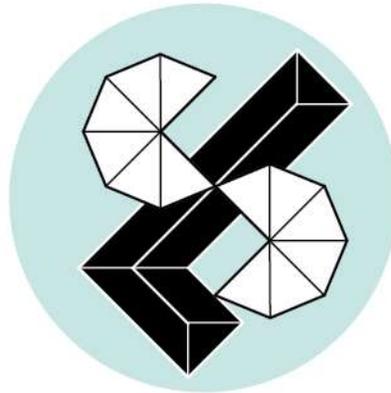


LEAH  
SMITH



GRADUATE  
PORTFOLIO

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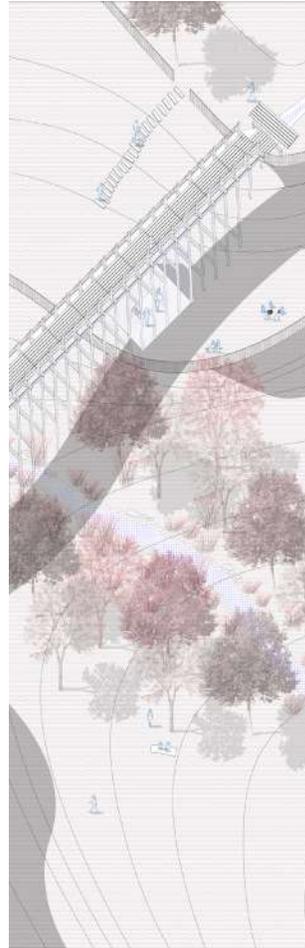
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# 1

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## LEARN FROM HAWAII

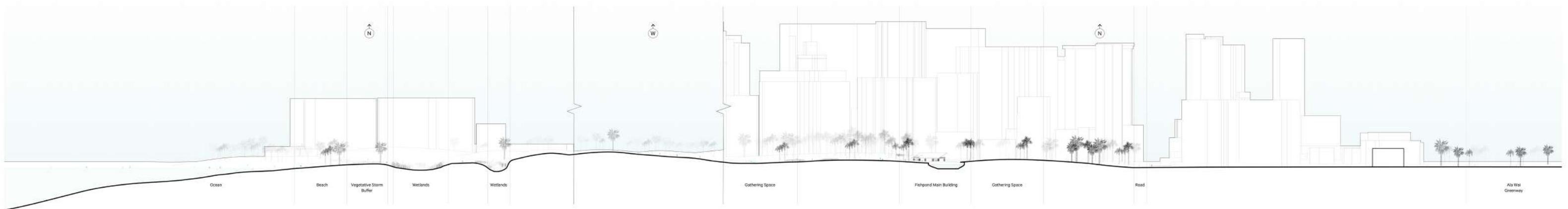
Studio Gooden

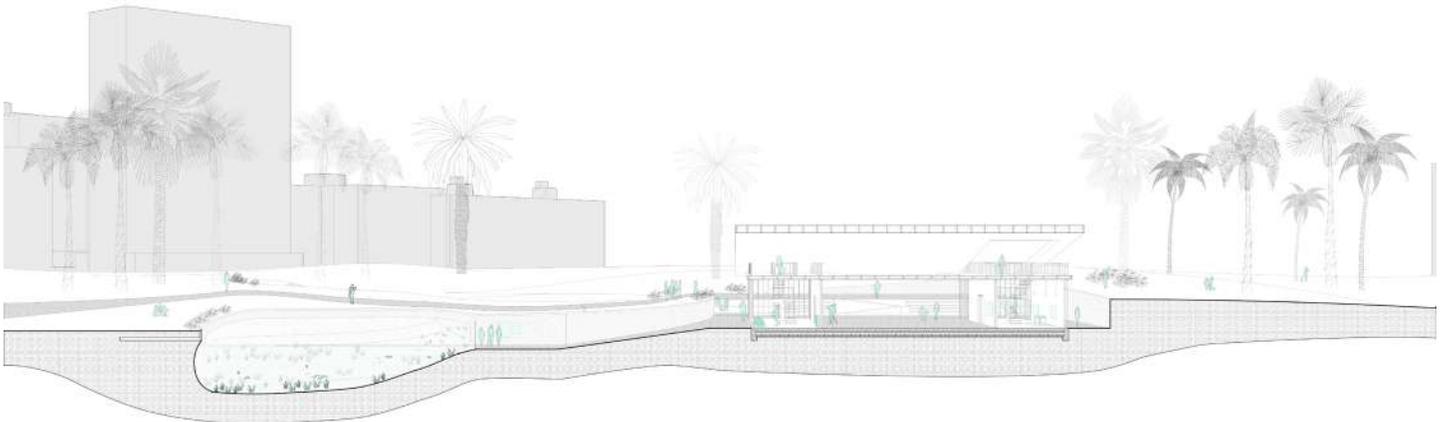
Spring 2022

Following the general research conducted in advance of our trip to Hawaii, and the realization that the tourism industry has created an indifferent attitude of Hawaiian visitors to the histories, culture and landscape of Hawaii, this project proposes the creation of a Tourist Education program. Learn from Hawaii, allows visitors to the islands to become more educated and aware of the foreign context by having them attend one (or more) of three workshops, each specializing in different aspects of Hawaiian culture.

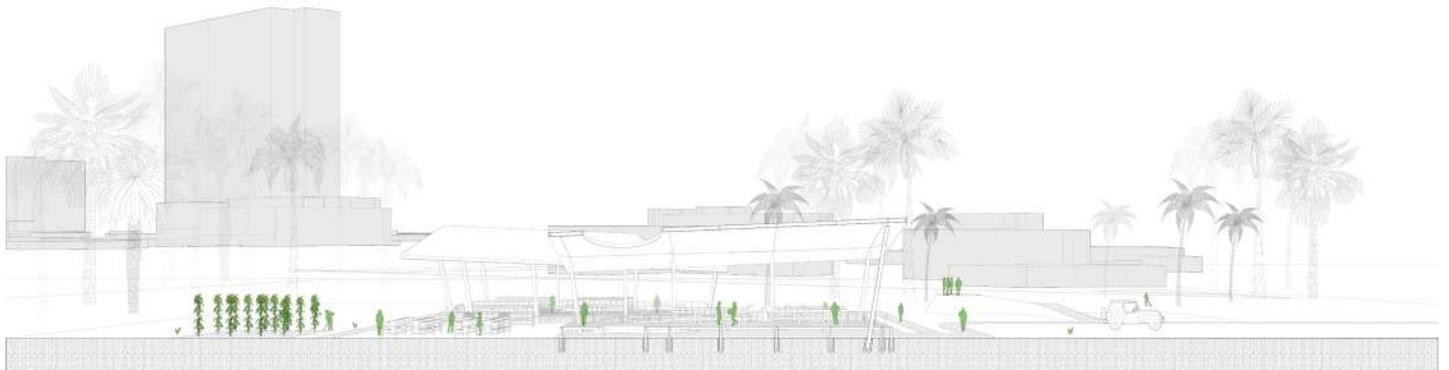
- I Wetland Conservation
- II Agricultural Economics  
- Farmers  
Markets/Community  
Gardens
- III Fishpond Management













Welcome Learn  
From Hawaii  
Visitors!

Please meet your host  
here before entering the  
Market and Farming area.

Mahalo!

# 2

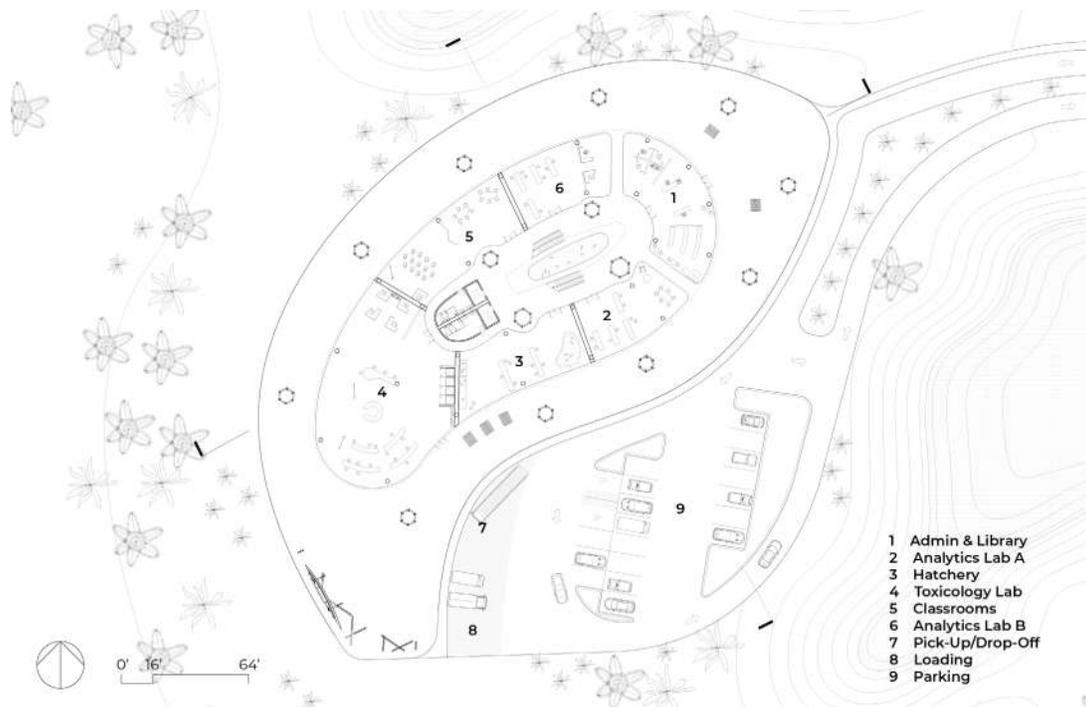
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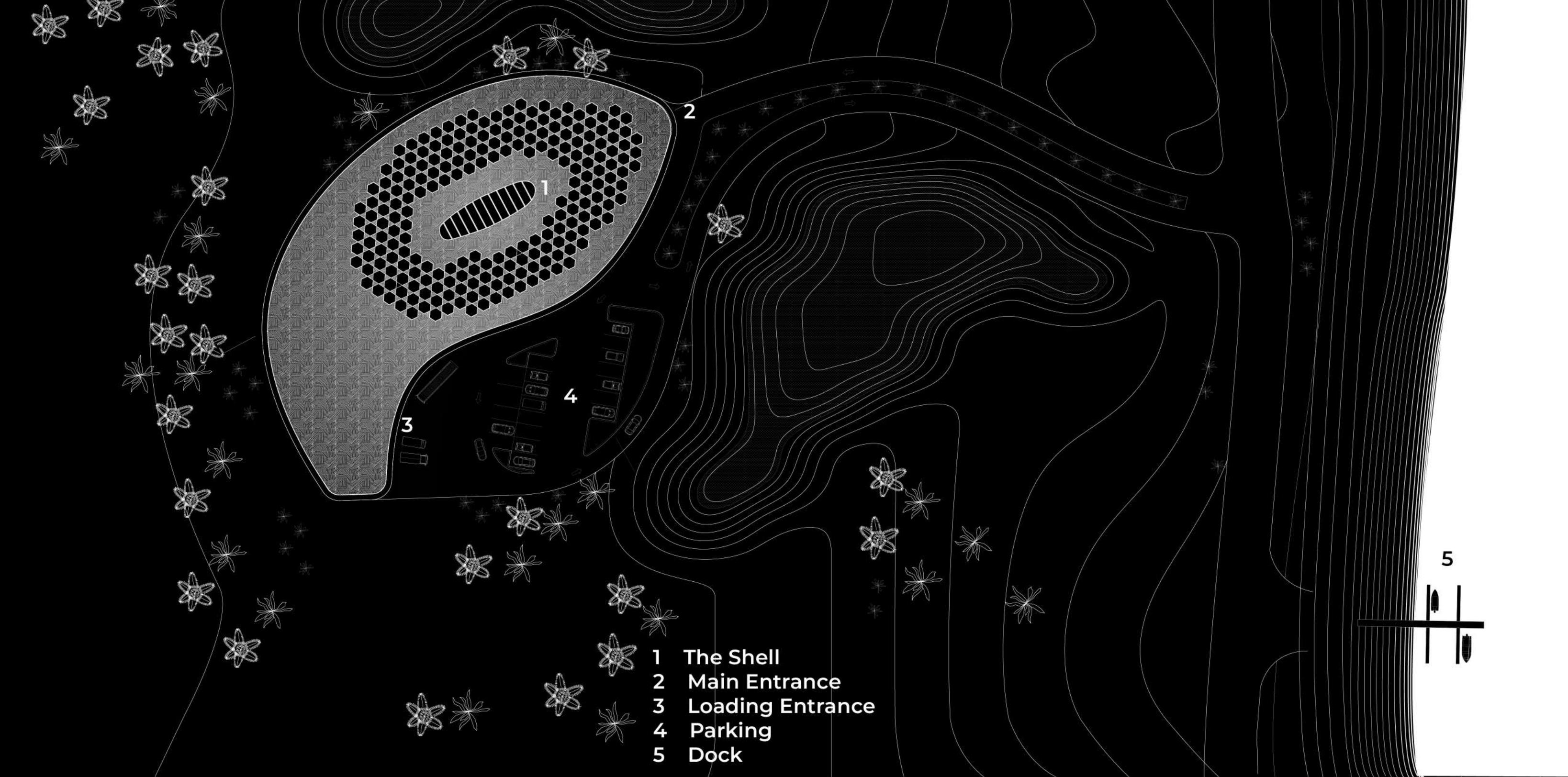
## THE SHELL

Studio Keith

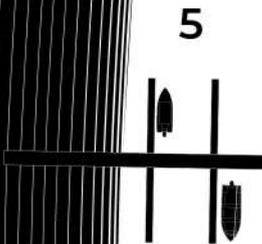
Fall 2021

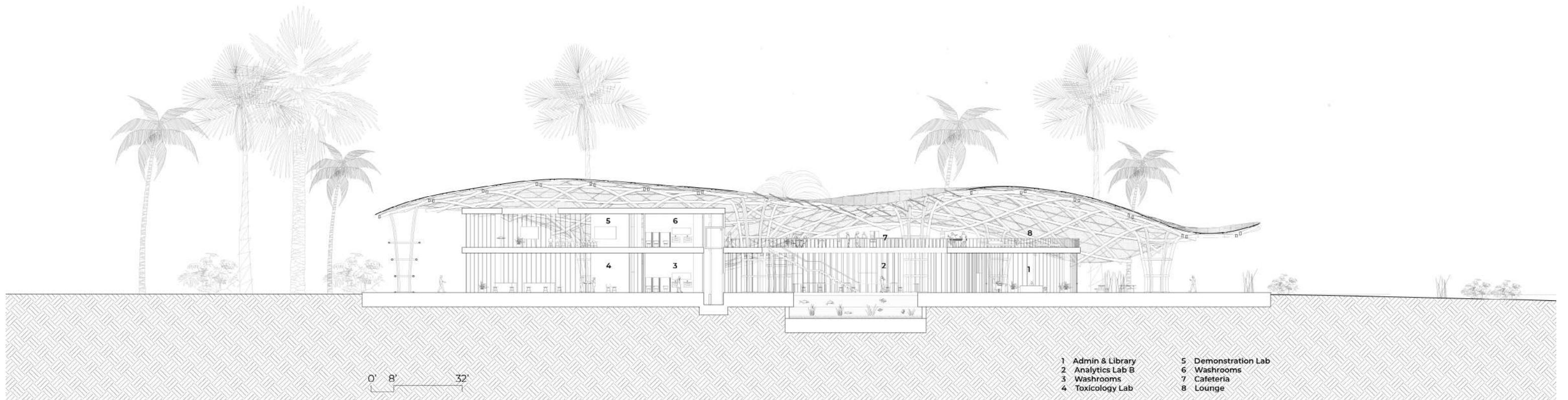
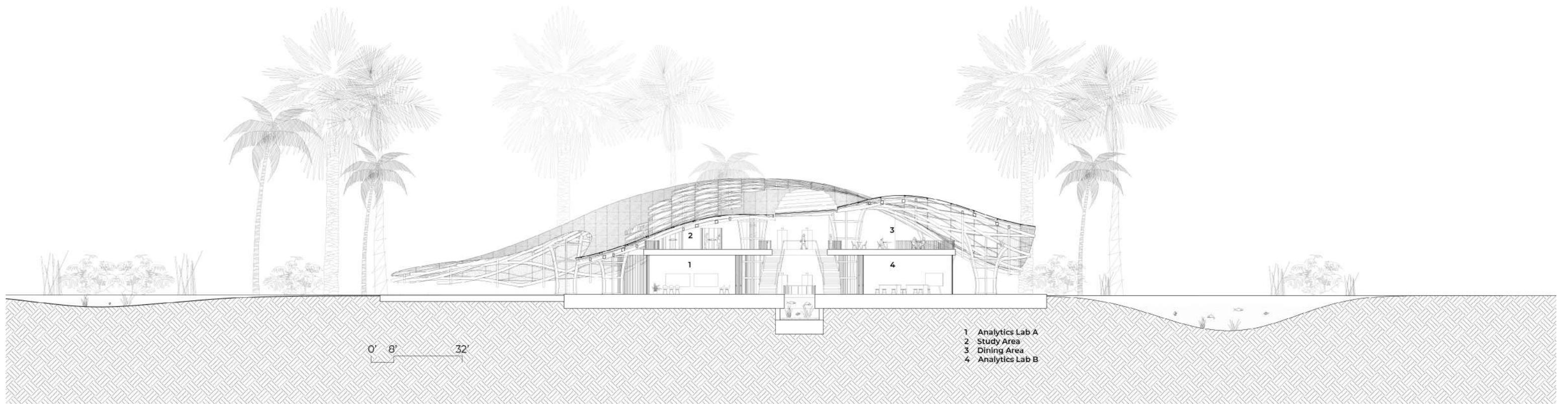
This design for an ocean research center off the East coast of Jamaica deploys low-carbon materials, passive cooling strategies, and a gridshell structure. The building features various laboratory spaces, administration, classrooms and areas for collective learning and socialization. The goal for the project is to create a site where researchers from around the caribbean could consider central for innovative oceanic research.

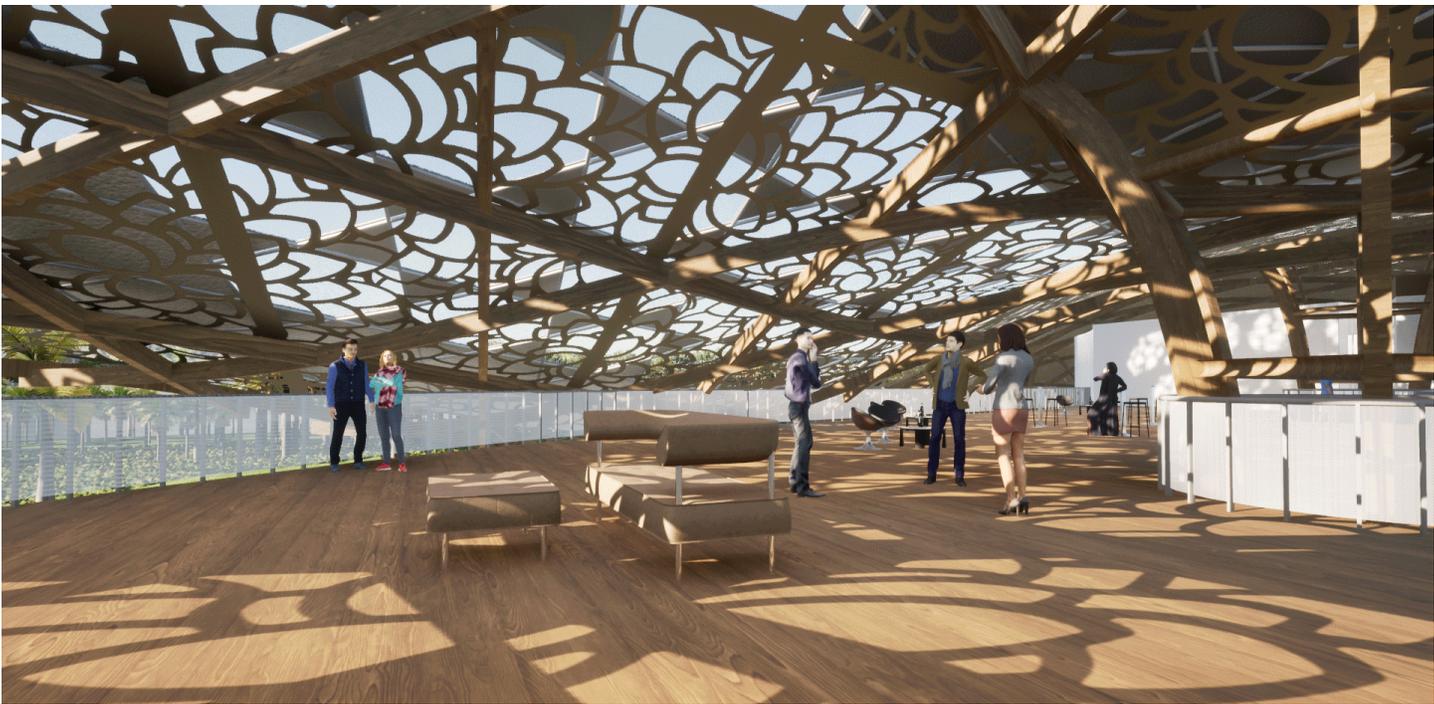




- 1 The Shell
- 2 Main Entrance
- 3 Loading Entrance
- 4 Parking
- 5 Dock









# 3

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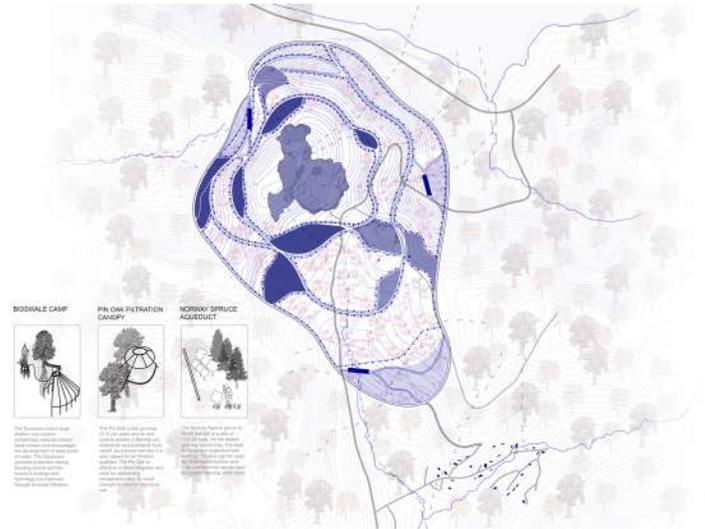
## ECOLOGICAL TRANSECTS

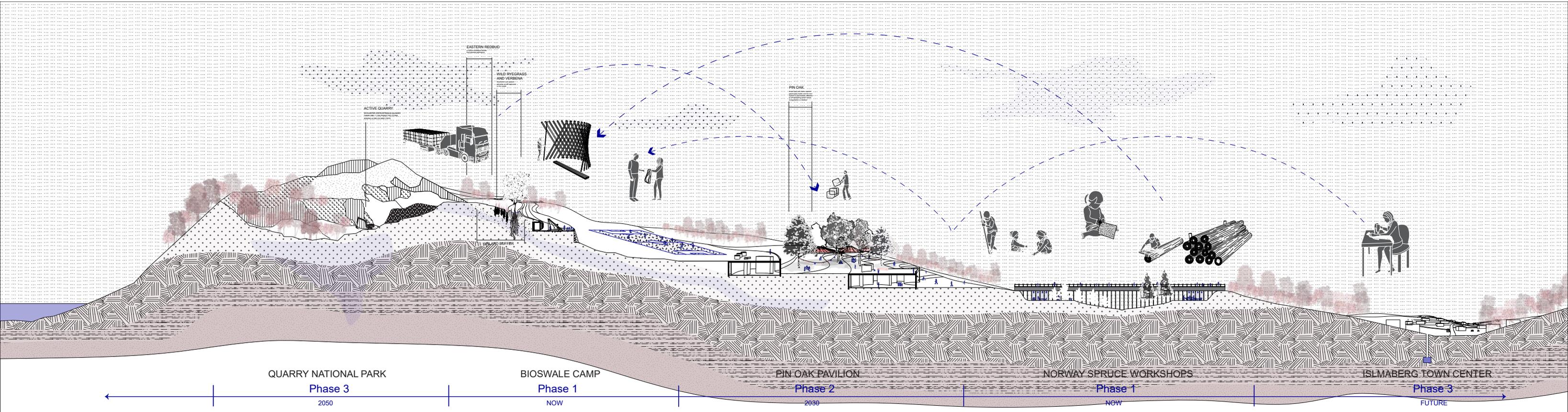
Studio Jamaledine

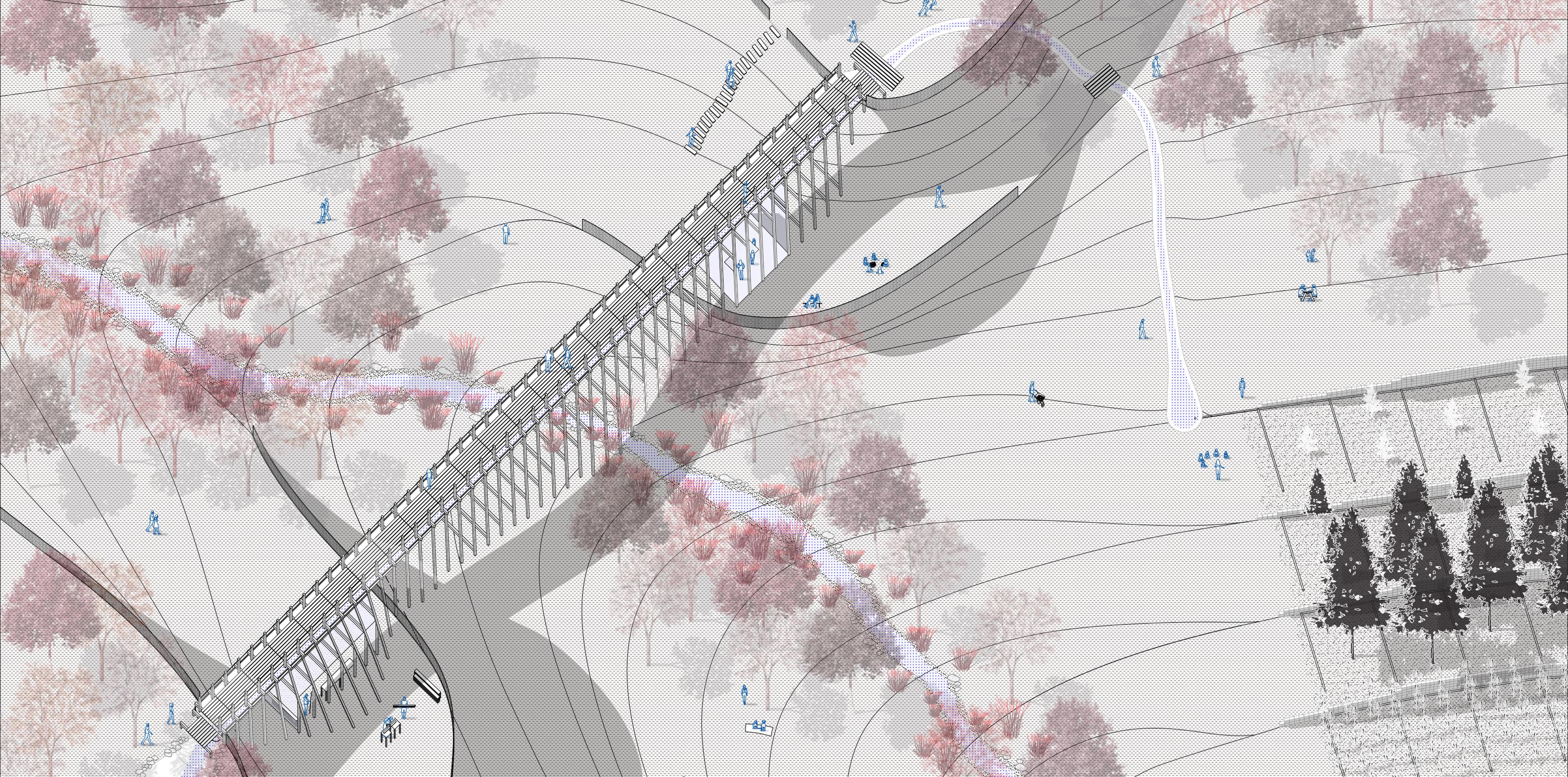
Spring 2020

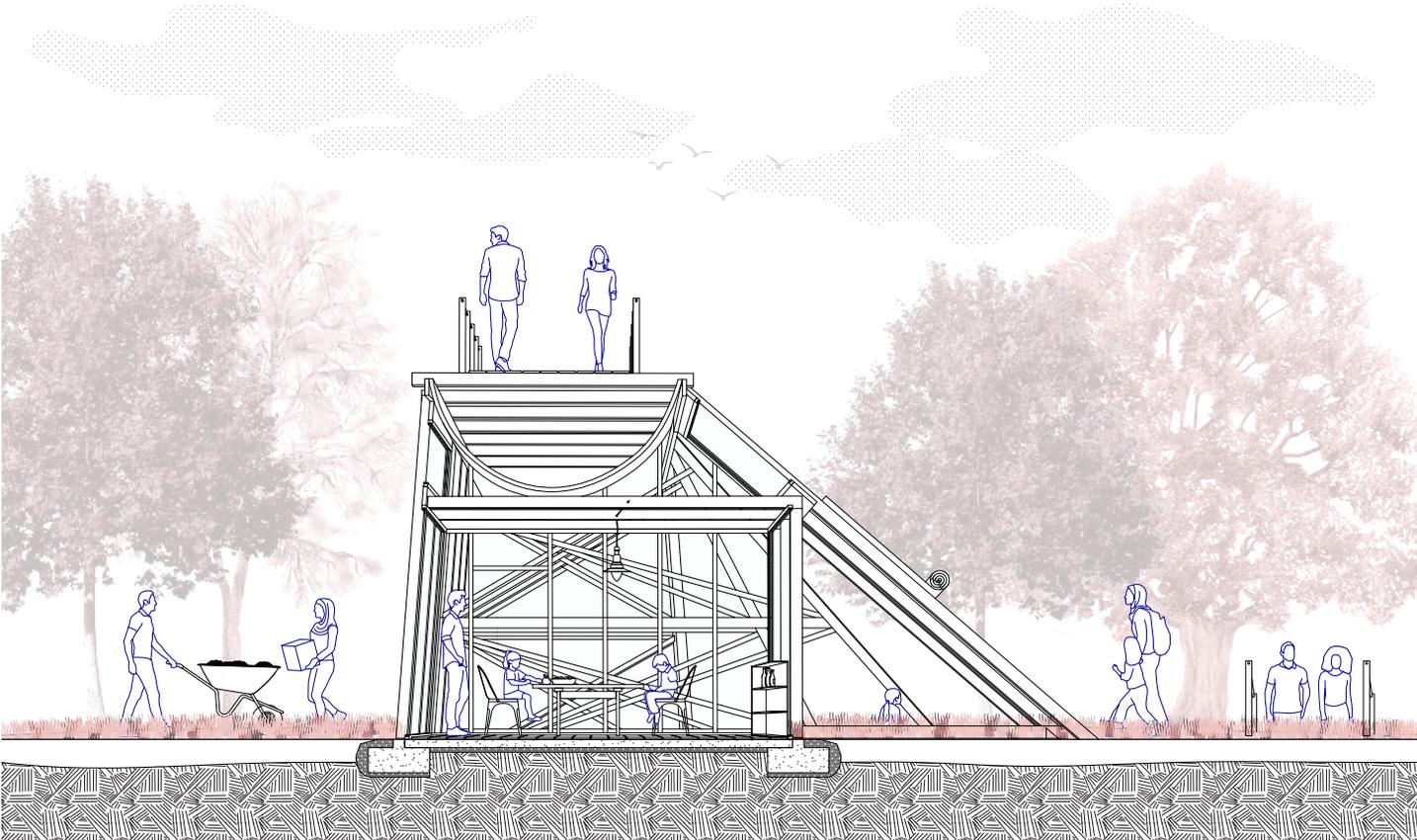
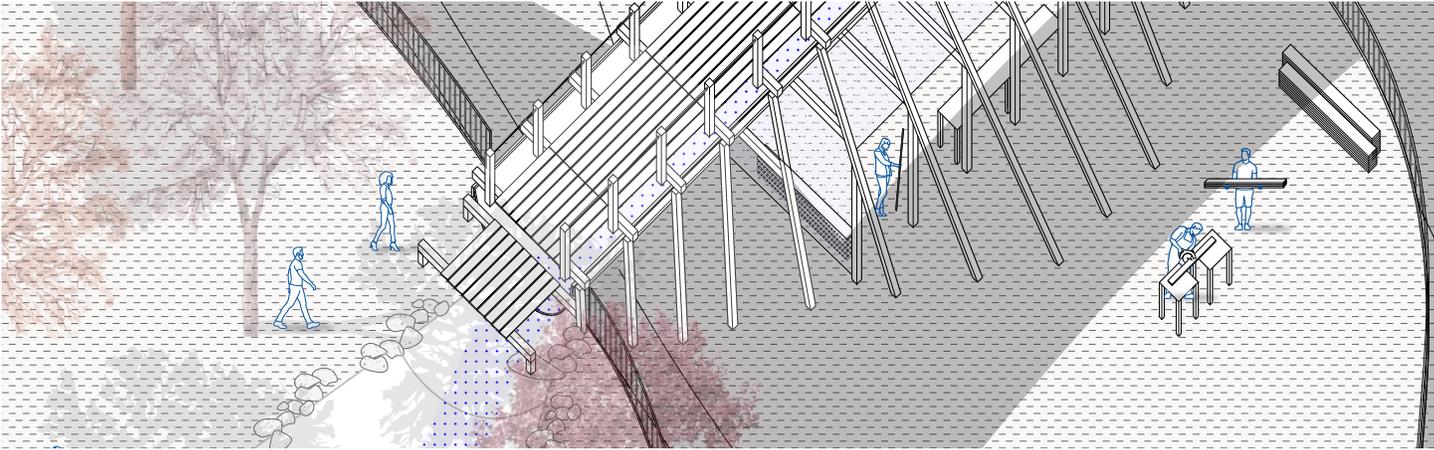
Working in a team of 3 and tasked with defining a problem in the context of the Muslim hamlet known as Islamberg in Upstate New York, my team examined the impact of a local quarry on water quality in the area.

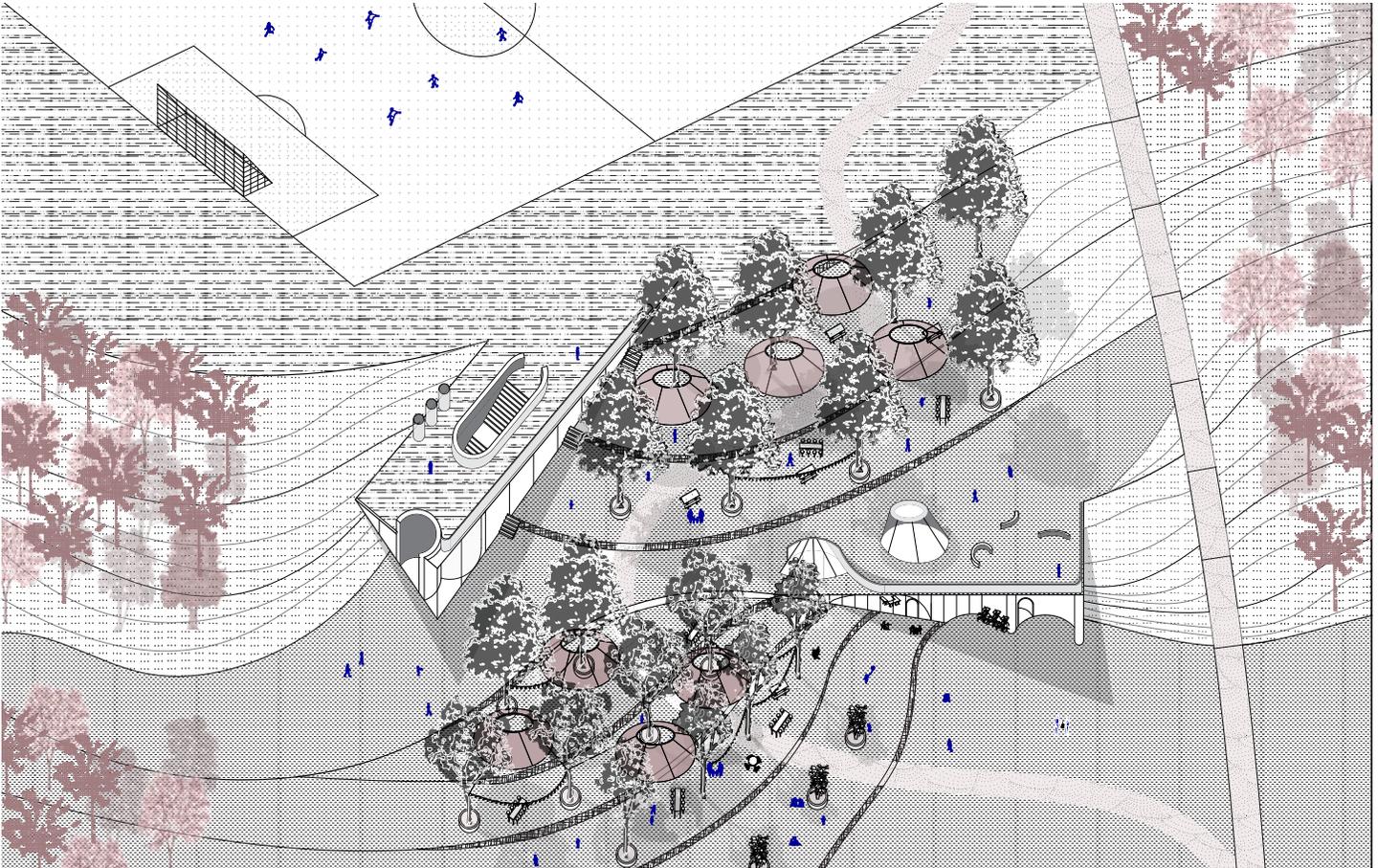
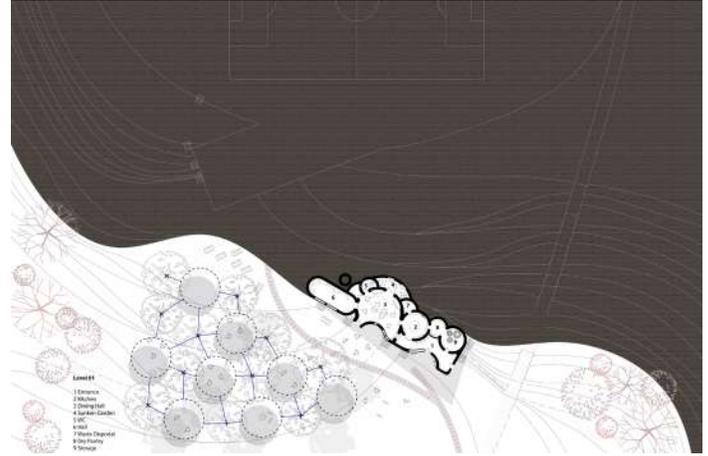
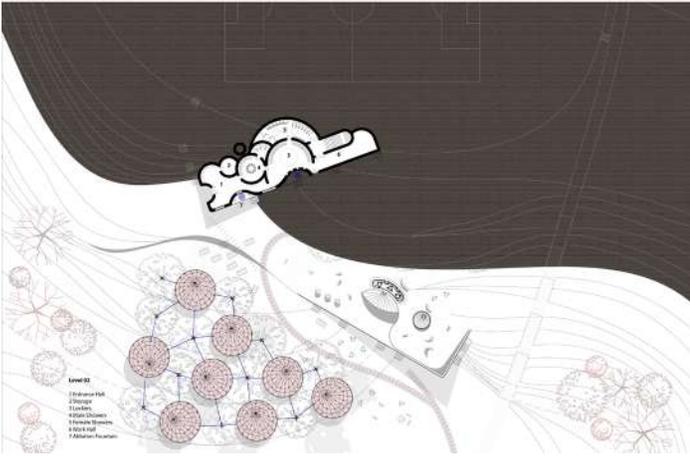
Our design operates at three scales as an evolution of architecture and landscape over 30 years. Bioswale campsites, filtration pavilions and aqueduct tree harvesting transform the landscape through the phasing of pathways and infrastructure capacity for temporal and permanent tactile learning environments, facilitating practices of religiosity and cross-cultural stewardship

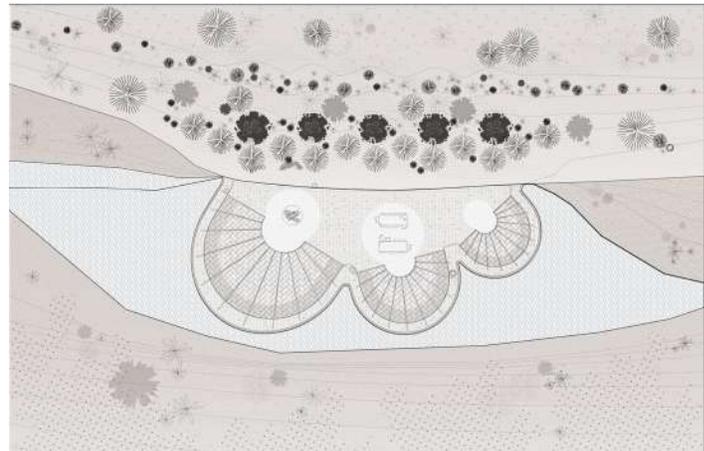
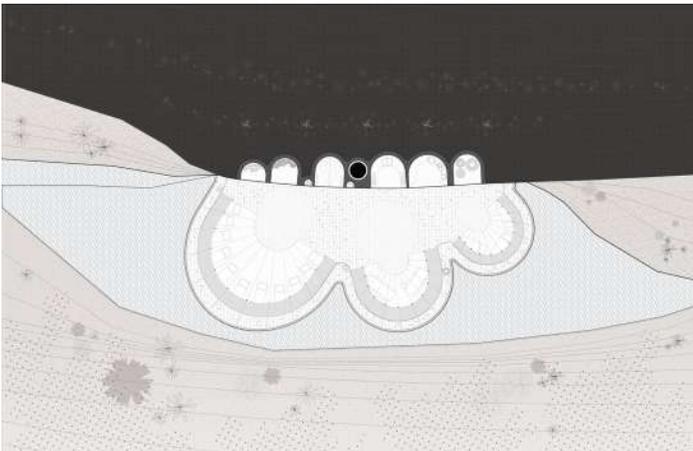
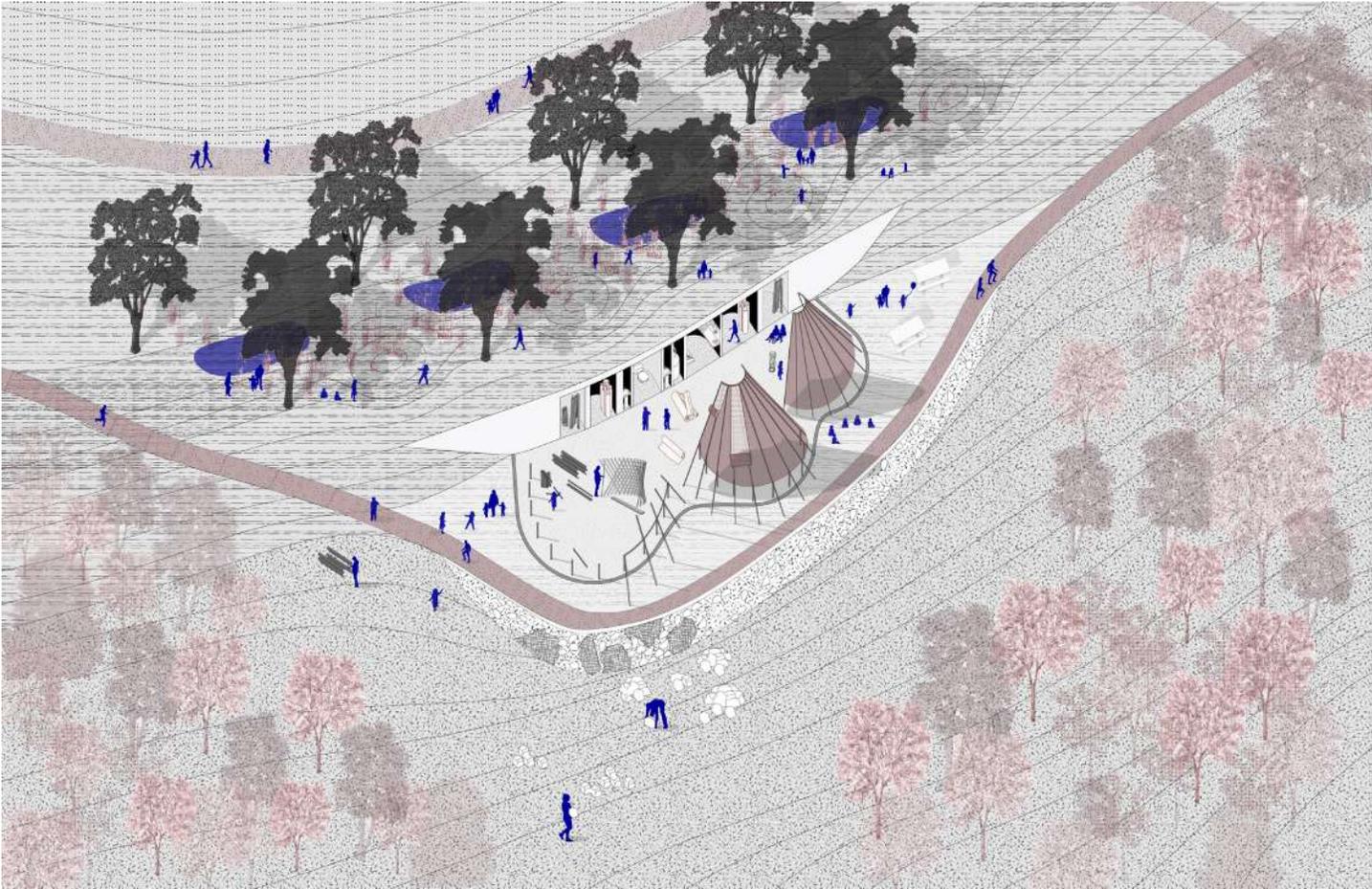














## ANEMONE INNOVATION CAMPUS

Architectural Technology V

Spring 2020

With the changing climate and rising sea level being a concern for coastal areas worldwide, our group designed an academic research campus elevated above the 100 year flood plane. The campus houses innovative educational centers with direct links to on-site employment, housing and a transit system - a tram - providing a linkage between the campus and sunset park's existing subway.



Average yearly dry-bulb temperature of 53.8 F



Typically South-East Winds

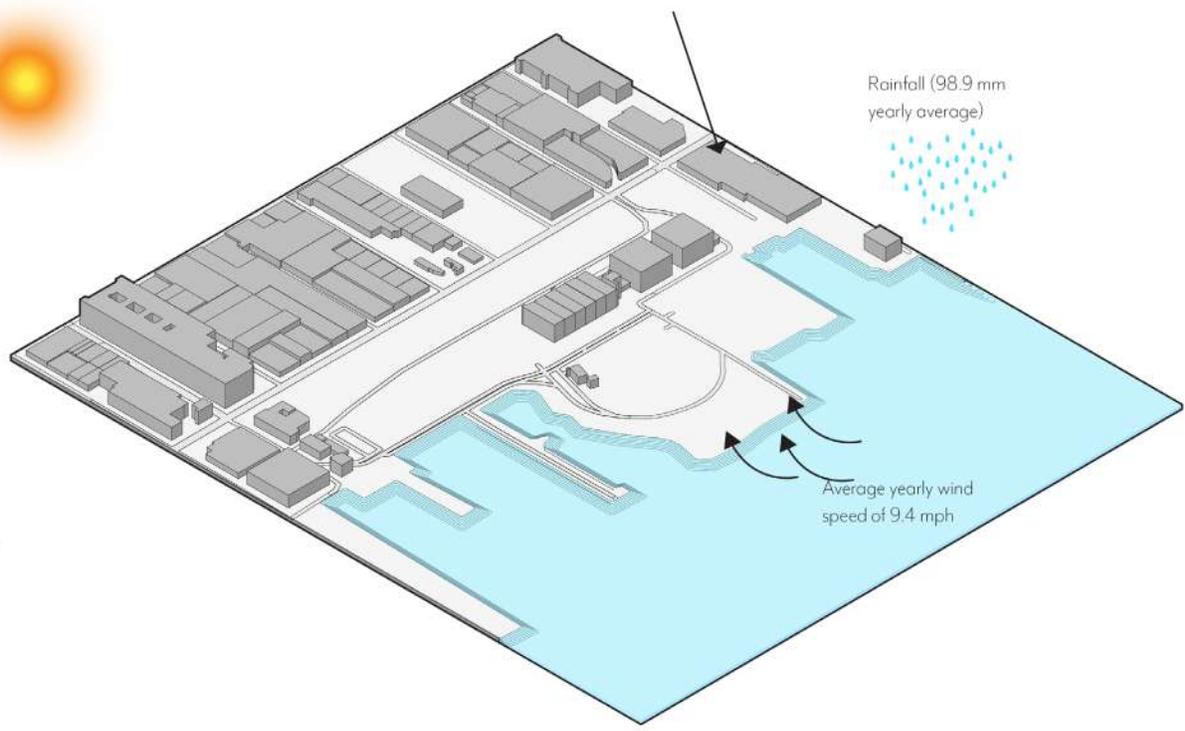
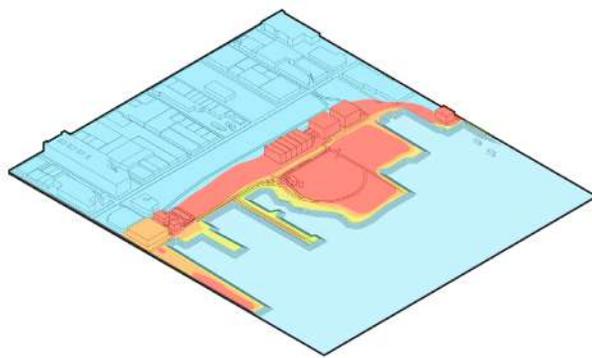
Rainfall (98.9 mm yearly average)



Average yearly wind speed of 9.4 mph

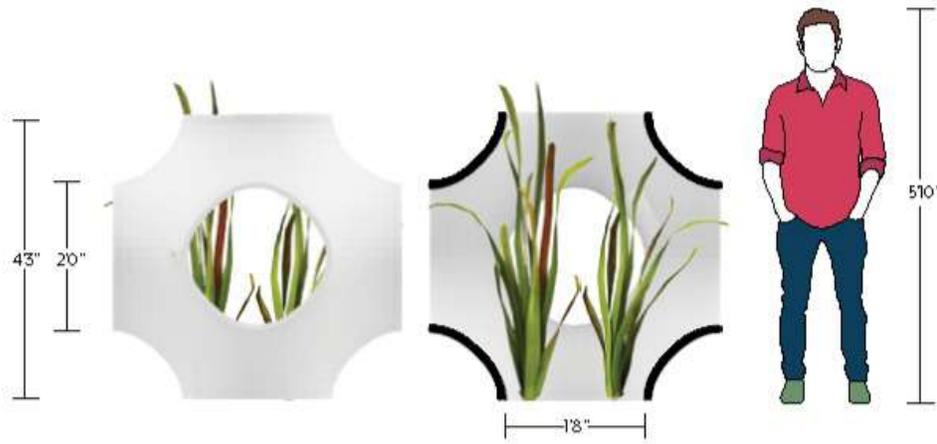
### Flood and Tidal Hazards

- High Tide 2020s ■
- High Tide 2050s ■
- High Tide 2080s ■
- High Tide 2100 ■
- 2020s + Floodplain ■



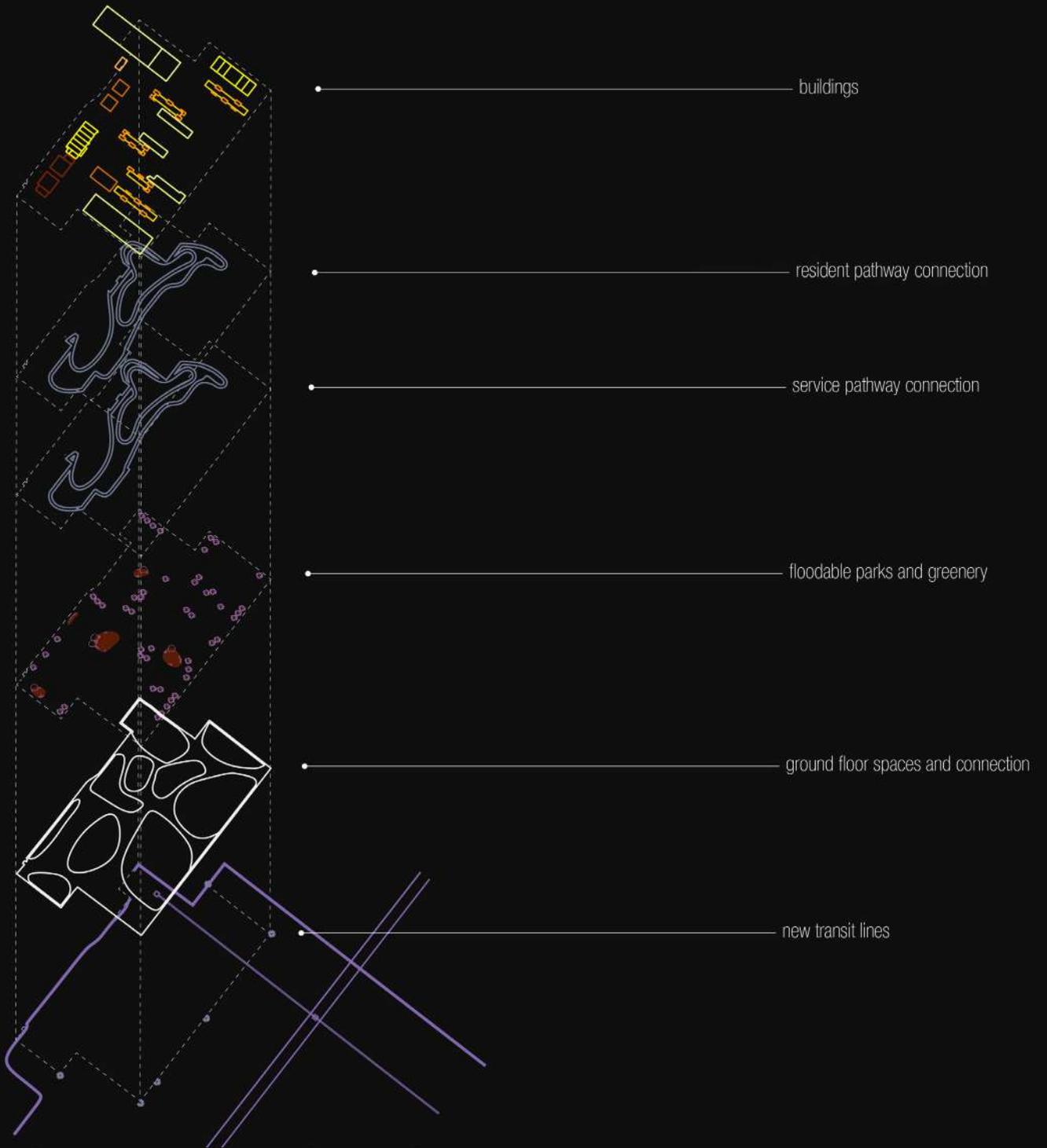


Reef balls are structures made of concrete, silt and shells. Their porous nature that mimics reef structures provides a habitat for oysters and other aquatic plant and fish species. The modular and condensed versions made of recycled glass and compacted sand can be arranged and aggregated in such a way to provide a column-like support structure.





- key
- vertical circulon centers
  - flood ponds
  - green space
  - ground circulation
  - elevated circulation



buildings

resident pathway connection

service pathway connection

floodable parks and greenery

ground floor spaces and connection

new transit lines

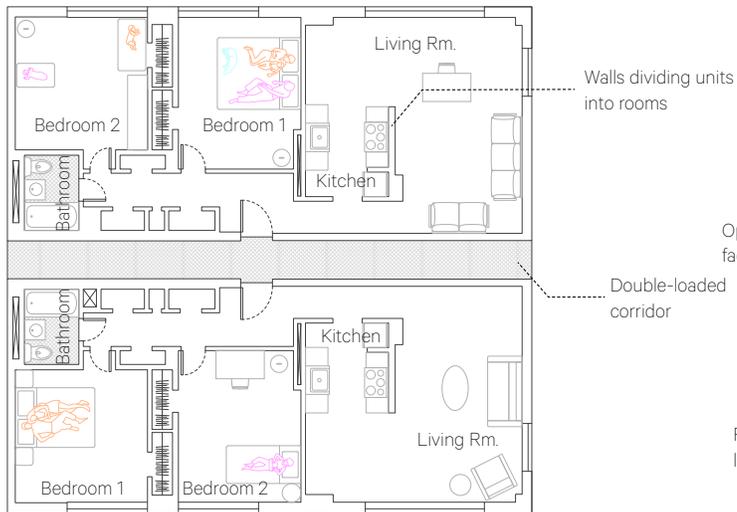
## ROOM/NOT ROOM

Studio Bunge

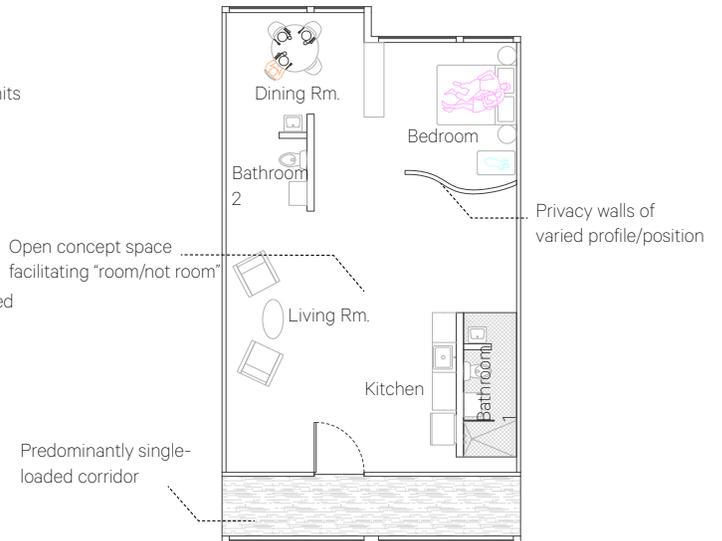
Fall 2019

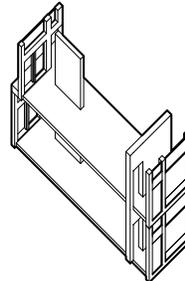
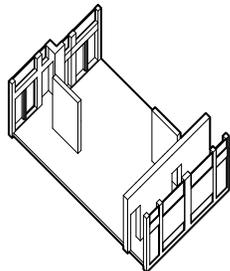
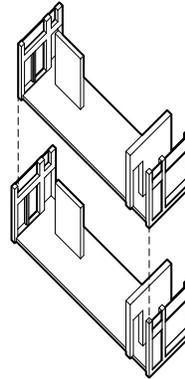
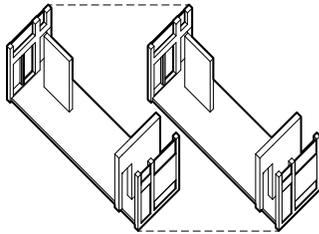
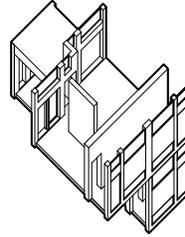
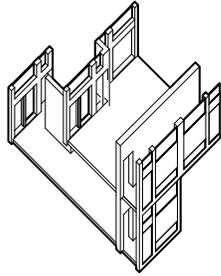
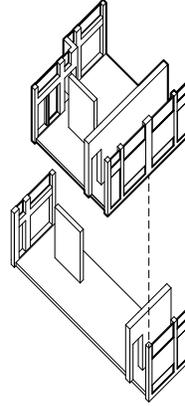
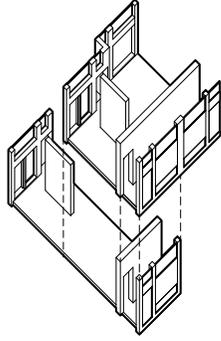
Prompted with the concept of “room/not room”, my partner and I were to come up with a housing scheme for affordable apartments adjacent to NYCHA housing in the Bronx. Our take on the concept was to design open floor plans devoid of walls that would typically signify a “room”. These rooms were designed as two sizes, both containing one or two wet walls that were both supportive and also ran as chases through the whole building. The building form was derived from the desire to optimize light entering the interior courtyard and courtyard apartments, as well as facilitating pedestrian flow diagonally across the site.

Linden Houses (Typical NYCHA  
Apartment Layout) - 769 sq. ft.



Proposed Apartment Layout  
(904 sq. ft.)

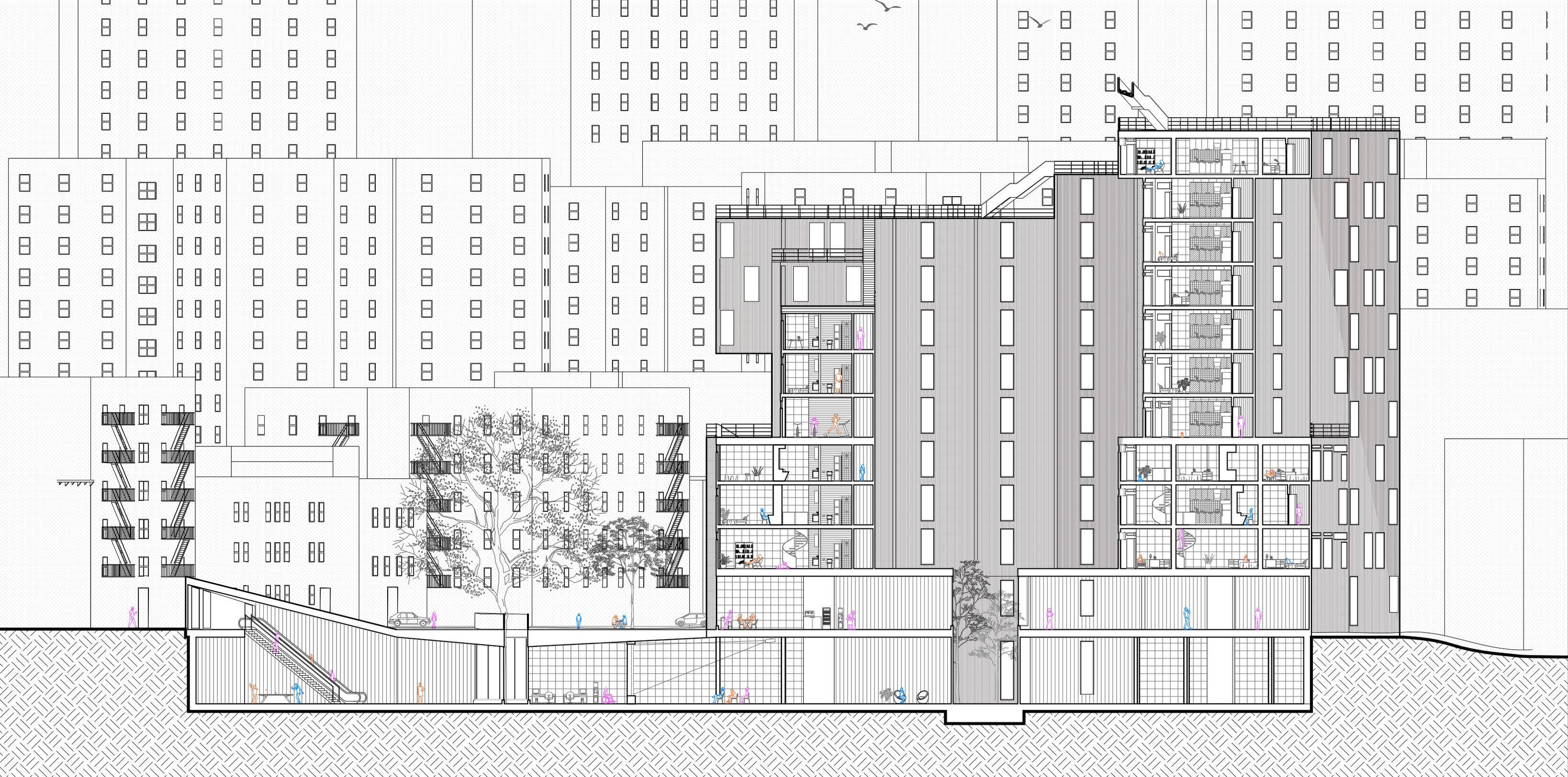




















## SARA D. ROOSEVELT MEMORIAL LIBRARY

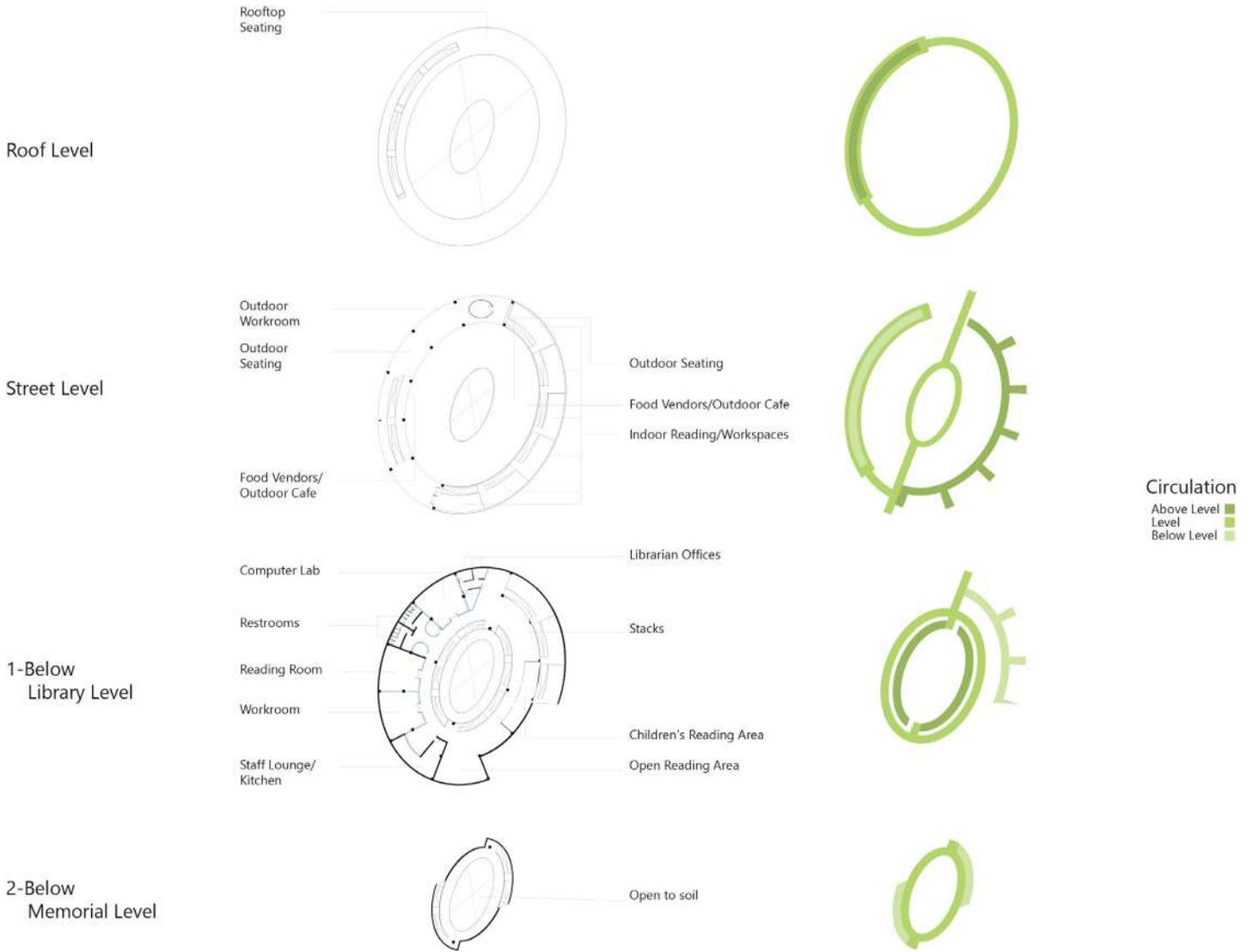
Studio Kipping

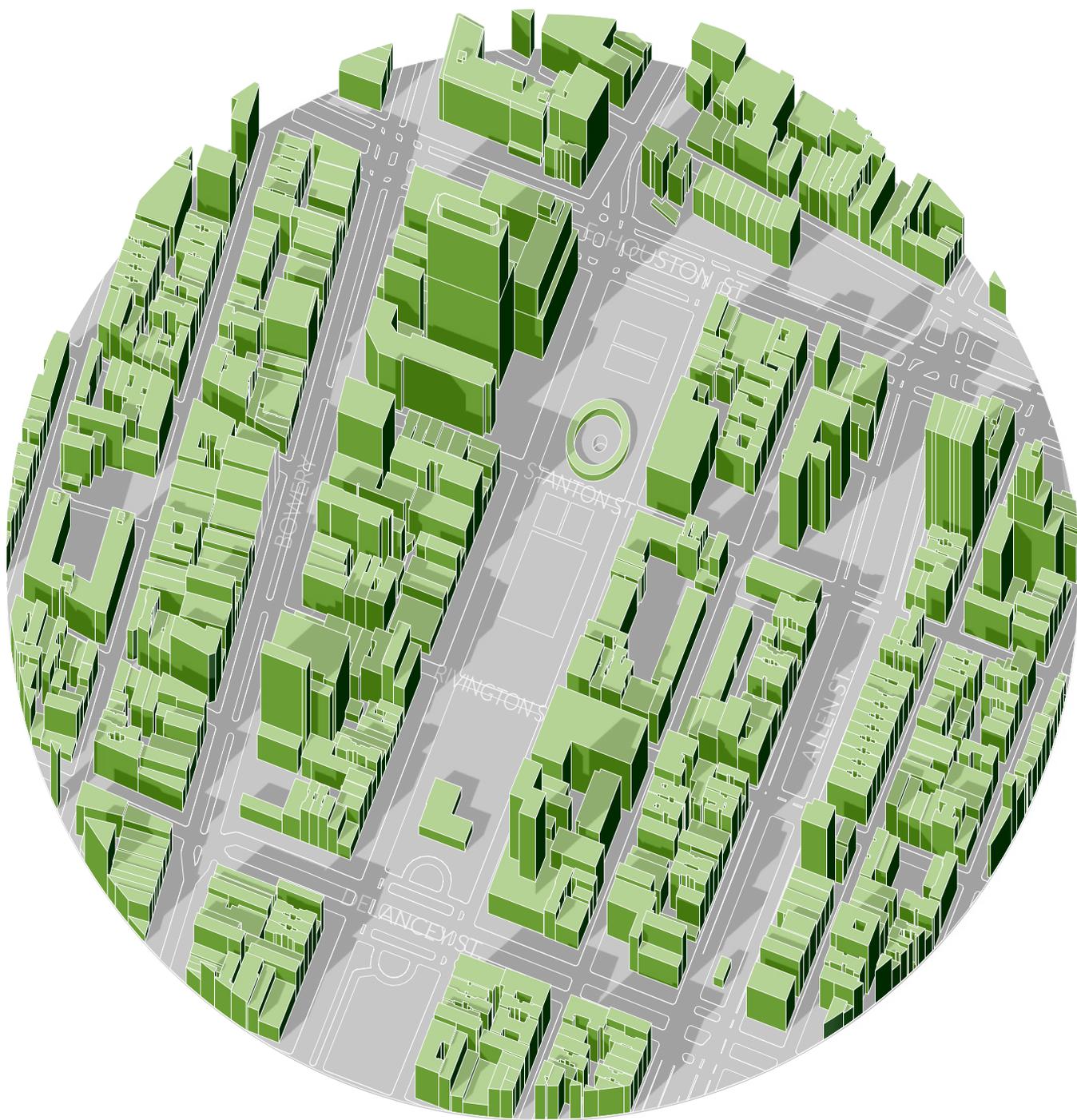
Spring 2019

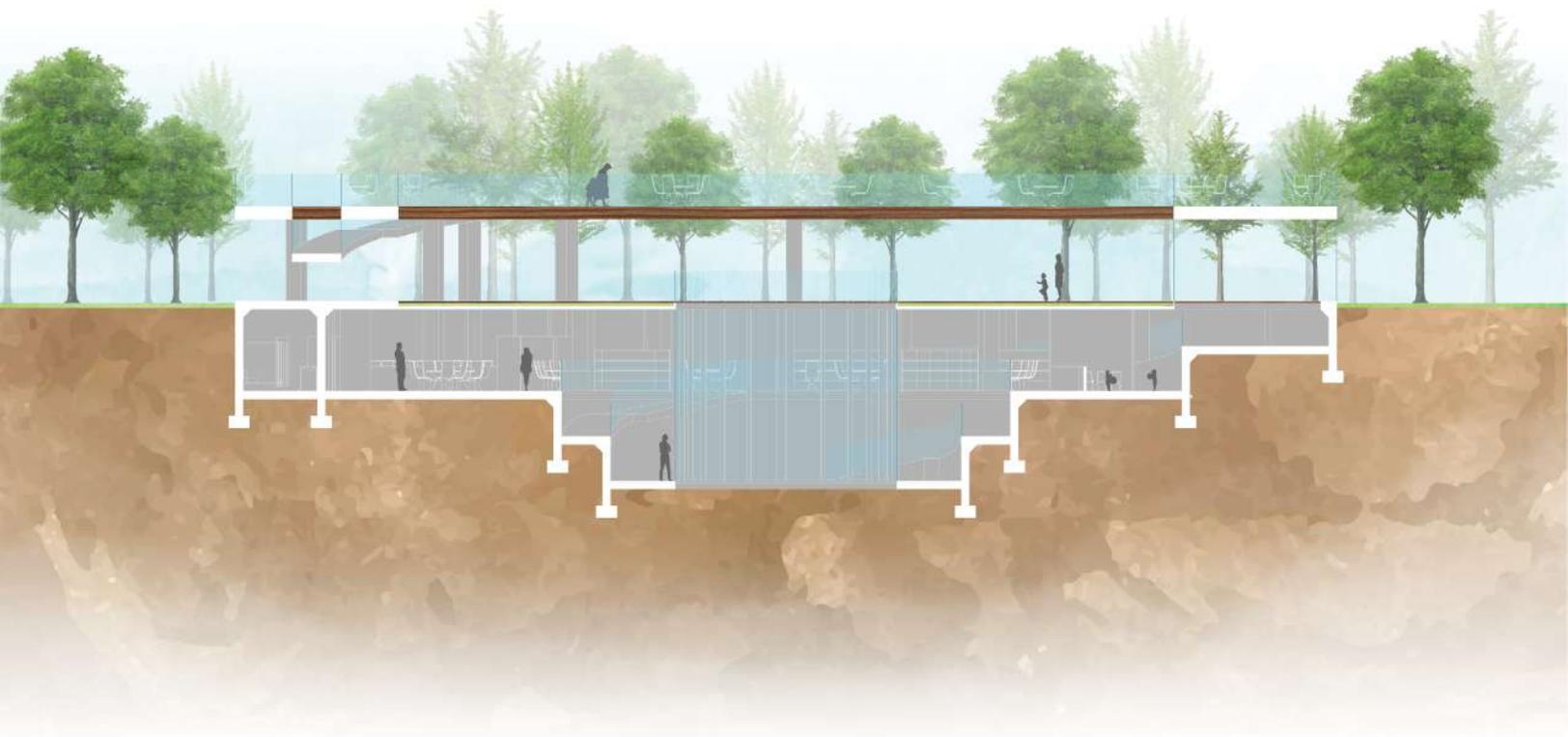
Substantial evidence suggests that the bodies of forgotten freed slaves remain on the site of Sara D. Roosevelt Park, a site where the only reference to this history is in the name of a community garden, M'finda Kalunga. This design for a public library strives to literally unearth this history. On the lowest level, visitors are face-to-face with earth that, in 1853, would have been street level. As they stand merely feet away from these forgotten slaves, visitors are meant to reflect on the contribution of immigrants to the building United States.

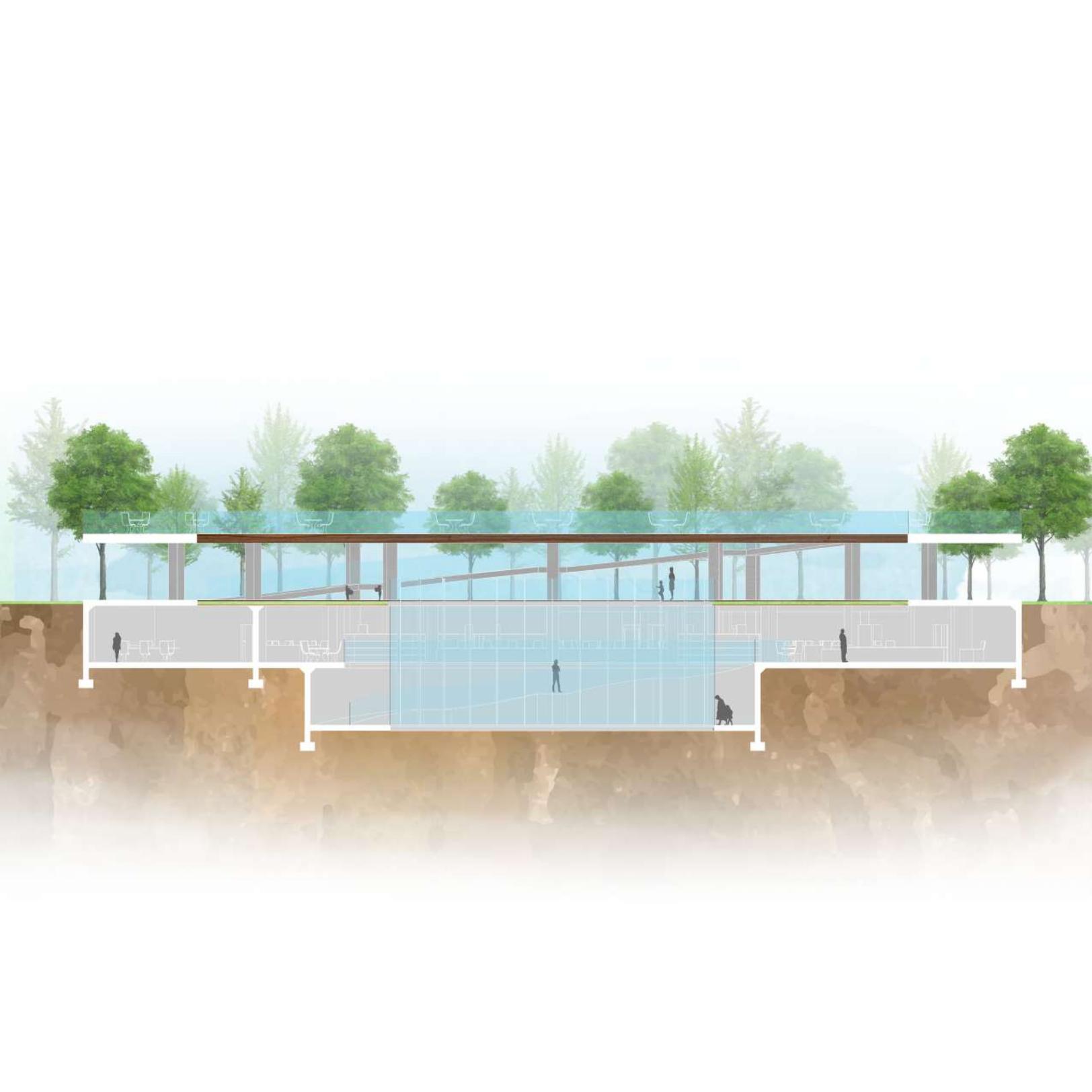


NY Lower East Side

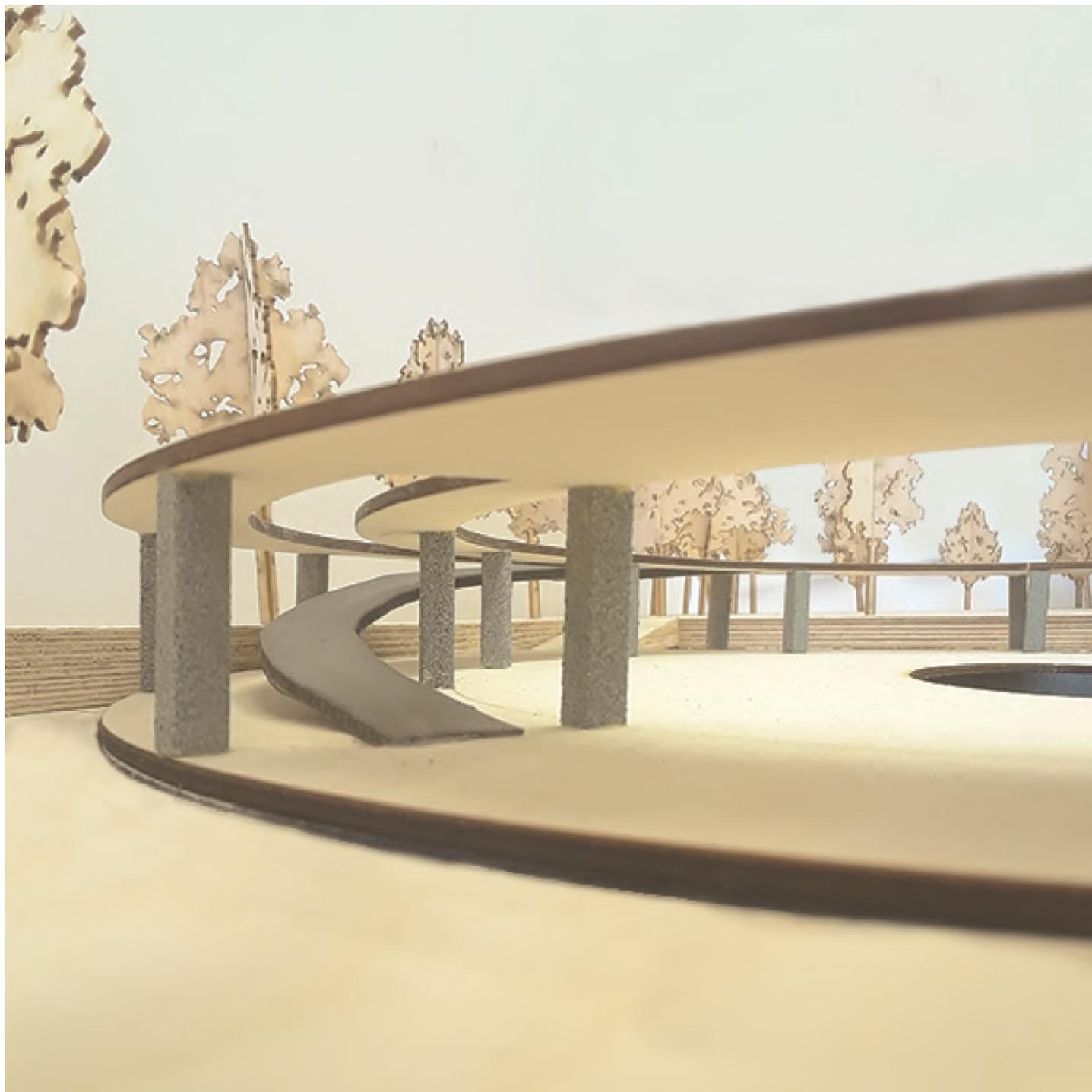












## ADDITIVE + SUBTRACTIVE GEOMETRIES

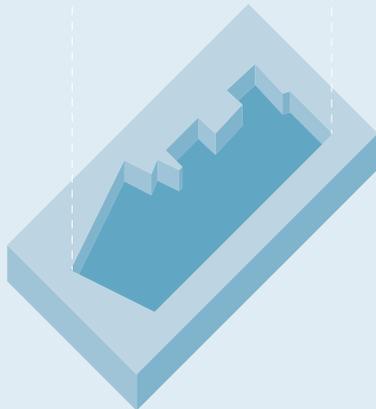
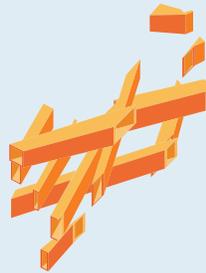
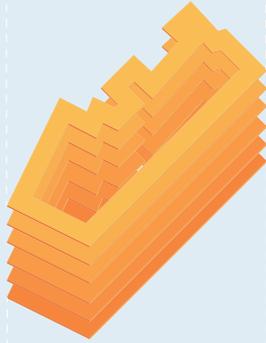
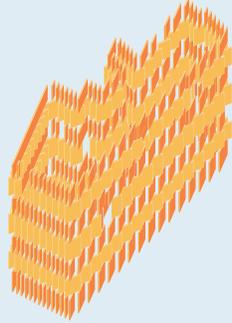
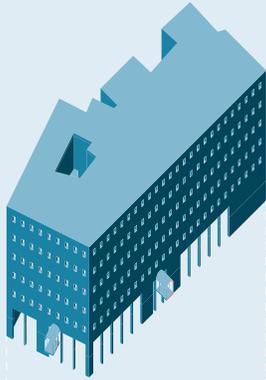
Studio Lin

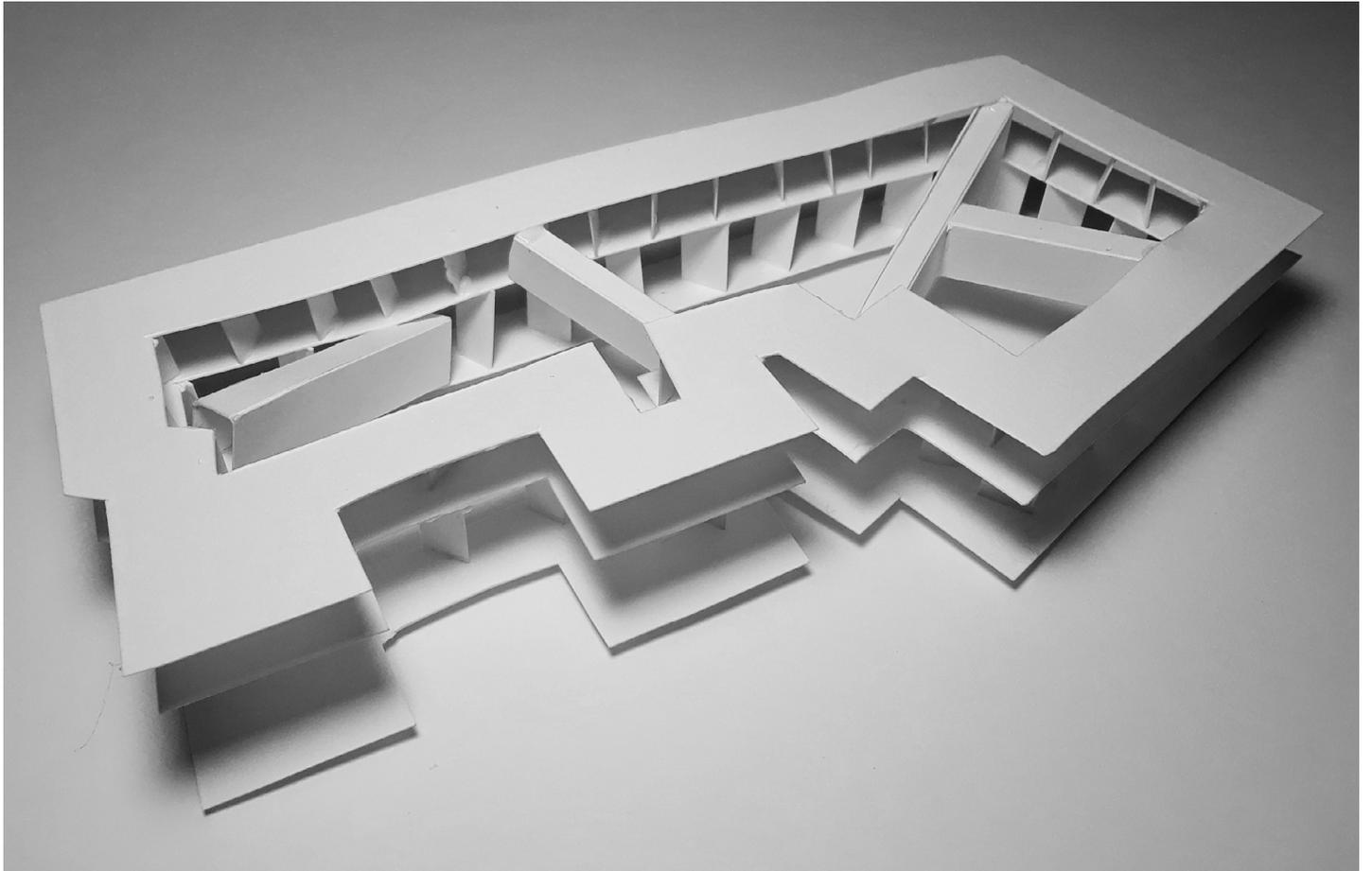
Fall 2018

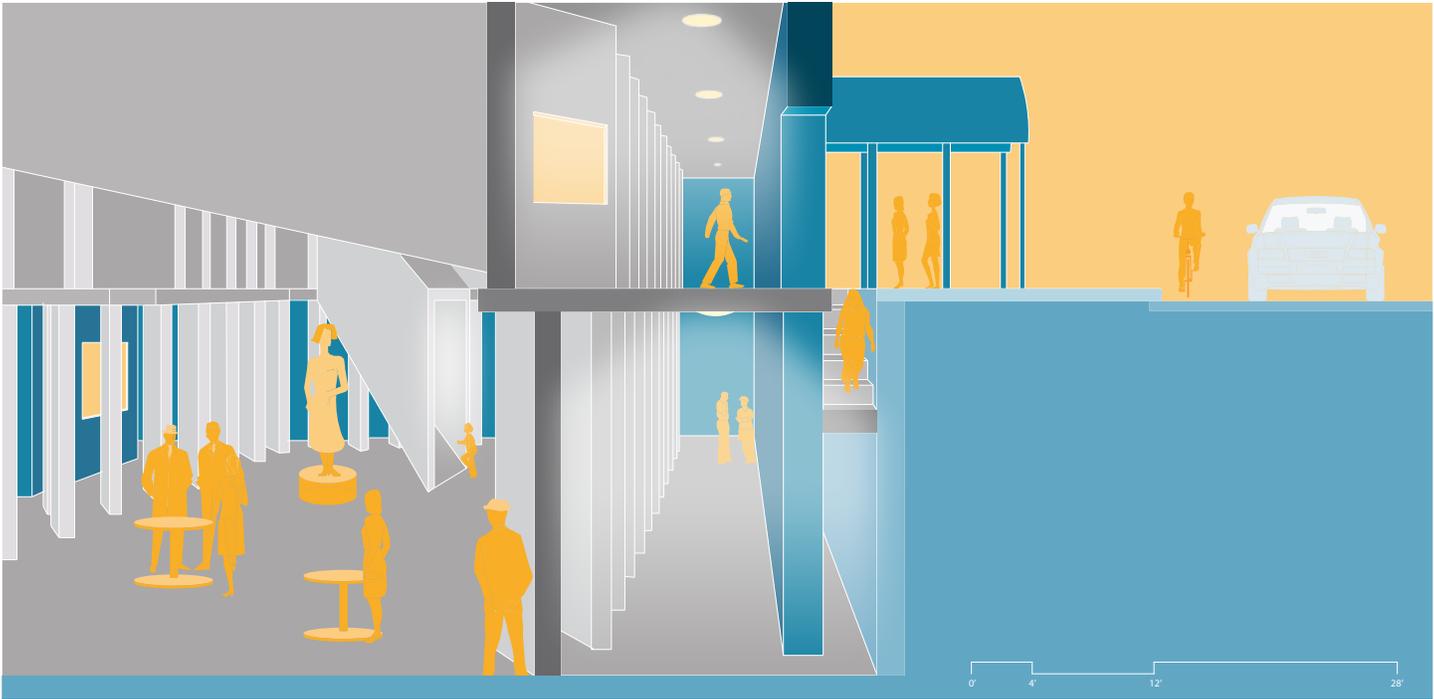
From the constant sounds of jackhammers and trucks, to the rampant scaffolding structures and construction signs, New York City is in a visibly constant state of construction. Whether it is buildings being demolished, renovator or built up, the alteration to the city scape is a active 24 hour process. Within this, however, exists a sort of limbo, a state where building that are to be torn down, await their demise. As a reaction to the unending construction, Additive and Subtractive Geometries takes advantage of this milieu forms, creating temporary conditions where the public can finally escape the disruptive state of the city.

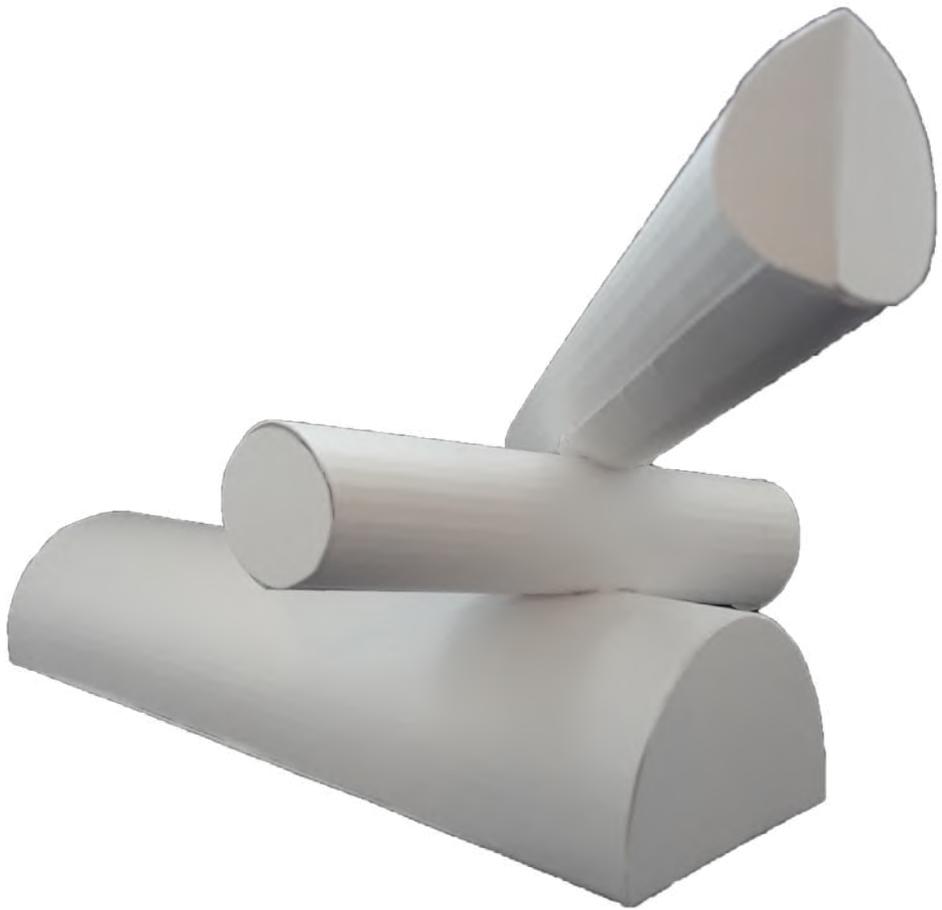


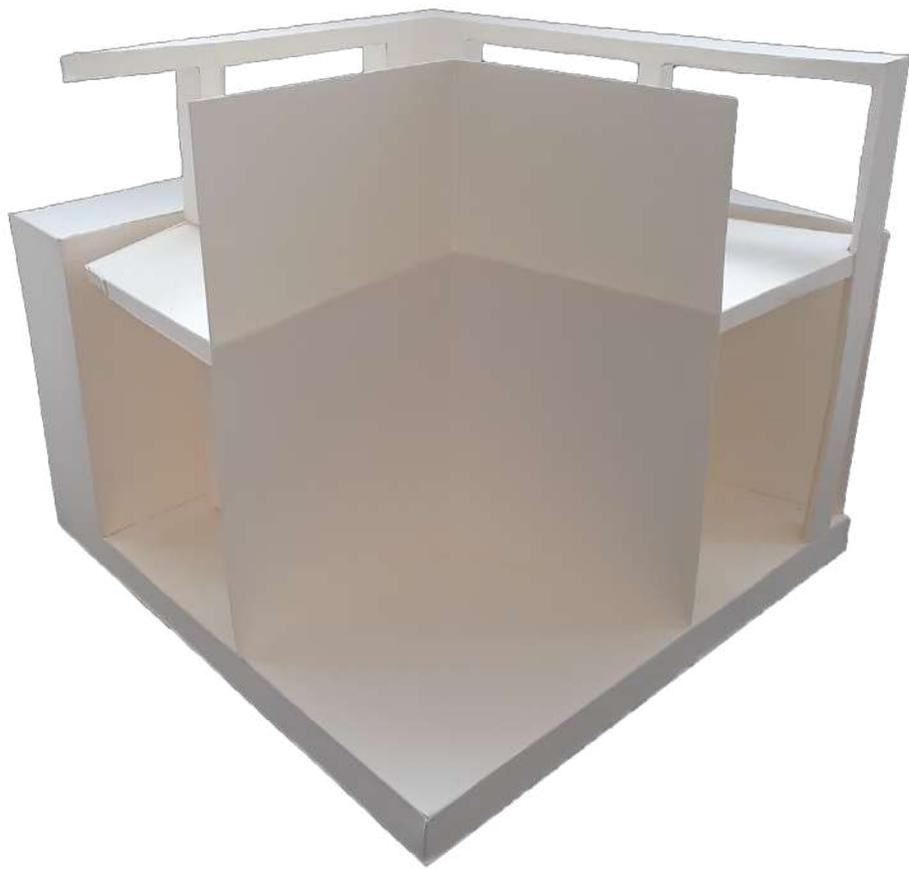












## GRACEFUL FARMS

Studio Rebek

Fall 2018

As the first ADR course experimenting with materials and modeling, I chose to focus on a fashion theme, creating a pewter pendant in the shape of Grace Farms by SANAA. The result was a gorgeous and polished architecturally designed piece of jewelry created from a well crafted 3D model. The display - the velvet wrapped base - was created to copy the existing topography on the site.





