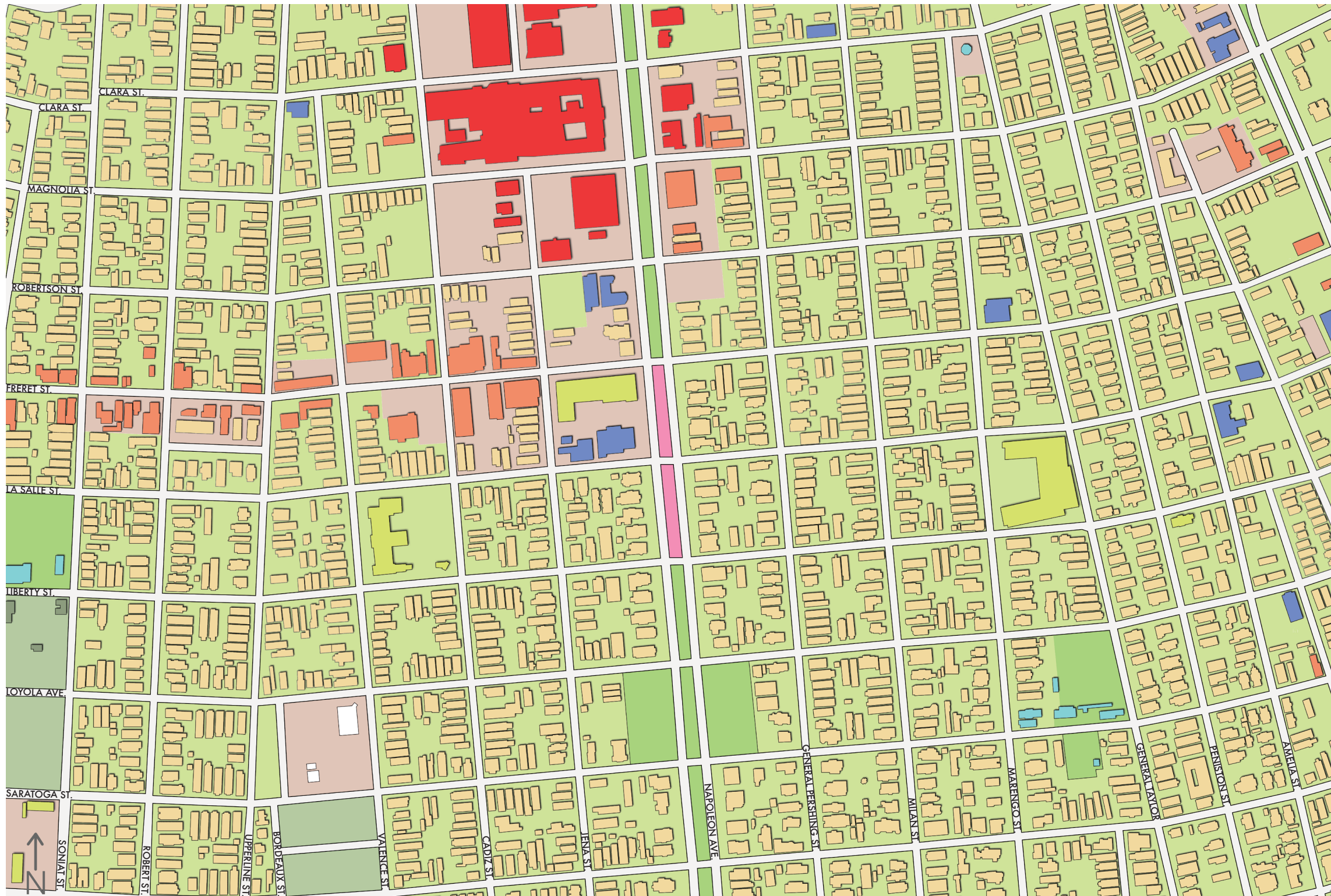
Three parks

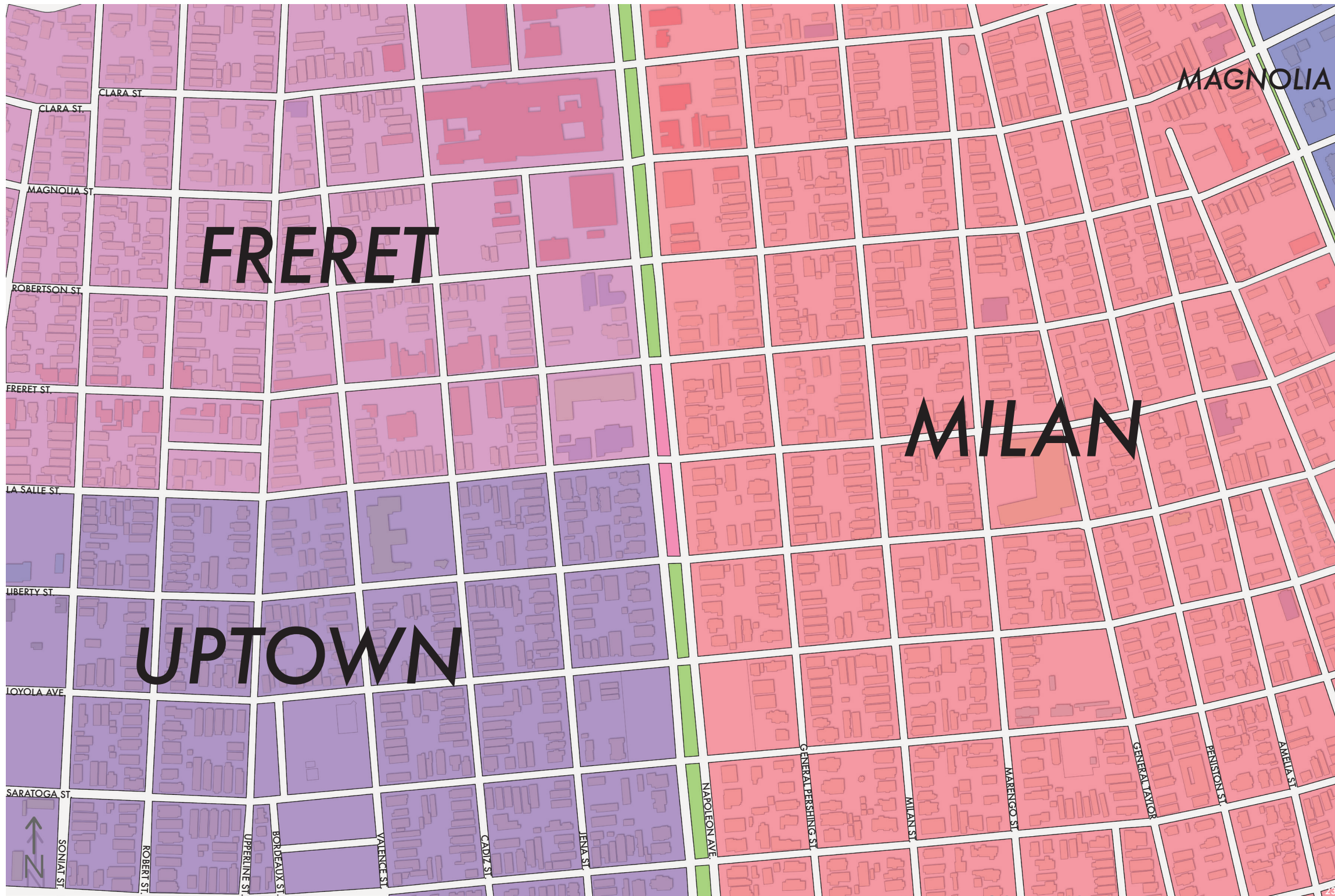
Junior League of New Orleans Thrift Store

Neighborhood Housing Services of New Orleans, which provides educational programs about home ownership

and an eclectic mix of housing styles more often than not in vivid colors

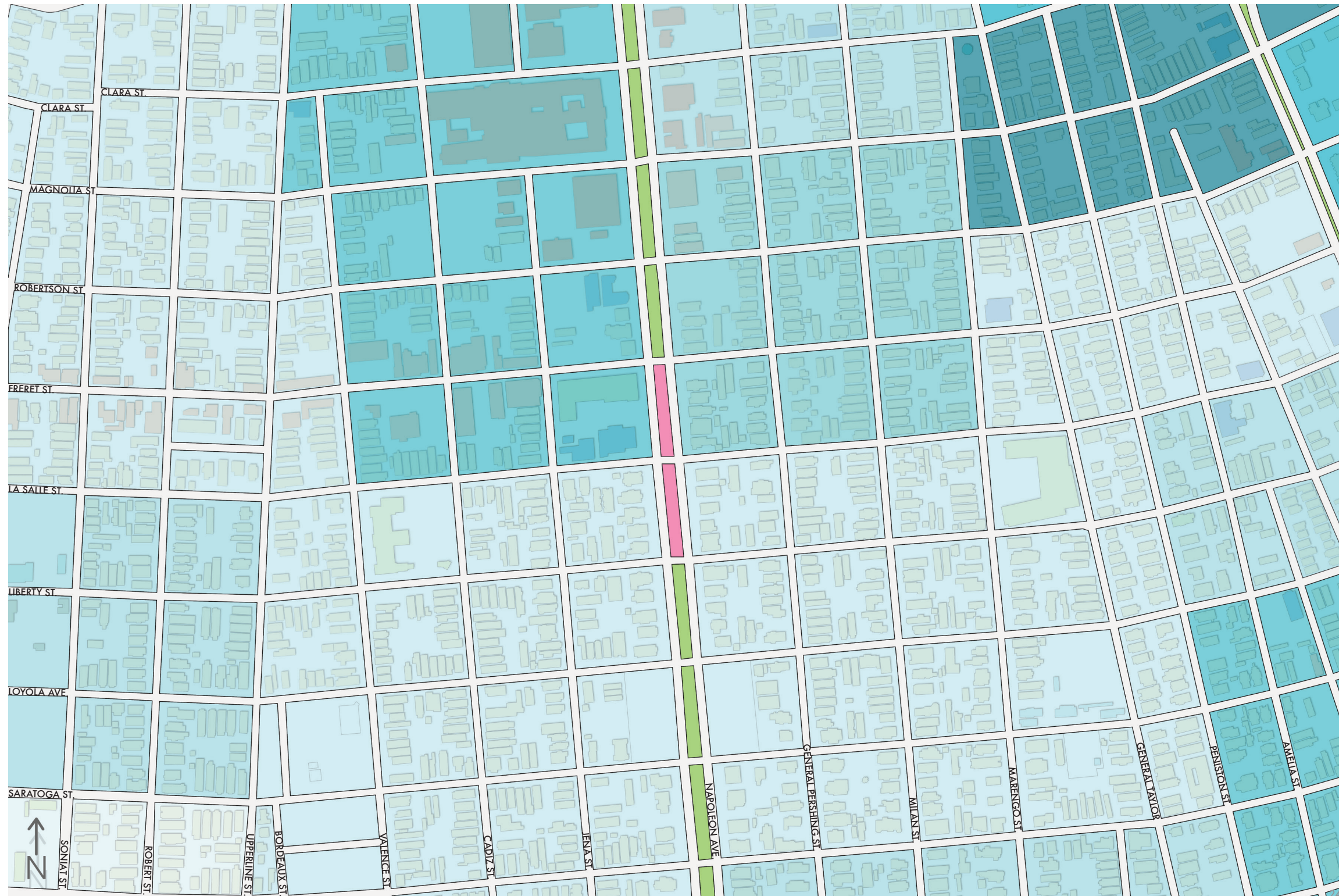
Within 1mi of the Site lies:  
Tulane University and Loyola University  
The St. Charles Trolley Line  
Audubon Park  
as well as many parade routes for Mardi Gras



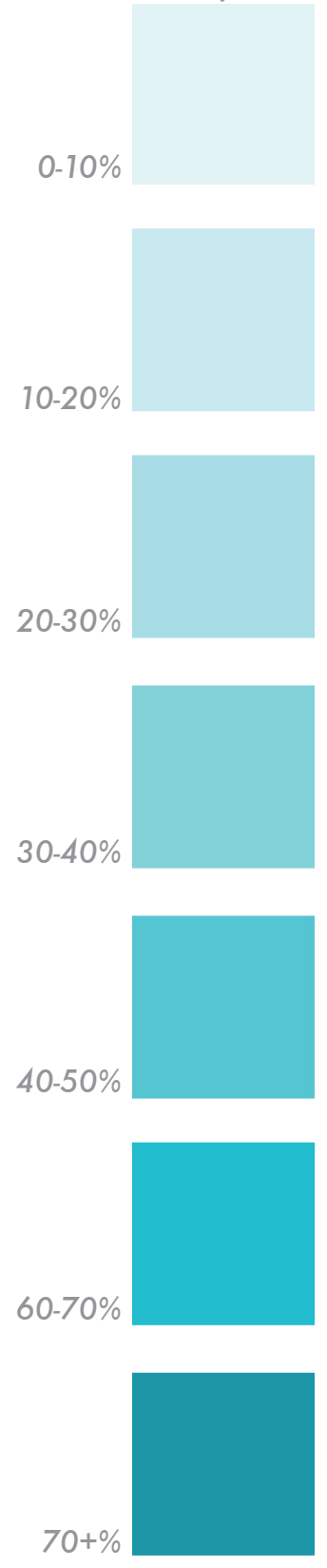


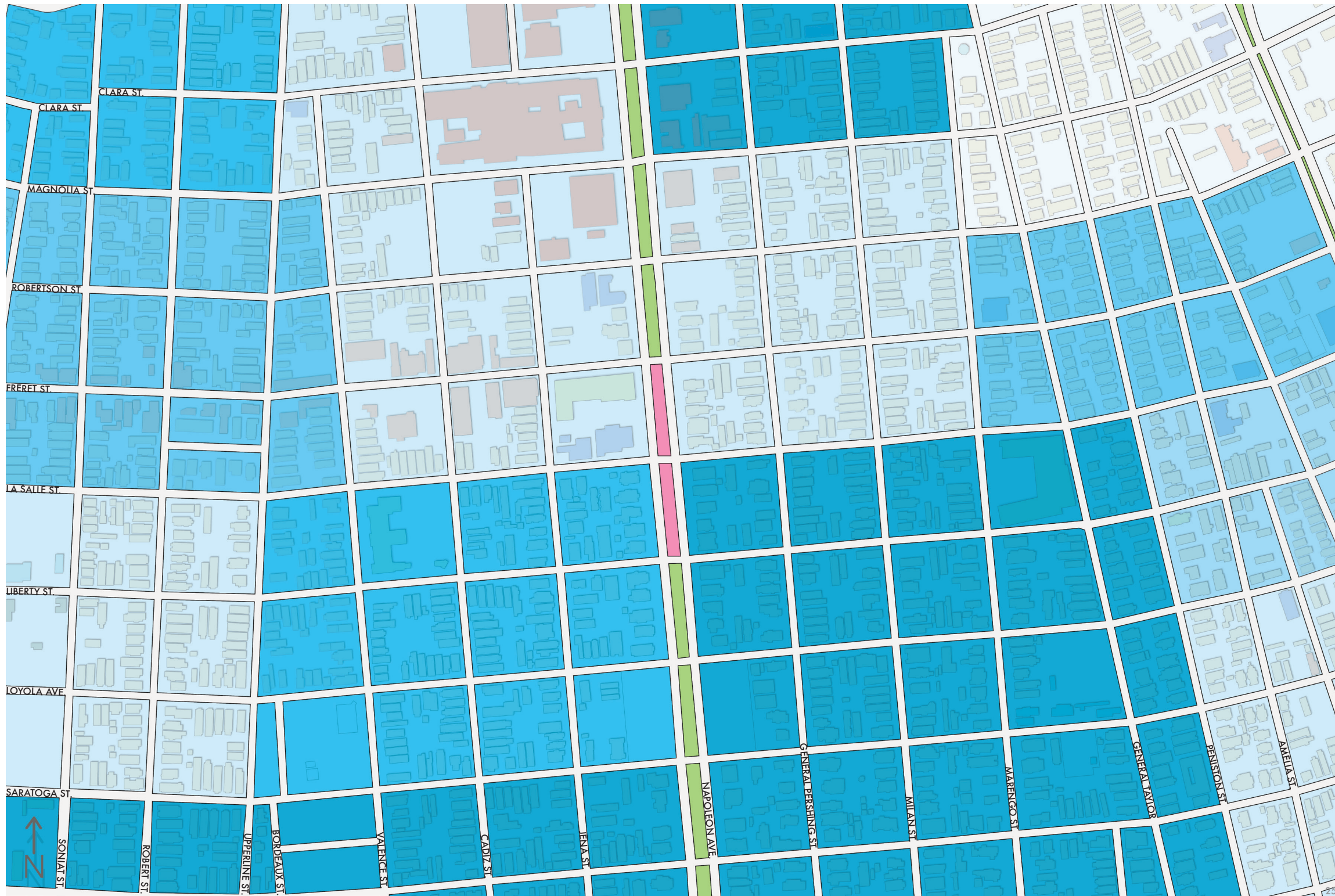
Map of the neighborhoods surrounding the Site.



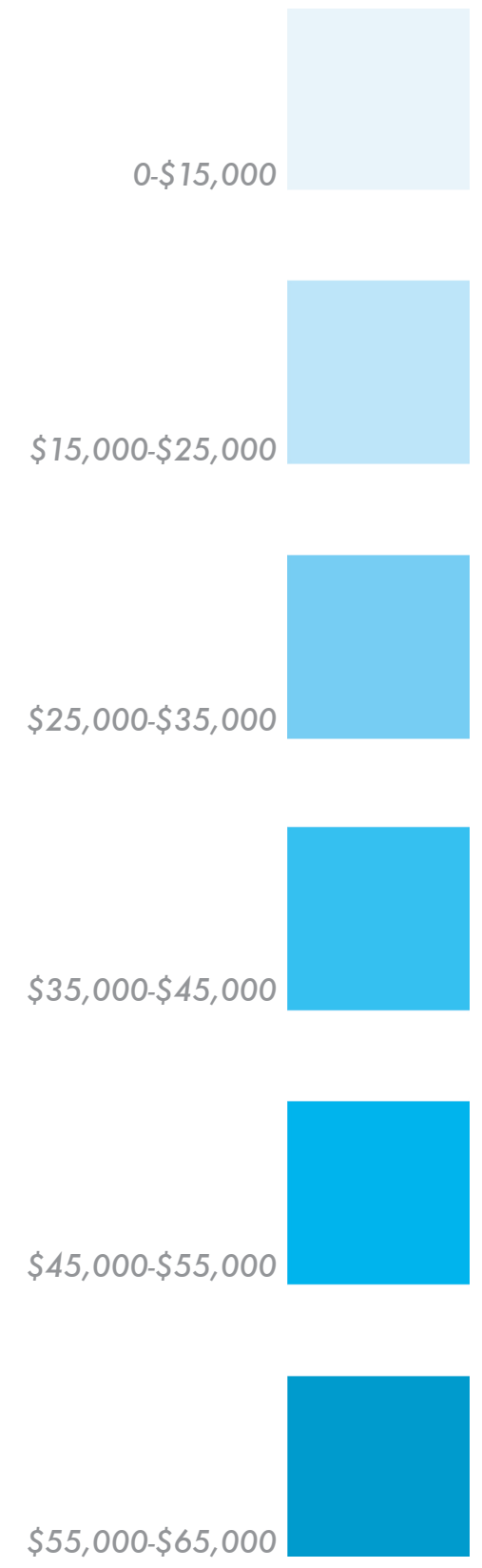


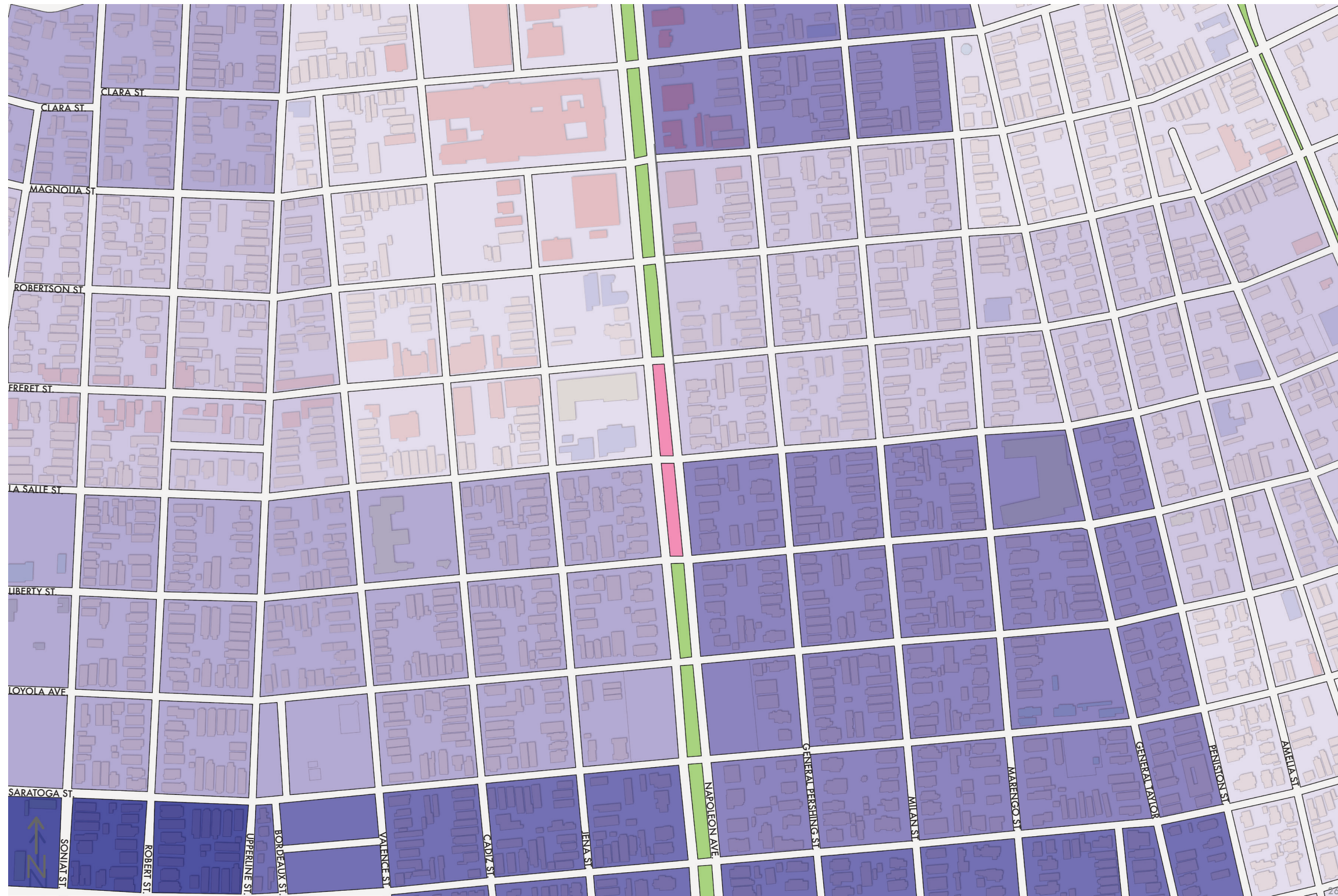
11  
Households with Income Below Poverty Level





12  
Median Household Income



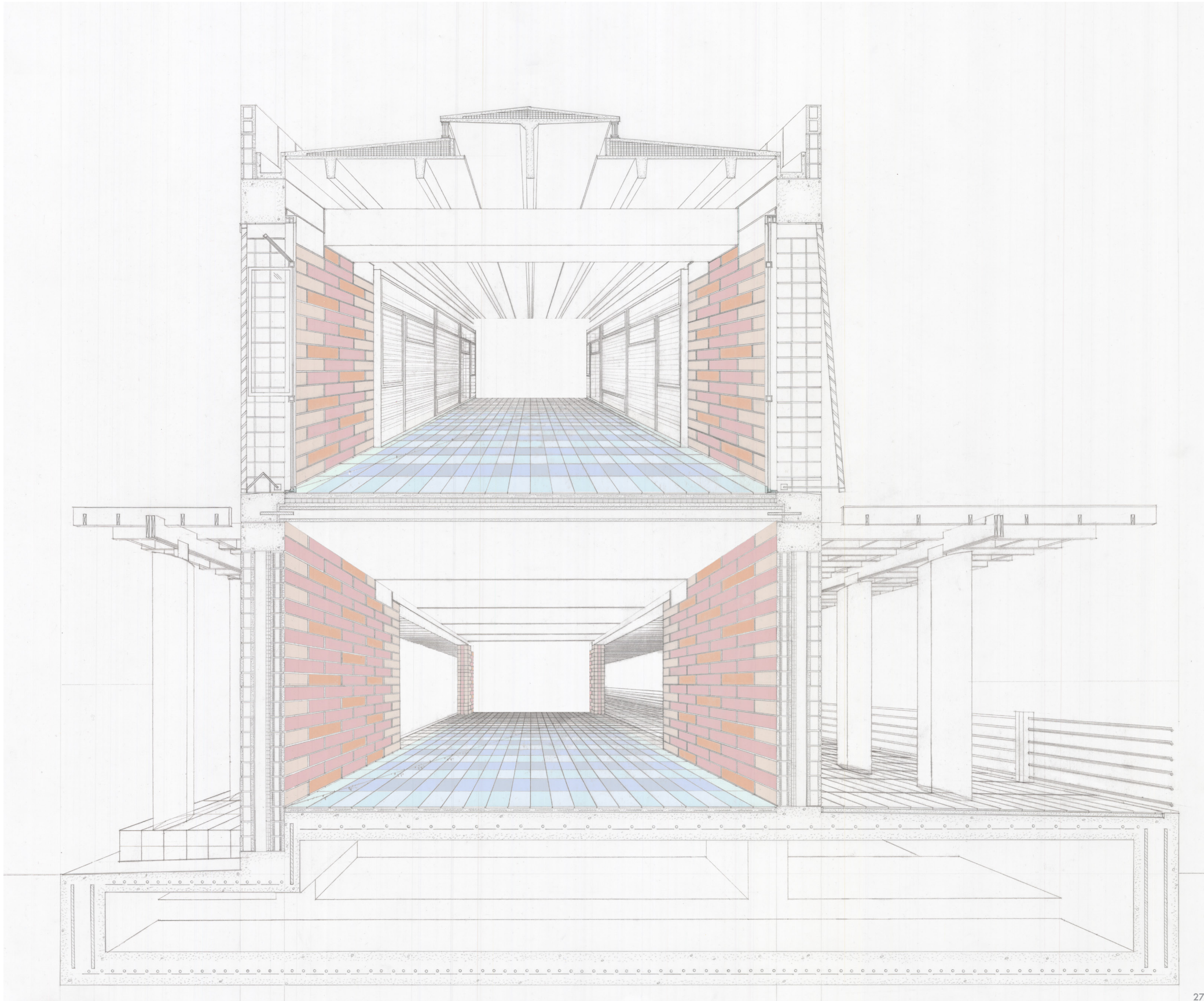


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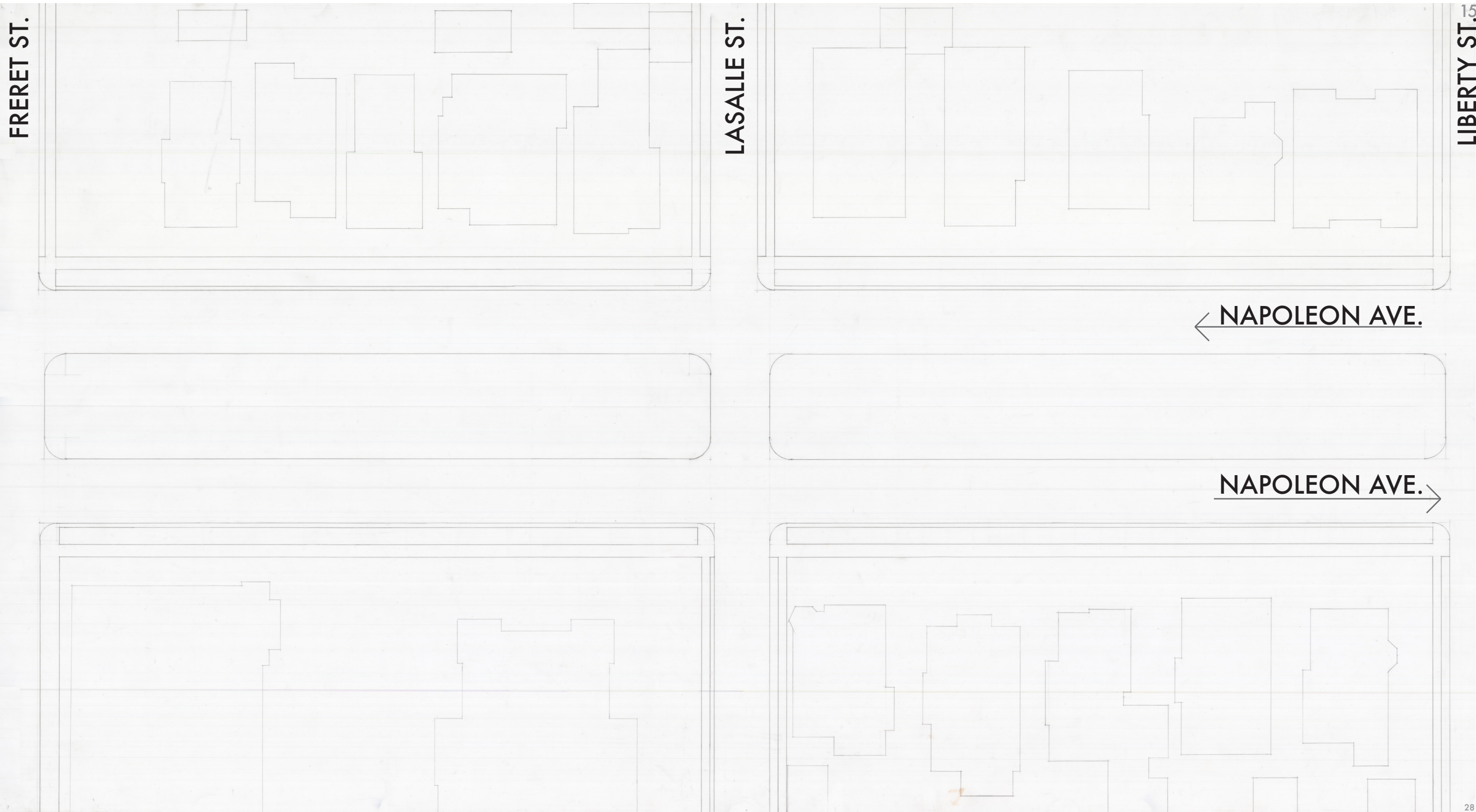
Median Family Income

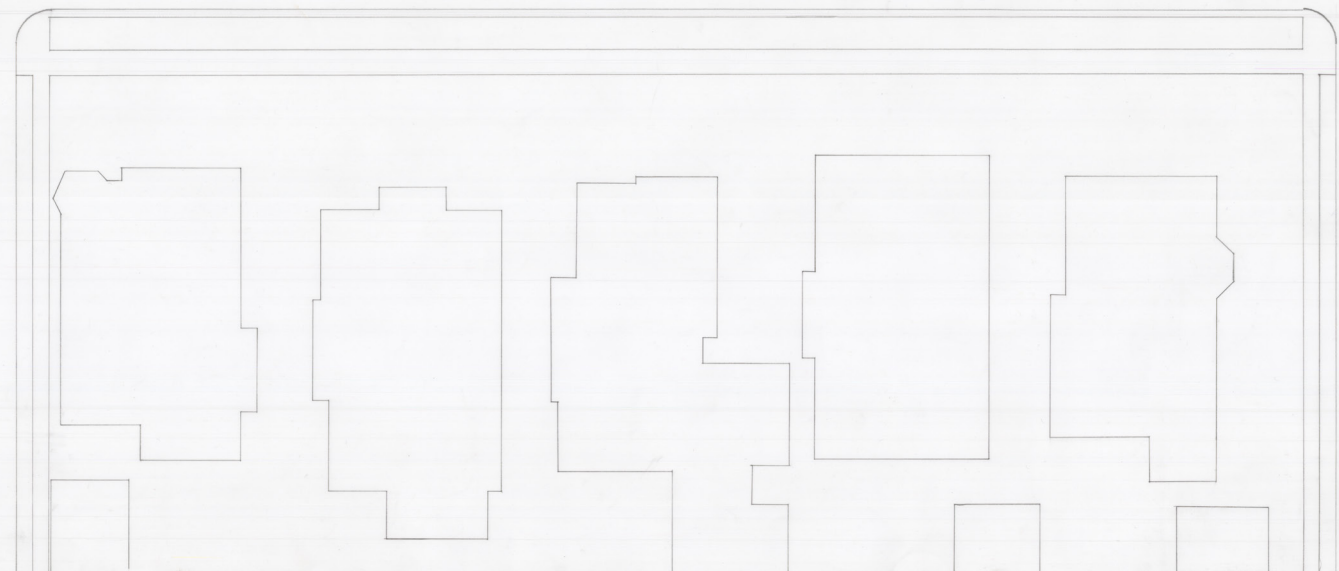
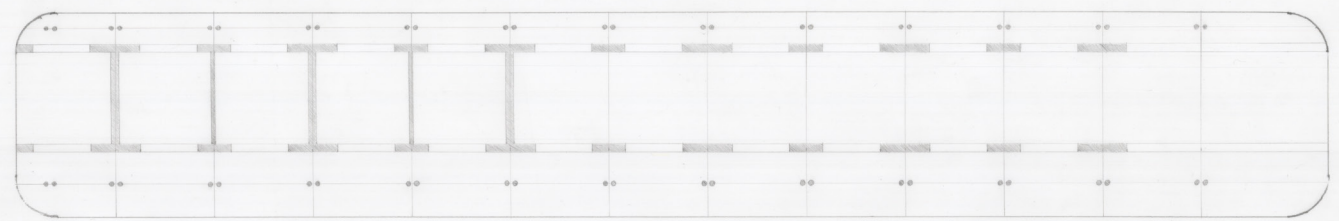
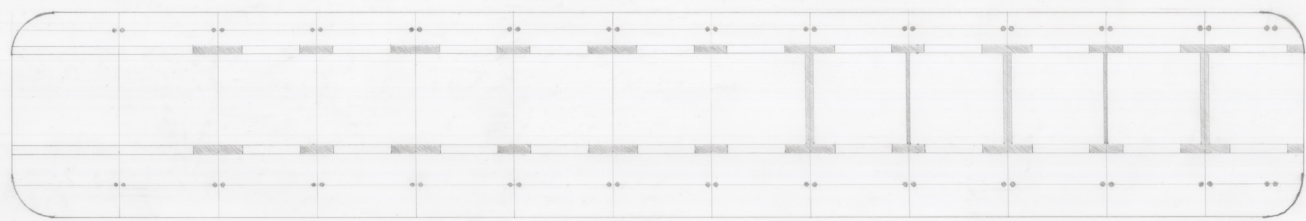
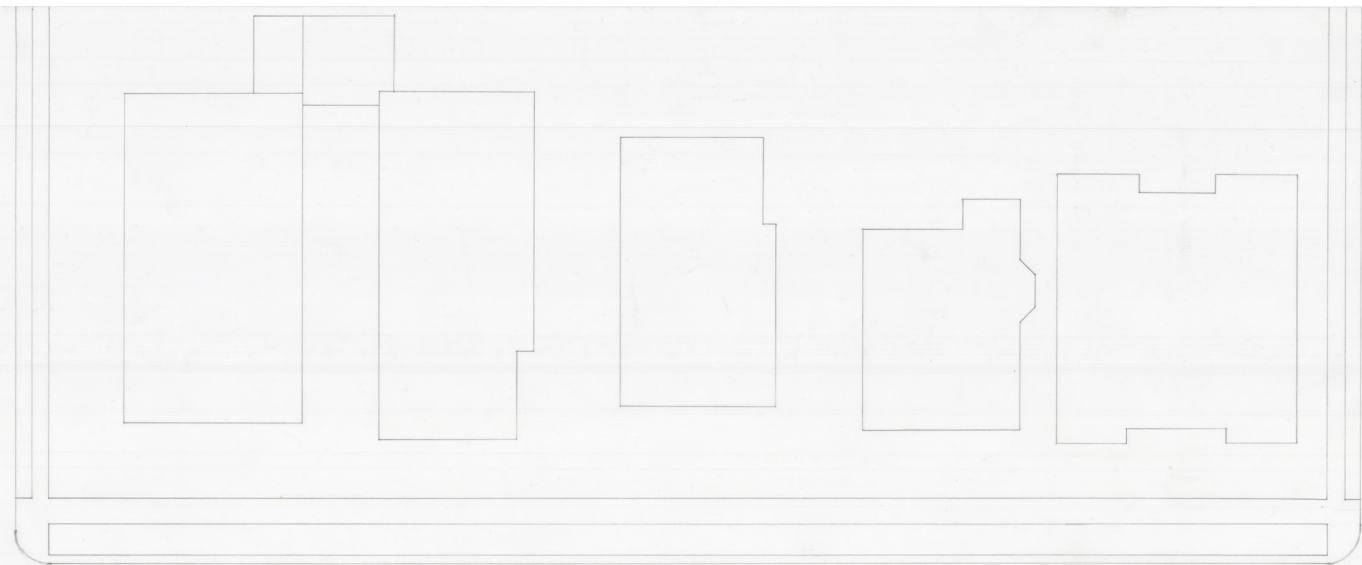
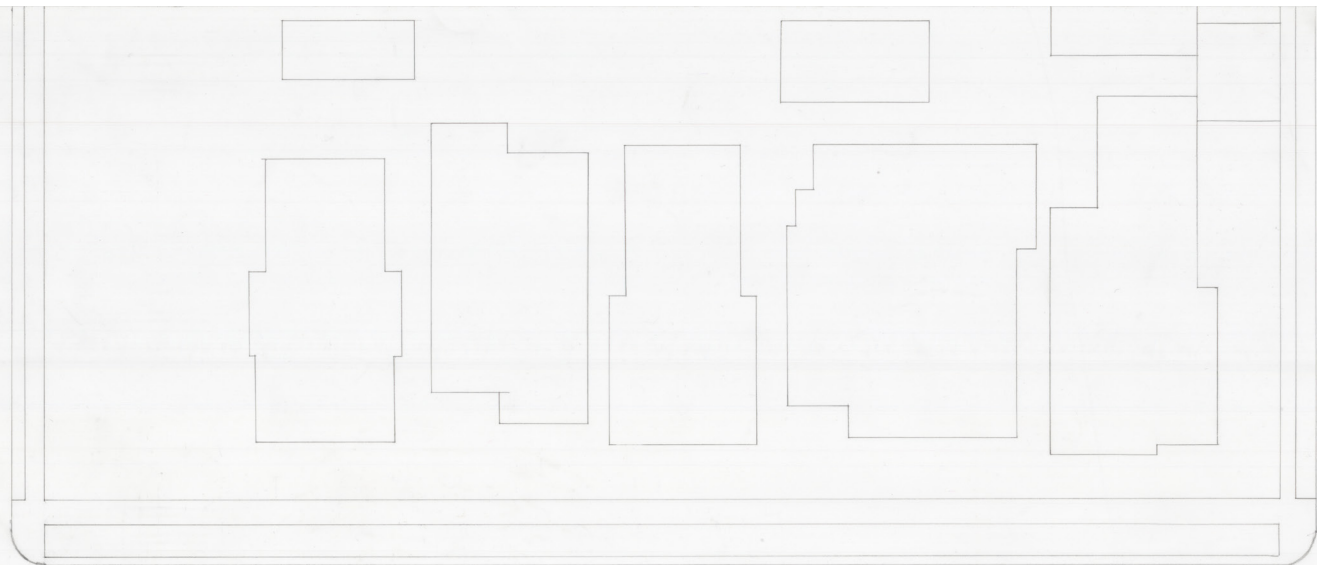


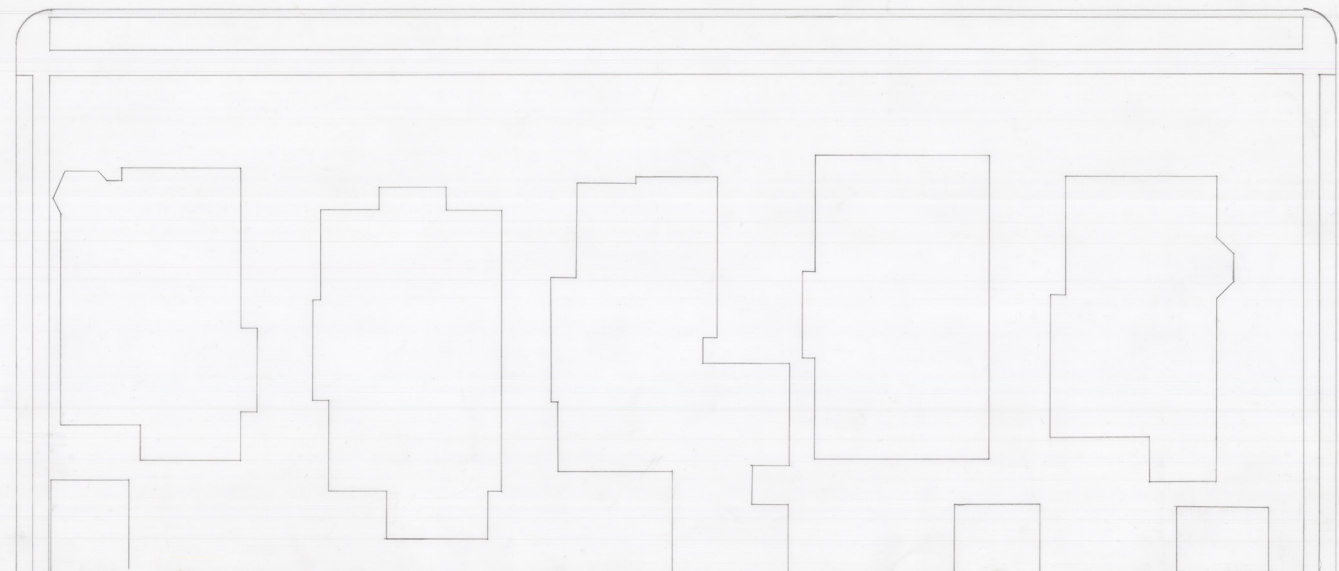
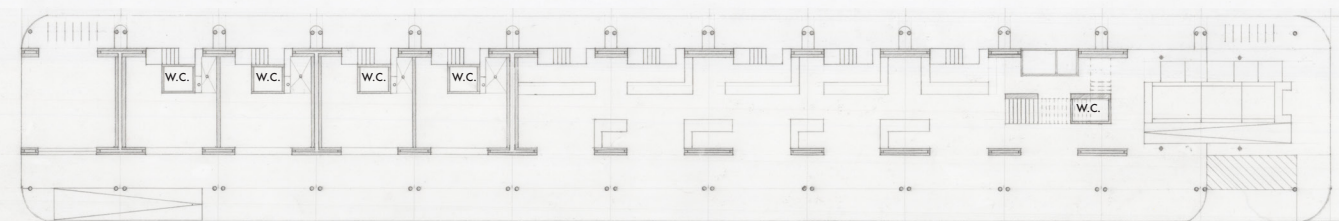
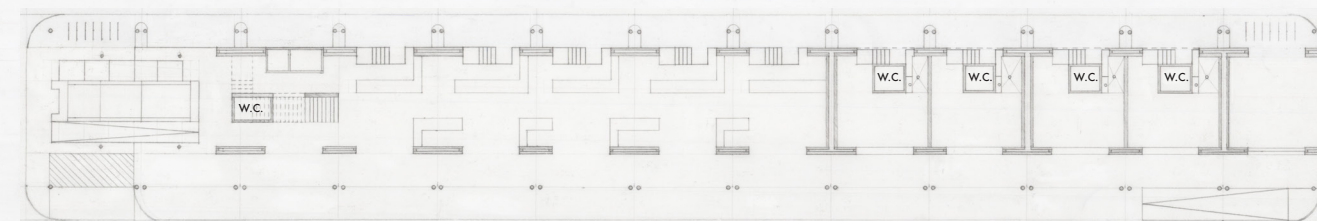
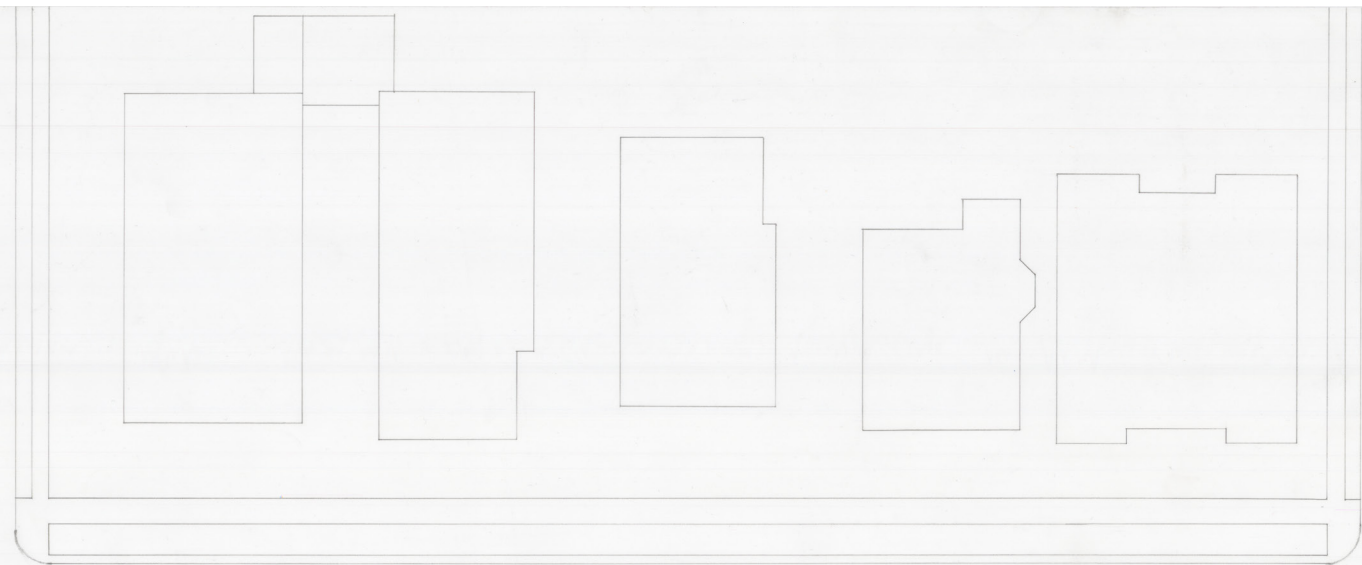
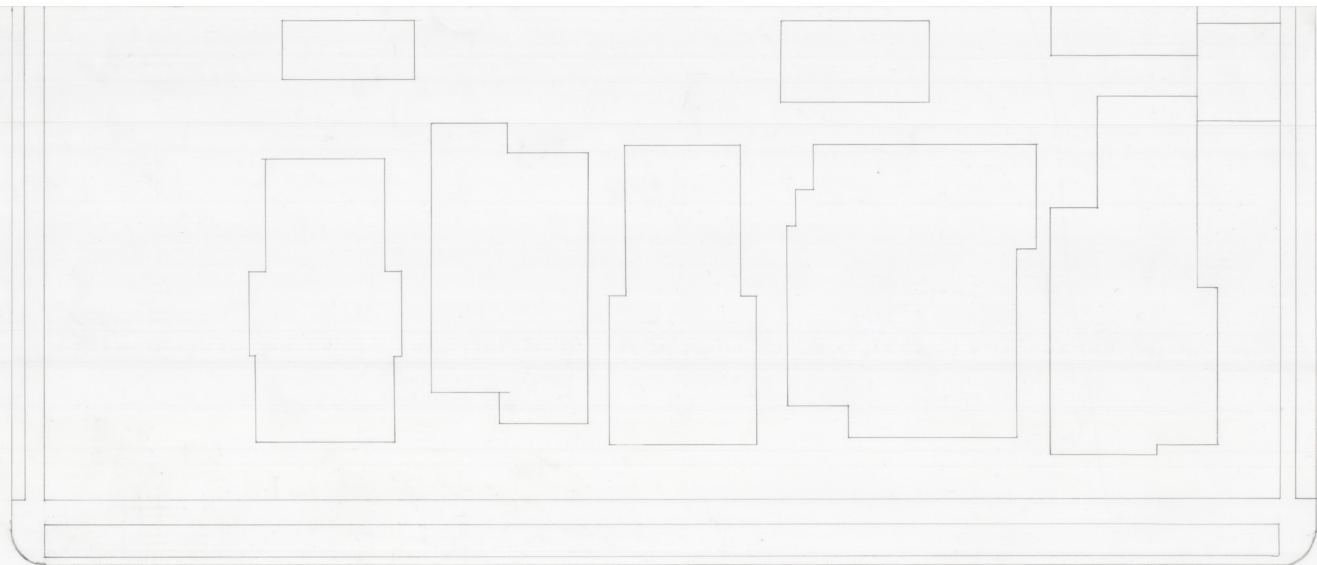
# The Neutral Ground Market & Grocery

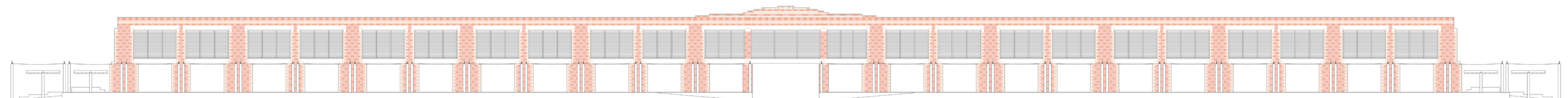


27 Transverse Section Perspective, looking South

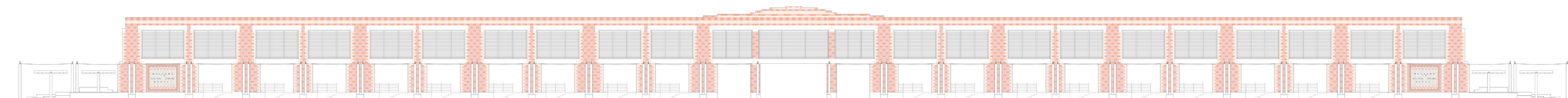








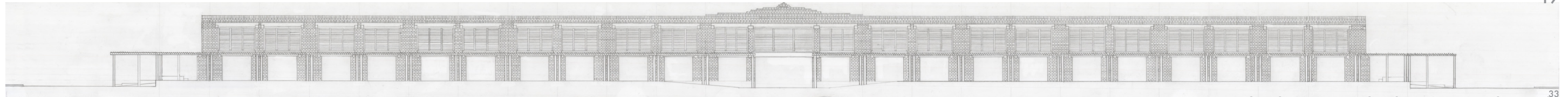
*West Facade Elevation*<sup>31</sup>



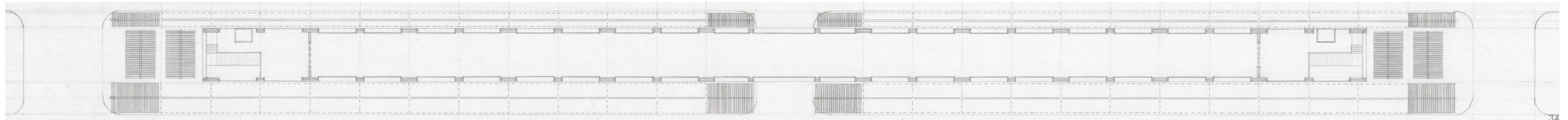
*East Facade Elevation*<sup>32</sup>

# THE NEUTRAL GROUND MARKET

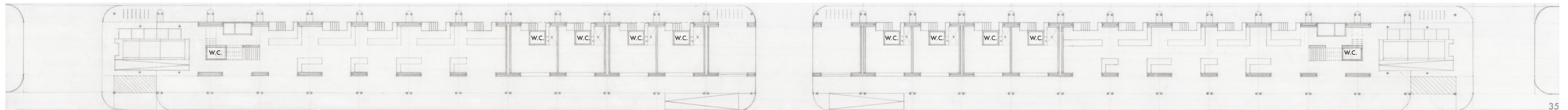




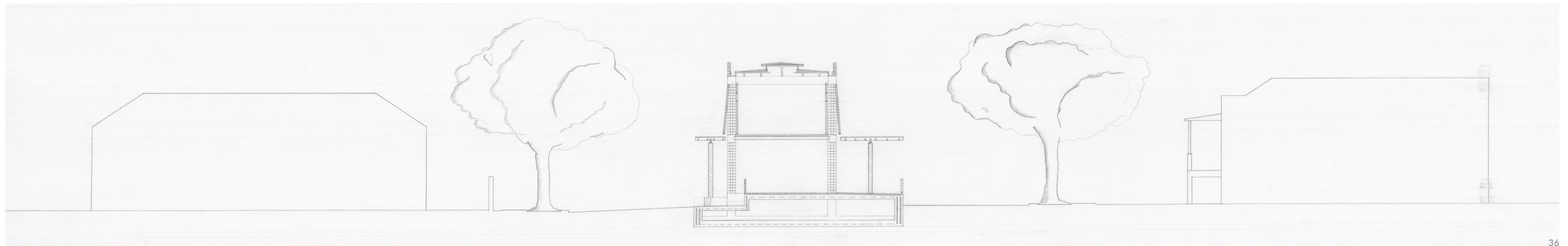
West Facade Elevation with Alternative Colonnade <sup>33</sup>



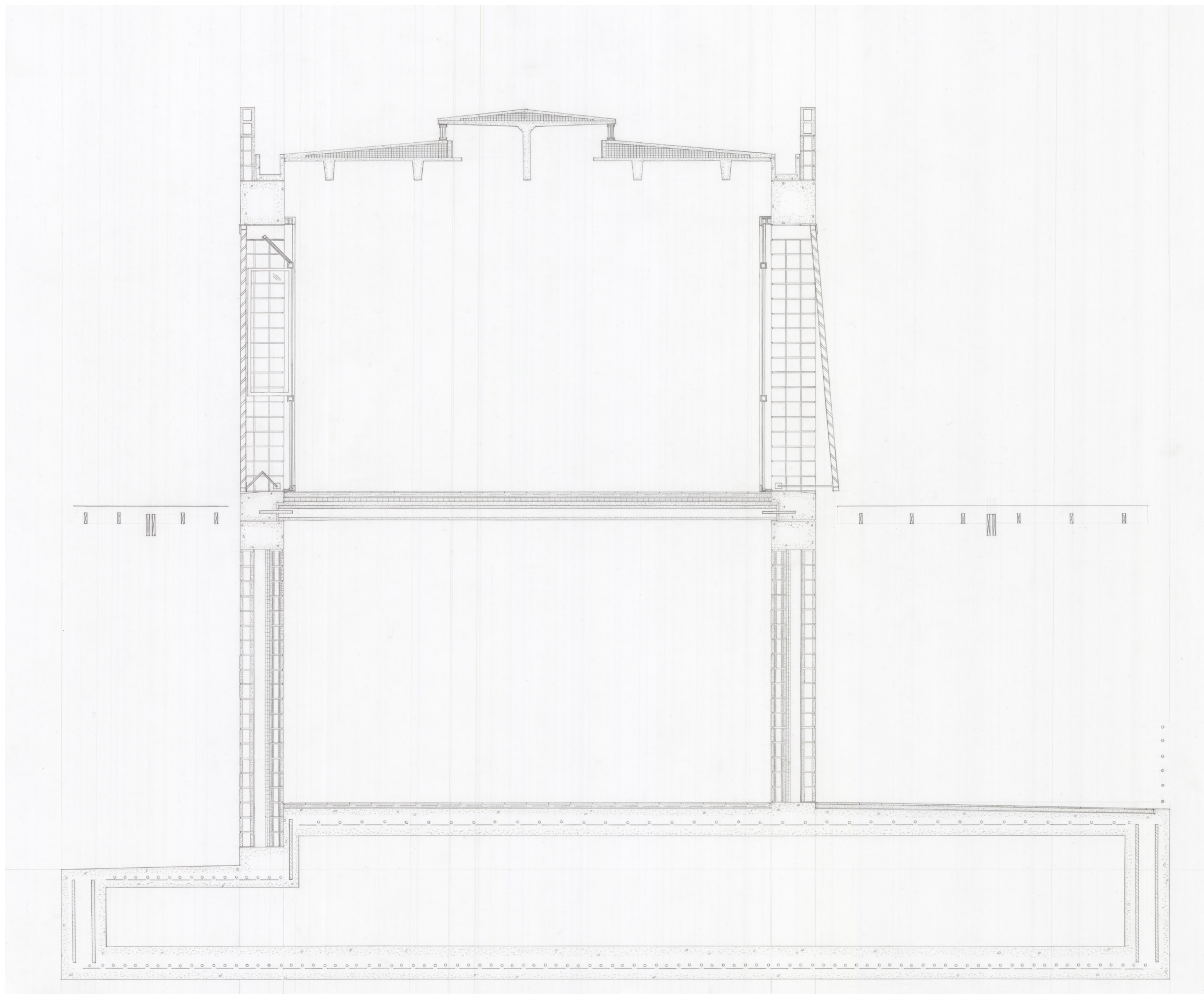
Grocery Store without Shelving Layout - Second Floor Plan with Alternative Colonnade <sup>34</sup>



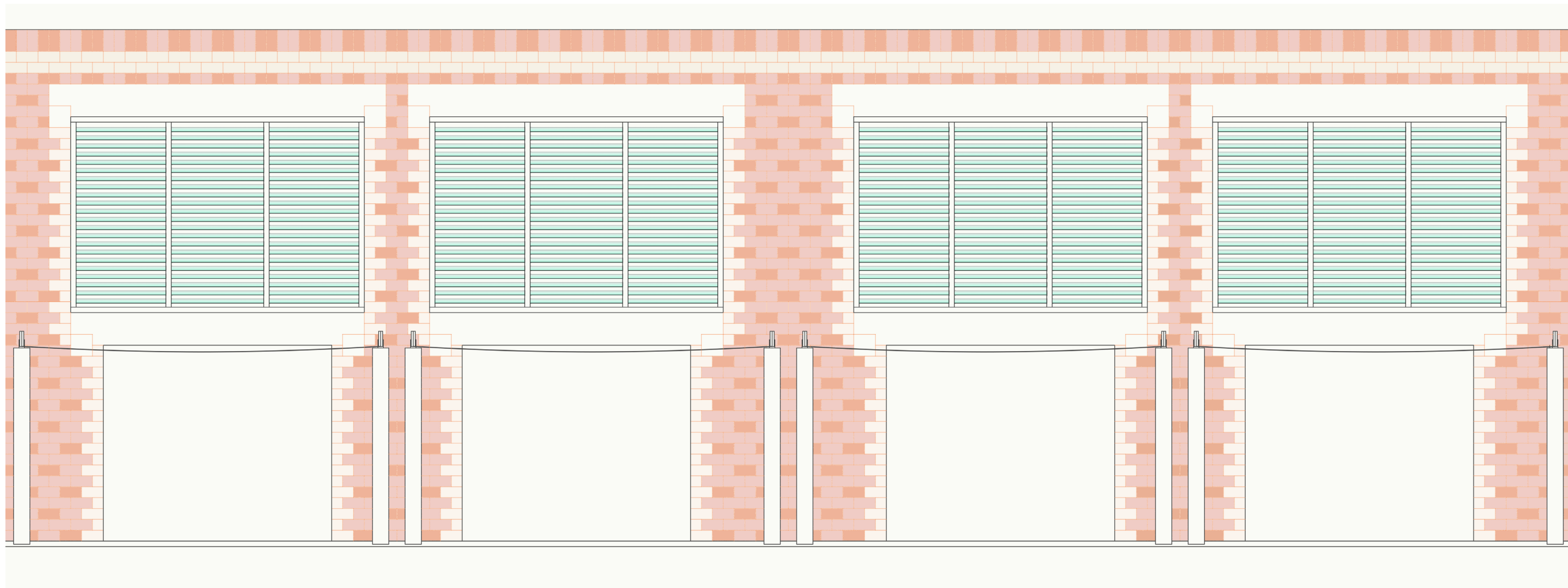
Farmer's Market Layout - First Floor Plan <sup>35</sup>



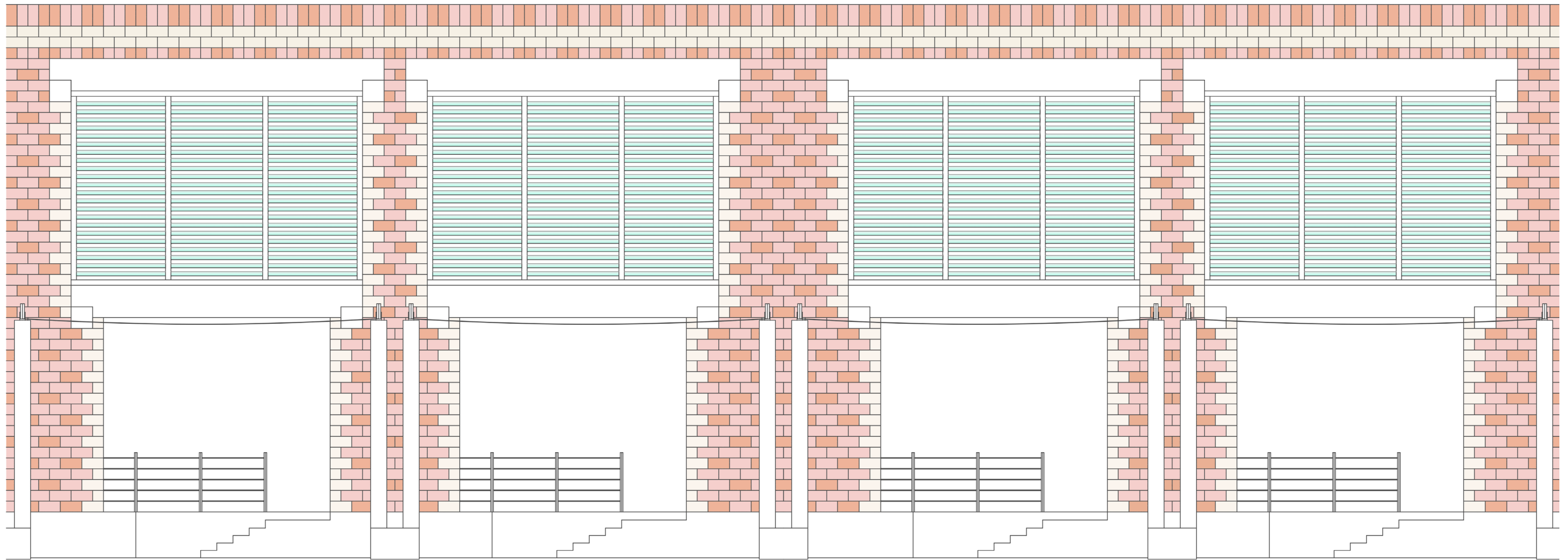
Transverse Section through Building and Site <sup>36</sup>



Section through Building without elevation behind, looking South



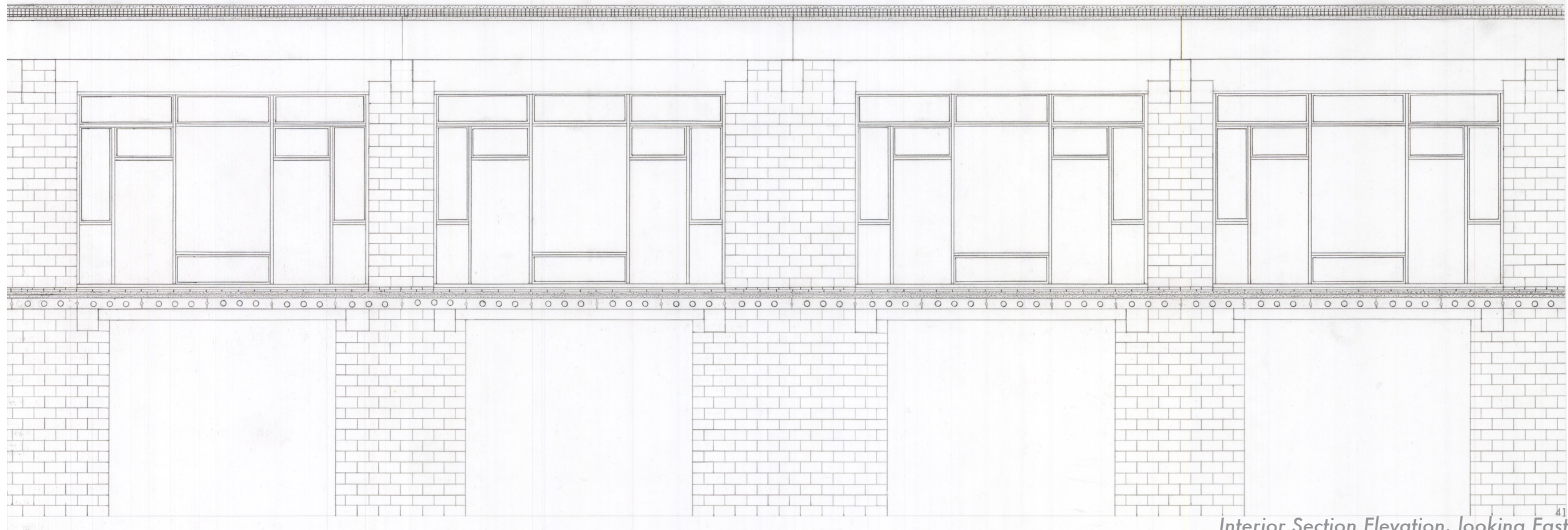
Elevation of Four Bays - West Facade<sup>38</sup>



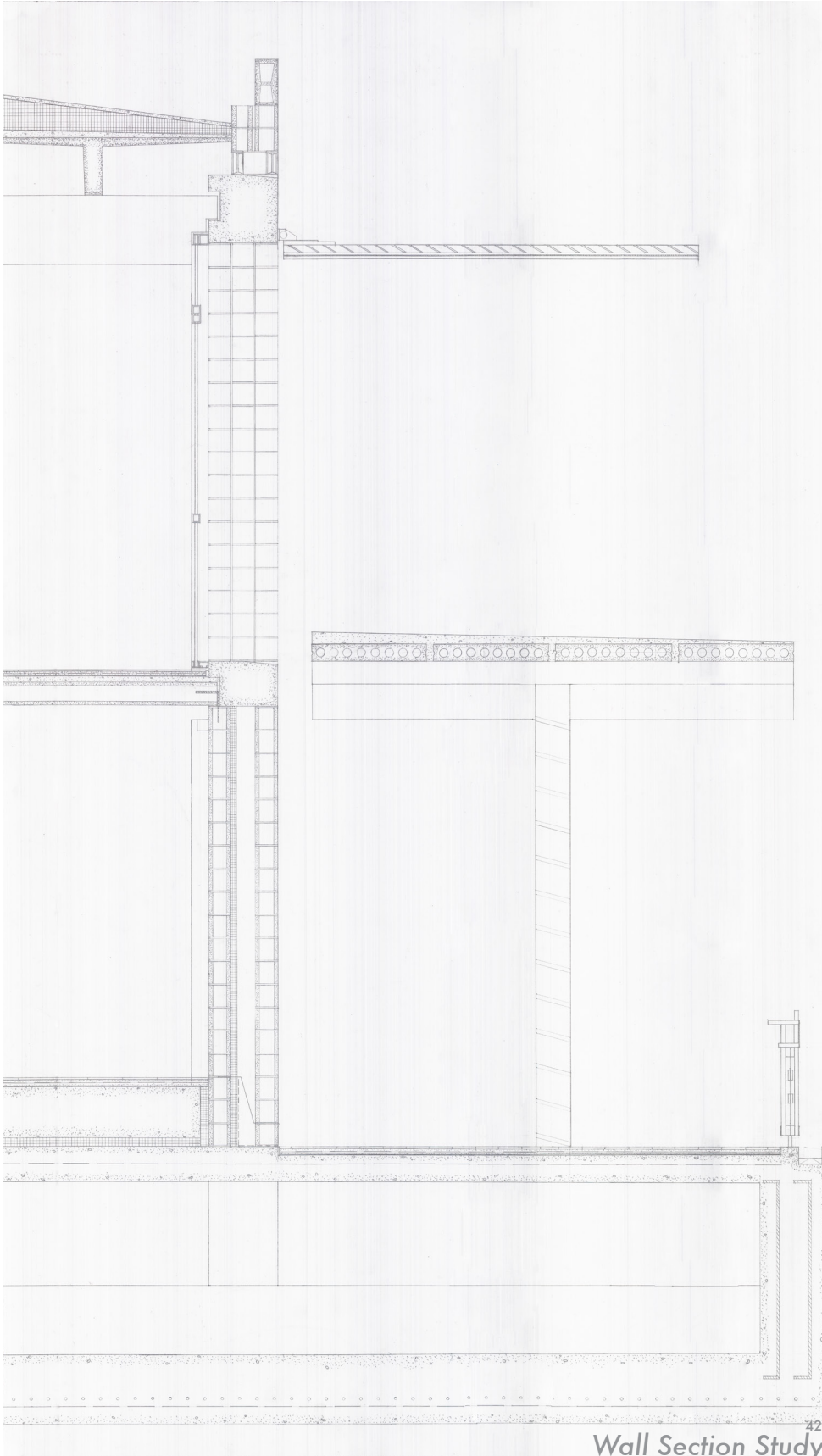
Elevation of Four Bays - East Facade<sup>39</sup>



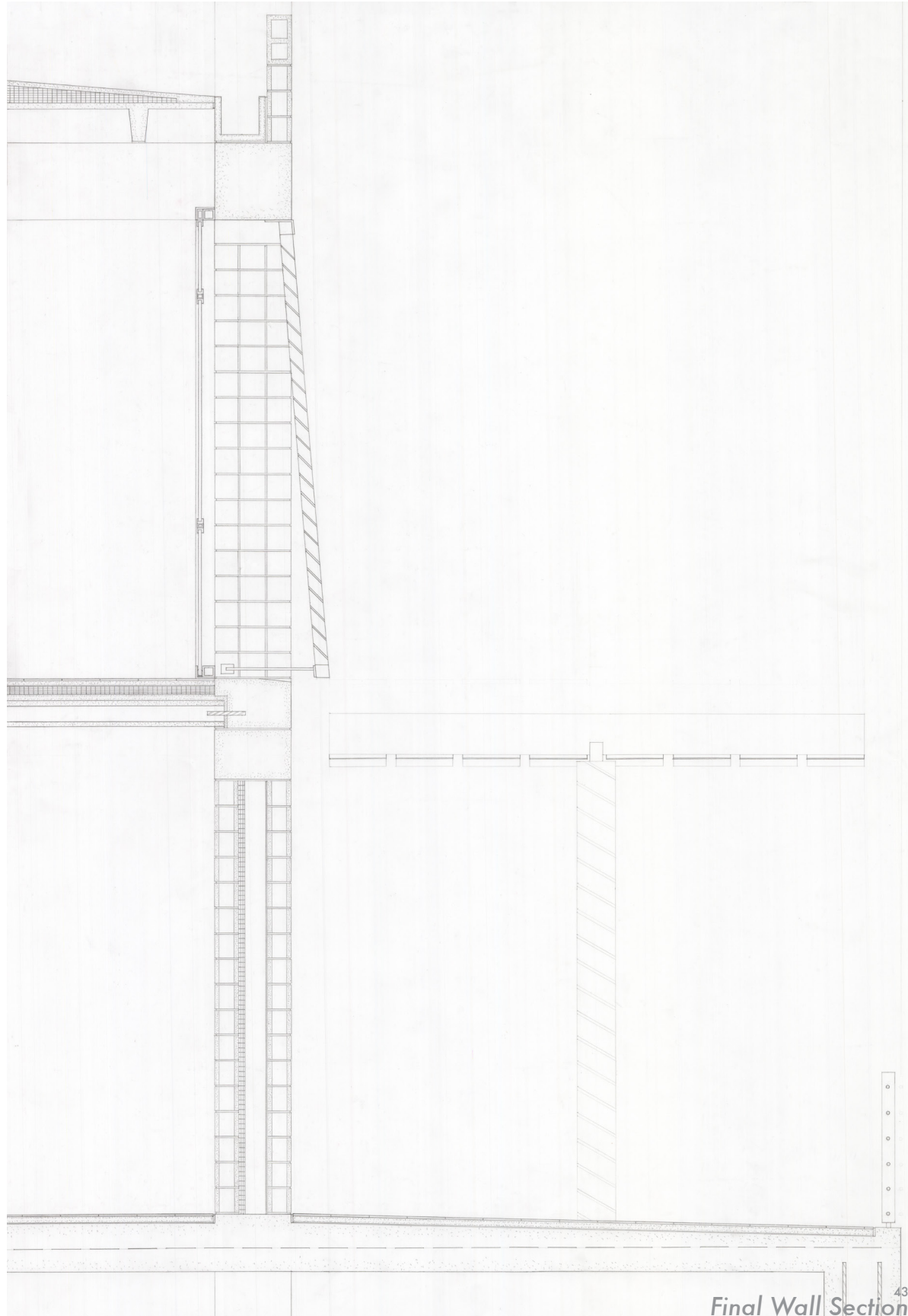
Elevation of Four Bays without Colonnade - West Facade <sup>40</sup>



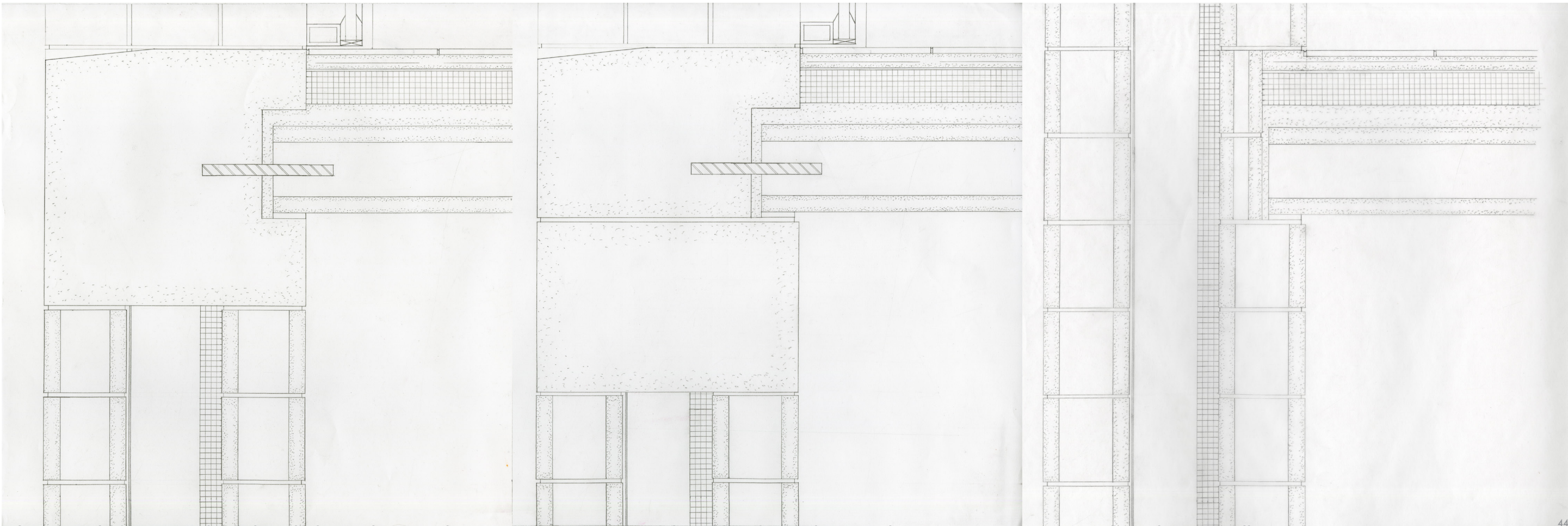
Interior Section Elevation, looking East <sup>41</sup>



Wall Section Study <sup>42</sup>



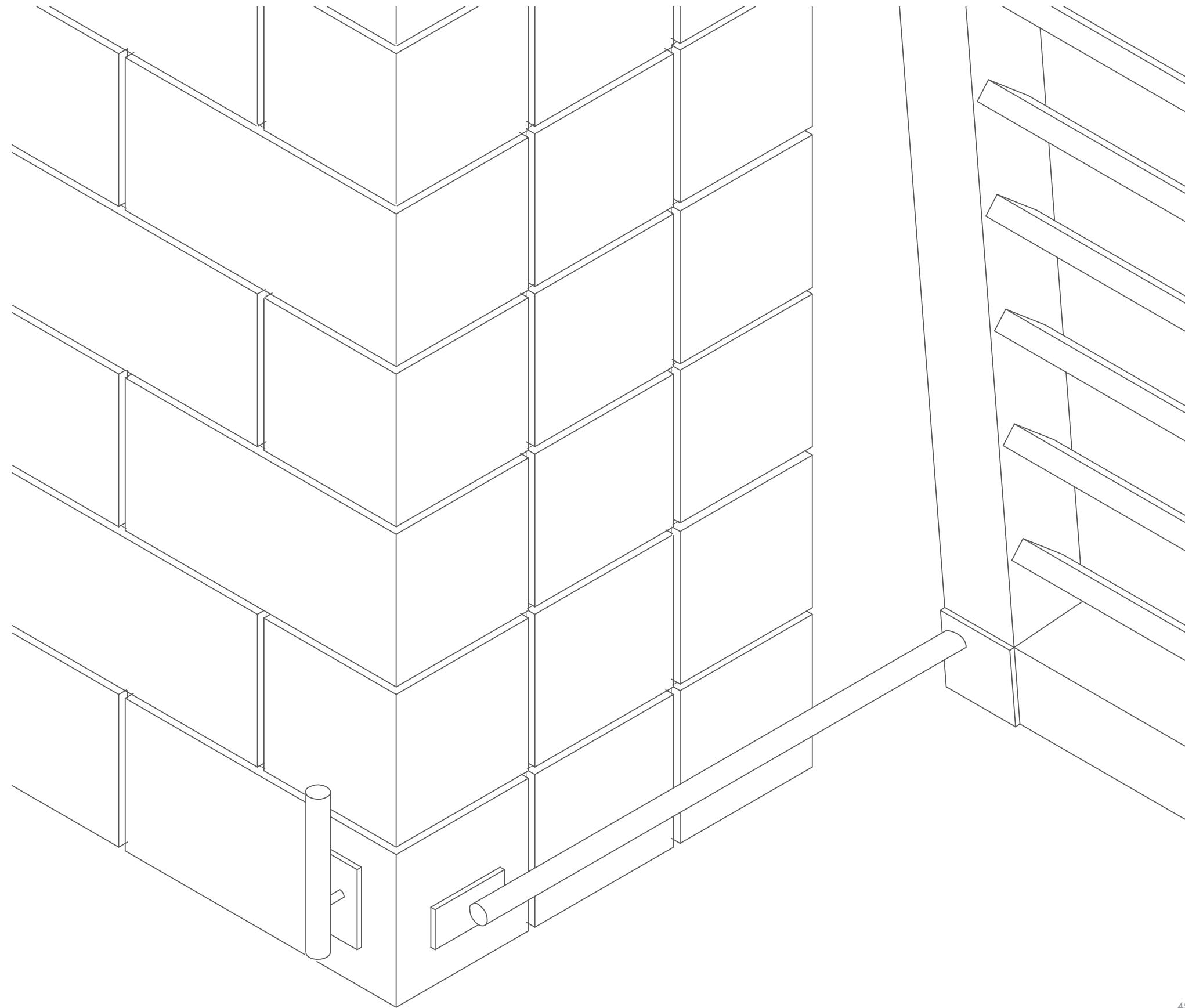
Final Wall Section <sup>43</sup>



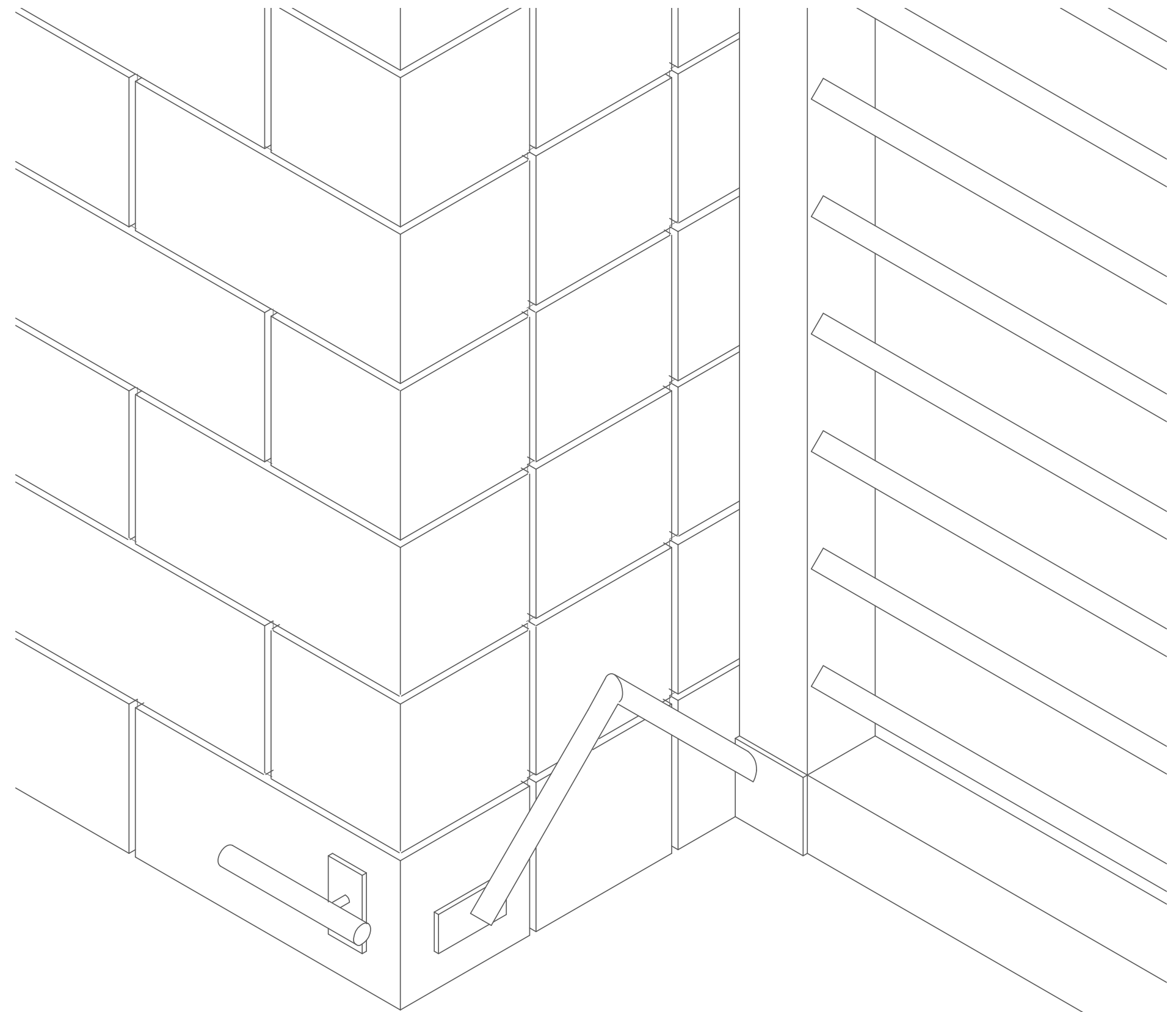
*Floor Details - 1. Section through end of First Floor Lintel*

*2. Section through middle of First Floor Lintel*

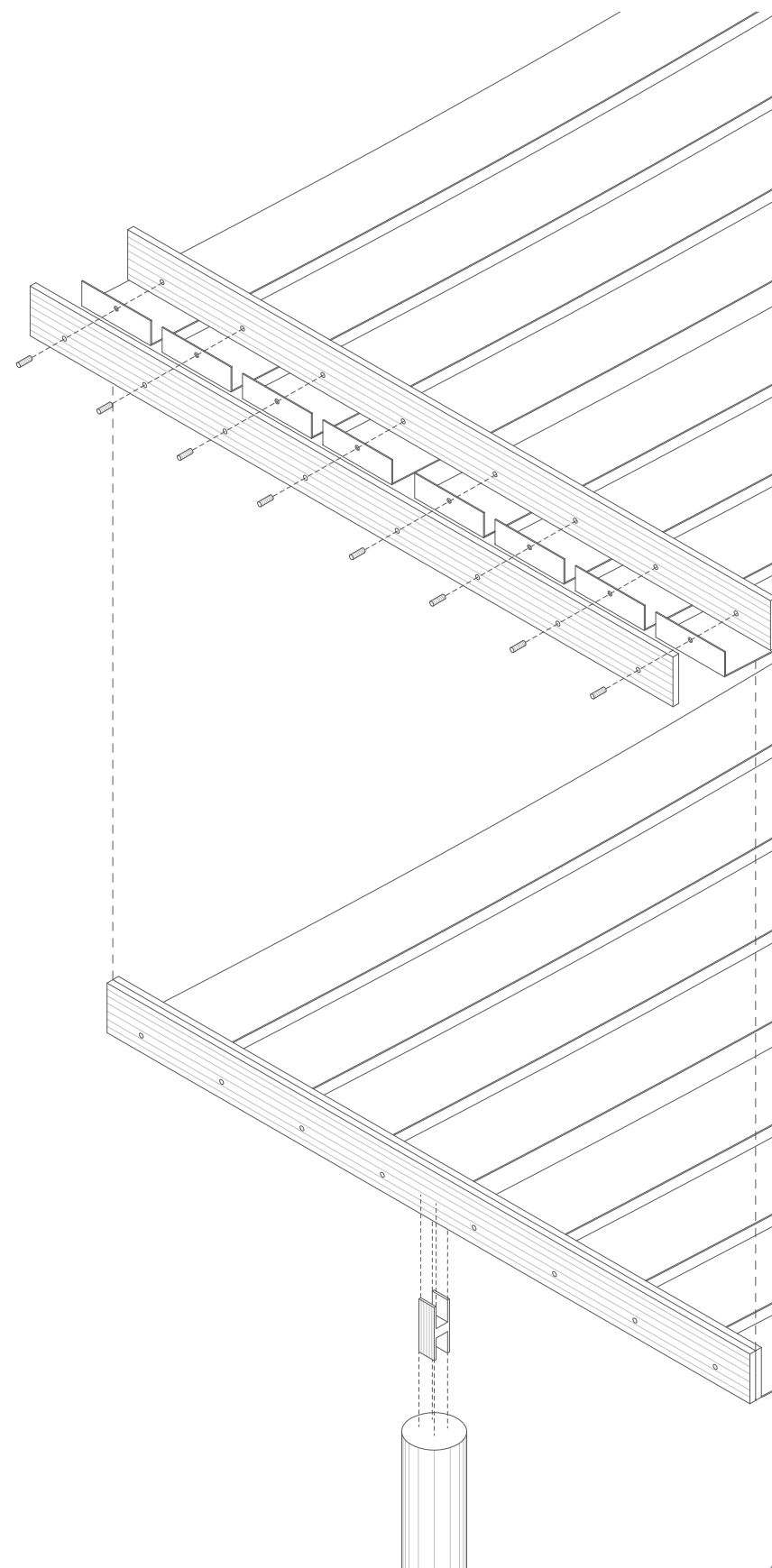
*3. Section through CMU wall*





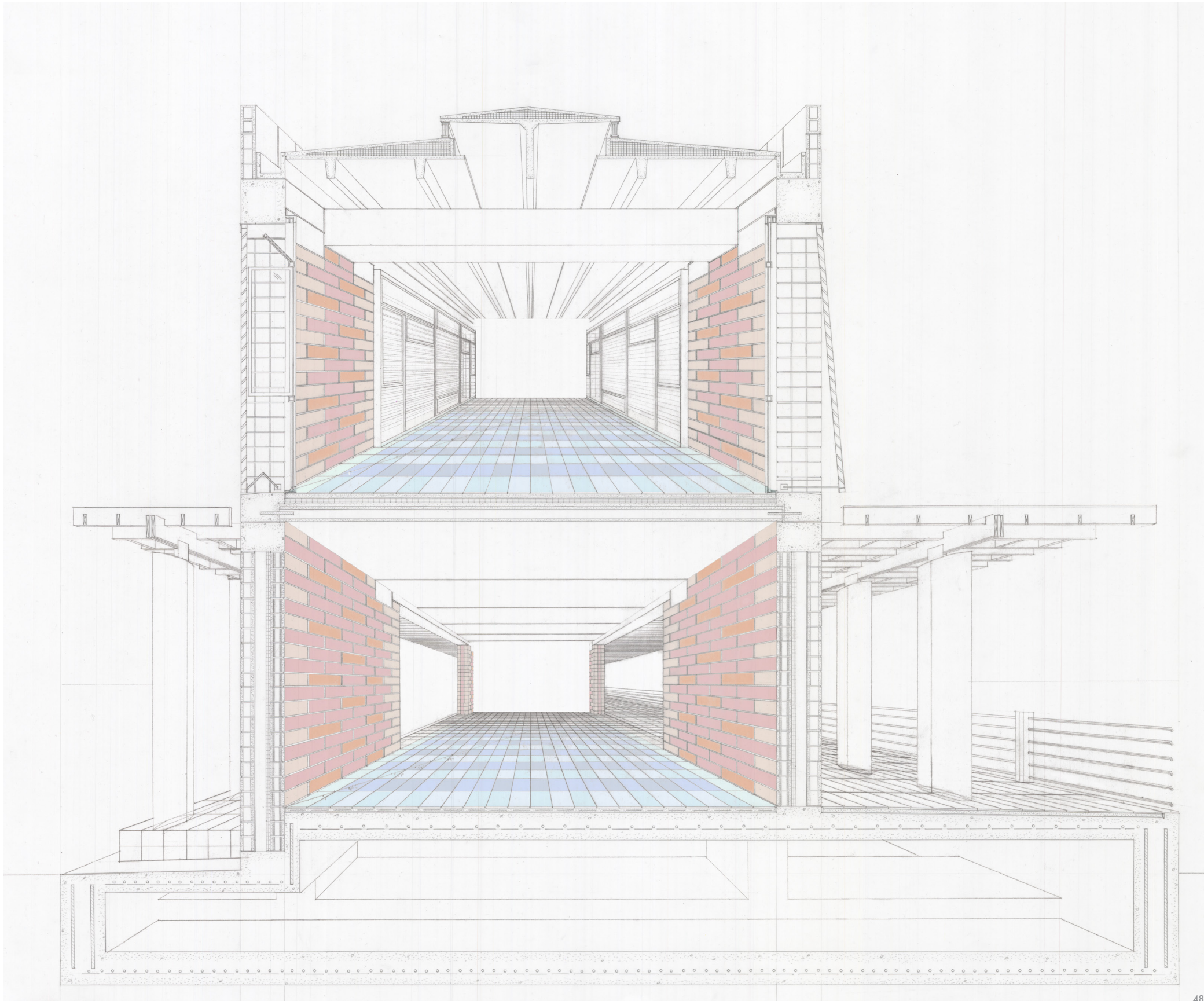


*Gear Detail for closing Bermuda Shutters on Grocery Level*

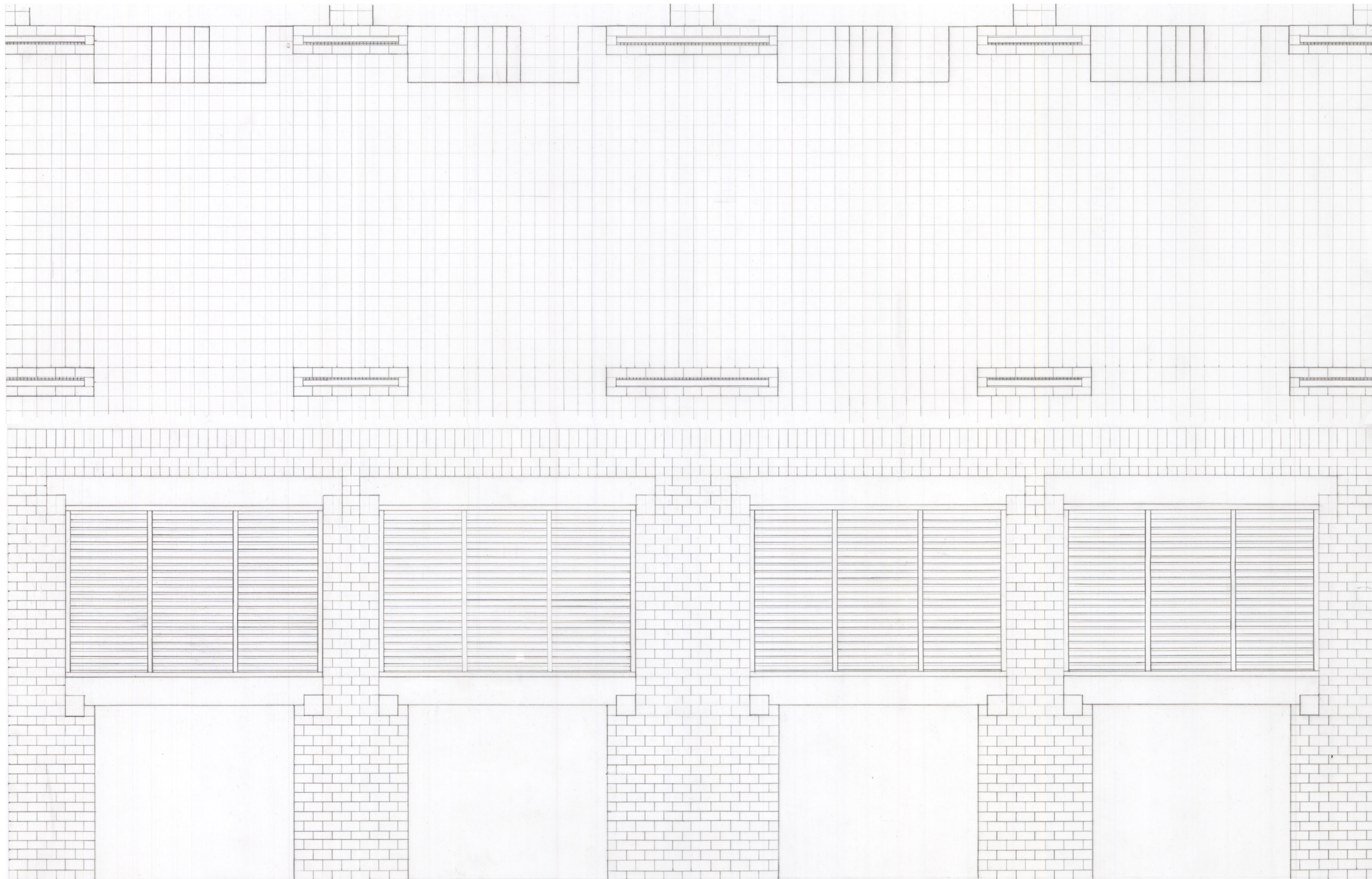


*Assembly Diagram of Exterior Colonnade  
with Fabric Awning*

# The Neutral Ground Market & Grocery



48 Transverse Section Perspective, looking South



**FLOOR PATTERN DESIGN PROCESS AND COMPOSITION**

Fold Out showing relationship of West Facade to Floor Pattern Plan<sup>49</sup>



NEN	NNN	ENE	NNE
ENN	ENE	NNN	ENN
NNE	NEN	NEN	ENE
NEN	NNN	ENE	NNE
ENN	ENE	NNN	ENN
ENN	ENE	NNN	ENN
NNE	NEN	NEN	NEN
NEN	NNN	ENE	NNE
ENN	ENE	NNN	ENN
ENN	ENE	NNN	ENN
NNE	NEN	NEN	NEN
NNE	NEN	NEN	NEN
NEN	NNN	ENE	NNE
NEN	NNN	ENE	NNE
ENN	ENE	NNN	ENN

EEE ENN EEN ENE  
 NNN NEE NNE NEN

EEE ENN EEN ENE  
 NNN NEE NNE NEN

NEN NNN ENE NNE  
 ENN ENE NNN ENN  
 NNE NEN NEN NEN

Are all combinations possible for  
 the Anni Albers composition

but of those eight combinations,  
 she chooses only five

these five combinations are then  
 arranged into three sequences

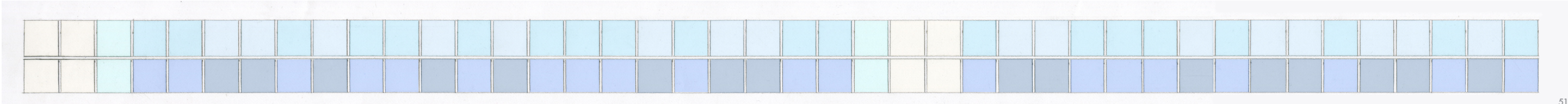
there are never two extremes  
 beside one another

the order of sequences is decided  
 by chance

and each line switches between  
 light gray with black and dark  
 gray with white

N N E E | N E N N | E N E N | N N E N | E E N N

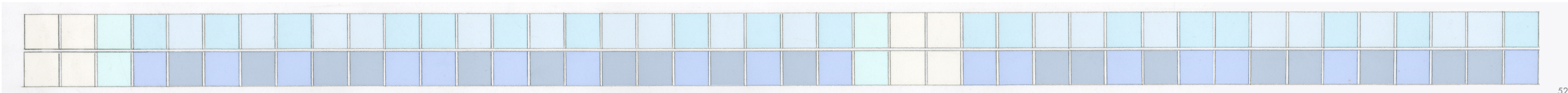
N E E N | N N E N | E E N E | E N E N



51

N E N E | N E E N | N E N E | N E E N | E N E N

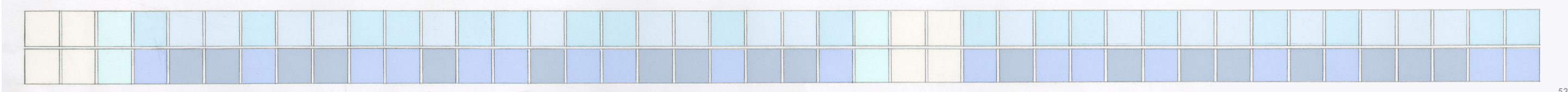
N N E E | N E N N | E E N E | N E E N



52

N E E N | E E N N | E N N E | N N E E | N E E N

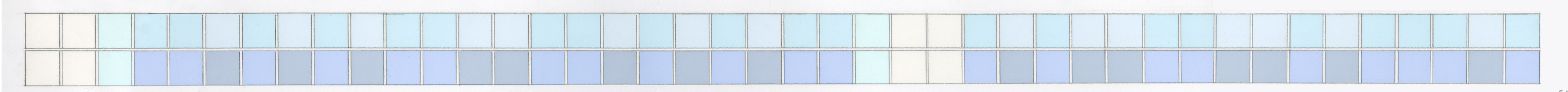
N E N N | E N E E | N E N E | E E N N



53

N N E N | E N E N | N E E N | N E N E | N E N N

N E N E | E N N E | E N E N | N N E N



54

EEEE ENNN EENN EEEN  
 NENN NNEN NENE NEEN  
 NNNN NEEE NNEE NNNE  
 ENEE EENE ENEN ENNE

Following the logic of Anni Alber's piece, these combinations are possible with a sequence of four units

EEEE ENNN EENN EEEN  
 NENN NNEN NENE NEEN  
 NNNN NEEE NNEE NNNE  
 ENEE EENE ENEN ENNE

but of those sixteen combinations, I choose only ten

with no more than three extremes or neutrals in a four unit combination

and in each horizontal sequence no more than three extremes or neutrals together as well

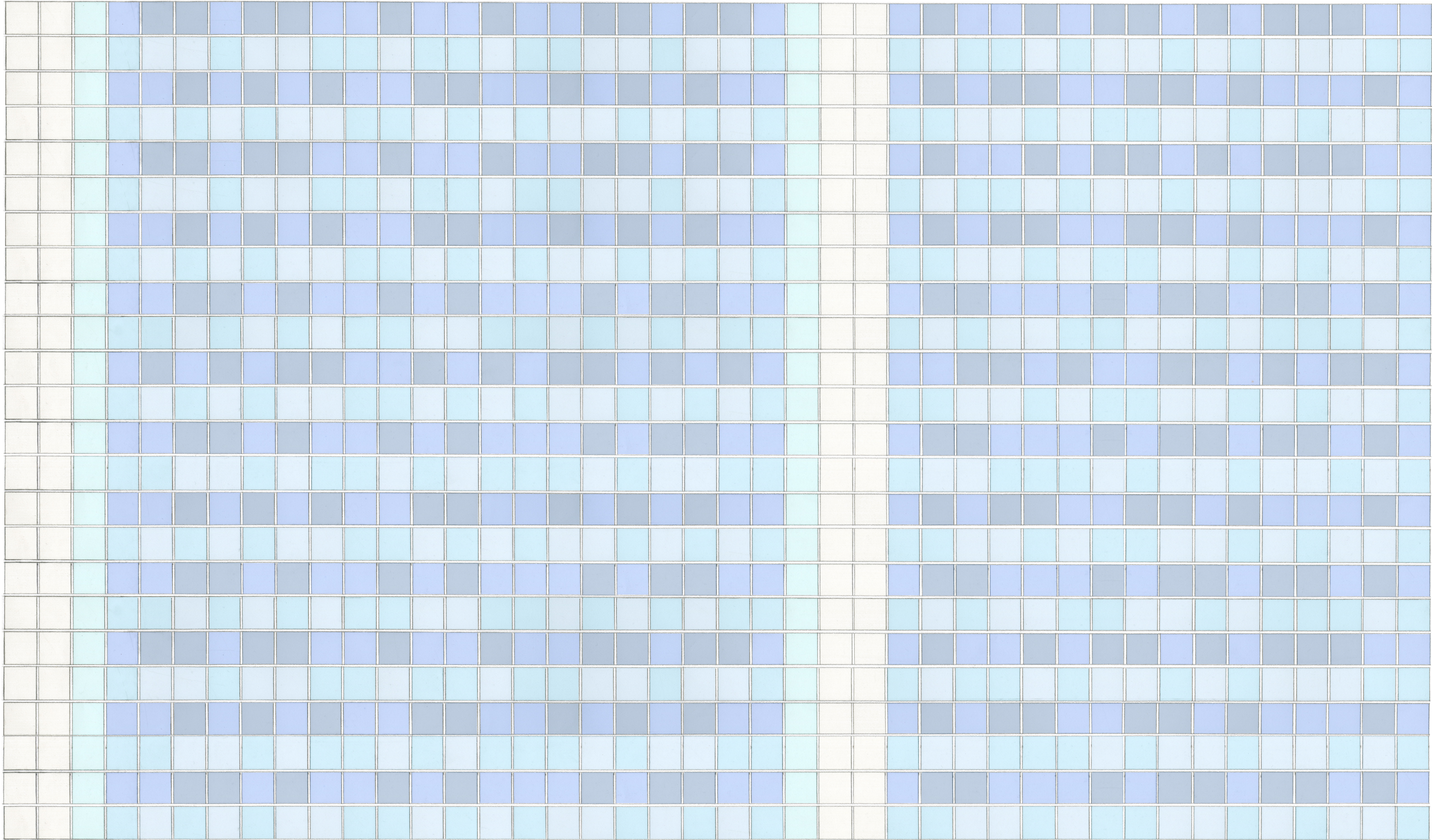
NNEE NENN ENEN NNEN EENN NEEN NNEN EENE ENEN  
 NENE NEEN NENE NEEN ENEN NNEE NENN EENE NEEN  
 NEEN EENN ENNE NNEE NEEN NENN ENEE NENE EENN  
 NNEN ENEN NEEN NENE NENN NENE ENNE ENEN NNEN

There are 42 tiles in each line

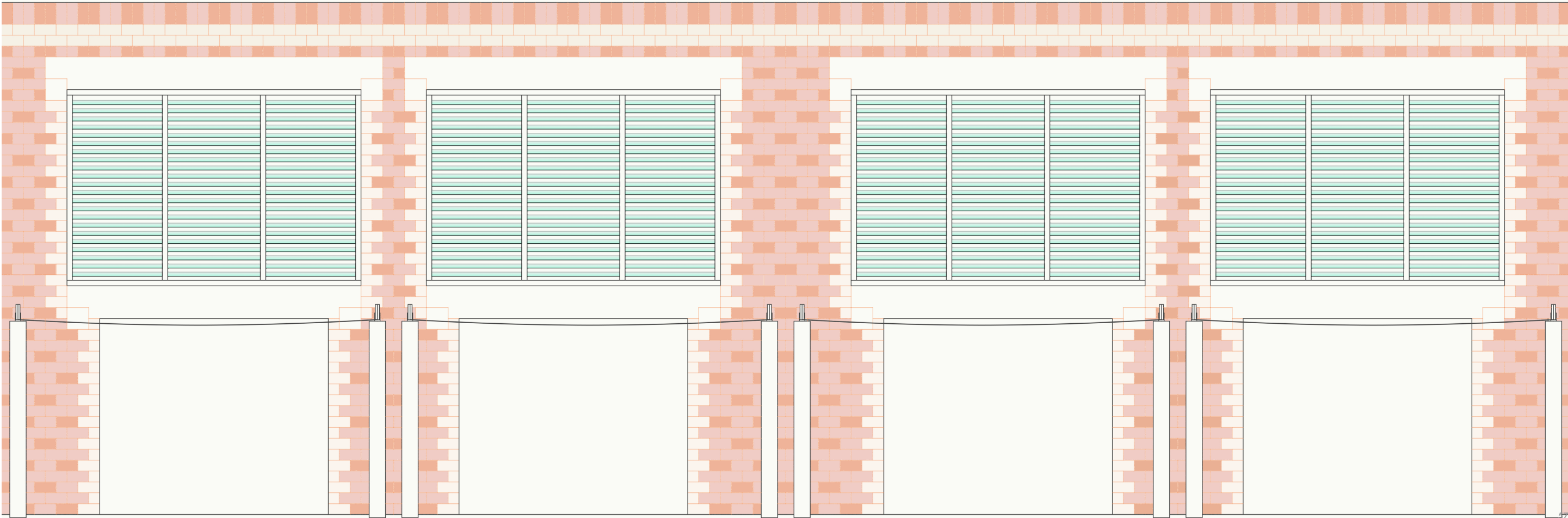
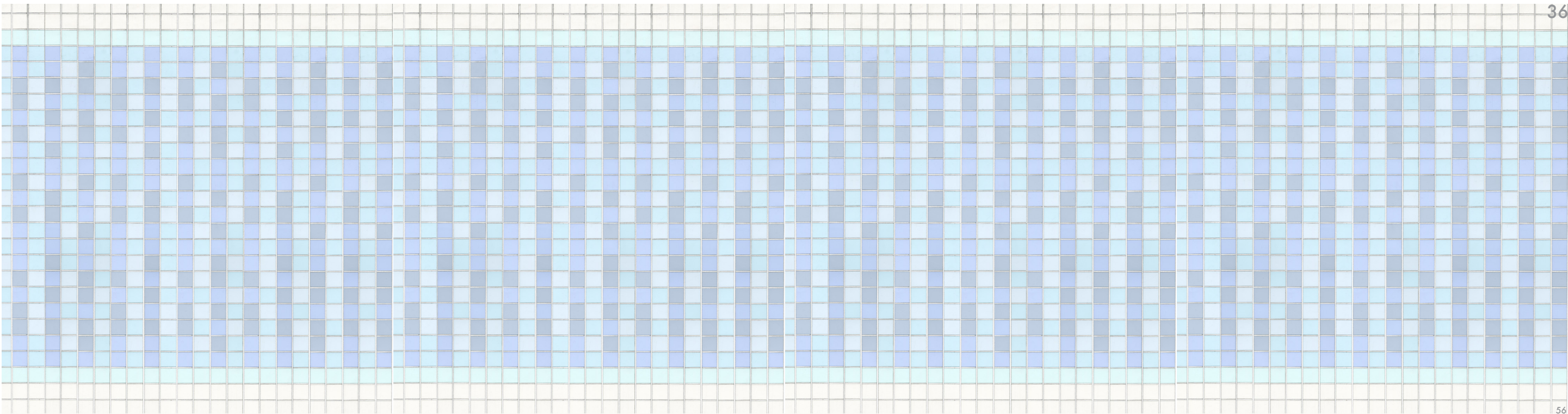
from the left, each sequence begins with 2 spacer tiles - 1 border tile - 5 combinations, with the first two combinations reflected across the middle - 1 border tile - 2 spacer tiles - 4 combinations

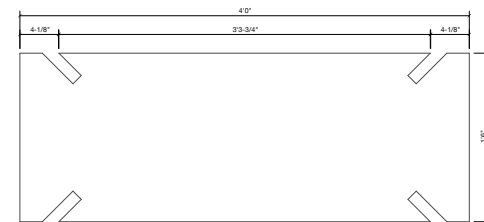
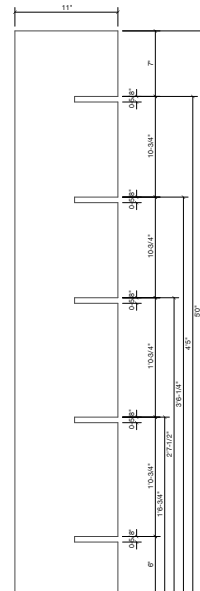
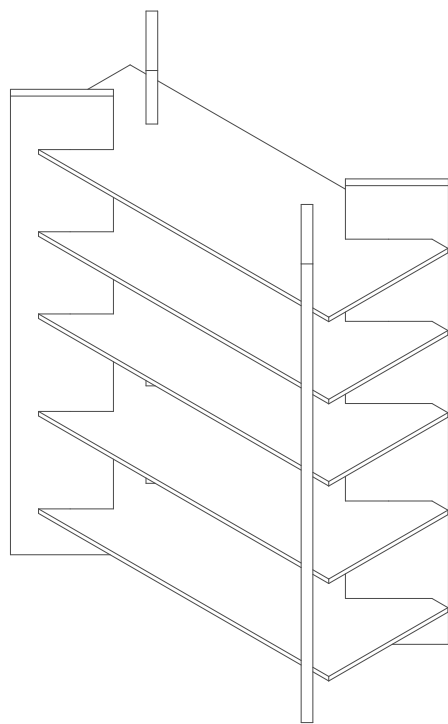
26 tiles are interior, the next 16 under the exterior colonnade





Floor pattern plan of One Bay <sup>55</sup>





Shelving designed to hold a variety of goods, with taller shelves at the bottom to hold larger bulk items such as paper towels, the middle shelves are slightly shorter and designed to hold items as large as cereal boxes and allow for double-stacked cans

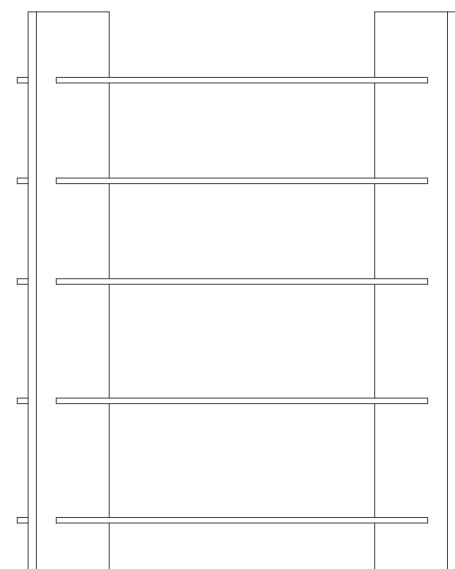
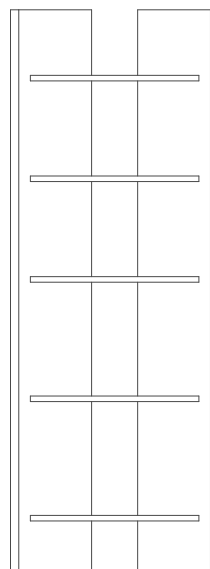
The short side of the shelving unit functions as a typical grocery store gondola endcap and provides display space for special items

Tall Shelving utilizes 2x12s for the legs and plywood boards to create the shelves

This unit occupies a footprint of 2'x4', which allows for efficient use of each plywood board

The top shelf stands at 4'-3" to enable easy accessibility for many

Tall Shelving Post Planing



In planning the spaces of the grocery store I felt better understanding grocery store shelving would help. As part of an independent study I decided to design and build a set of shelves which I imagined for the Neutral Ground Grocery Store.

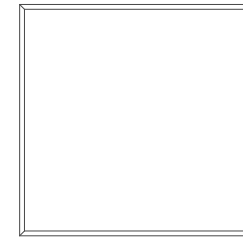
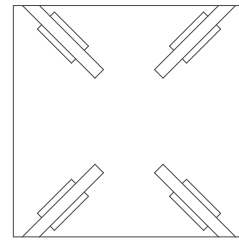
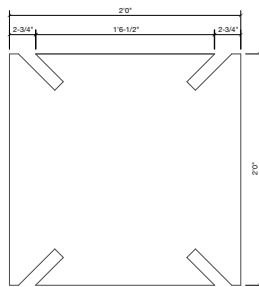
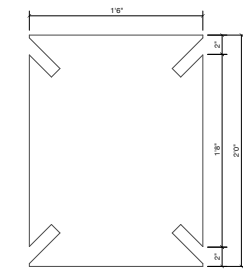
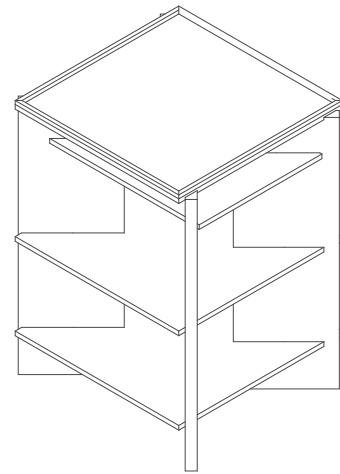
Following the ethos which guided the building's design decisions, I decided to make these shelves out of standardized parts and pieces, so the shelves could be assembled inexpensively, but also to design the shelves to function well and ultimately be beautiful.

The second requirement in designing these shelves was to make them able to be easily assembled and taken apart. In researching and discovering Post-Katrina New Orleans I heard many accounts of store and shop owners losing everything inside their stores, from the shelves to the products, due to the flood. So if the need ever arose, this shelving could be easily deconstructed and packed away safely and flatly.

I began with designing the most ubiquitous type of shelving in the grocery store - the tall shelving. These design decisions influenced the form of the next two styles of shelving, the low shelving, which is becoming more common and makes stores feel less overwhelming and crowded, and the basket shelving meant to hold produce.

Taking the cue from mass produced grocery store shelving units, this shelving integrates both the Gondola Run and Gondola Endcaps into one piece. Each side functions as a space to display products and allows the units to stand apart from one another. Instead of creating long aisles, this shelving allows for a variety of groupings within the grocery space and two distinct types of faces - short and long - to display a variety of products.

## GROCERY STORE SHELVING



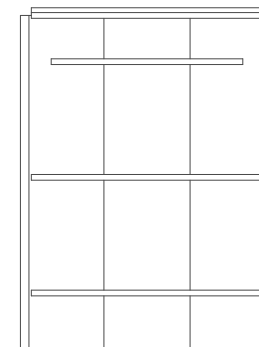
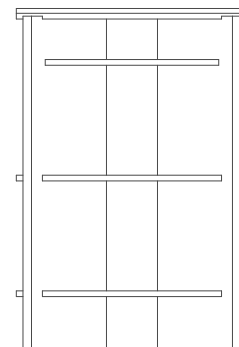
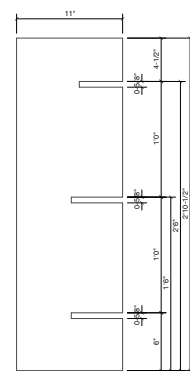
Shelving designed to hold stacked produce on top of the unit

Shelving below for display of additional, related products, as well as a smaller shelf to hold bags, twist ties, and other related objects

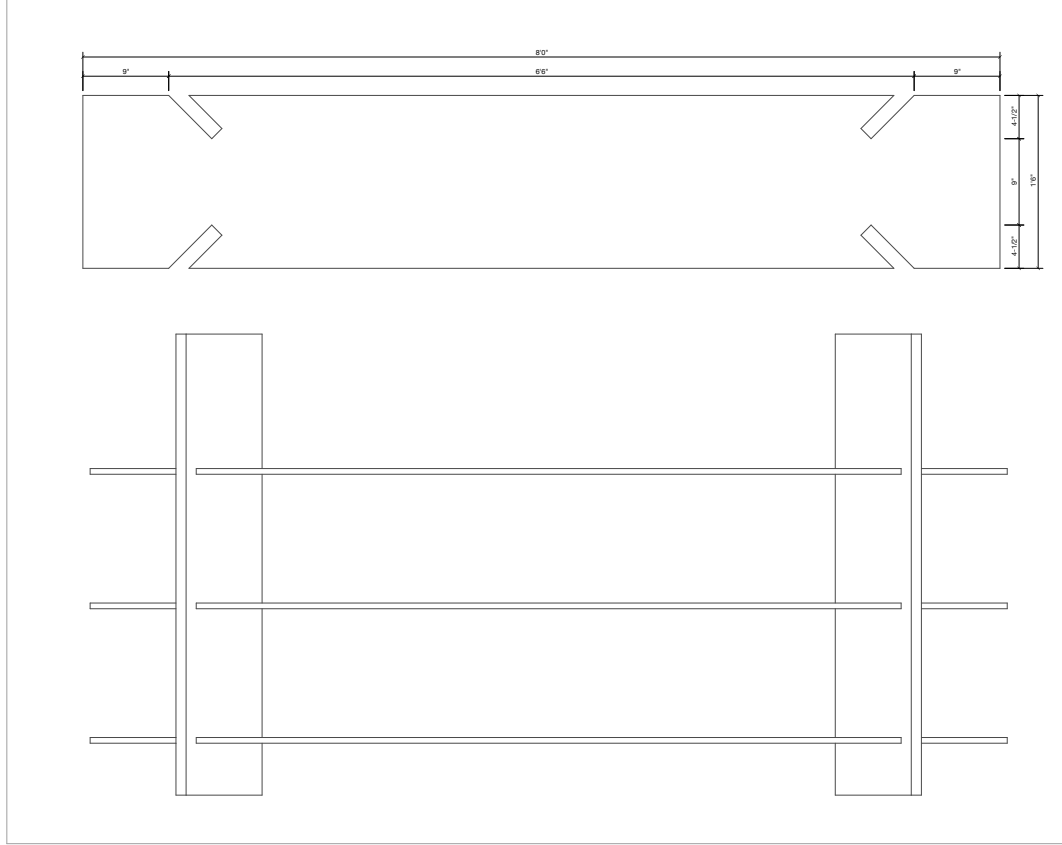
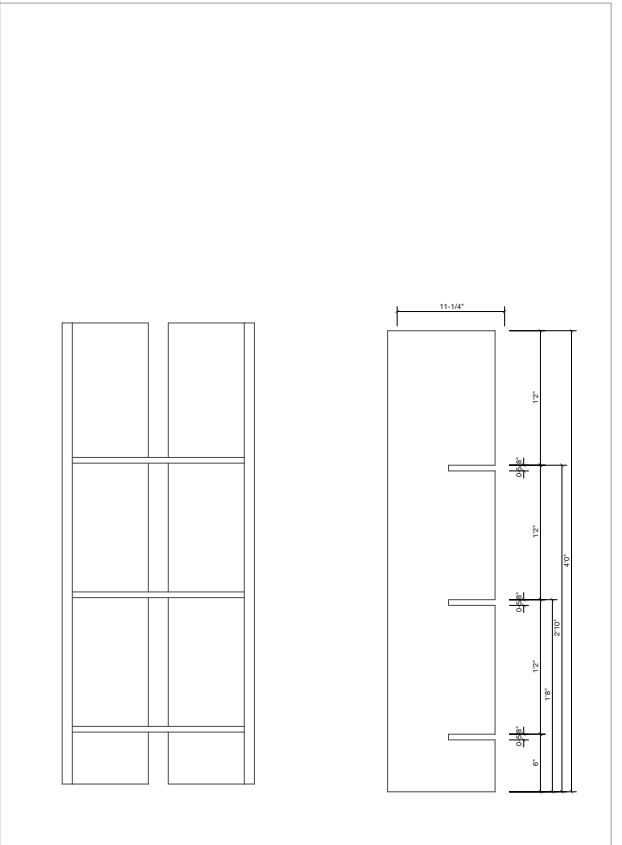
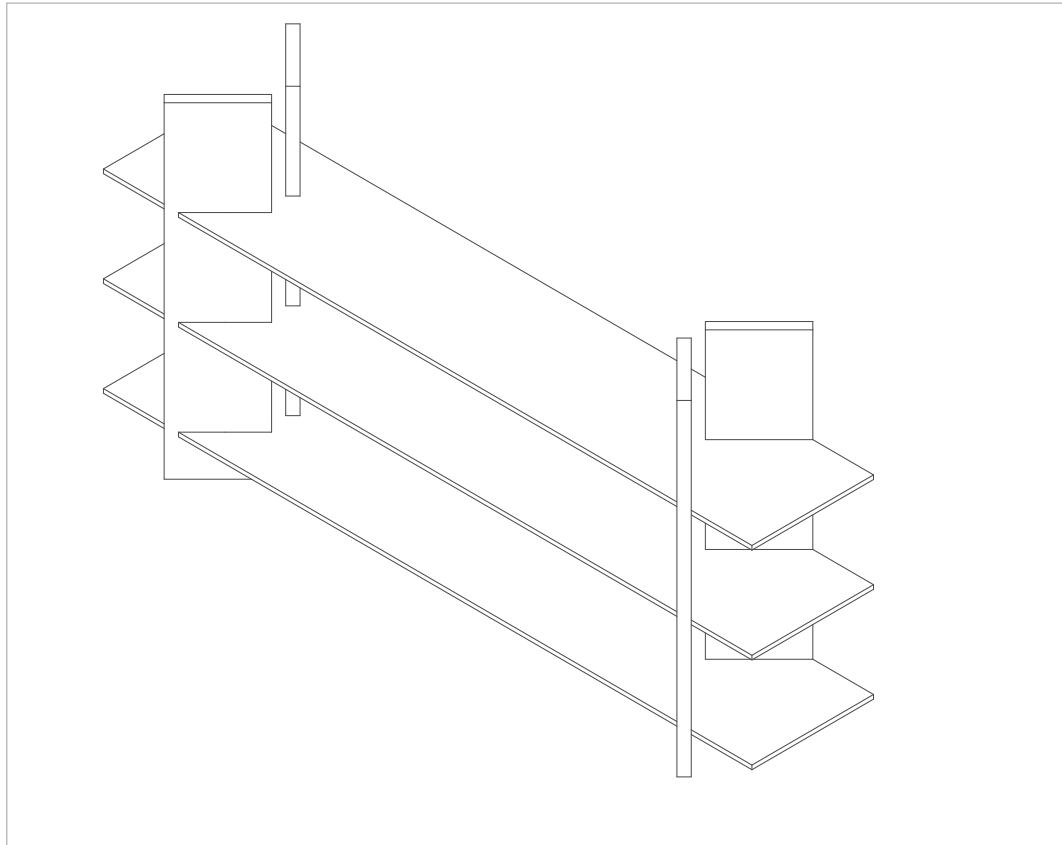
Basket Shelving utilizes 2x12s for the legs and plywood boards to create the shelves

This unit occupies a footprint of 2'x2', making reaching the center easy, while also allowing for efficient use of each plywood board

The unit stands at a little under 36" which makes the shelving the same height as many grocery store shopping carts



Basket Shelving Post Planing



Shelving designed to hold packaged products as well as gravity bins and scoop bins for bulk items, such as flours, grains, and nuts

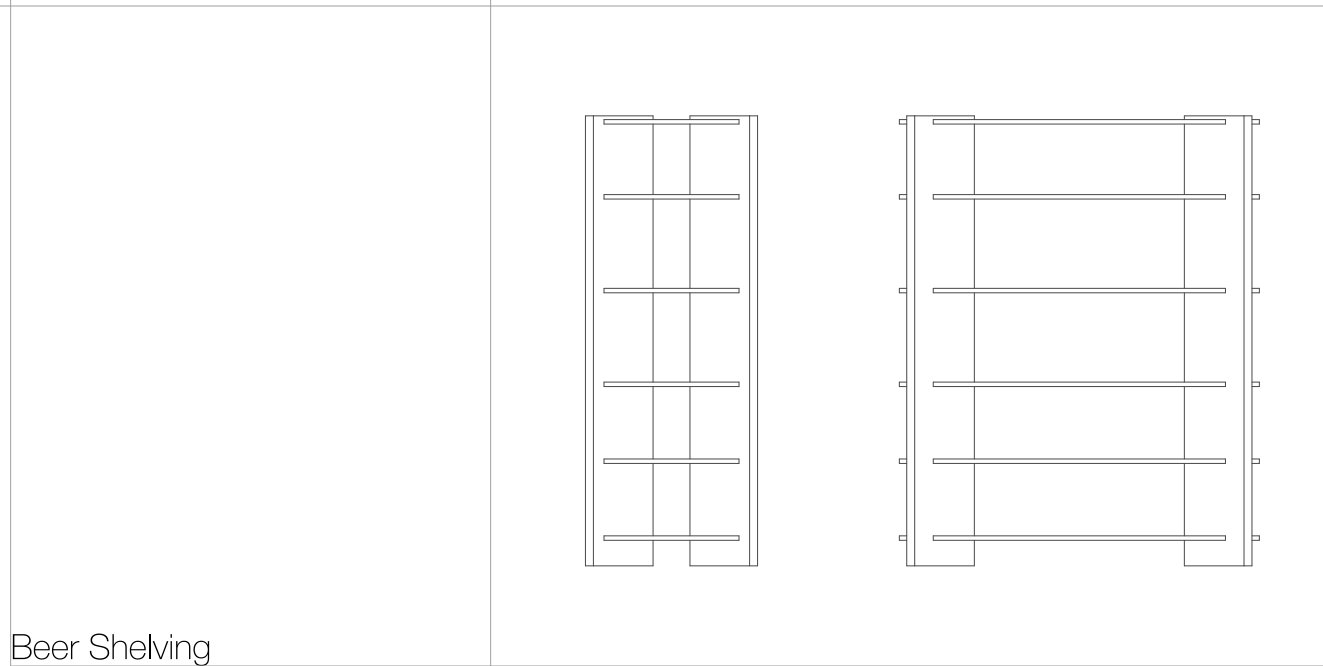
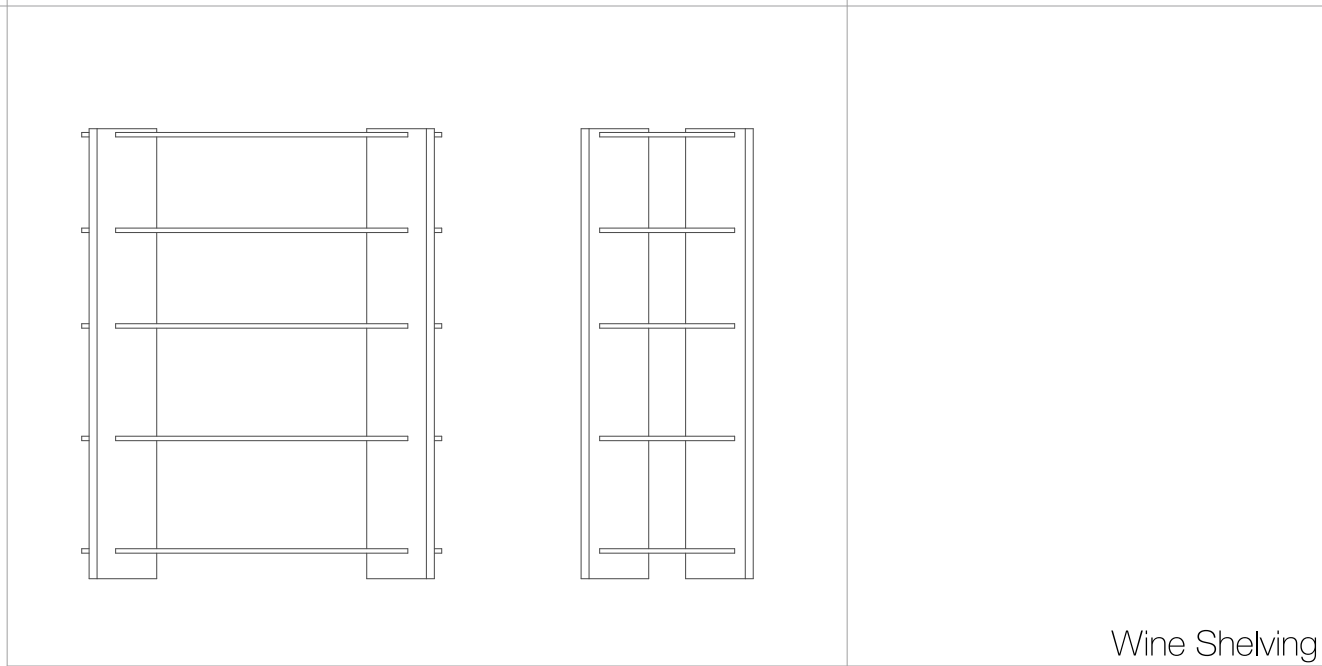
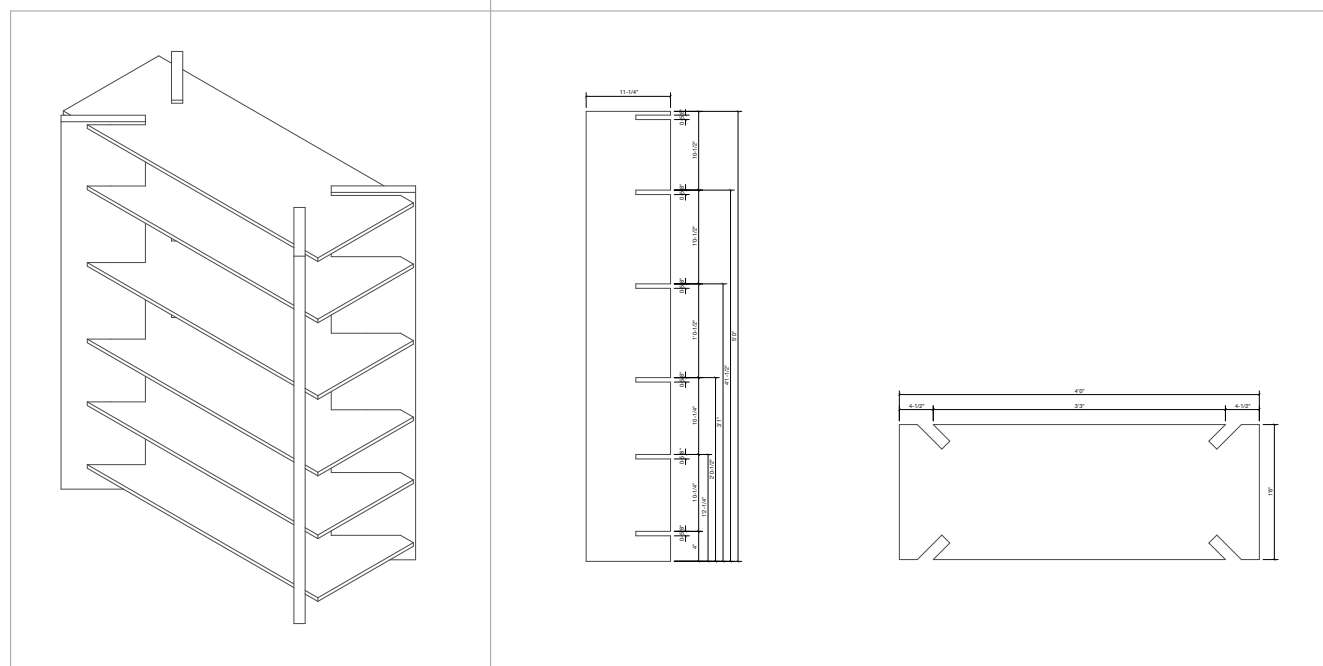
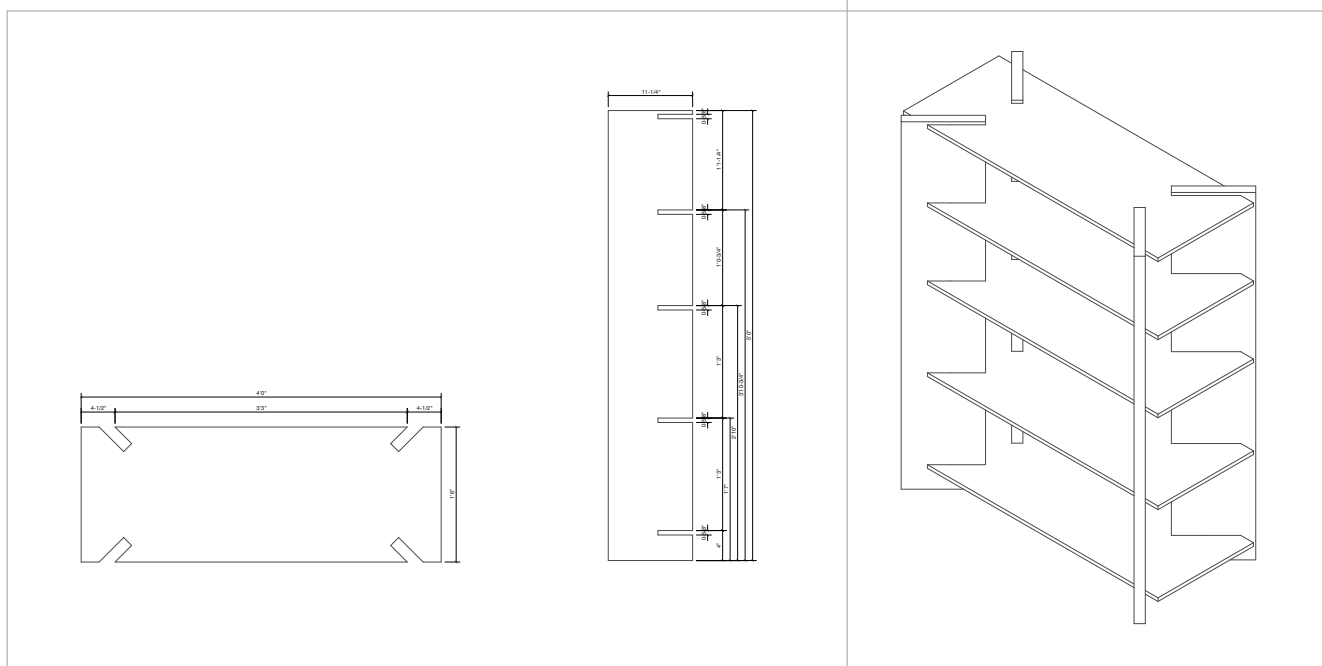
The short side of the shelving unit functions as a typical grocery store gondola endcap and provides display space for special items, as well as a place to store pens, bags, and twist ties for the bulk items

Shelving unit utilizes 2x12s for the legs and plywood boards for the shelves

This unit occupies a footprint of 2'x4', making efficient use of each plywood board, similarly to the tall shelving

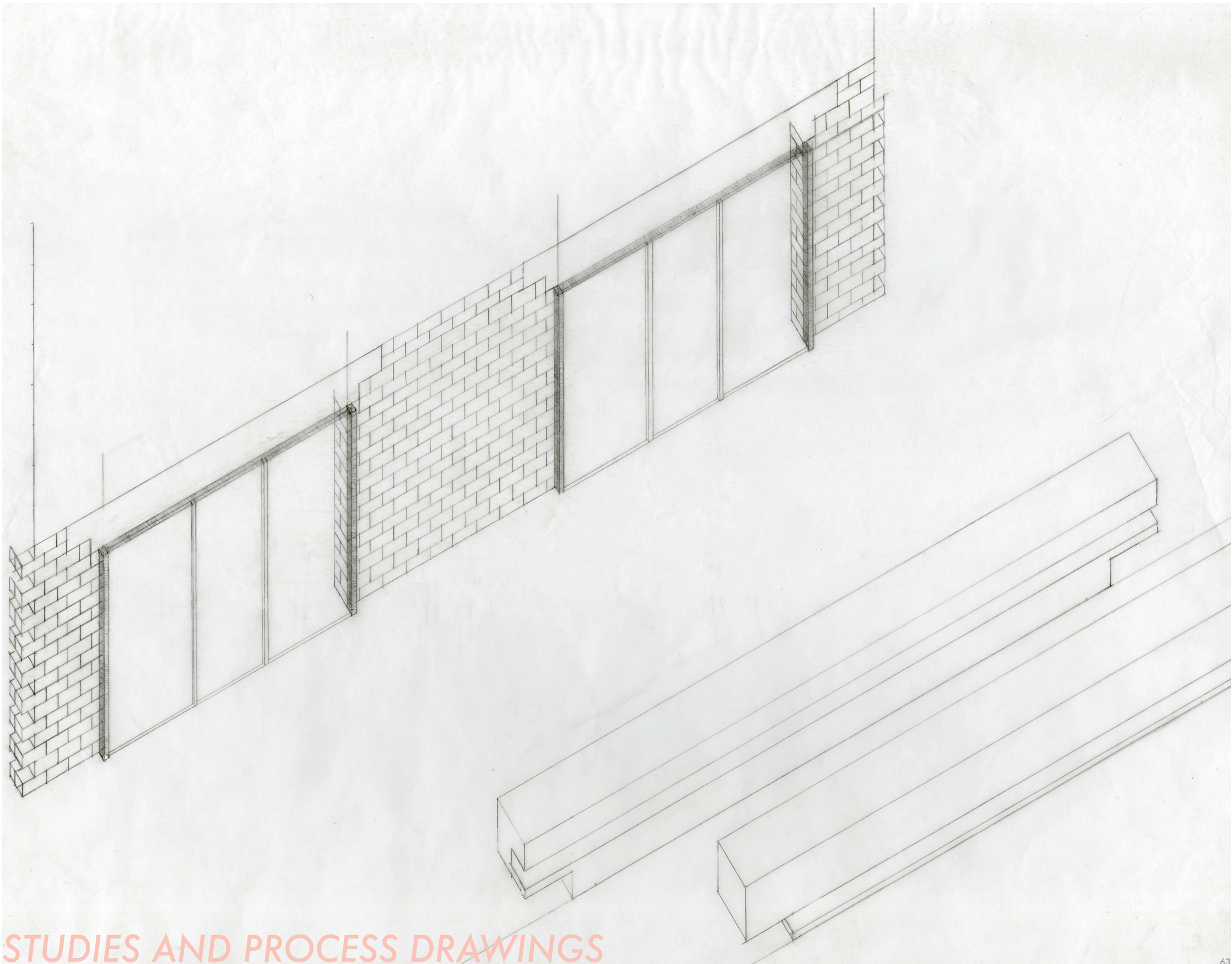
The unit stands at 48", with the top shelf at 2'-10", this allows for sight lines above the shelving making the space feel more open, but an efficient use of space with the three shelves

Low Shelving



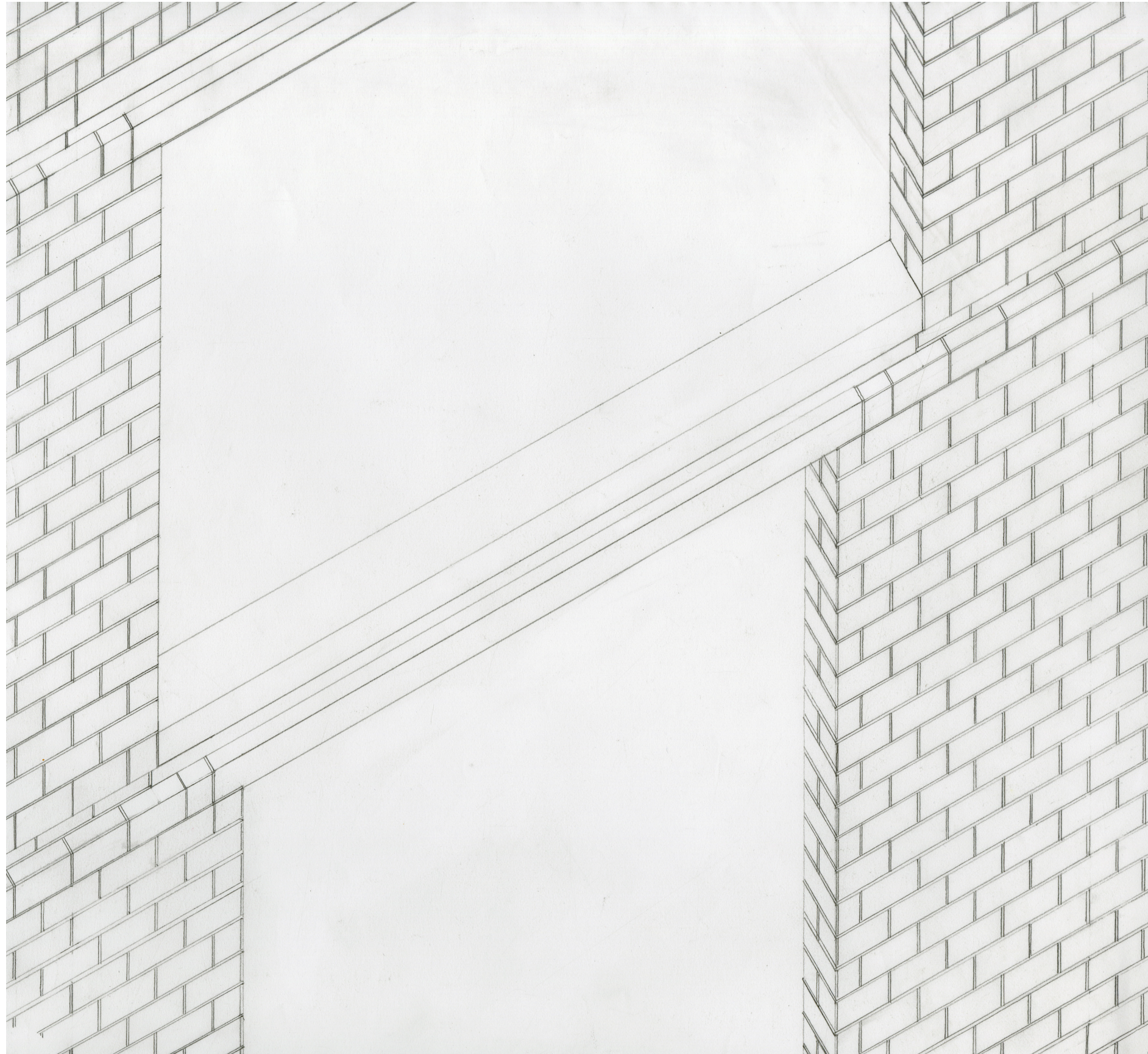
Wine Shelving

Beer Shelving



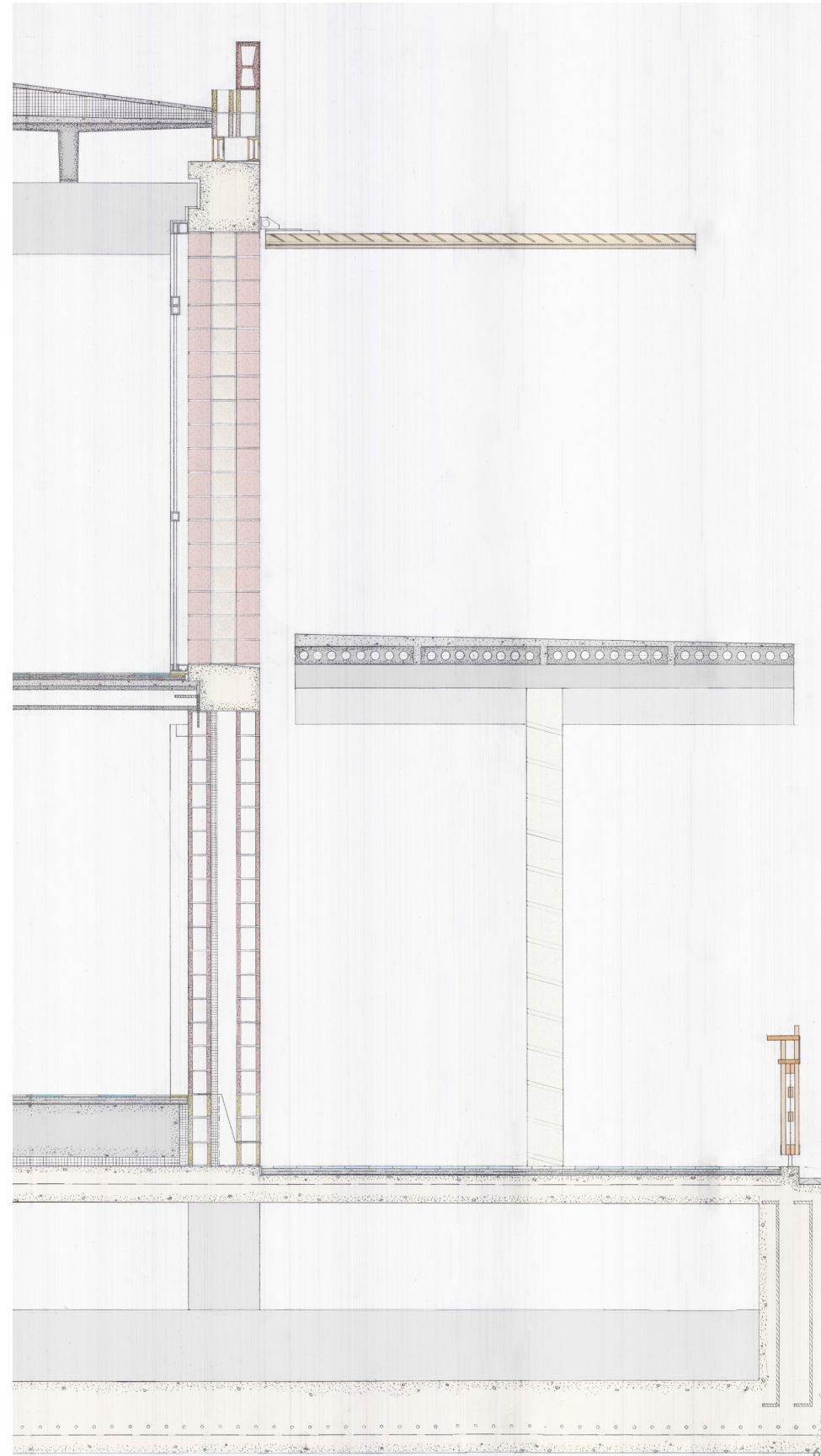
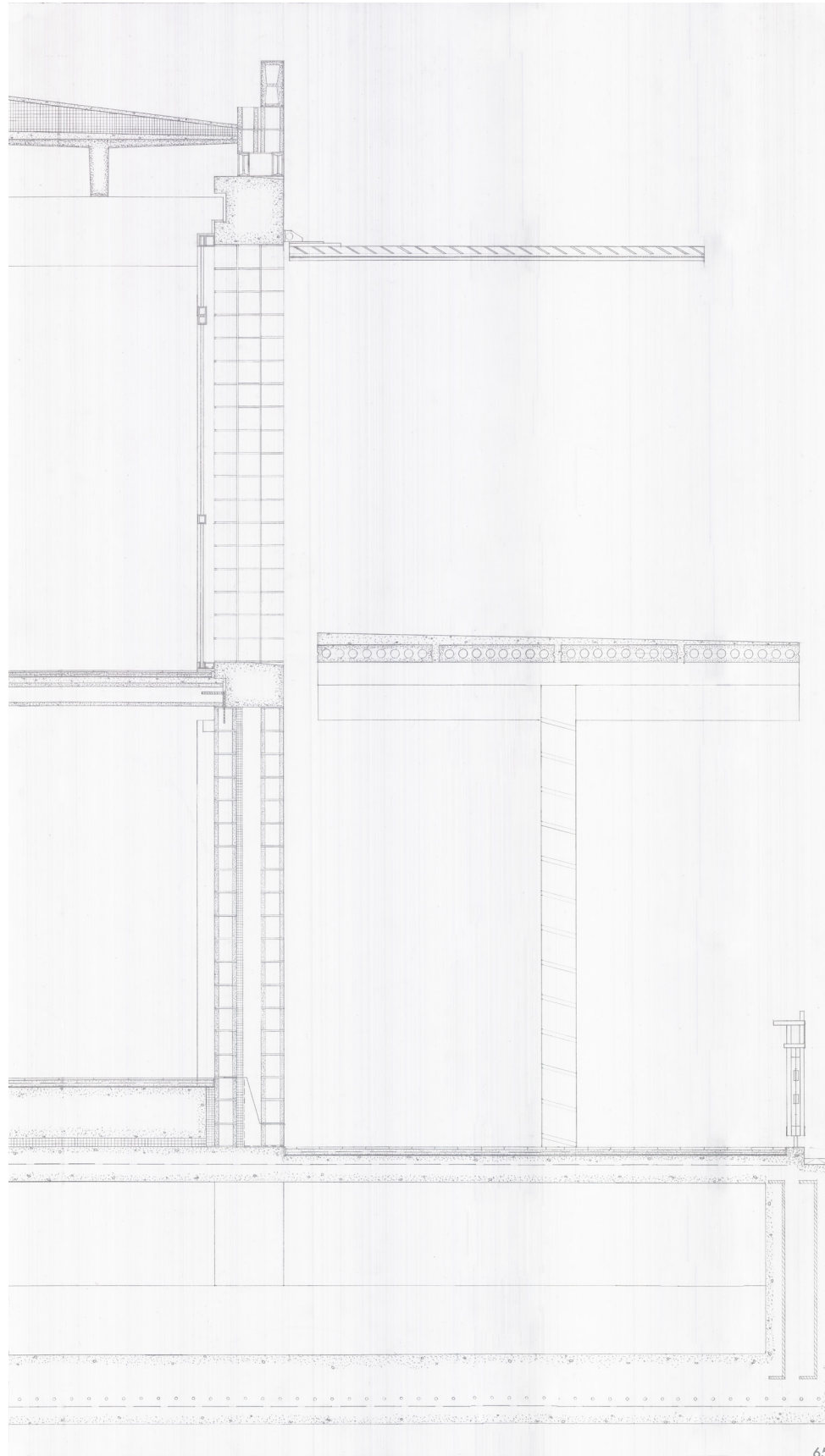
**STUDIES AND PROCESS DRAWINGS**

*Sketch studying shape of first floor lintel, how it will meet the wall and make a space to gather the floor for the second level*



*Axonometric sketch looking at the first floor  
lintel and the thickness of the wall*





43  
 The same drawing, but one in color expressing the material qualities, studying the wall section.

Serious changes to the final were made in the exterior colonnade and upper level shutters

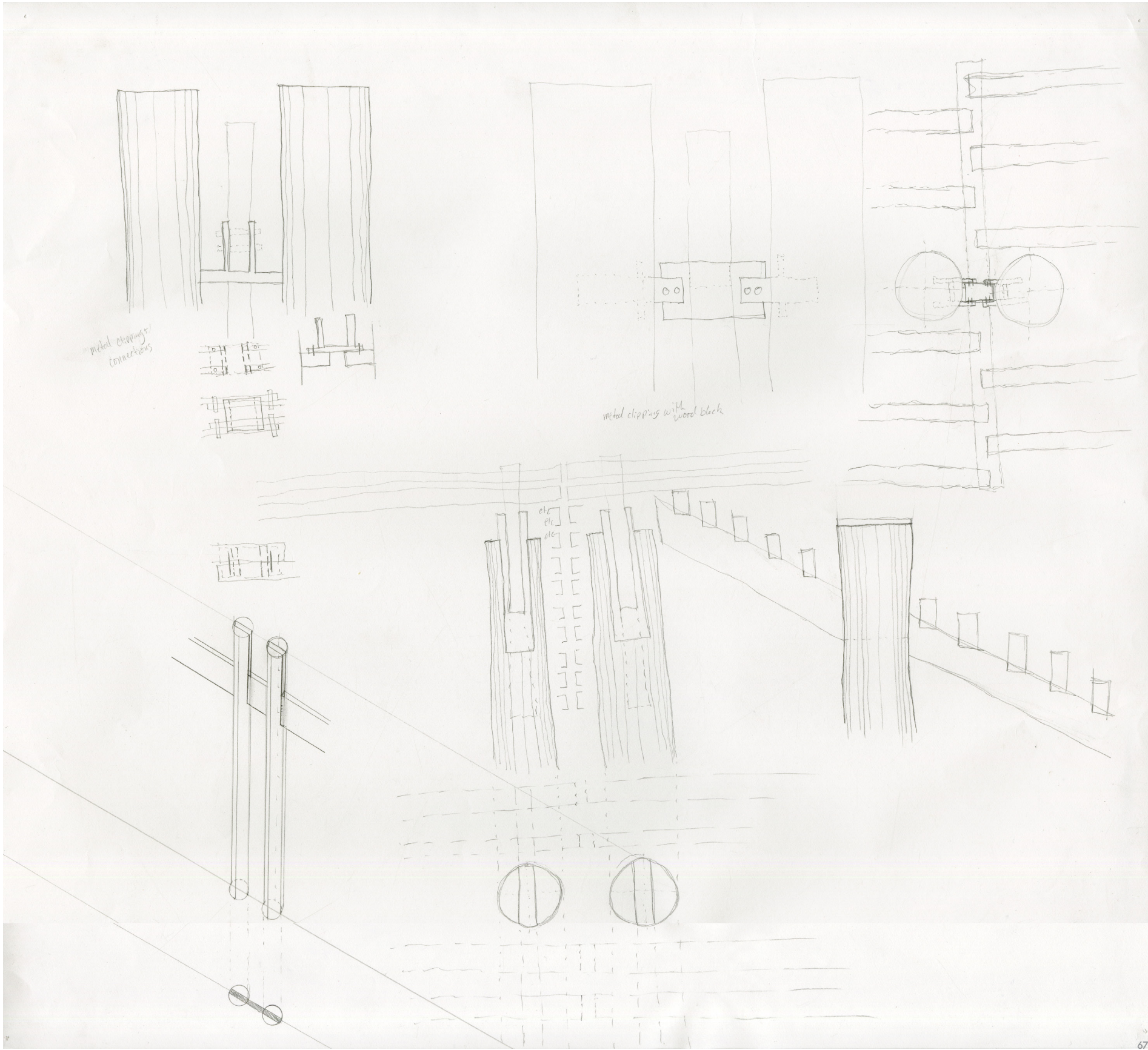
In the original scheme the market and grocery store were separated from one another, with the grocery store taking up both levels of the building, although in a much smaller footprint, and the market was housed in the exterior colonnade space

The raised lower level floor reflected a desire to keep the grocery store at least 5' above street level to exceed the height of previously known floods in the area

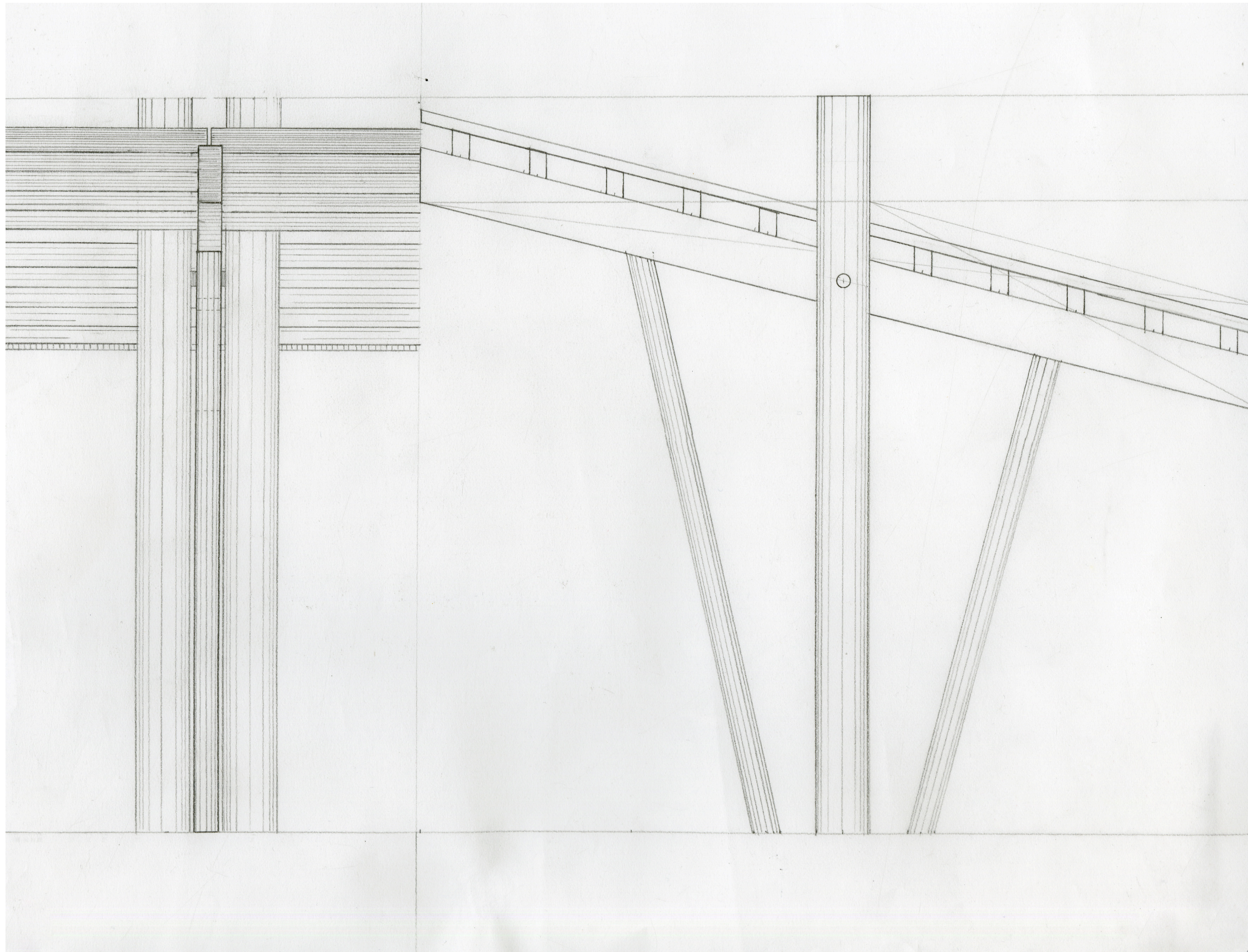
Keeping with the ethos of utilizing standardized pieces to control costs, and with the Market originally being outdoors, the first few schemes for the colonnade roof were with pre-cast concrete so as to shade vendors and buyers from the sun, as well as the rain

Before becoming Bermuda shutters, the upper level shutters had been imagined as ones which could fully open and close, shading the building from the sun during the day, but able to close and protect the windows during any storms

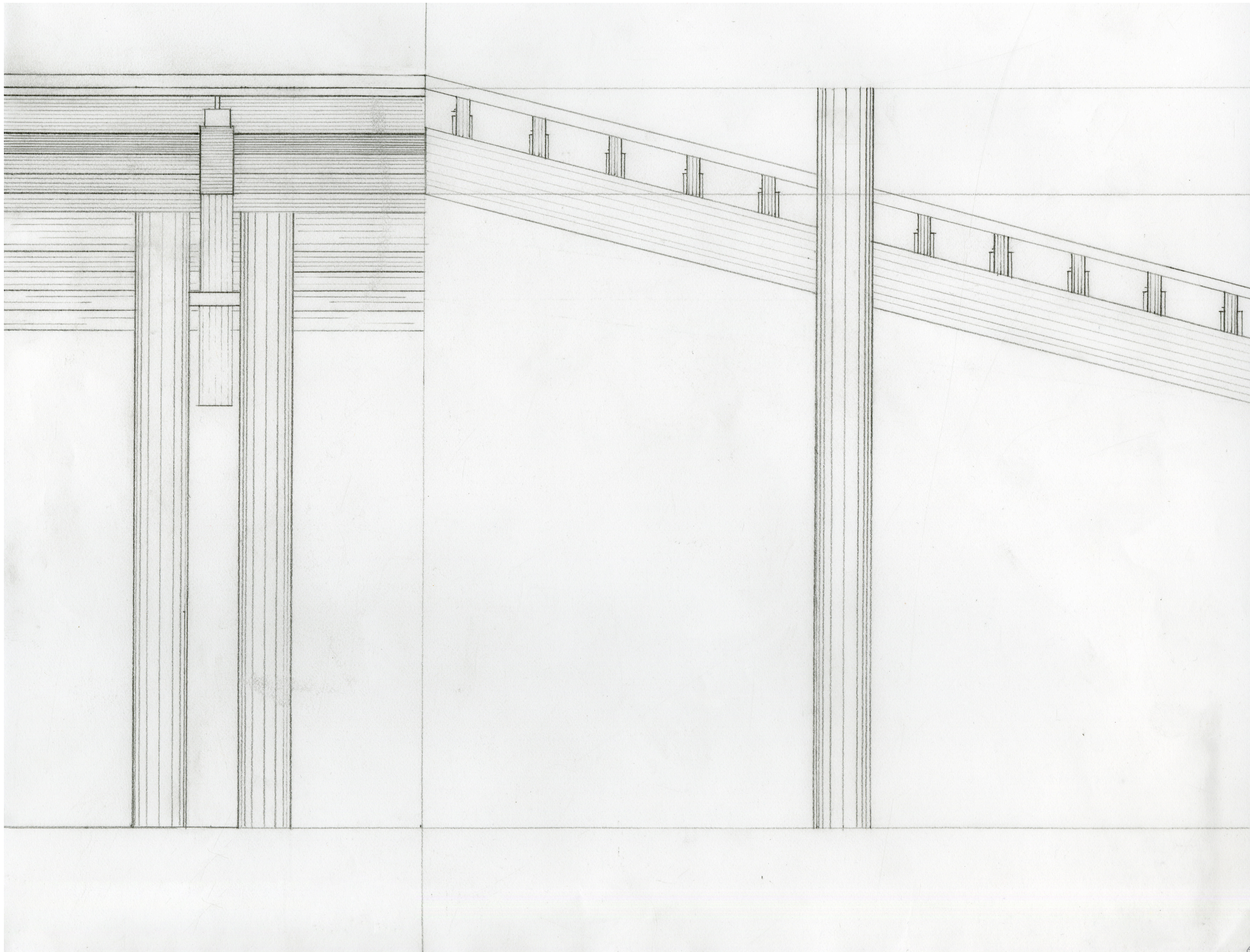
There was always an idea about a gear which would control the shutters though, and this idea made its way into the final scheme with the Bermuda shutters



Sketches looking at how the double column system would meet a beam and begin to form the colonnade roof made out of wood pieces with metal clips



Section and Elevation sketch of exterior colonnade ideas



Section and Elevation sketch of exterior  
colonnade ideas

Section and Elevation sketch of exterior colonnade ideas when market was still housed under exterior colonnade before being integrated into the building with the grocery store

In these sketches, the columns are all site cast concrete poured through a tube form

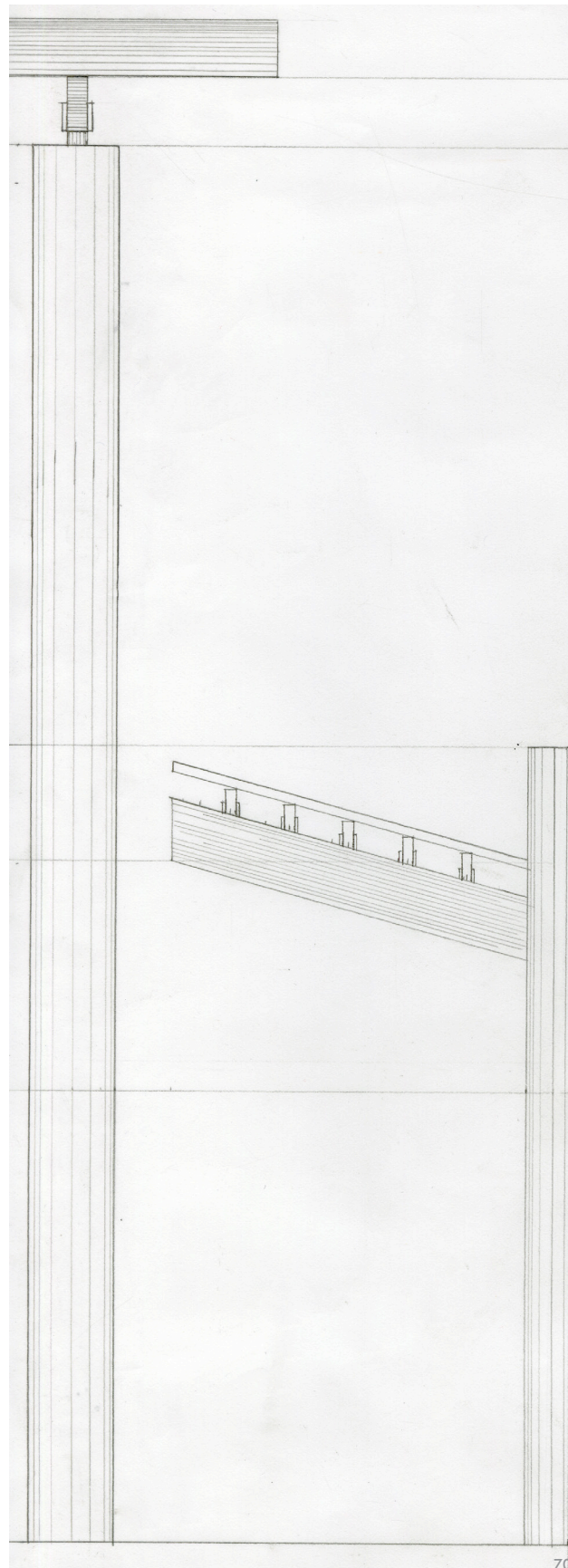
The smaller colonnade was to serve as a space for the vendors

while the larger colonnade acted as an entryway to the building and created open space for people to gather even when one was not shopping

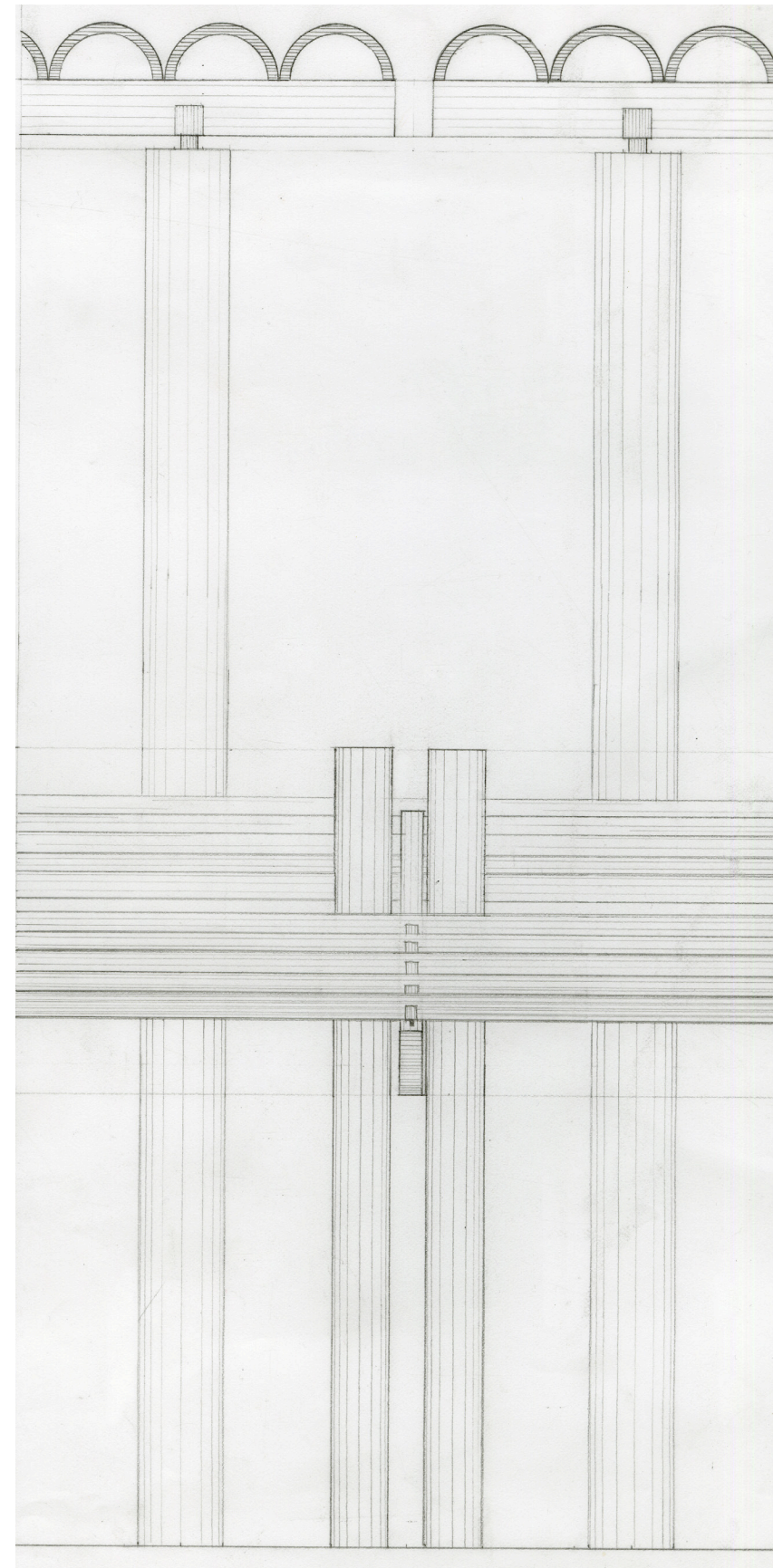
with the proximity of schools nearby, I felt this could be a good place for children to spend time as part of the community after school instead of wandering around the streets

the open spaces underneath the central colonnade would have table and chairs, as well as a raised space for musicians to play, or when the market and grocery store were active, for various cooking demonstrations

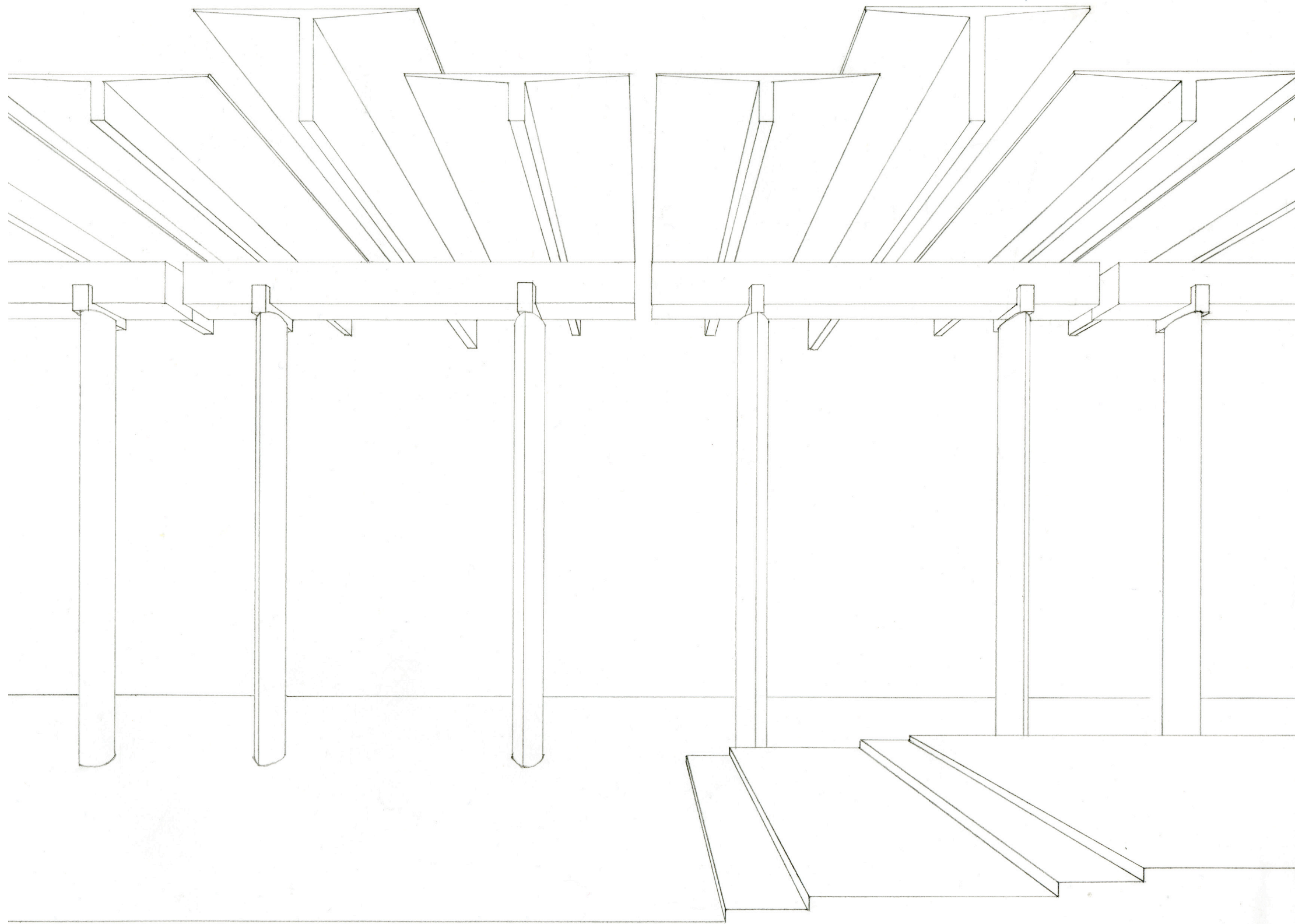
The round roof was a thought about taking concrete tube forms - which were already being used for the columns - sawing them in half, and then making pre-cast concrete forms for the roof instead of using flat panels



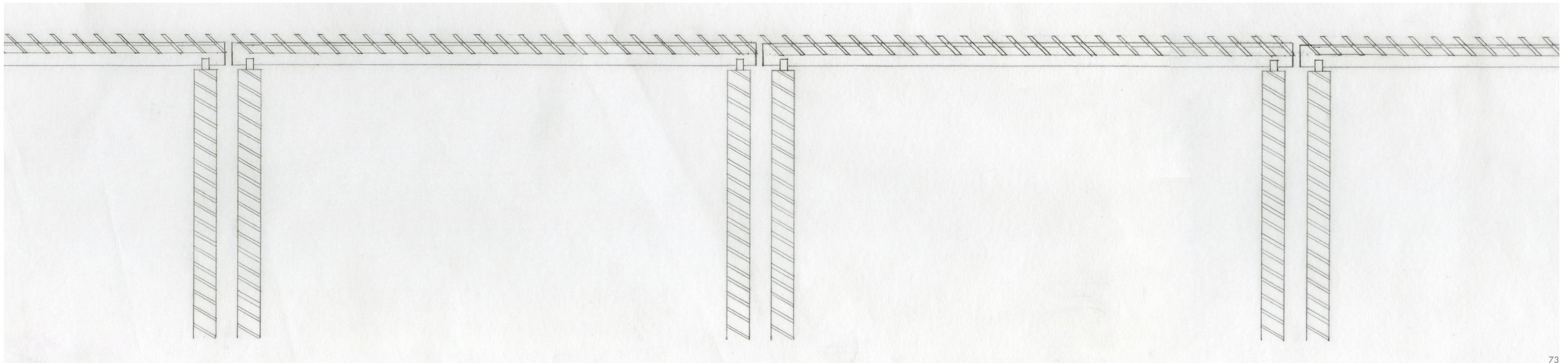
70



71



*Perspective showing the central colonnade space, but with pre-cast concrete tees as the roof, an idea which would work its way into the final building scheme, although the tees would end up running parallel to the building rather than perpendicular*



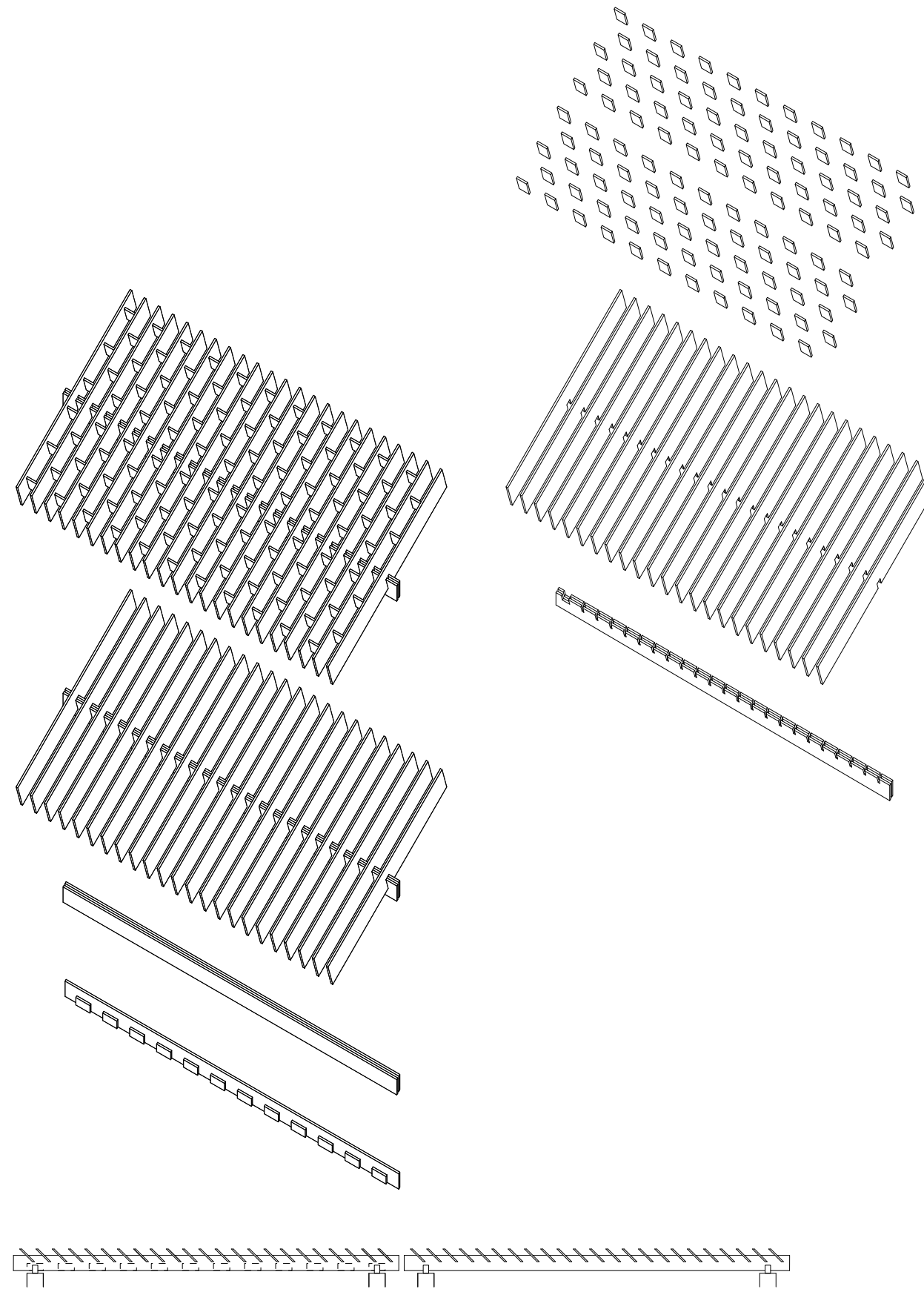
73

Once the Market moved inside the building with the grocery store, the colonnade was free of some restrictions

With the bottom floor of the building open for the Market, people would have a space protected from rain, thus the exterior colonnade began to act more as a sunshade

This iteration utilized 2x12s with spacers between them to form a beam, with more 2x12s notching at an angle into the beam to form a sunshade, this assembly would slip into clips in the cast in place concrete columns

This idea was deemed structurally too heavy for how little it supported and questions were raised about how often the piece would have to be replaced due to weather



Assembly drawing showing how the 2x12 sunshade would go together