

# ***GRADUATION PORTFOLIO***

***YANAN CHENG***

*2019-2020 MSAAD*

*COLUMBIA GSAPP*

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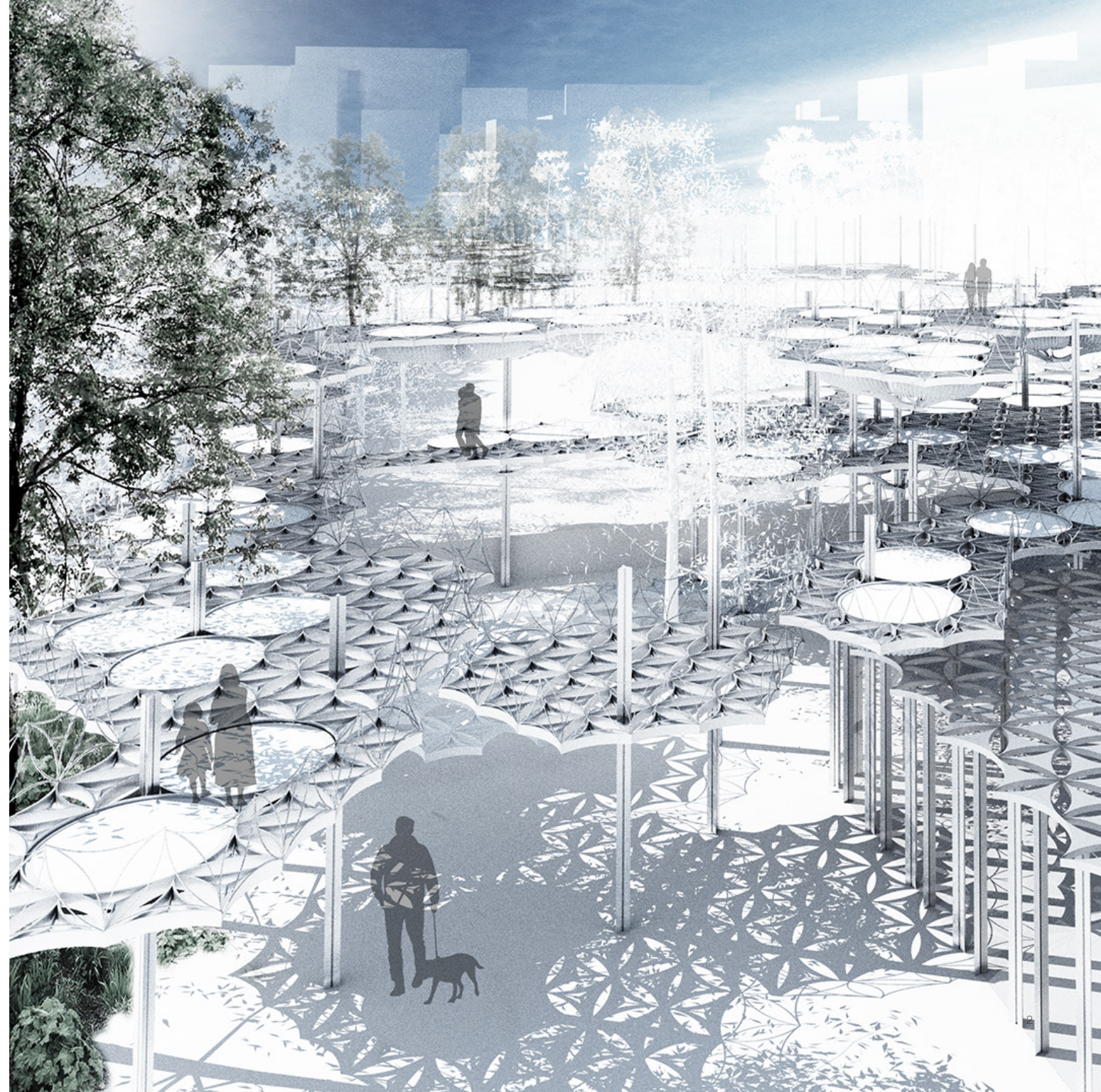


# *PARALLEL DIMENSIONS*

SIRENIA KIM

YANAN CHENG

KARLA ROTHSTEIN  
COLUMBIA GSAPP  
SUMMER 2019





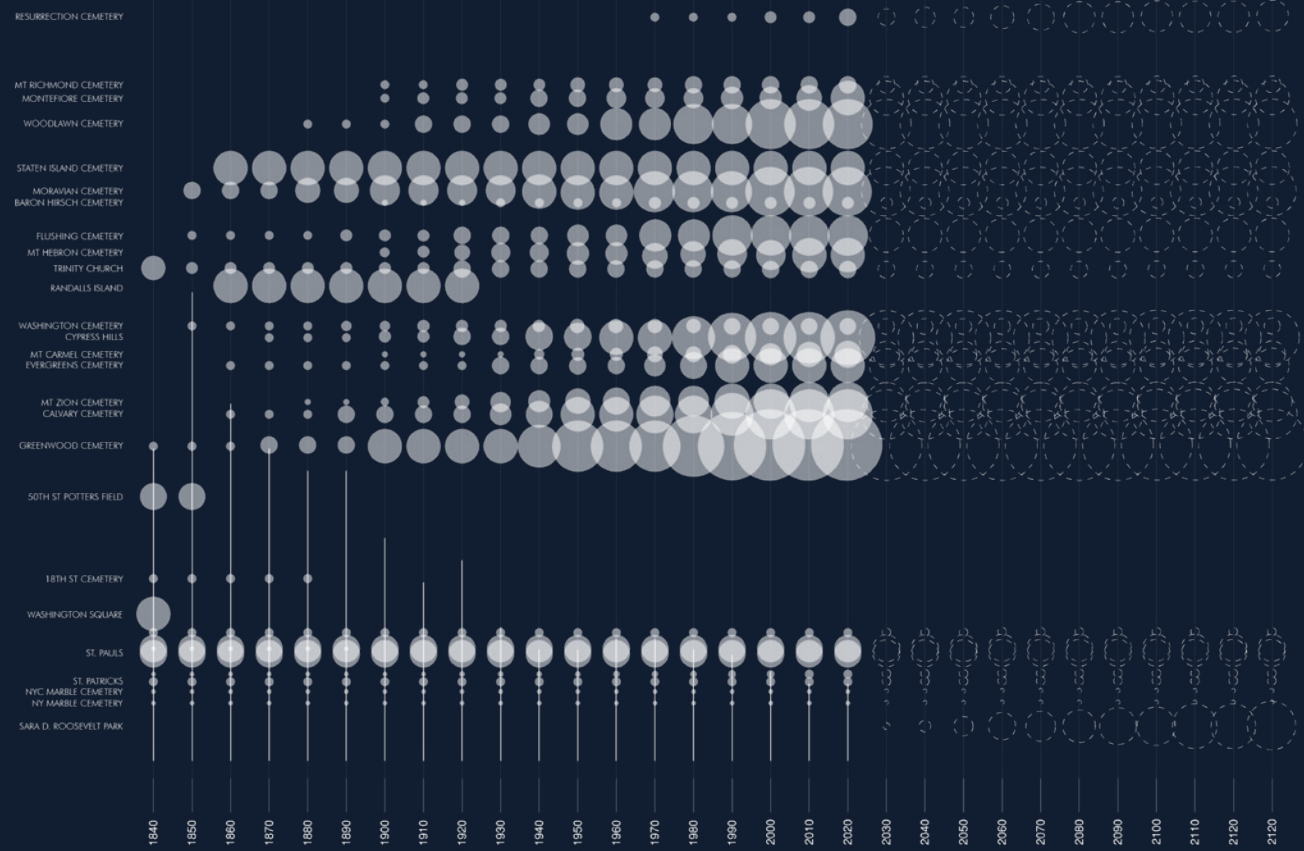
Your death brought darkness  
But when I touch, you still glow  
To comfort my soul

Life and death are parallel experiences, coexisting and influencing one another. This project offers a meeting ground where the living are invited to spiritually interact with the dead. A new form of 21st century cemetery coexists with a parallel canopy of public space, mediating and enhancing current activities by responding to temporal aspects of the site. Through anaerobic bioconversion, the deceased are converted into energy, encircling one in a halo of light. The aggregated corona provides both intimate and collective settings for personal remembrance and collective engagement.

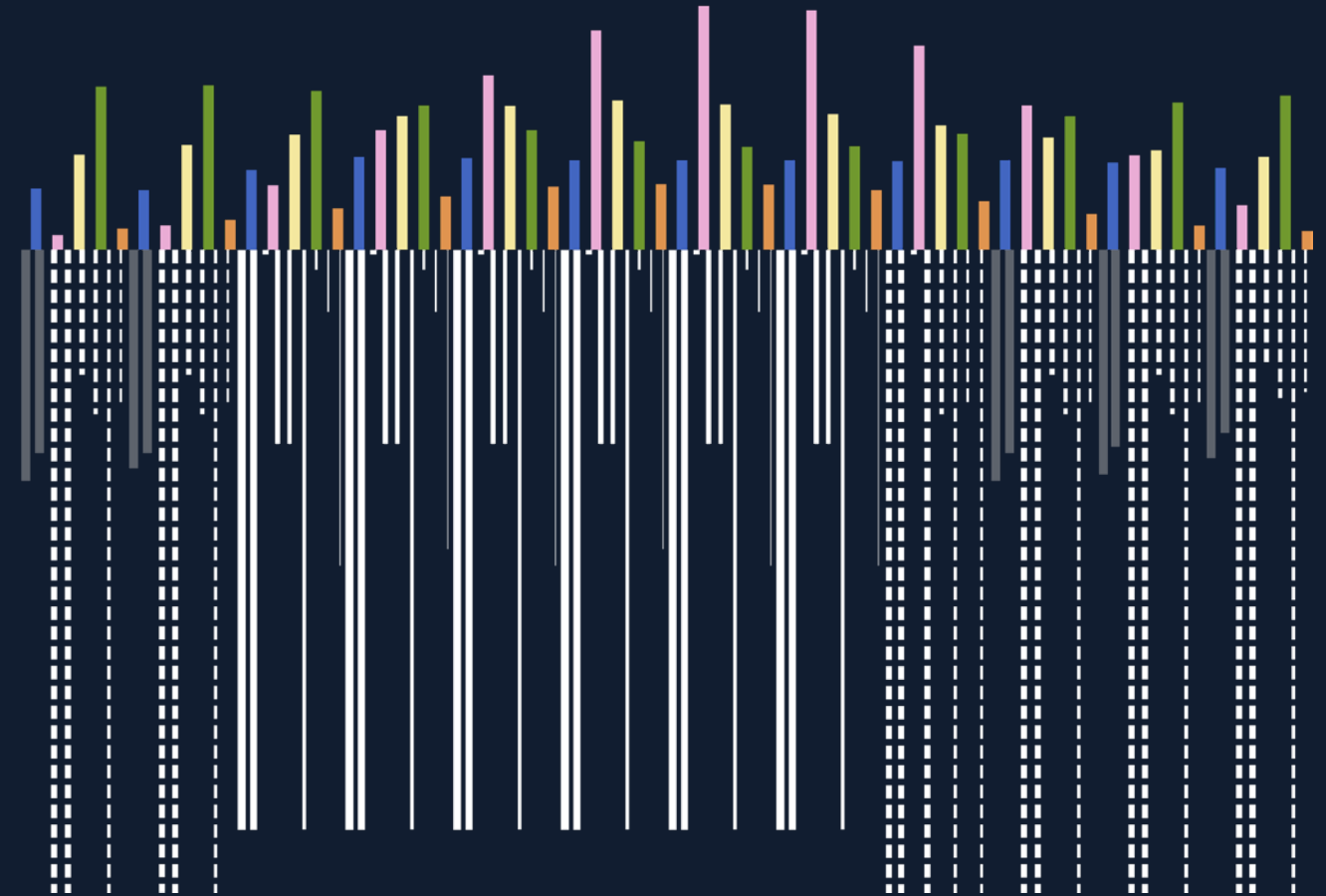
Ceremonial pavilions with a porous skin are softly illuminated by natural light, creating spaces of tranquility and reflection. Ascending pathways facilitate committal and blur the division between life and death experiences. The porous canopy strategically thickens as holistic experiences of life are increasingly valued.



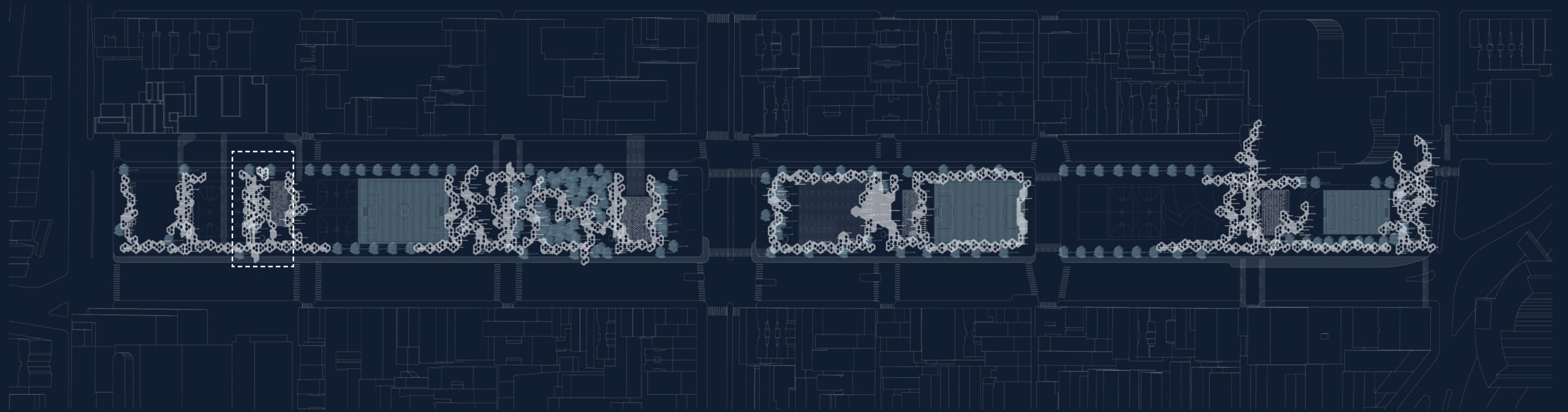




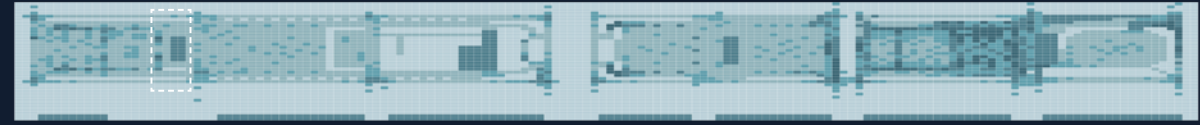
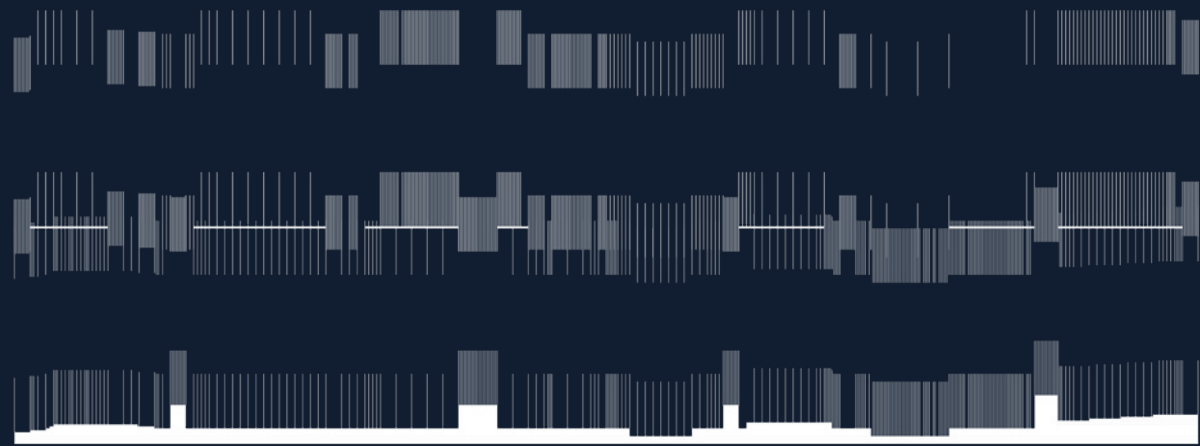
New York City Cemetery Capacity



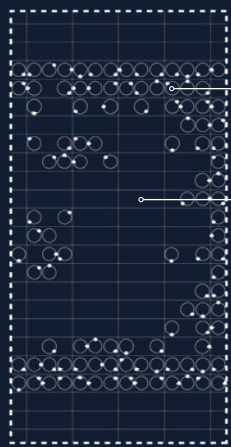
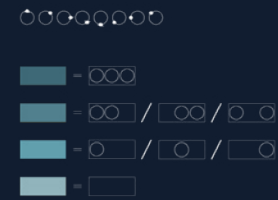
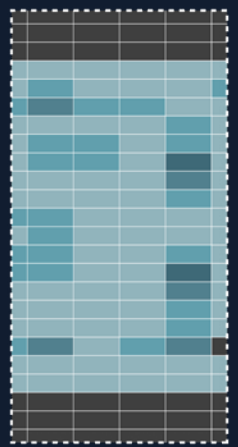
Sara D. Roosevelt Park Weather and Activity







Vessel Arrangement



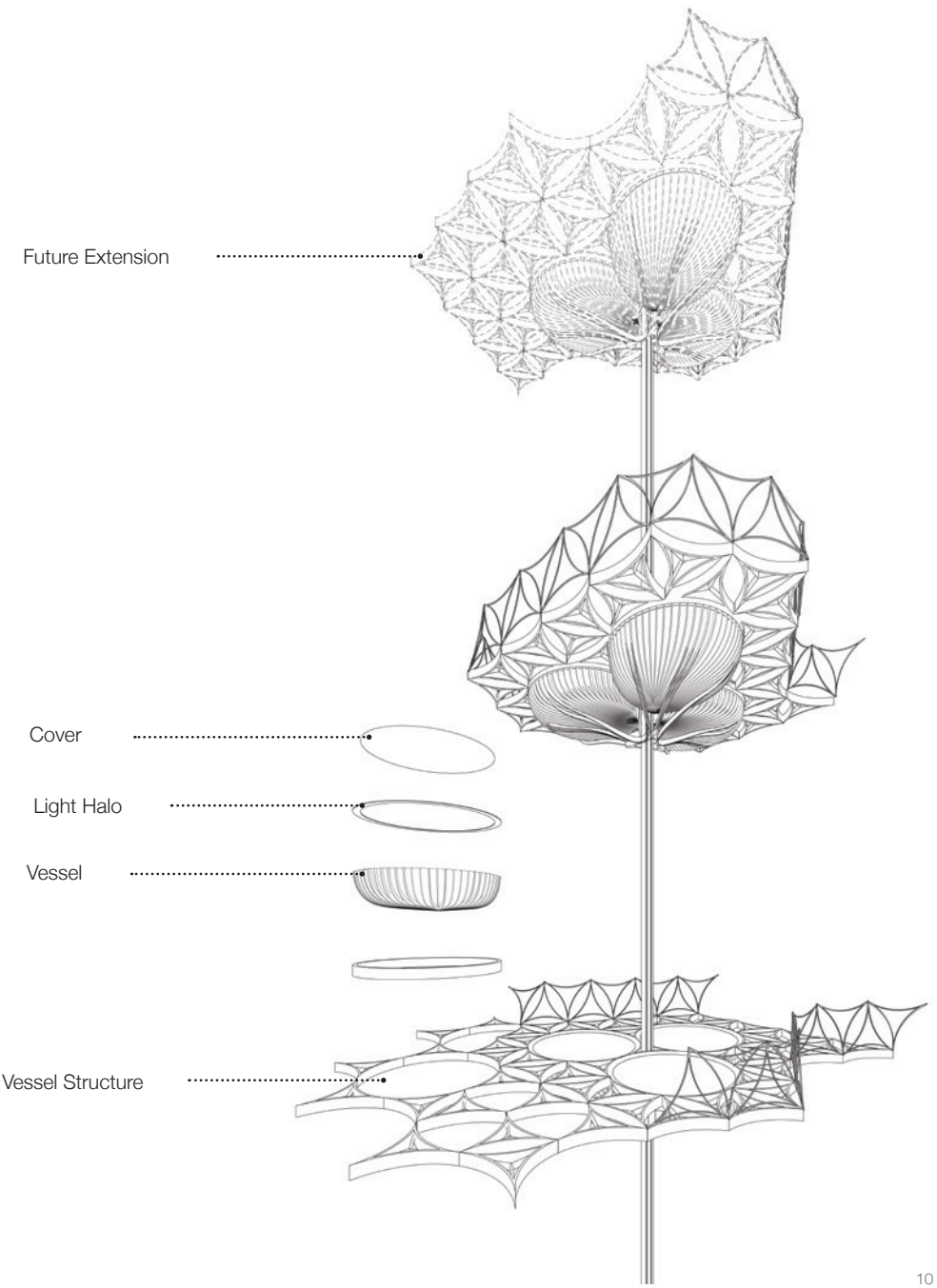
Intimate  
Collective  
Halo

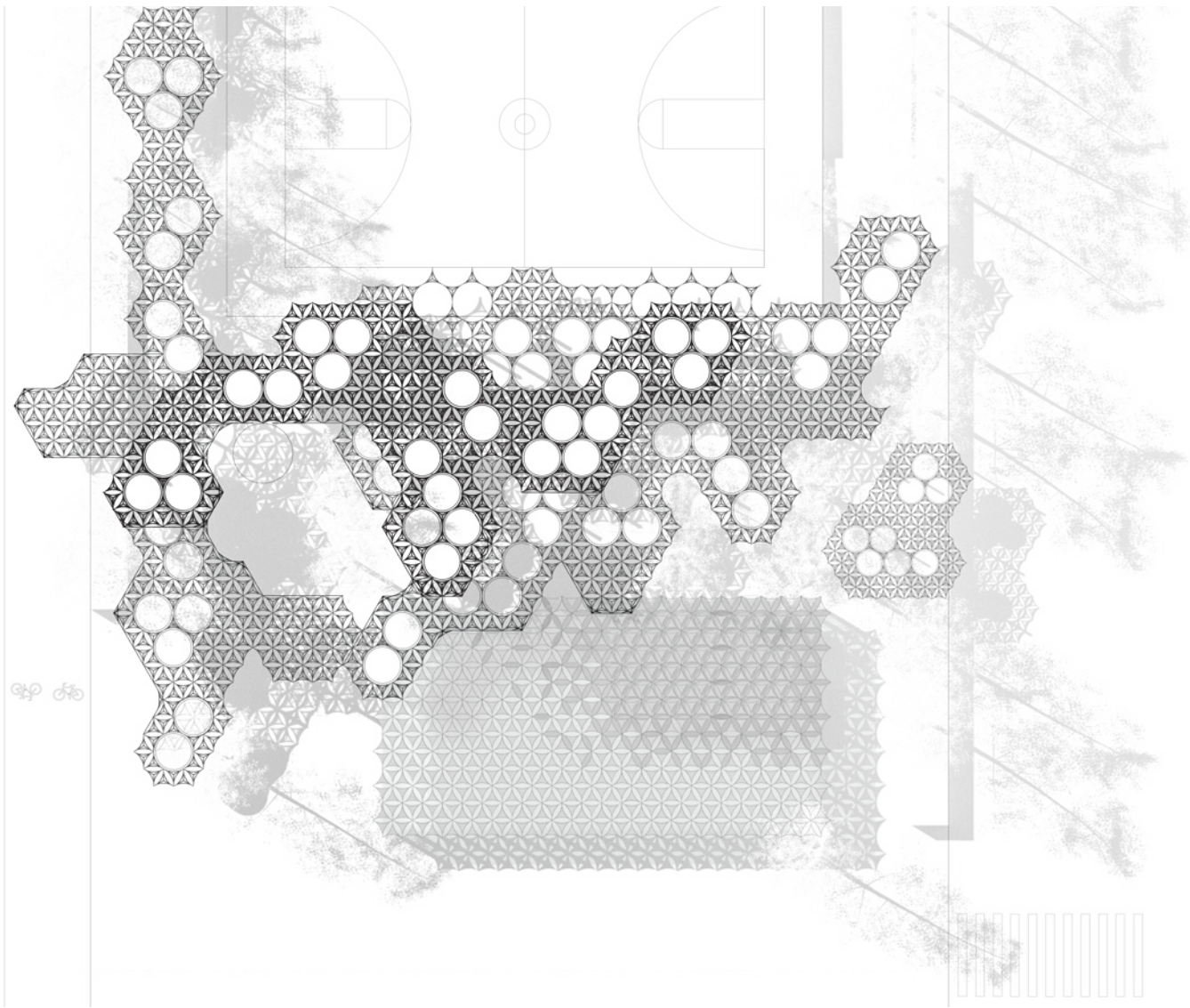


Activity Density Map

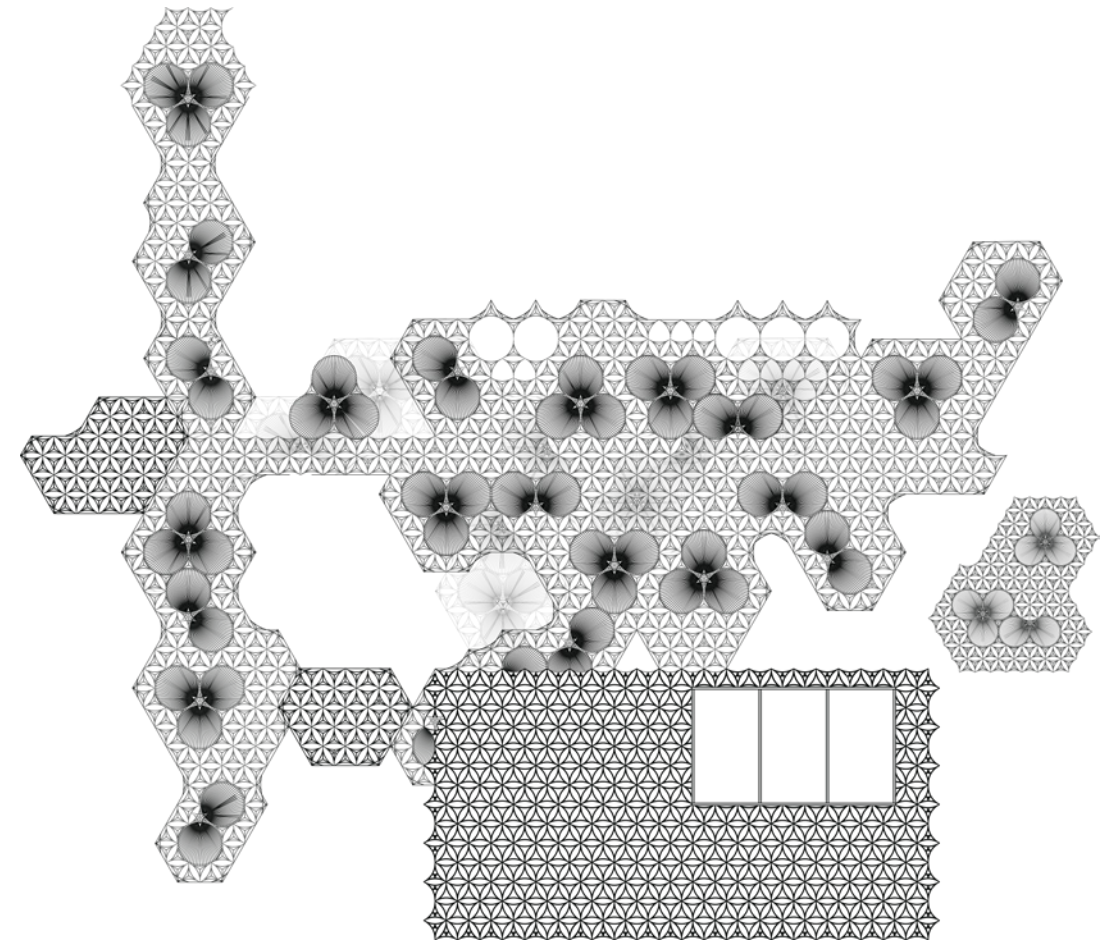


Underbelly Study





Swatch Plan



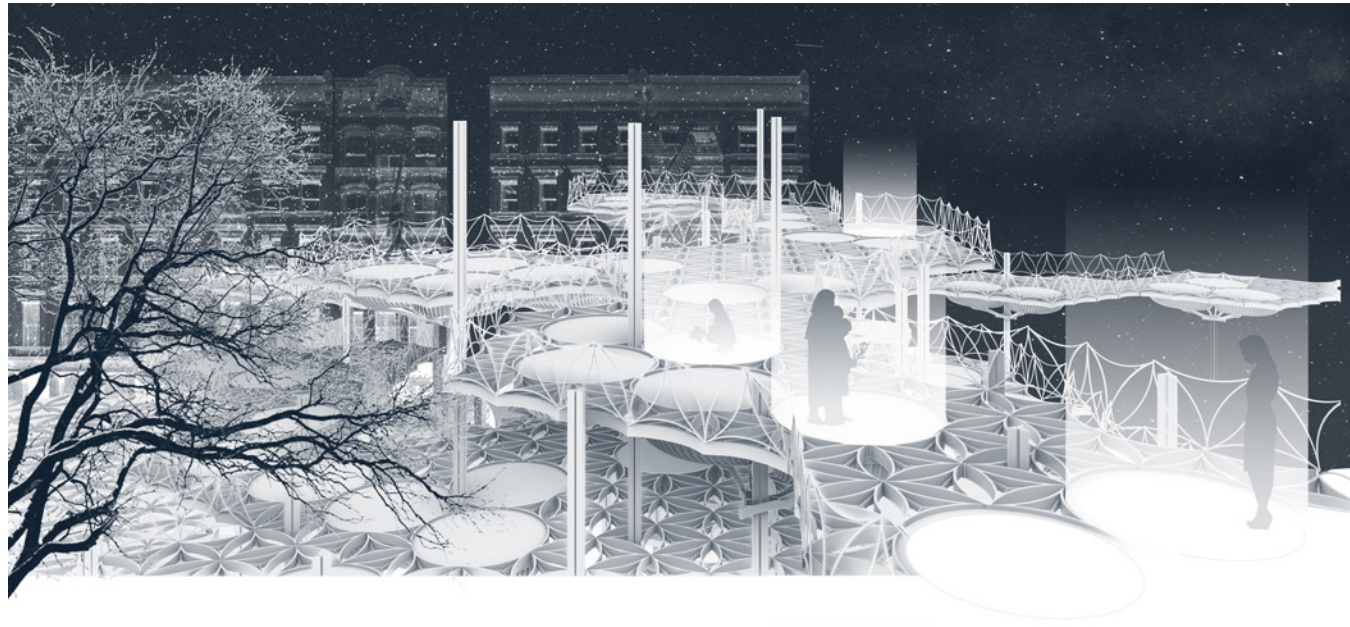
Swatch Reflected Ceiling Plan





Swatch Section

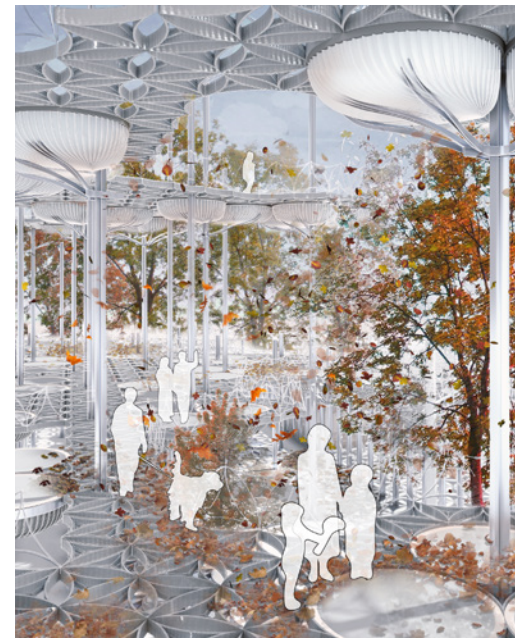




Spring



Summer

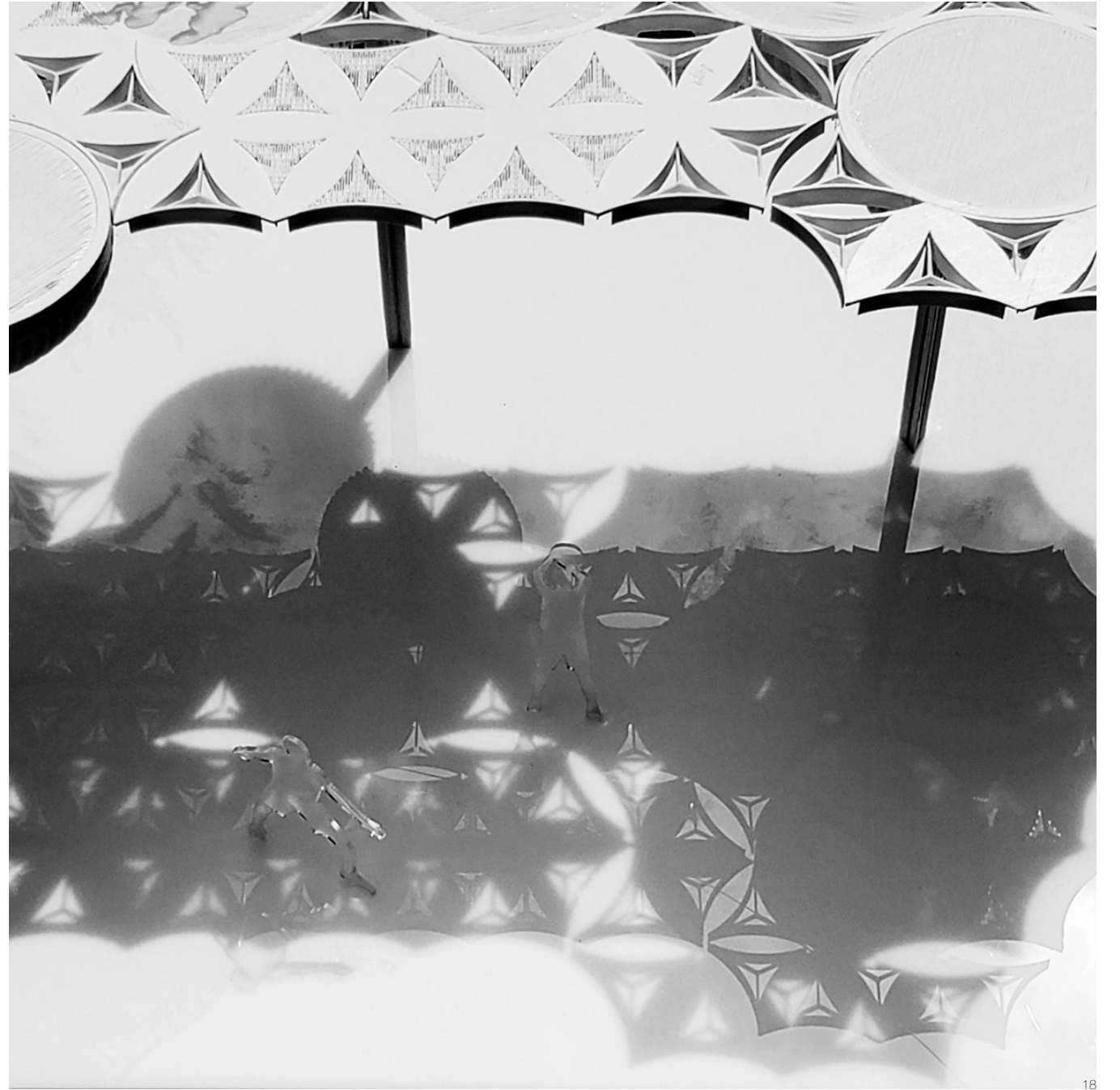
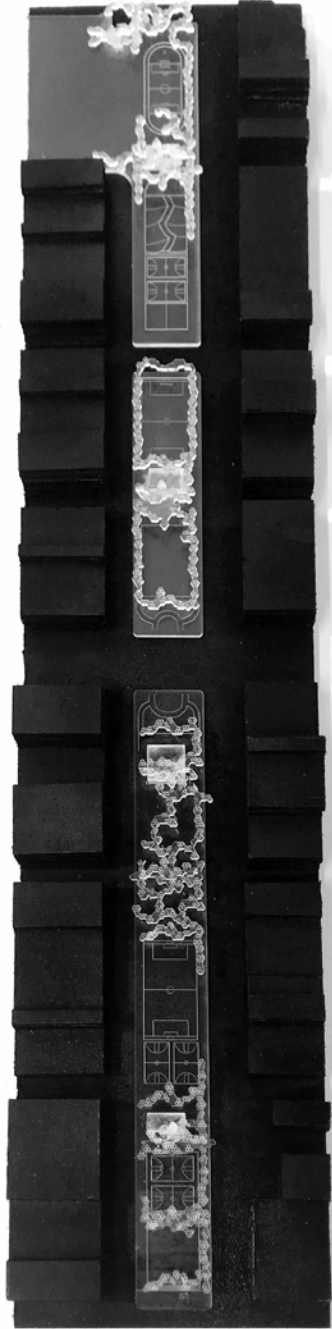


Fall

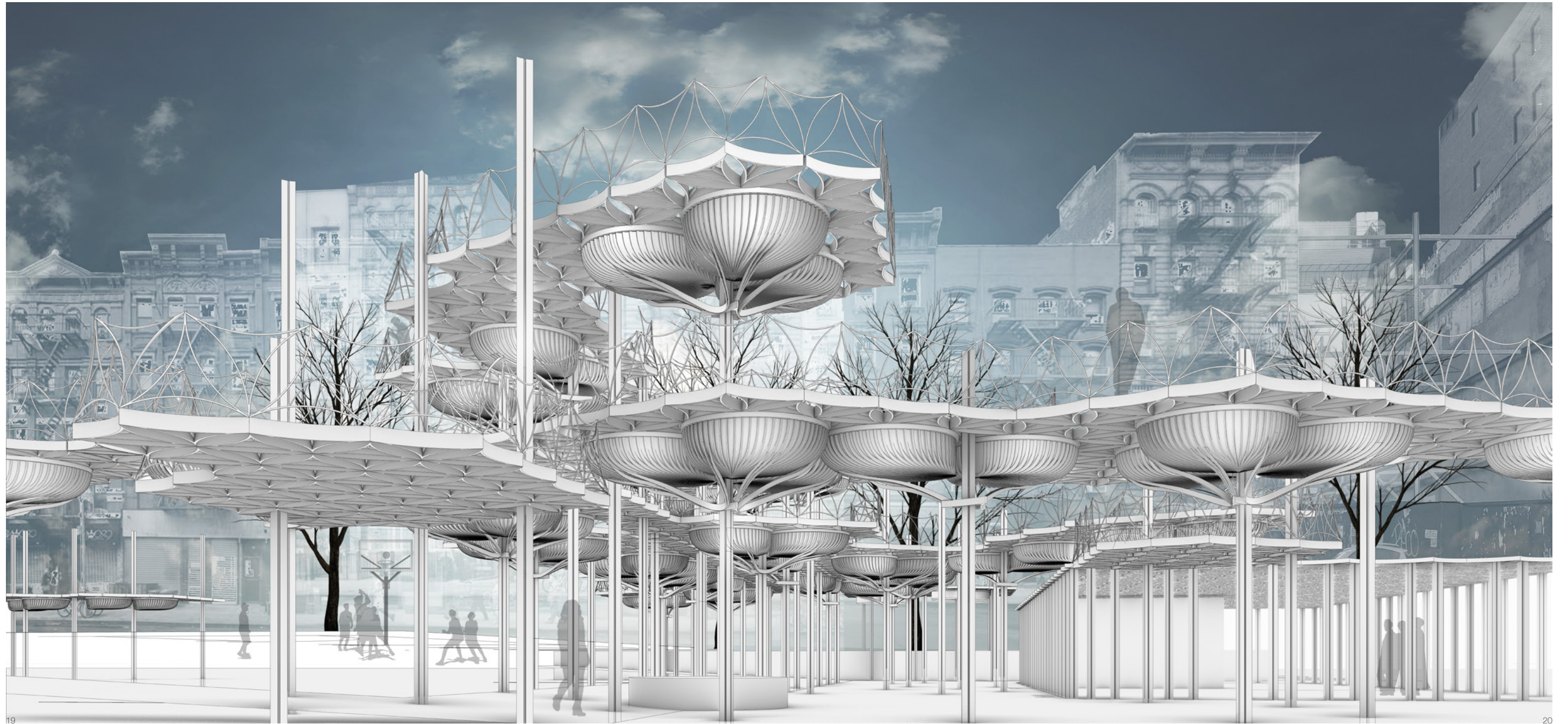


Winter











# WESTBETH

## *Transscalarities*

FEIBAI AN

YANAN CHENG

SIYING CHEN

SULTAN ALFAISAL

ANDRÉS JAQUE  
COLUMBIA GSAPP  
SUMMER 2019



Edith Stephen  
Photo by Frankie Alduino



Jack Dowling  
Photo by Frankie Alduino

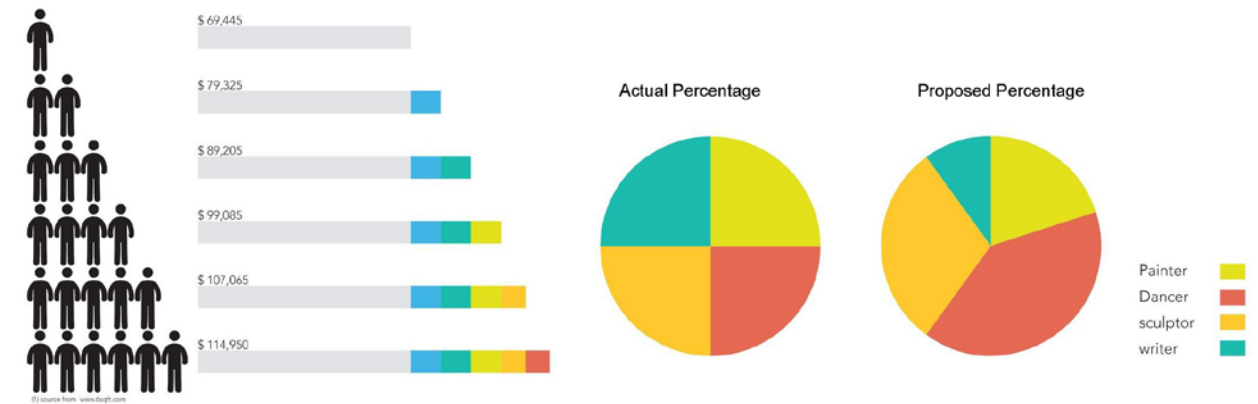
When Dreams Become Reality...



Westbeth Artists' Housing  
 Richard Meier's & Partners  
 New Yorks, New York  
 1967 - 1970



The 2019 maximum household income



# A Dream of Artists A History of A City Block...

Westbeth Artists Housing is a nonprofit housing and commercial complex dedicated to providing affordable living and working space for artists and arts organizations in New York's West Village. Its campus comprises the full city block bounded by West, Bethune, Washington and Bank Streets in the West Village neighborhood of Manhattan, New York City; the complex is named for two of these streets, West and Bethune. The building was built for Bell Telephone Laboratories in 1898 and was designed by Cyrus Eidlitz . At the time Bell lab was the largest<sup>1</sup> industrial research center in the United States and responsible for inventing broadcast, color TV, telephones, vacuum, and other electronics. In 1966 the building faced its first friction when Bell Lab had not only outgrown the space, but noise and vibrations from trains and traffic made certain experiments impossible, and the Laboratory decided to move out of New York city to a campus in Murray Hill, New Jersey<sup>2</sup>. Due to its original use as a laboratory, Westbeth's interior spaces had double height ceilings and expansive open spaces which would later lead to the architect, Richard Meier, having a conflict with city planning over loft renovations and zoning. Two main shareholders of the artist housing shared the same vision of the project. The National Endowment for the Arts (NEA) and J. M. Kaplan Fund. Both the NEA and the Kaplan Fund agreed on creating artist housing using an old industrial building because it was the move back then for artist to live wherever they produce, that was also supported by the end of the industrial era in west village. Because the area was zoned as industrial, and the city of New York initially would not allow a loft live-work space a situation that was challenged by the NEA and the Kaplan Fund. Furthermore, because of the unprecedented program, there was no architectural office that had experience with a similar task, and initially no architect was suggested by the NEA or the Kaplan Fund. Richard Meier just opened an office in New York with just two houses in his portfolio and got selected by the National Endowment and the J. M. Kaplan Fund. Meier had been suggested by Richard Kaplan, Meier's classmate from Cornell who was also the son of J. Kaplan<sup>3</sup>.

Richard Meier wanted to re-create Le Corbusier's Unite d'Habitation in New York was unsuccessful due to FHA rules and zoning law. FHA rules stated that units had to be designed for family sizes rather than catered to artists' occupation. This forced the architect to create open shared studio spaces in the ground floor, taking space from the renting income which created tension in the first years of the project between the tenant themselves.

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<sup>1</sup> "A Landmark Anniversary for Westbeth - GVSHP: Preservation: Off the Grid." GVSHP, March 14, 2016. <https://gvshp.org/blog/2016/10/23/a-landmark-anniversary-for-westbeth/>.

<sup>2</sup> "Westbeth-National Register of Historic Places." Westbeth-National Register of Historic Places. New York.

<sup>3</sup> "Westbeth-National Register of Historic Places." Westbeth-National Register of Historic Places. New York.

<sup>4</sup> "Landmarks Preservation Commission." BELL TELEPHONE LABORATORIES COMPLEX (Including the Former Western Electric Company and Hook's Steam-Powered Factory Buildings) (Now WEST-BETH ARTISTS' HOUSING), October 25, 2011, 1–43. <http://s-media.nyc.gov/agencies/lpc/p/2391.pdf>.

Meier's office had a concept of creating commercial spaces on the ground floor to be the main income generator for the project, which unfortunately did not turn out to be a successful design at that time. It was not easy to find a tenant to rent the space in the late 60s and early 70s. The vacant space was used mostly as a gallery space for the artist.

The New York City Planning Commission created the first special zoning district to accommodate live work spaces. Westbeth is a complex of 3 buildings of which the main building is for artists' housing, the L Building used by the New School; and the I Building has artists' studios and commercial spaces. 383 live-work spaces for artists of all disciplines and their families are created in this ambitious renovation project. The design concept of Westbeth was an integrated, self-sufficient community that would provide the residents not only with loft space in which to live and work, but also with gallery space, theatrical facilities, and film, photography, and dance studios. Within such a community, artists will have a total environment in which to pursue their work, from conception to performance or display.

The Artists Housing was raised Thirteen floors. The main structure was built between 1889 and 1920, providing over 600,000 square feet of floor space with high ceilings, large windows, and thick masonry walls. The building has views on three sides: West to the Hudson River, North to upper Manhattan and south to lower Manhattan. A narrow existing courtyard is the organizational focus for the whole complex. Richard Meier's Office removed one roof and two floors, allowing this courtyard to be opened to the sky to create a spatial environment in the old industrial complex. The main entrance to the building is located at one end of the courtyard, which controls the public access to the structure<sup>4</sup>. The previous users of building Bell lab had the high line track cutting through it, and the train has been used to transport goods and equipment. However, the newly planned high line by James Corner Field Operations, Diller Scofidio + Renfro, and Piet Oudolf did not extend to the artist community<sup>5</sup>.

Life in Westbeth was affected by crime and a rundown neighborhood. Westbeth turned from being an artist sanctuary to a difficult place to create art. This became worse over time with 19 suicides over 30 years. Westbeth was described as "Death-beth" by one resident in her documentary video made in 1995<sup>6</sup>. Another resident taped the children of long-term residents saying the "dark side" of Westbeth, including that they come across the bodies of people who had thrown themselves from the roof while walking to school. With a prime Hudson River-front location in Manhattan, its rent goes from \$900/month studios to \$2,400/month three-bedrooms today. The competition for the apartments is fierce and there is usually a ten-year long waitlist for the applicants who had been accepted. The tenant started handing their apartments down to their children and grandchildren who were non-artists and such action obeyed the rule of Westbeth as an artists' community<sup>7</sup>. This neighborhood became more gentrified overtime, The busy neighborhood did require more attention from the metro system and it became one of the busiest hubs in the city of New York. The building is located a few blocks south of the high line and Whitney Museum. The building was recognized by the city for being first historical and later landmarked. Moreover, the bohemian artists' life style that Meier imagined had become something more of a retirement home. Westbeth is struggling now with over 60% over the age of 60 and 30% over the age of 70 years old. Westbeth is considered now a naturally occurring retirement community more than an artist housing<sup>8</sup>.

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<sup>5</sup> "Design." The High Line. Accessed August 8, 2019. <https://www.thehighline.org/design/>.

<sup>6</sup> Tracie Rozhon. "Westbeth, a Canvas Still Taking Shape." The New York Times, May 25, 2000. <https://www.nytimes.com/2000/05/25/garden/westbeth-a-canvas-still-taking-shape>.

<sup>7</sup> Schulz, Dana. "Westbeth Reopens Highly Coveted Waitlist for Artist's Housing, Starting at \$900/Month." 6sqft, March 18, 2019. <https://www.6sqft.com/westbeth-reopens-highly-coveted-waitlist-forartists-housing-starting-at-900month>.

<sup>8</sup> Kim Velsey. "Finding Her Place at Westbeth." The New York Times, December 10, 2018.



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Kim Velsey. "Finding Her Place at Westbeth." The New York Times, December 10, 2018.

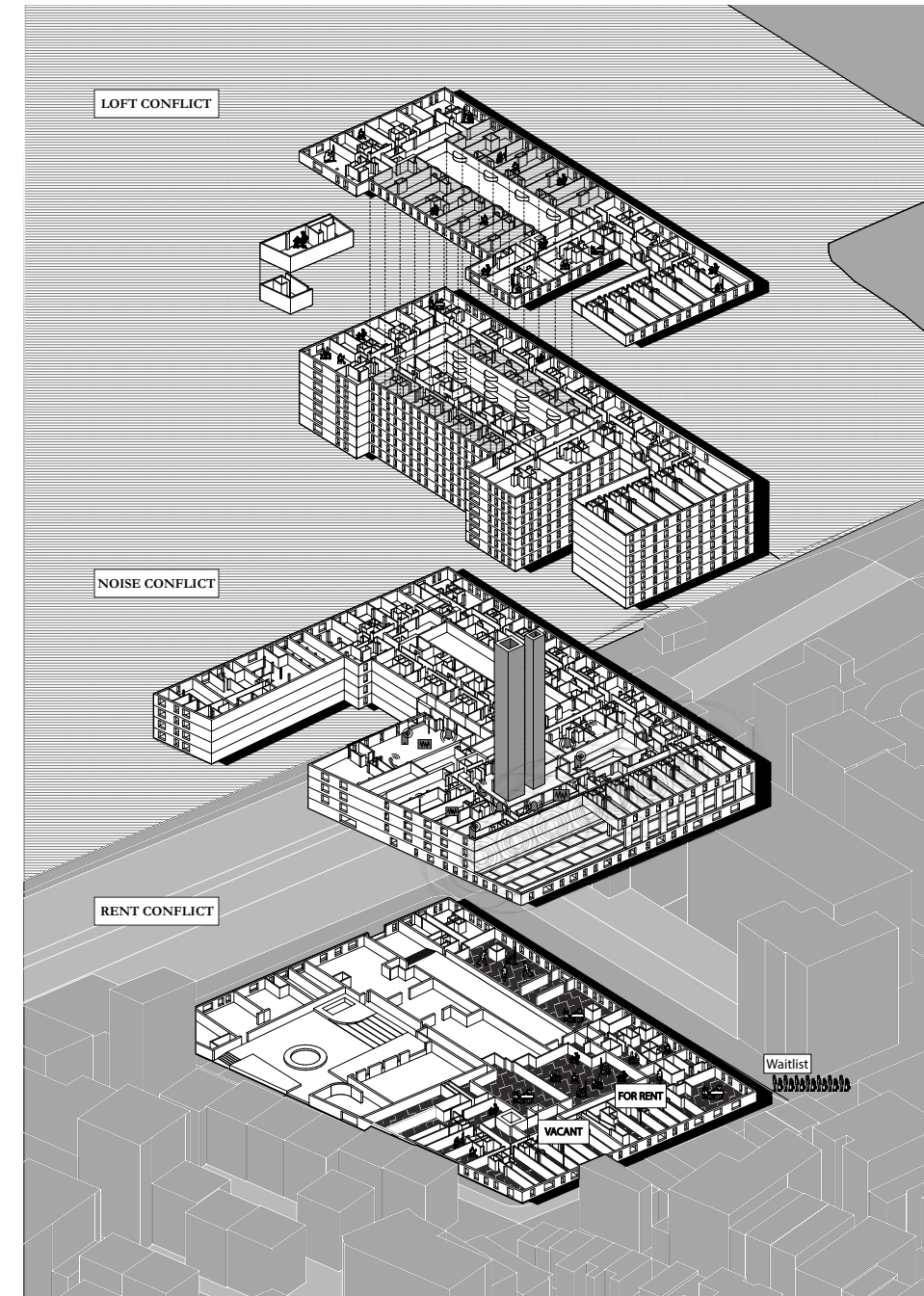
"Landmarks Preservation Commission." BELL TELEPHONE LABORATORIES COMPLEX (Including the Former Western Electric Company and Hook's Steam-Powered Factory Buildings) (Now WESTBETH ARTISTS' HOUSING), October 25, 2011, 1–43. <http://smedia.nyc.gov/agencies/lpc/lp/2391.pdf>.

Schulz, Dana. "Westbeth Reopens Highly Coveted Waitlist for Artist's Housing, Starting at \$900/Month", March 18, 2019. <https://www.6sqft.com/westbeth-reopens-highlycoveted-waitlist-for-artists-housing-starting-at-900month>.

Tracie Rozhon. "Westbeth, a Canvas Still Taking Shape." The New York Times, May 25, 2000. <https://www.nytimes.com/2000/05/25/garden/westbeth-a-canvas-still-taking-shape>.

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# ***BE-ING WITH***

*Co-exist at the Planetary Scale*

SHIYIN ZENG

YANAN CHENG

PHU HOANG  
COLUMBIA GSAPP  
FALL 2019

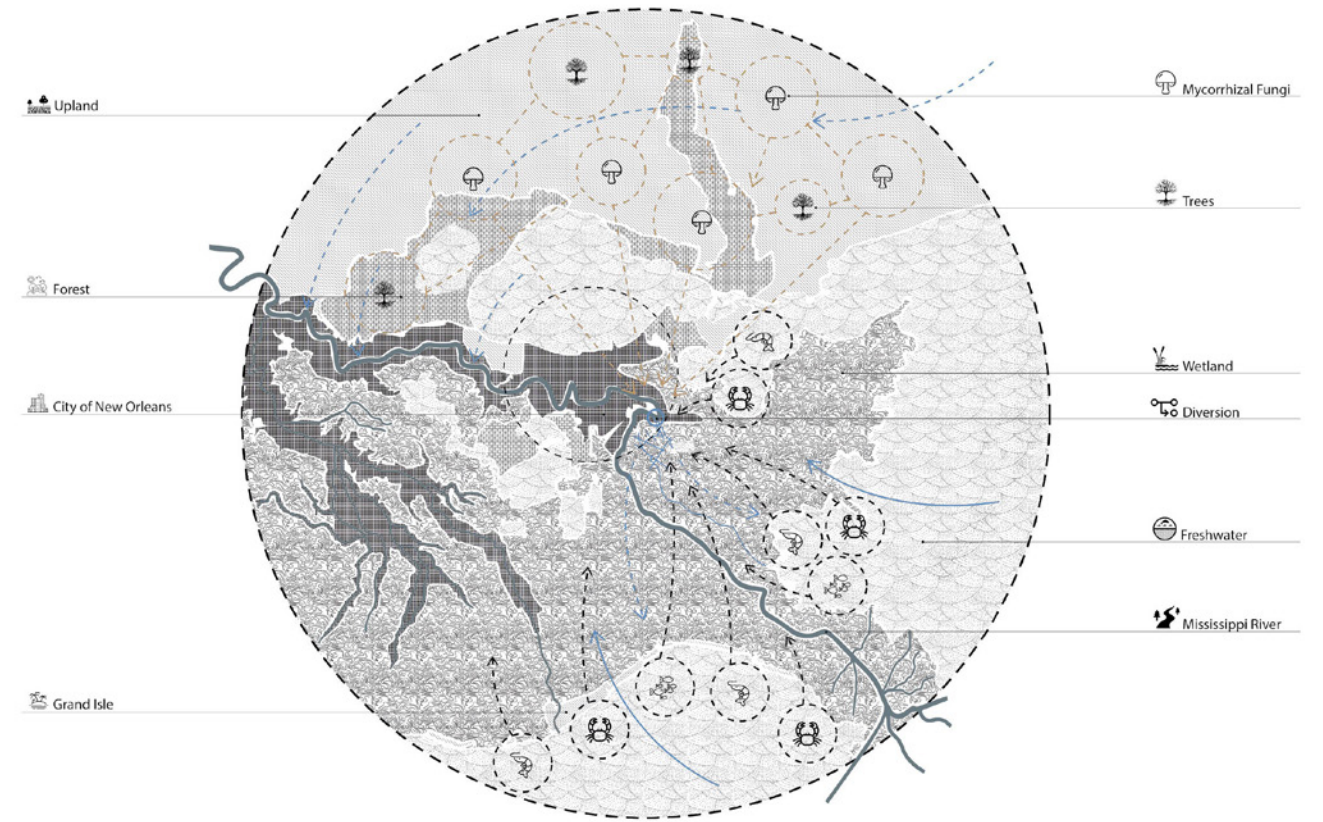
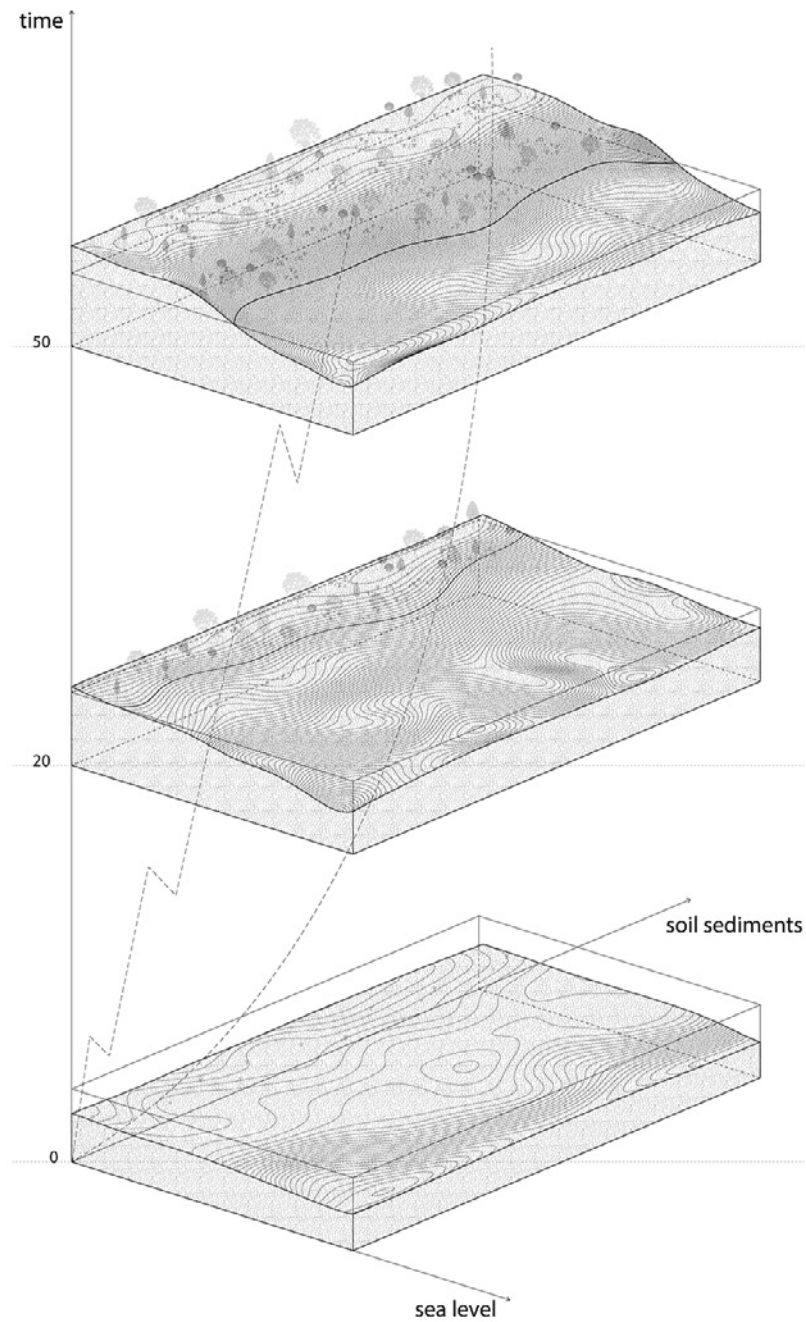




The Mississippi River Delta and coastal Louisiana are disappearing at an astonishing rate: a football field of wetlands vanishes into open water every 100 minutes. Since the 1930s, Louisiana has lost over 2,000 square miles of land, an area roughly the size of Delaware.

Louisiana is creating a sediment-diversion system in order to reduce inland flooding and erosion. In an effort to reduce coastal erosion, Louisiana wants to build two river diversions that will redirect the water and sediment the river carries to eroding wetlands and build new lands.

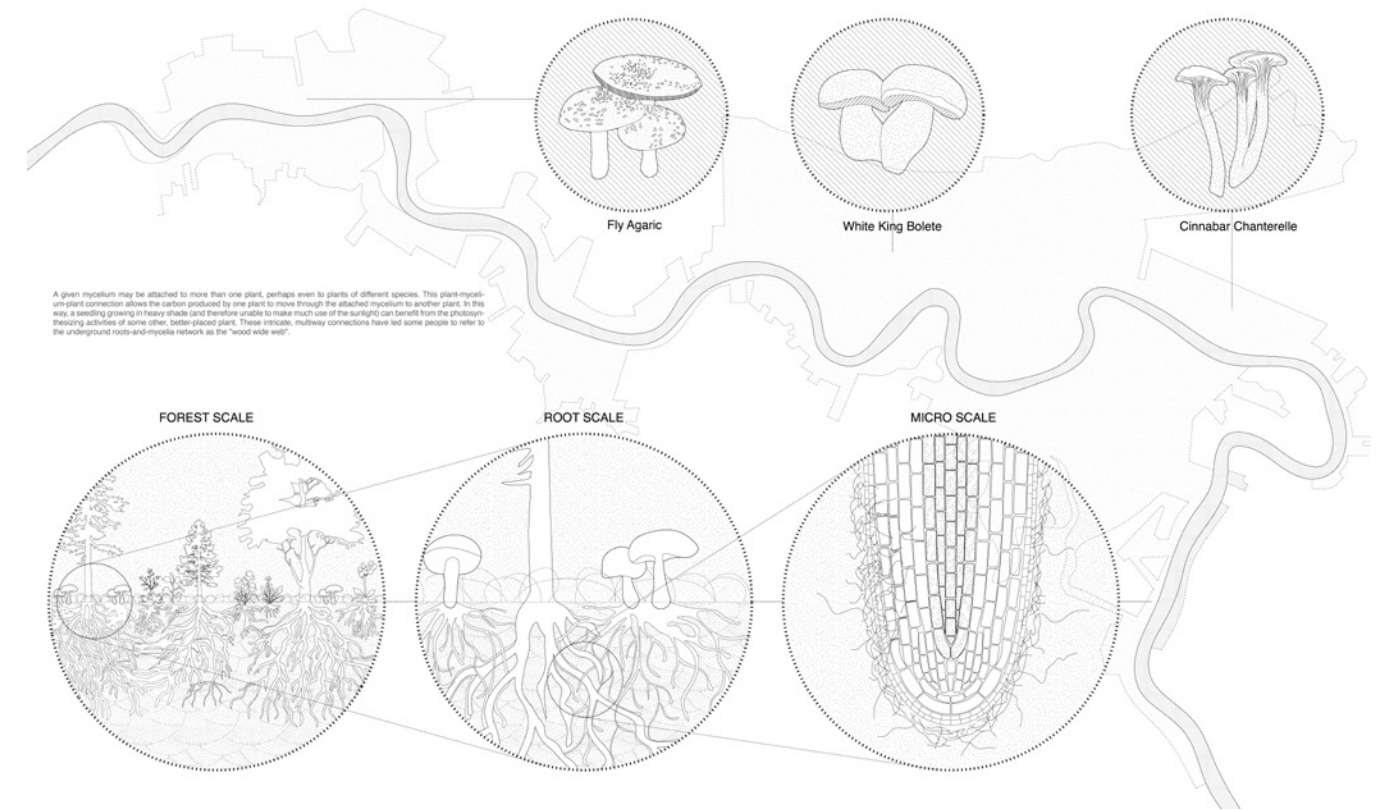
However, fishermen oppose river diversions to fix Louisiana coast. They say that the diversions could kill oyster industry lead to algae blooming and bring harmful sediments and pollutions. Thus, making a disaster...





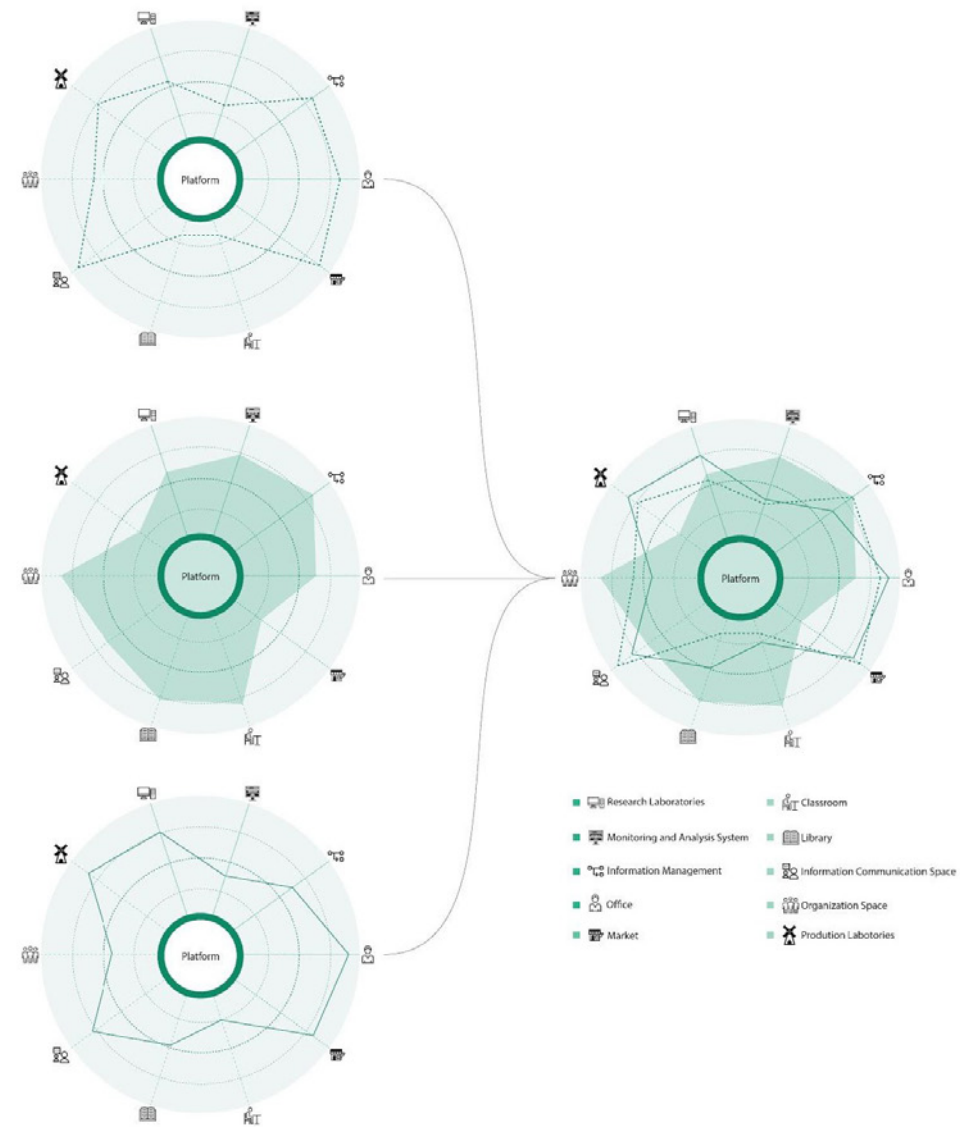
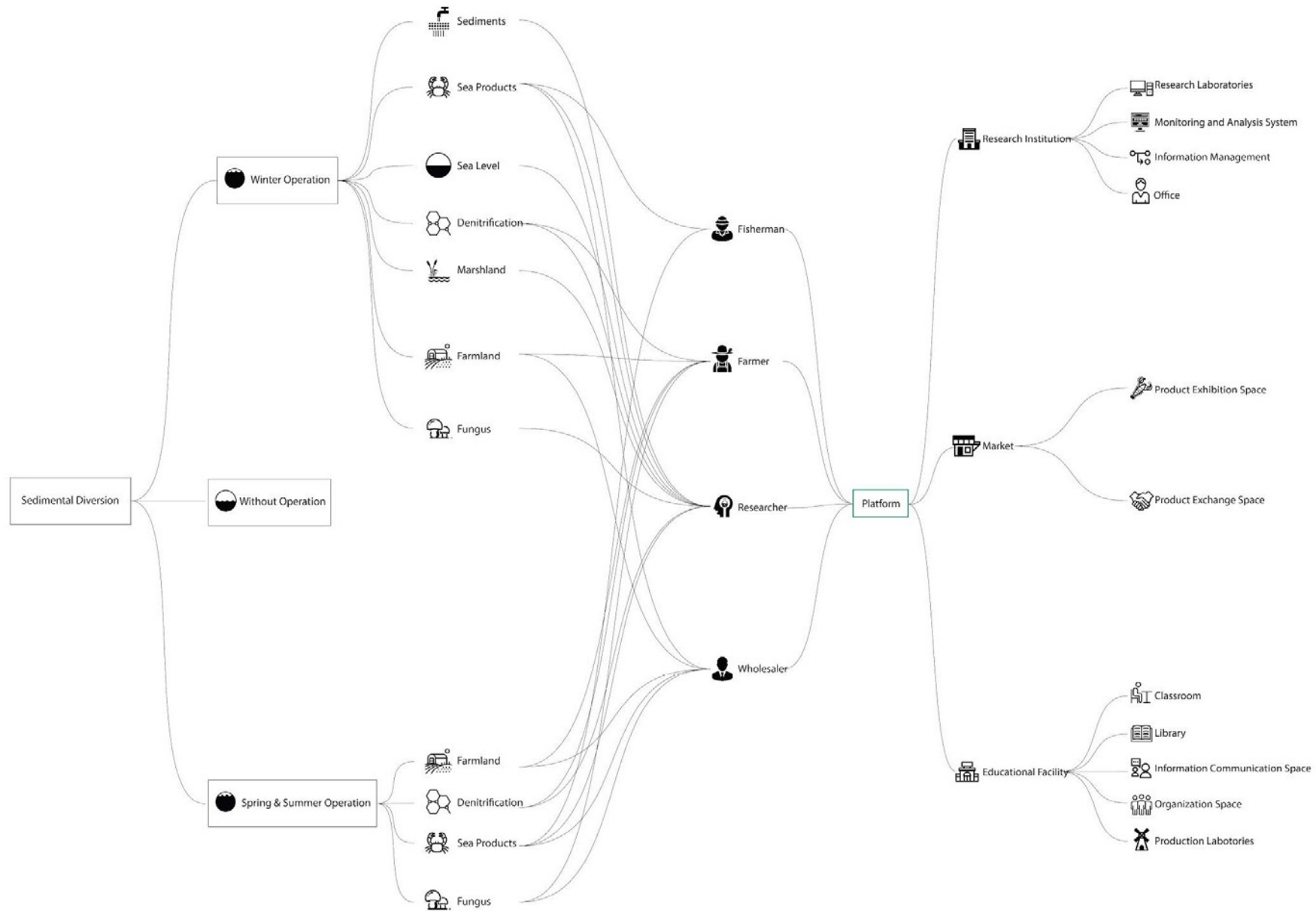
Planetary Scale

Mycorrhizal fungi colonize plant roots in a symbiotic manner and extend far into the soil, and in this way solidify soil. We could use this type of fungi to add to the sediment diversion and alleviate its negative effect.

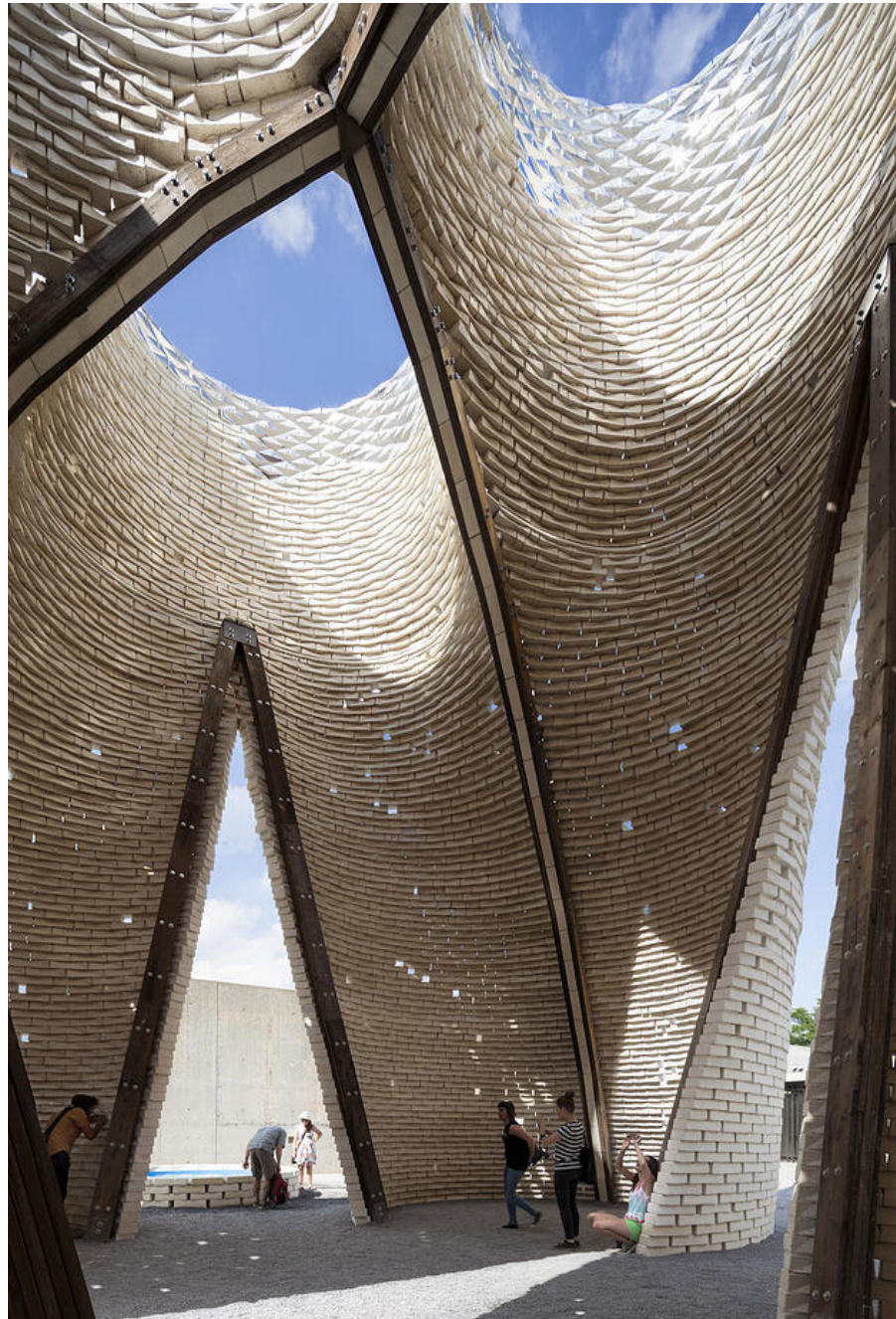


Multispecies Scale



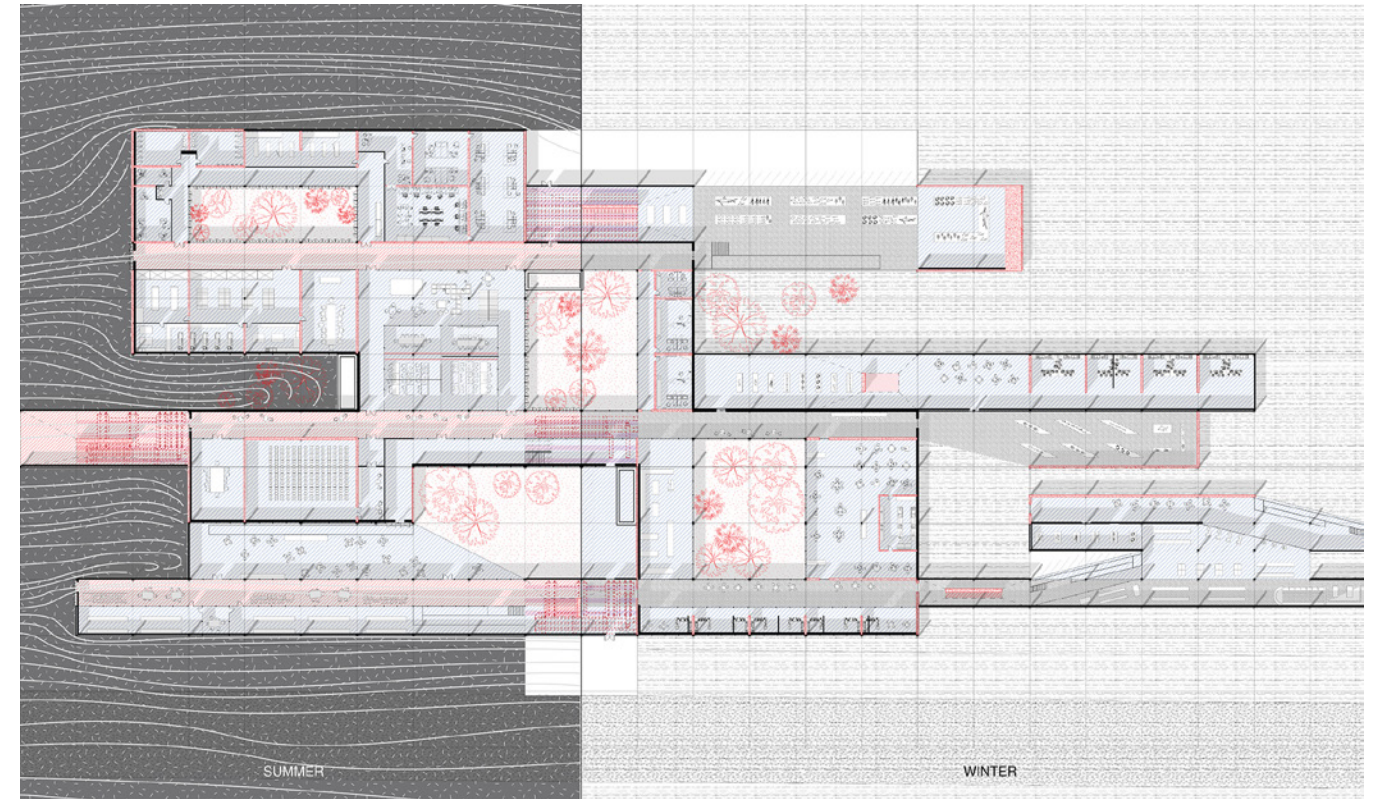




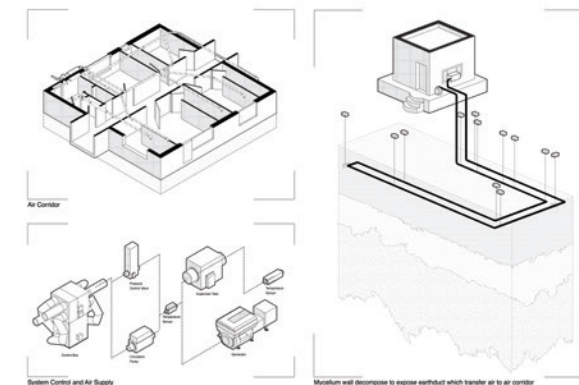


**Mycelium Brick**  
-great for bearing walls

- Lightweight
- Biodegradable
- Fireproof
- Nontoxic
- Water resistant
- Absorb CO<sub>2</sub>
- Sustainable

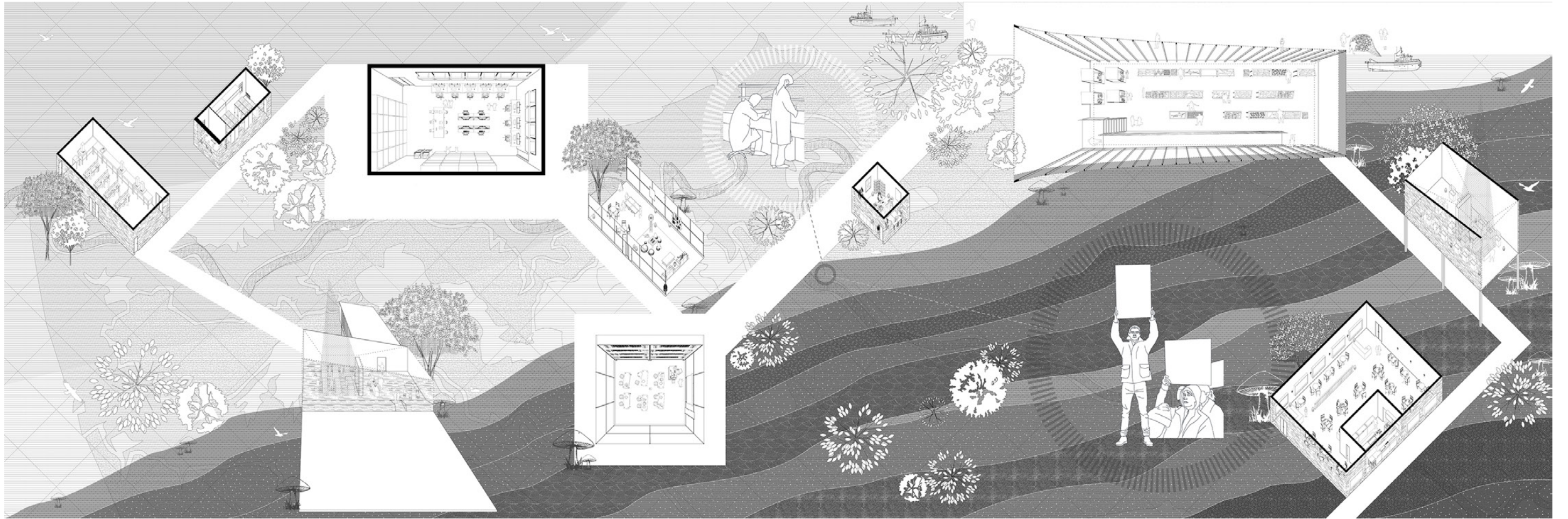


Plan



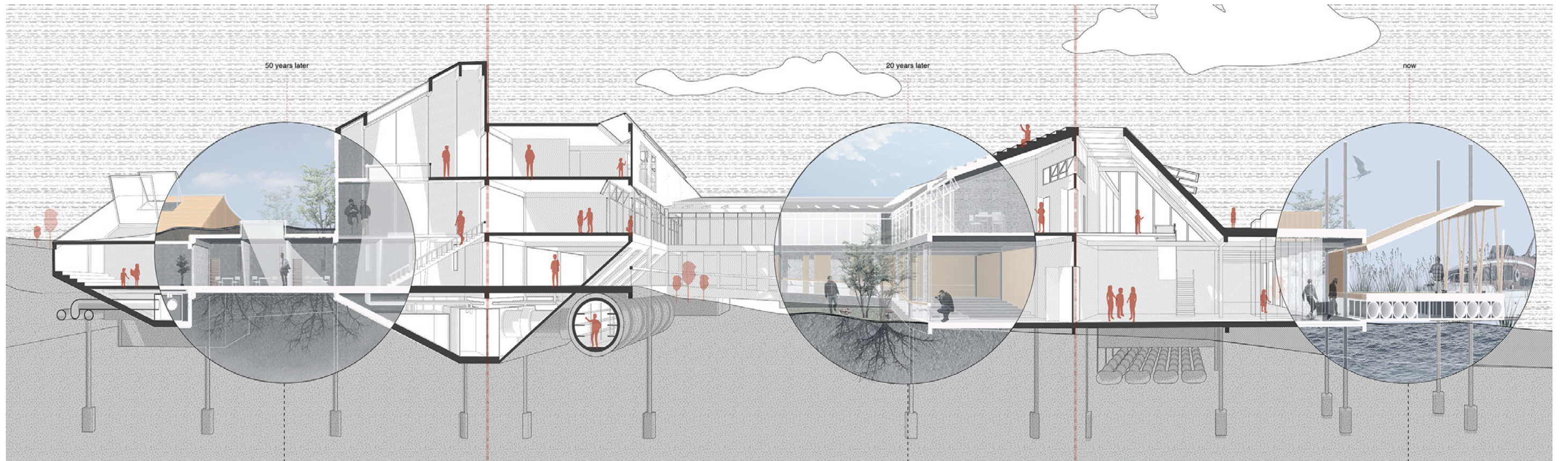
Enclosed air corridors allow wind to blow through and make a green house effect that helps control temperature during different seasons





Hybrid Drawing



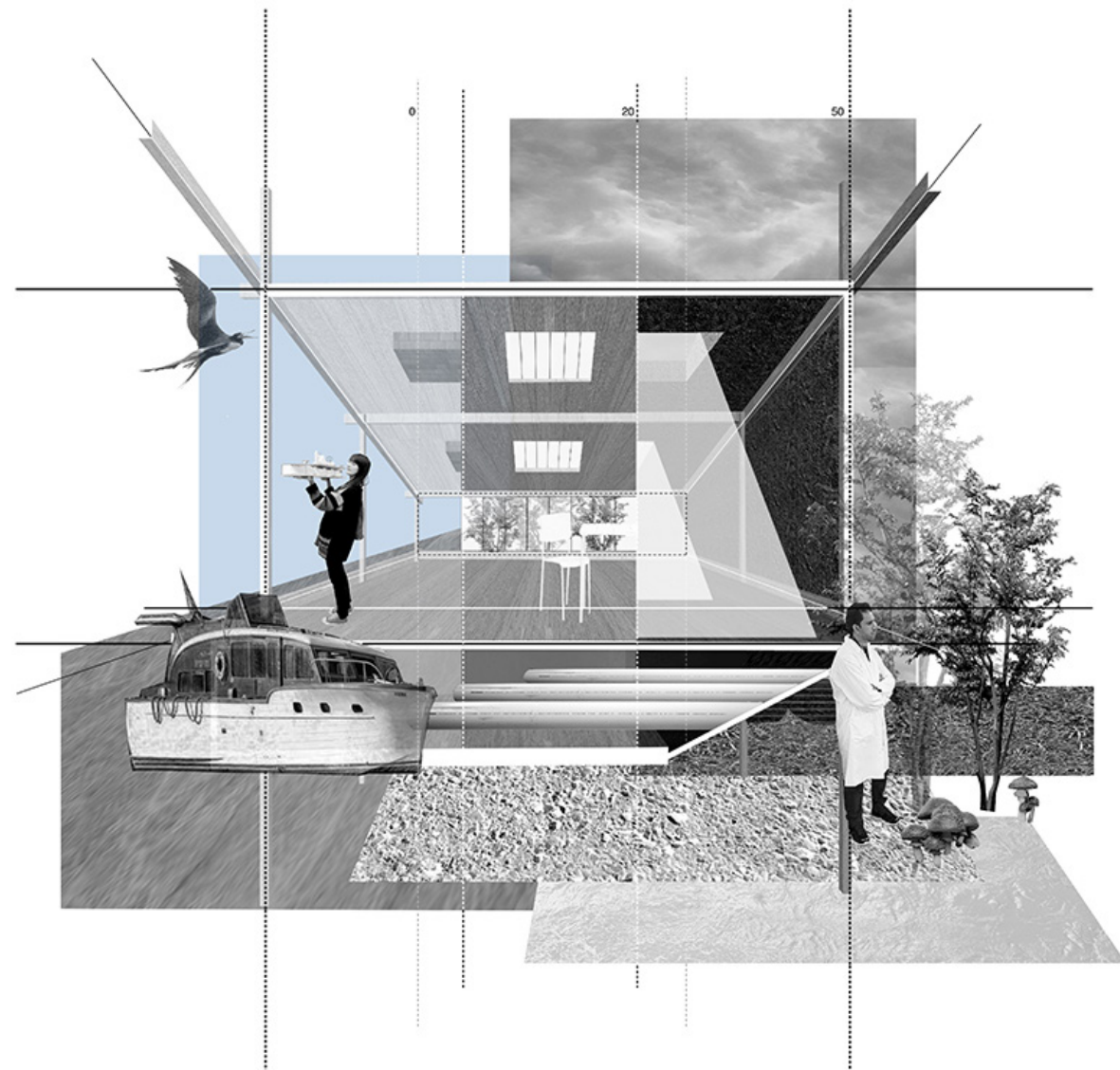


After the soil pile up, the building will become underground. Lighting will transfer to skylight.

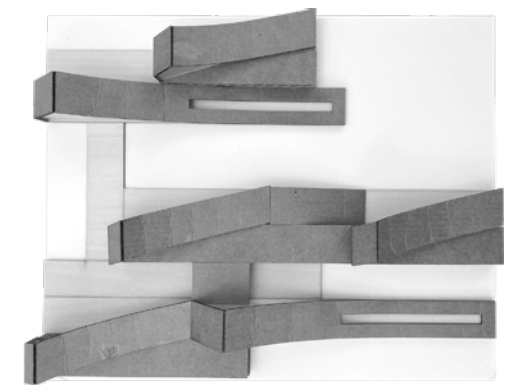
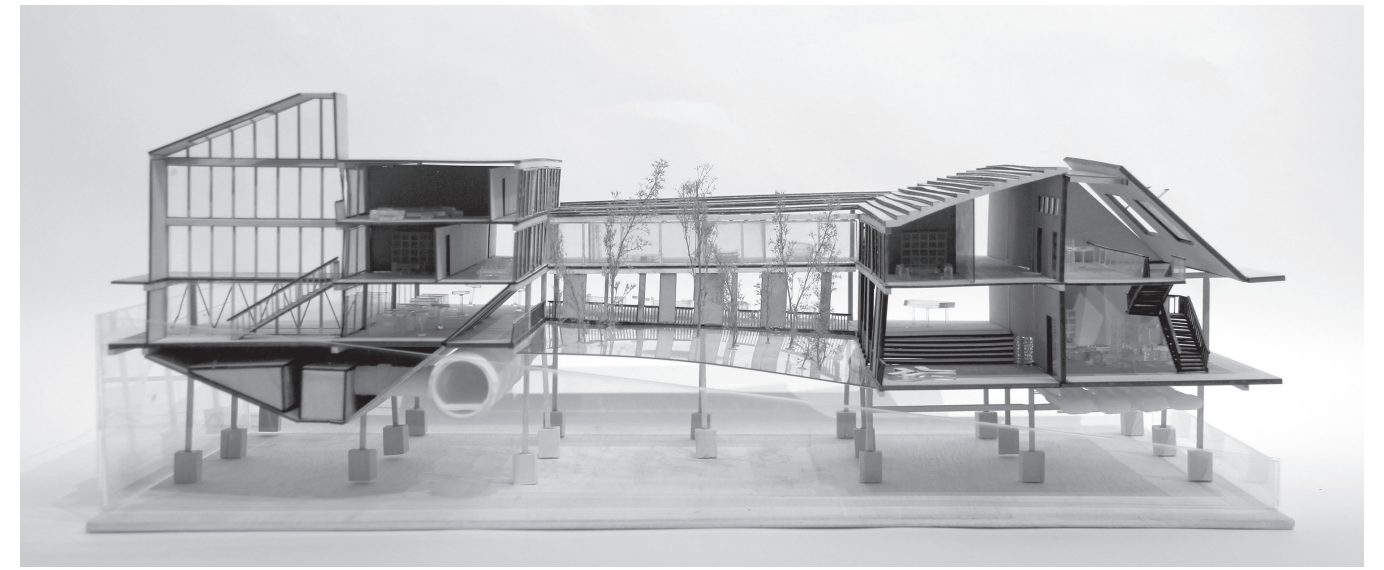
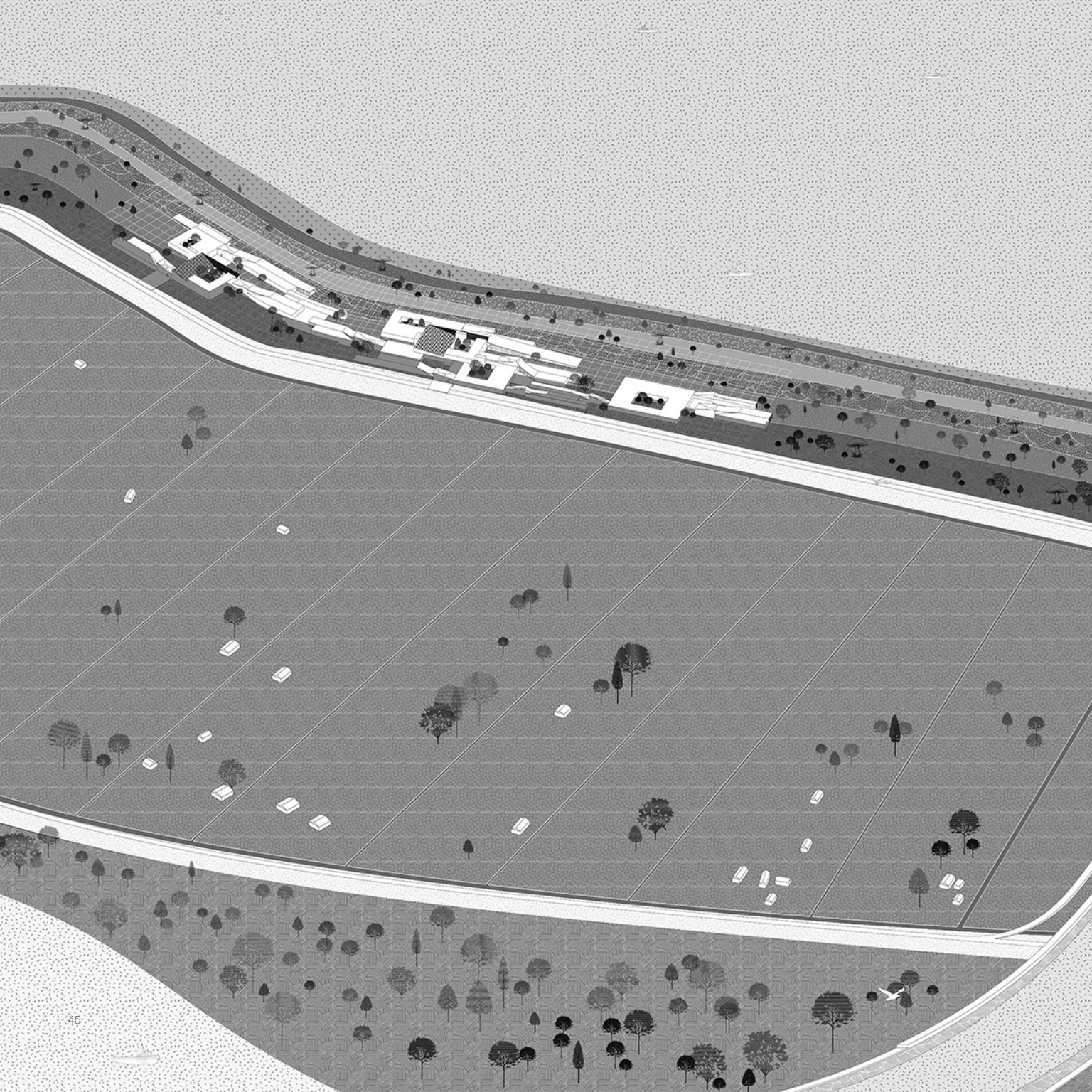
After the soil pile up, the open courtyard will become an enclosed garden.

Decks are designed to be able to float, therefore, adoptable for sea level rise.











# *TIME-LESS*

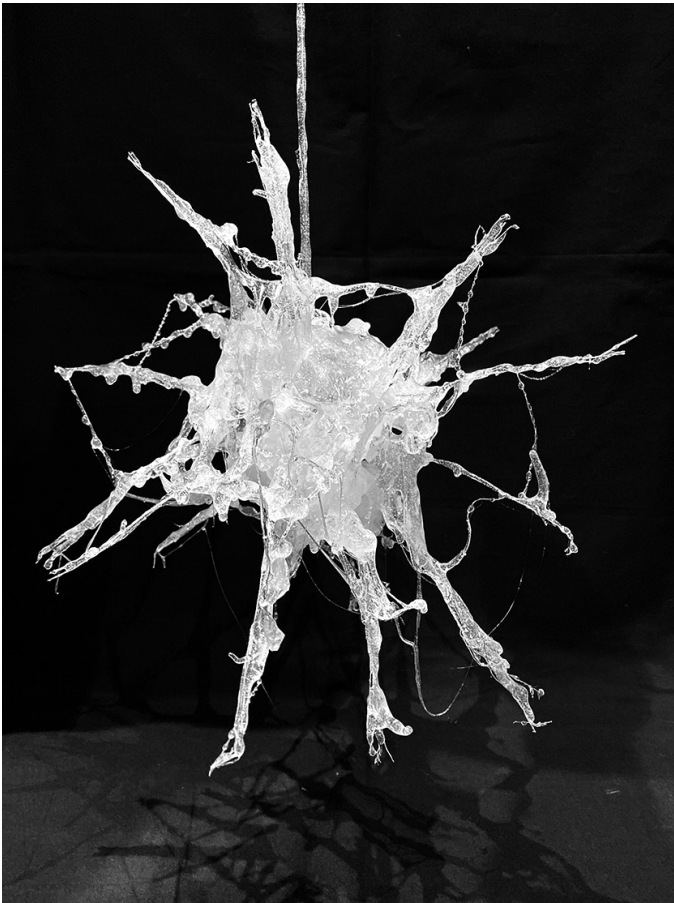
## *Composite Modeling*

YANAN CHENG

JACQUELINE MARTINEZ  
COLUMBIA GSAPP  
FALL 2019

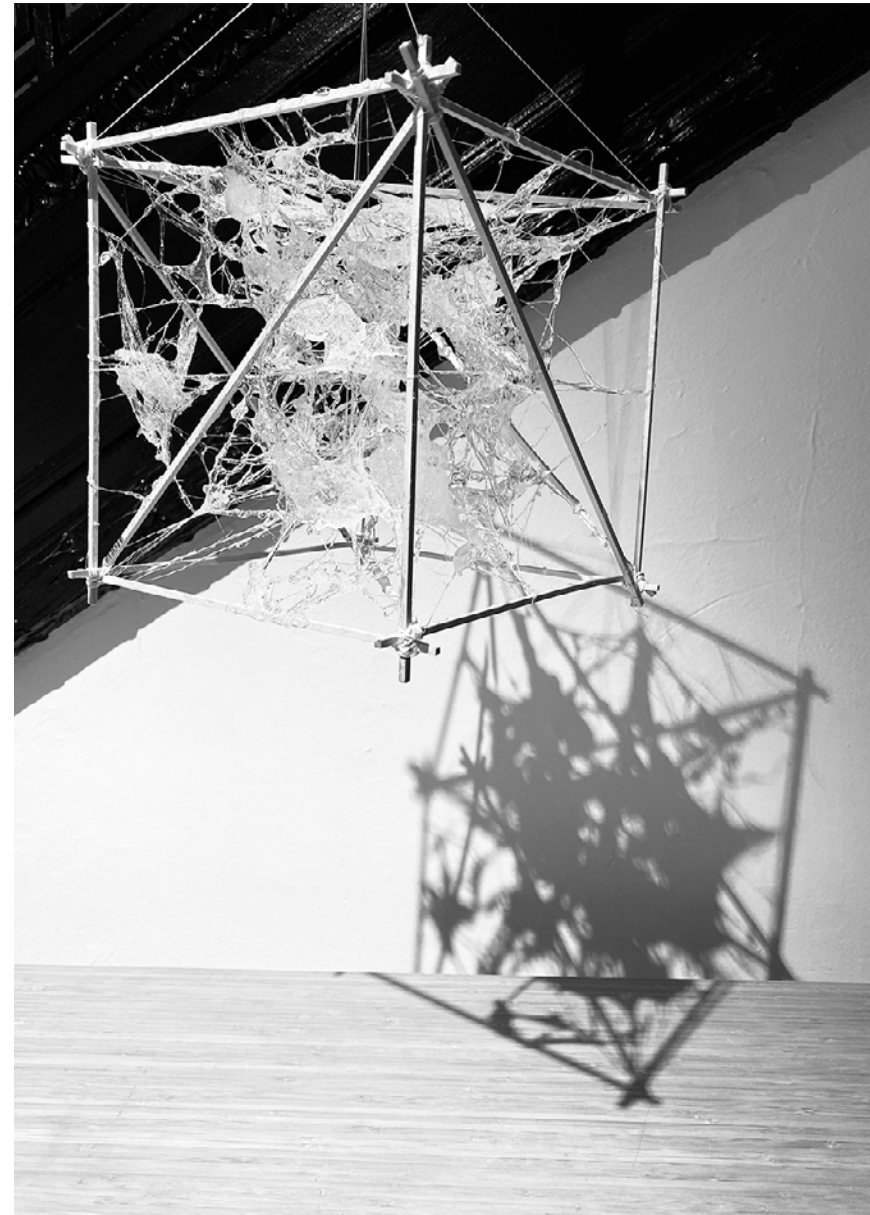
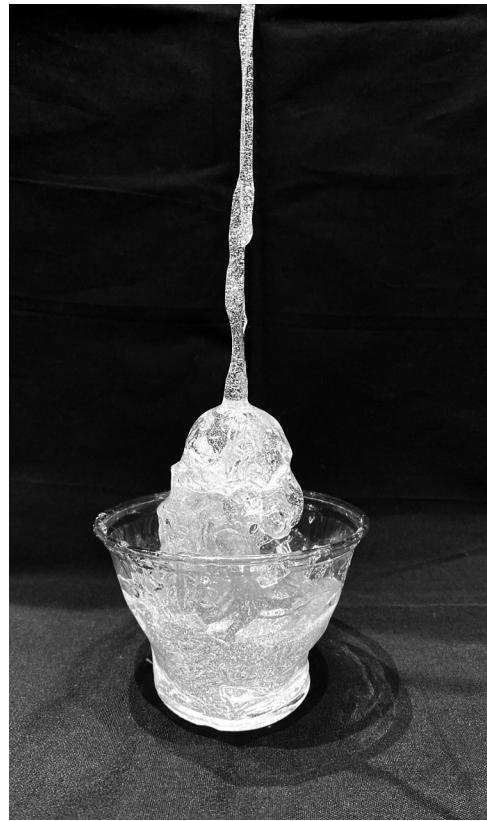






## STRUCTURE

Using a basic 5 Act story telling framework, we need to craft a narrative through 5 composite 3D and 2D vignettes conceptually tied together to articulate our holistic narrative.



## PROSE\_RESIN

A selected material or fabrication technique to exploit through manipulation and experimentation re-articulating and aiding in the stylistic conceptual reading of the narrative.





# ACT ONE

## Shrinking

4.6 billion years ago;  
At a very small corner of the universe;  
On the Orion Arm of the Milky Way;  
In the midst of a molecular cloud;  
An Atom is fighting against his destiny.

"Brothers!! Sisters!!" he shouts,  
"Hurry up!"  
"It's pulling us!"  
"We can do it! We can run!"  
"..."

Not long after, a Protostar was born through pulling surrounding matter towards its center. The atom couldn't escape from his destiny. Silence...

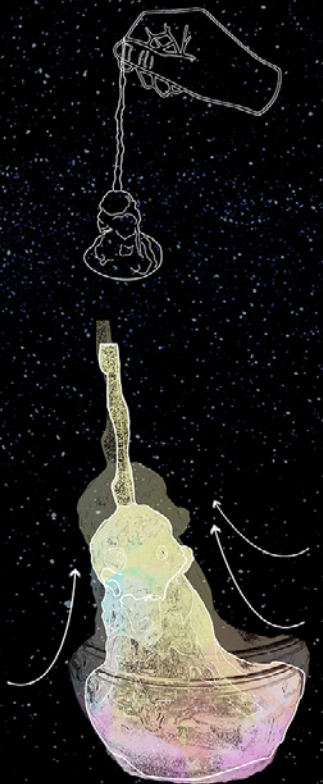


# ACT TWO

## Attraction

"You're strong", said the Jupiter,  
"It has been great to be binary with you",  
the Sun replies, "sorry to lose you";  
"I still get your back".

Although being a binary system long ago, the Sun received most of the matter and eventually formed the yellow star we see nowadays. Jupiter, as a failed star, sits behind out mother earth and protect us from steroids attacking from outer universe.

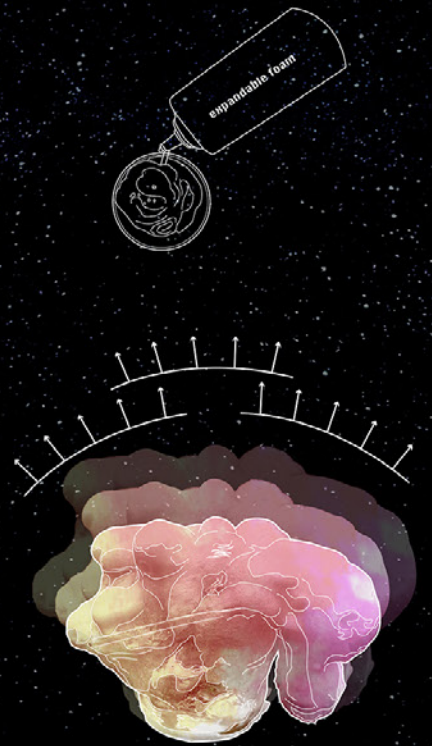


# ACT THREE

## Expansion

"It's coming!"  
"Don't panic. We know this is going to happen."  
"I know..."  
"Its outer shell is expanding. It will swallow us all!"  
"I see..."  
"Go home"

In approximately 5 billion years, our sun will start to burn helium and turn into a red giant star. Its outer layers will consume Mercury and Venus and reach Earth.

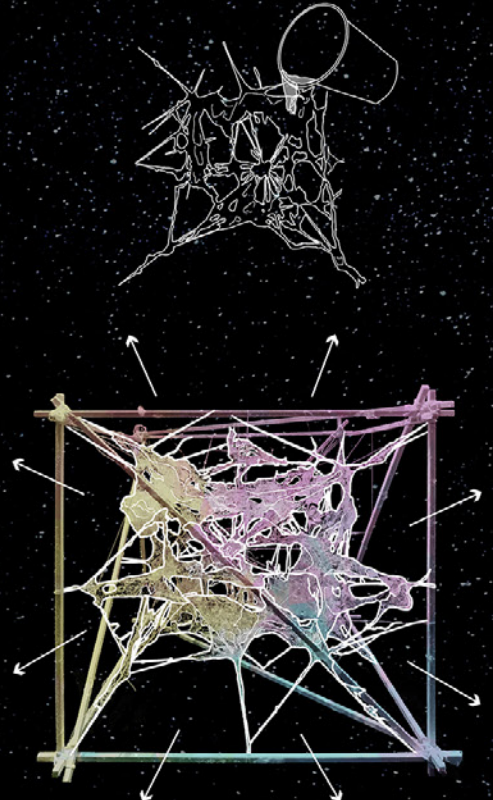


# ACT FOUR

## Explosion

"It's beautiful!"  
"Yes it is."  
"So lucky we can see it from far away"  
"Not lucky if you are in the middle of it"

Soon after the Sun burns out all of its fuel, its outer layers will be ejected and form a massive planetary nebula. A planetary nebula is colorful and filled with chemical elements. A lot of such planetary explosion are essential in returning and spreading chemicals to the universe and other star bodies.



# ACT FIVE

## Condensation

"A pearl!"  
"A pearl in the sea of stars."  
"I will use them to make a necklace. It will be very beautiful."  
"It will also be very heavy."

After the outer layer is ejected, the core is left behind and become a white dwarf. A white dwarf is very dense, while it has size of a planet, it has a mass of the original Sun.





# SEA-TY

## *Theory of the City Form*

YANAN CHENG  
HALA ABUKHODAIR  
SHUO HAN  
SOPHIE LEE  
PEIZHE FANG

VISHAAN CHAKRABARTI  
COLUMBIA GSAPP  
FALL 2019

### ARGUMENT

The development of the sea level rise and progression of climate change crisis, coastal cities have been at great risk and in the frontier of the impacts of this crisis that caused vast damages to coastal cities infrastructure. Progression of technology have led us to develop this new city form that helps us adapt to this new modern typology.

Tidal energy development have progressed as future coastal cities infrastructure which allows the existing land and the forsaken marshland to coexist and with it try to reduce the carbon emissions of highly energized tech city typology. This new city form allows coastal cities to be 100% flood resilient by developing a grid of tidal energy infrastructure with creating electricity to the entire electric grid line of Sea-ty and using the tidal energy infrastructure as the city's foundation, allowing the city to be floating above sea levels.

There's a mixture of built infrastructure that forms a radius of 0.5-1 mile consisting mixed use buildings with residential typologies which was inspired by Clarence Perry's self-contained neighborhood unit as a tool to help us design a utilized residential neighborhood for tech city that is pedestrian focused. Leisure and commercial spaces are located on every first floor that connects all buildings with a public rail transit system. These radii of mixed use typologies are located around the radii of tech cores where all offices and manufacturing laboratories are located.

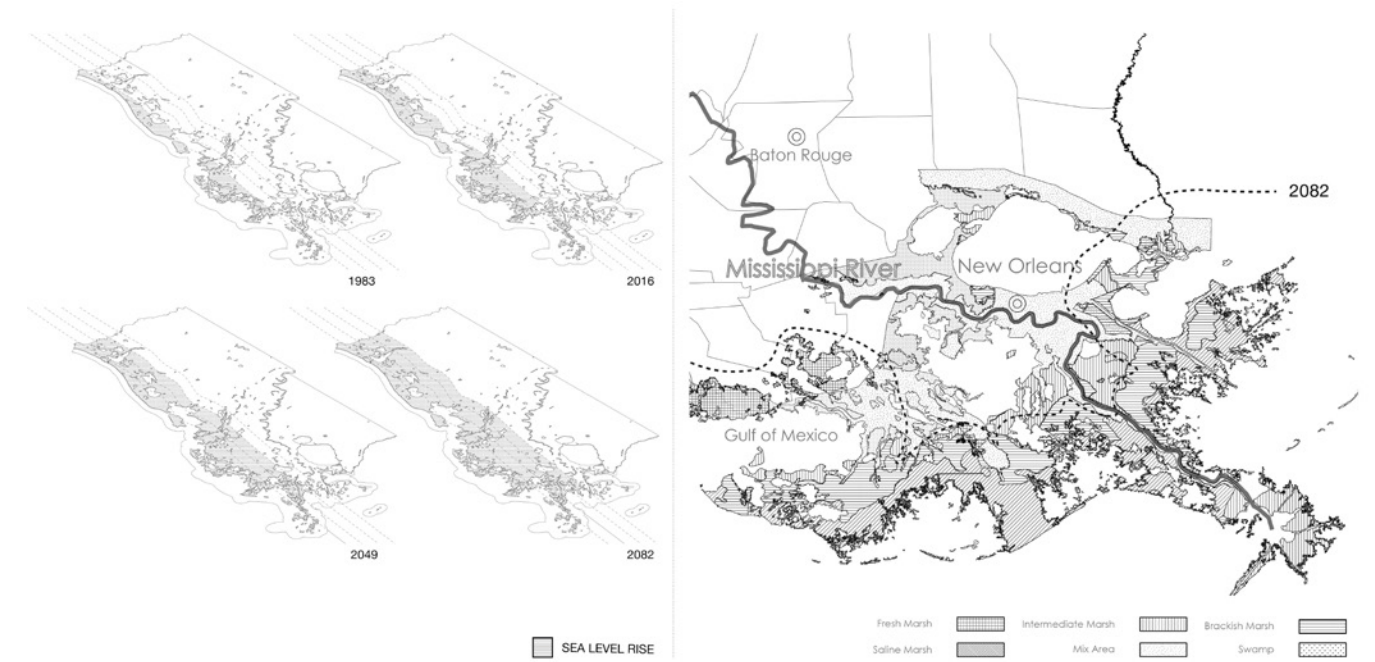
The entire city is connected through public transportation, pedestrian passages and bike lanes that are also accessible through the parks between each radius. All tech, mixed use, and park radiuses form around the lands typology with an organic form.



## LOCATION



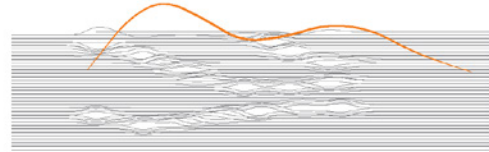
## CHALLENGES



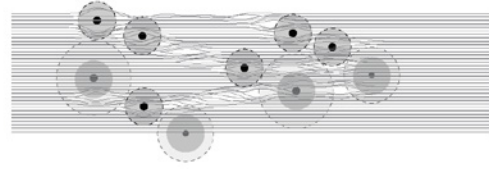




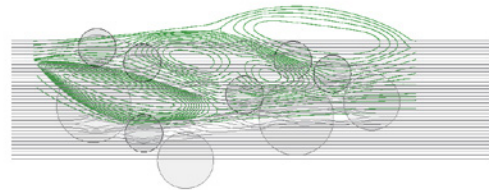
**DESIGN LOGIC**



**LAND GEOMETRY**

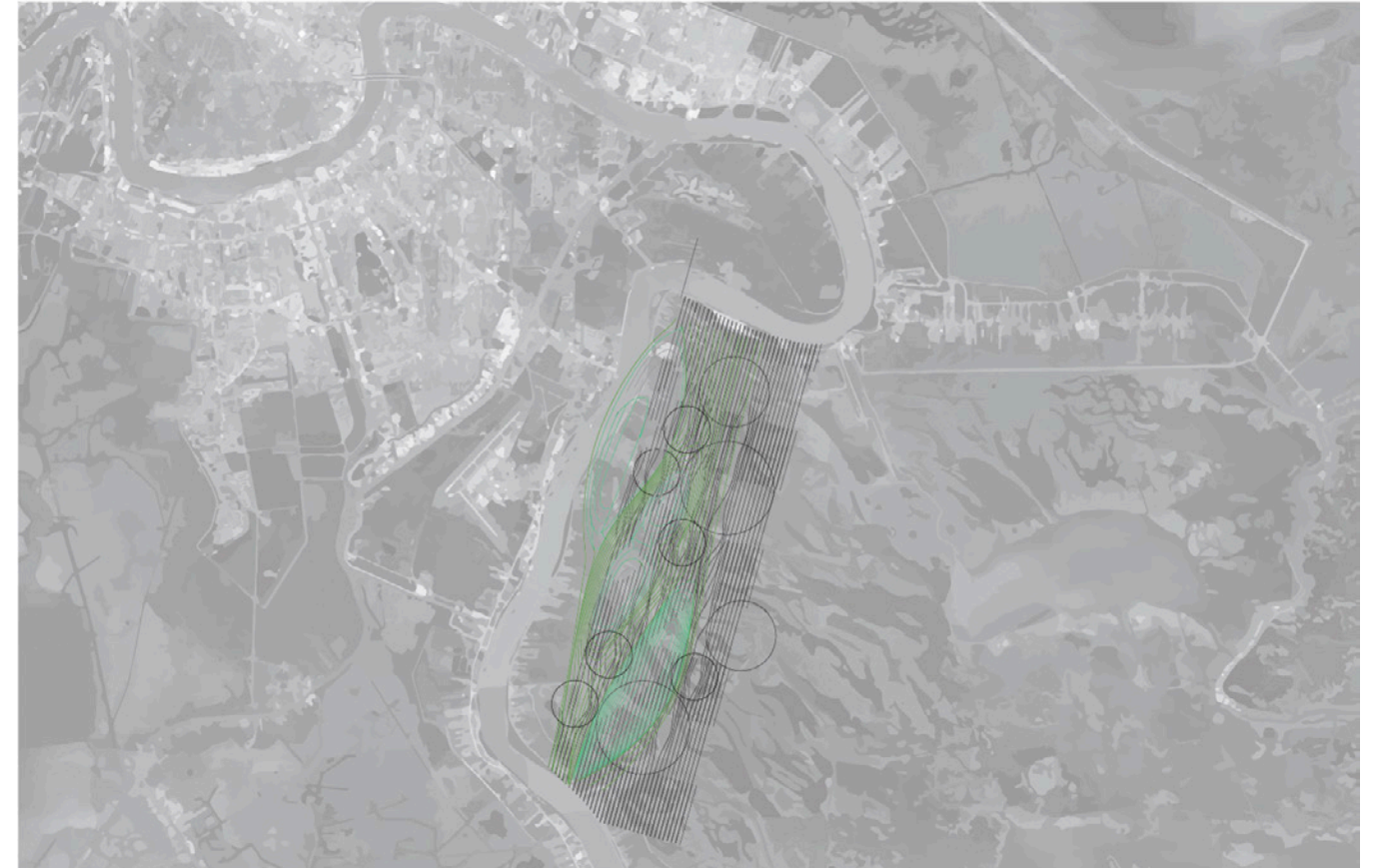


**LAND USE ZONING**

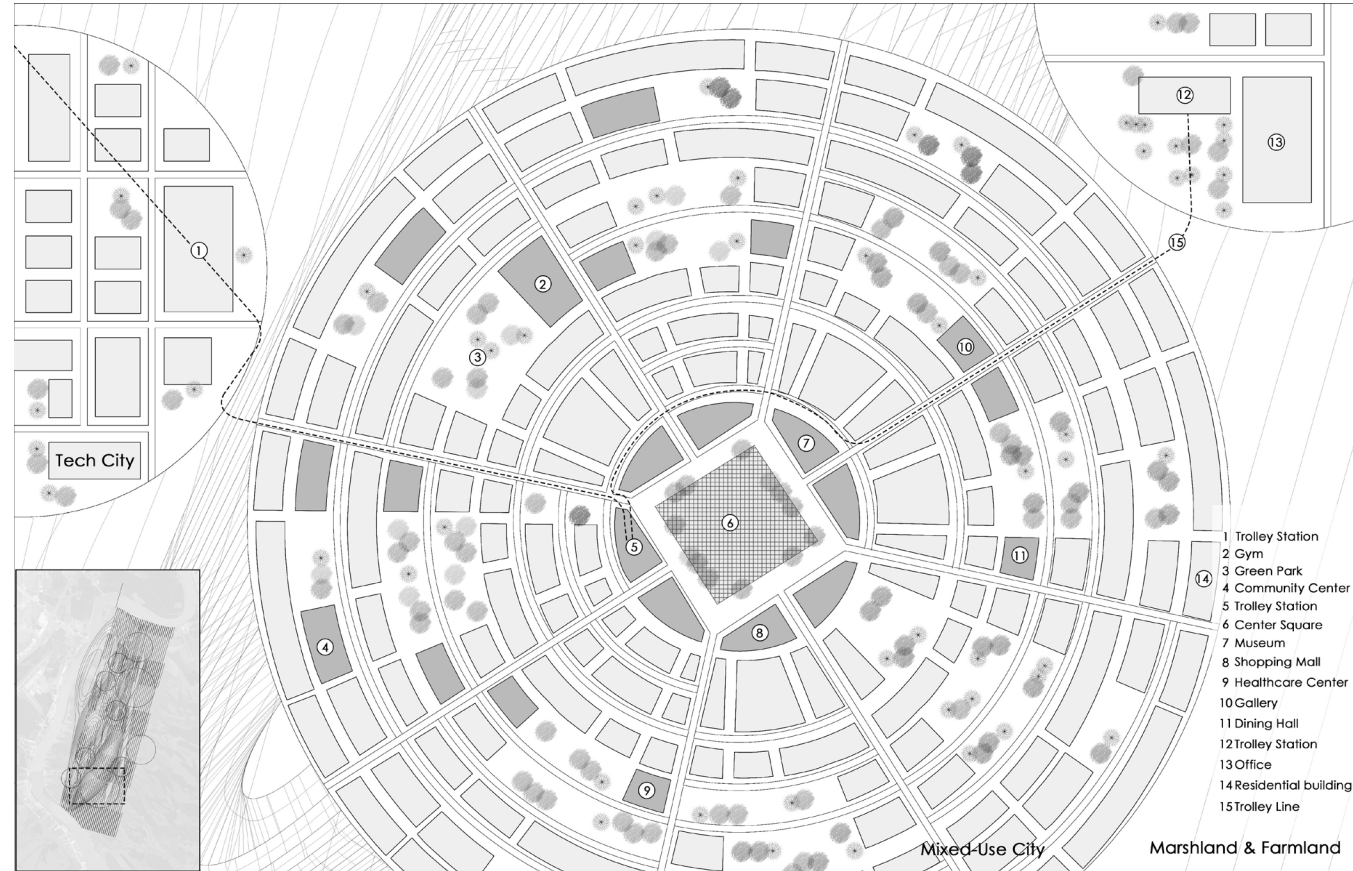


**LANDSCAPING**

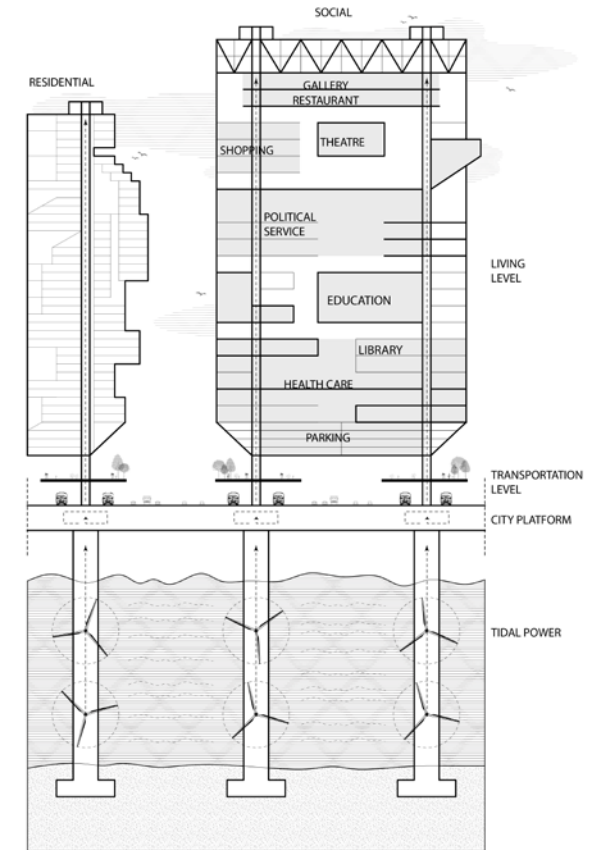
**SITE PLAN**



## URBAN PLAN



## BUILDING TYPOLOGY





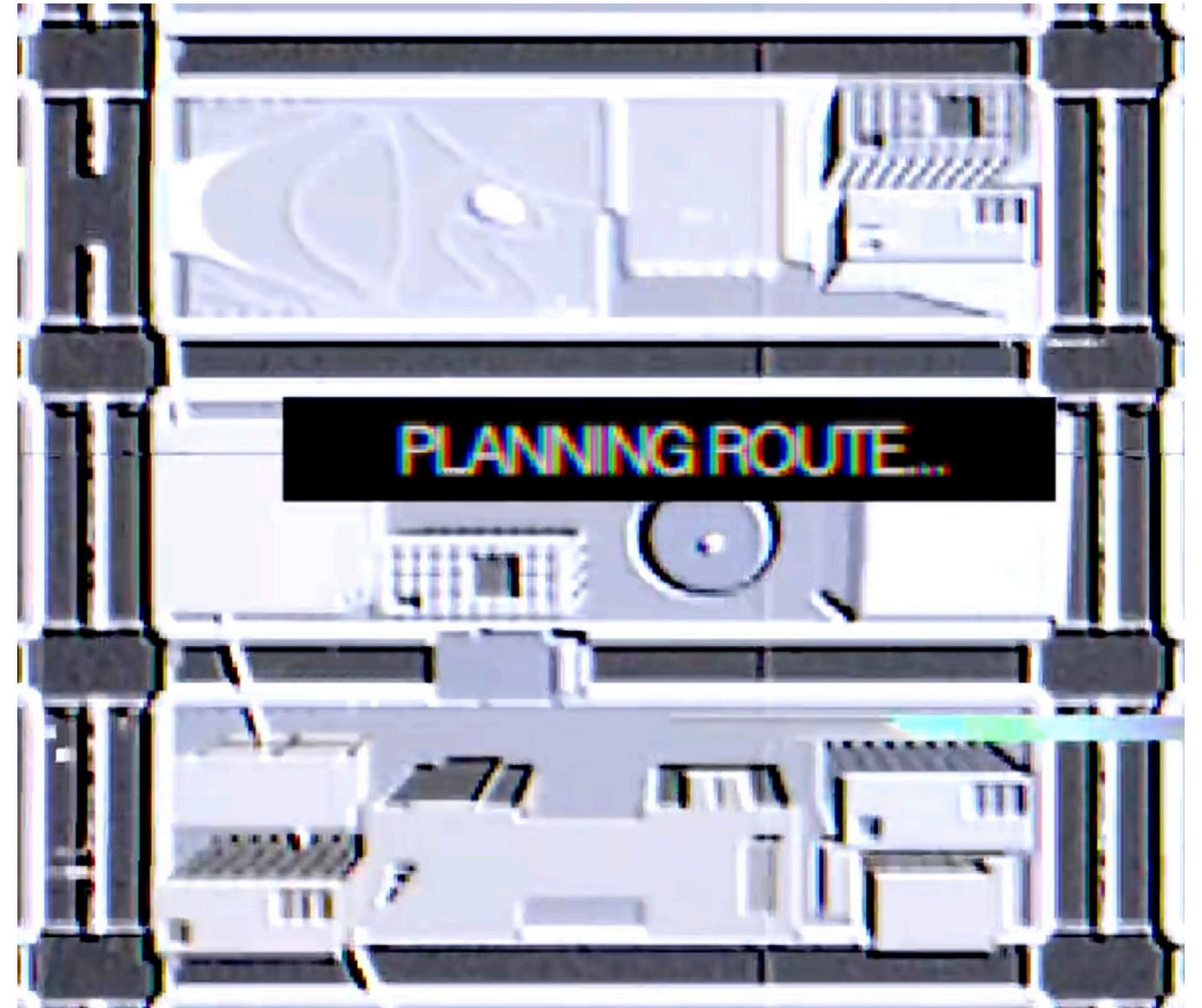
# *FUTURE CITY*

*Realtime*

YANAN CHENG

SHIYIN ZENG

FARZIN LOTFI-JAM, GREG SCHLEUSNER  
COLUMBIA GSAPP  
FALL 2019

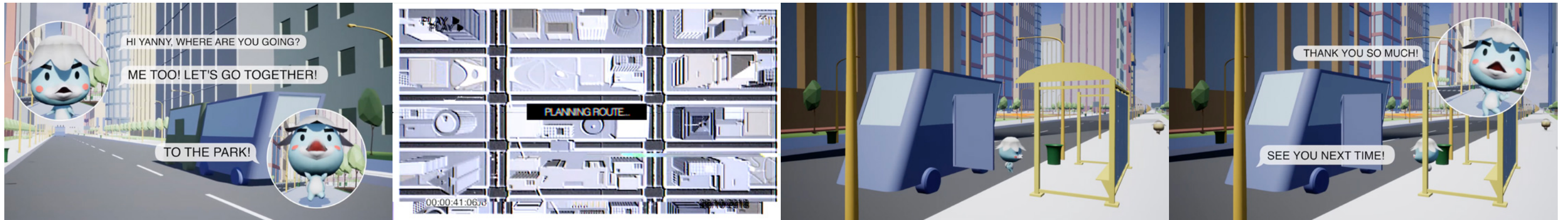


The course teaches basics of the game engine "Unreal Engine 4". With discussions on the five critical social problems, my group used the game engine to generate a short video advocating the employment of autonomous car in the future city.



Autonomous cars can talk

Autonomous cars move regularly



Autonomous cars can merge into one

Autonomous cars can automatically plan routes

Autonomous cars are safer than human driving cars



Scan QR code to watch the video

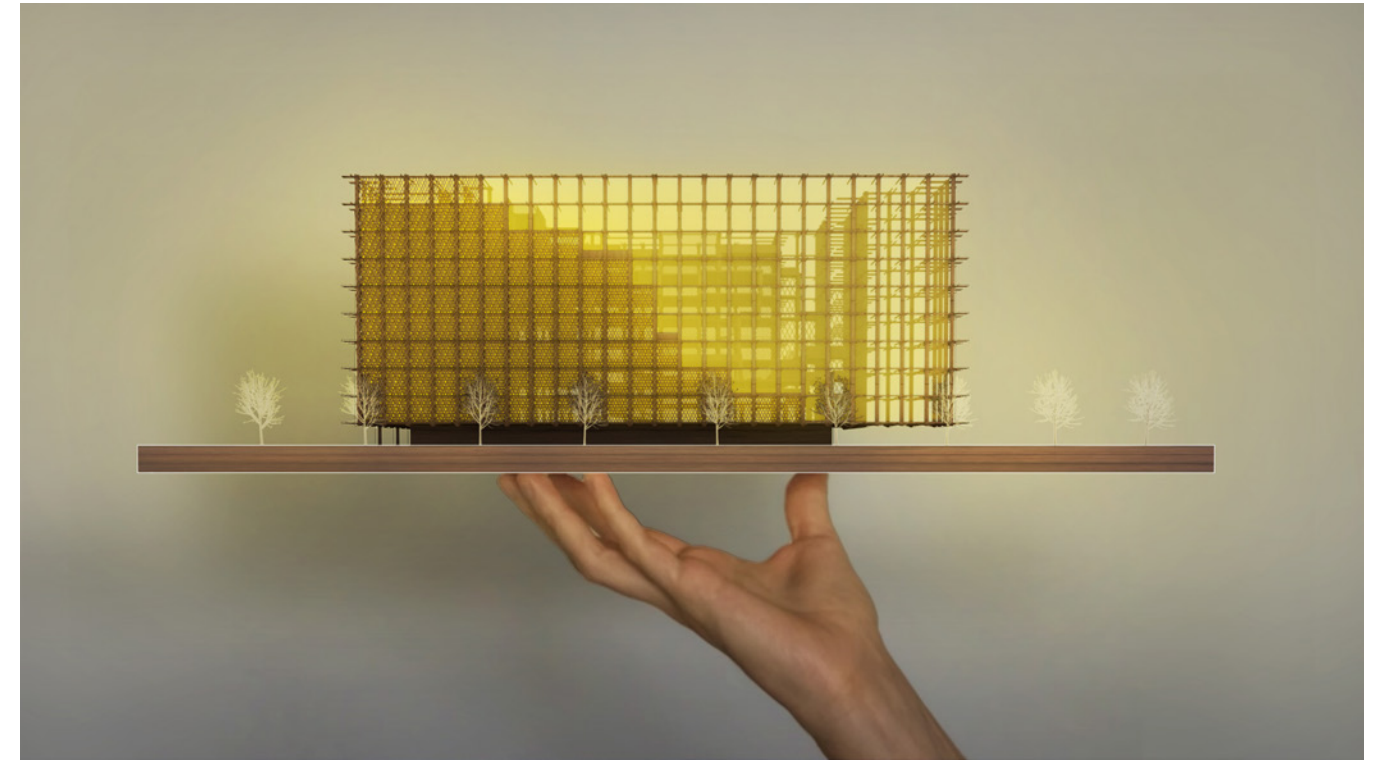


# *THE CULTURAL NEST*

YANAN CHENG

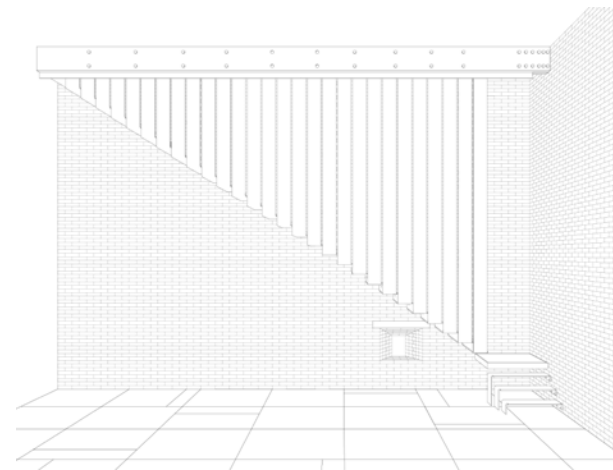
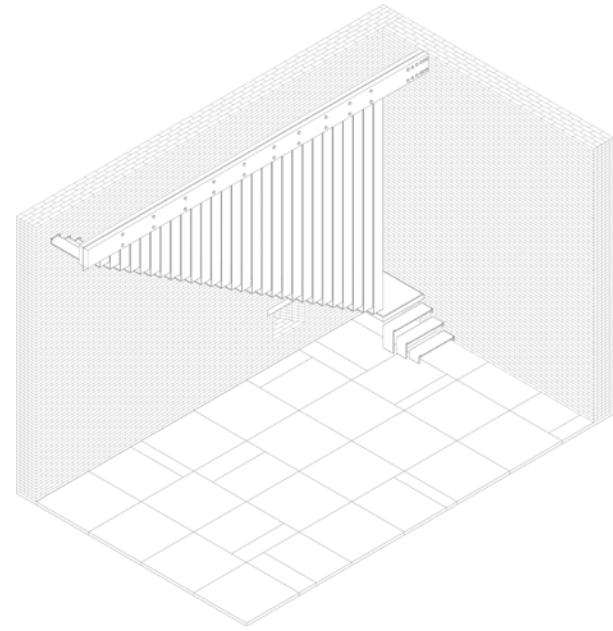
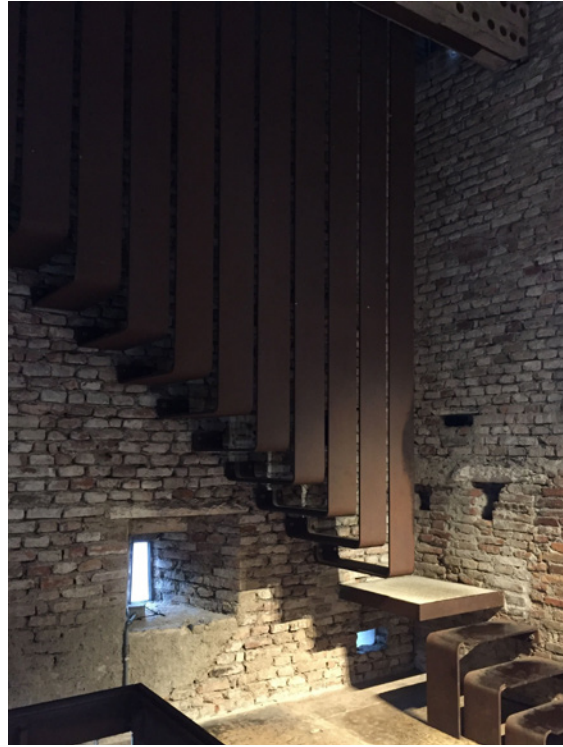
LUYI HUANG

HILARY SAMPLE  
COLUMBIA GSAPP  
SPRING 2020

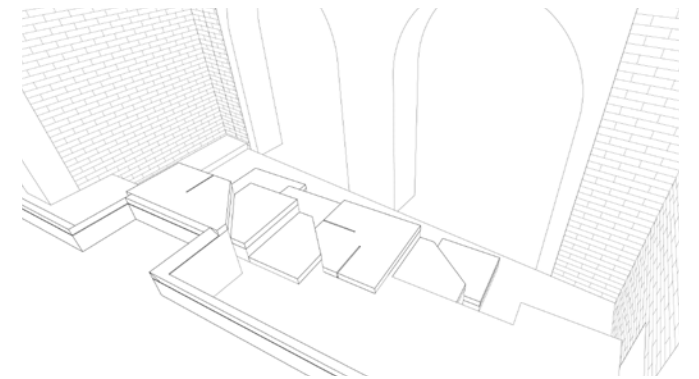
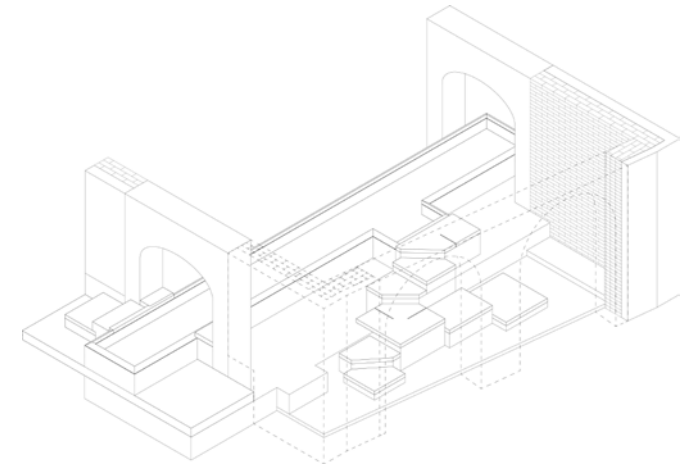


*Can the pandemic sounds the alarm  
on the climate change?*

Carlo Scarpa\_Castelvecchio Museum

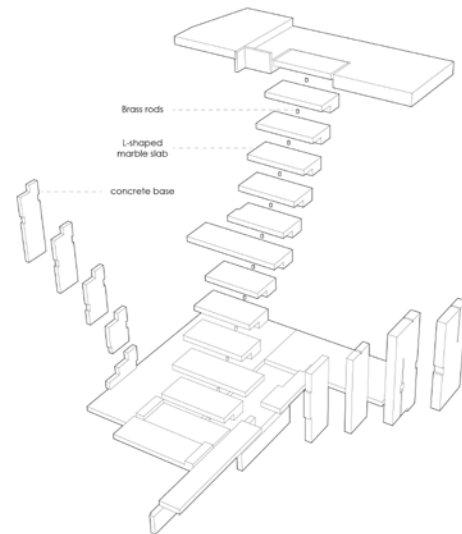
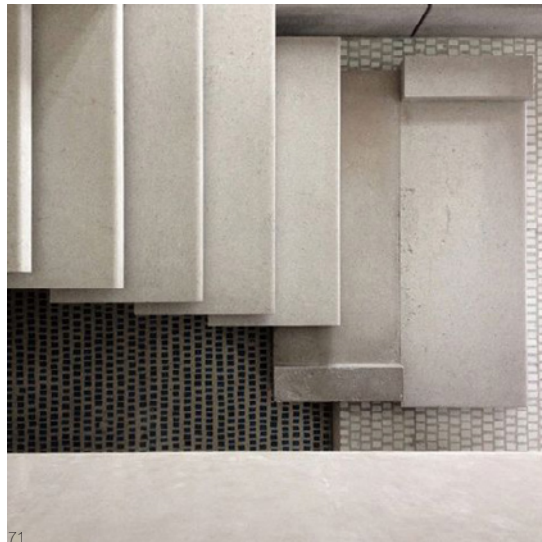
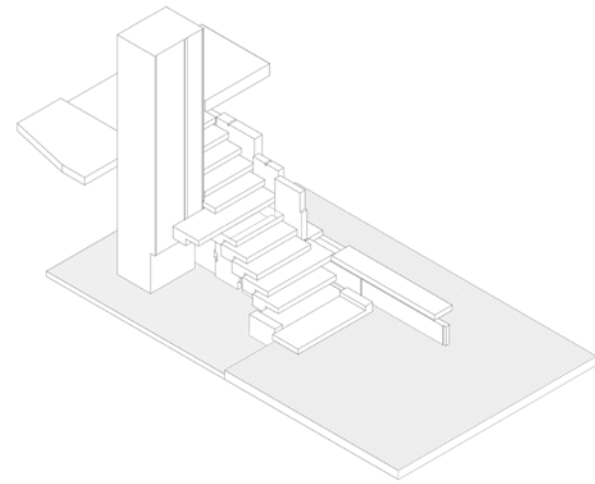


Carlo Scarpa\_Fondazione Querini Stampalia





Carlo Scarpa\_ Olivetti Showroom



Kengo Kuma & Associates



SunnyHills Cake Shop



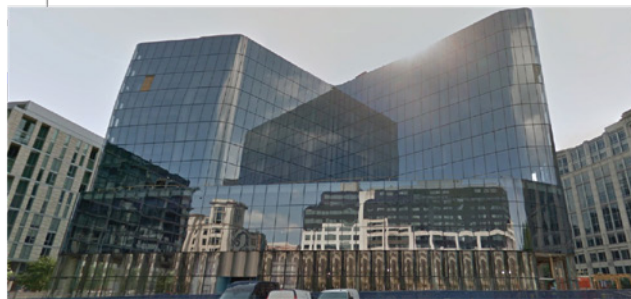
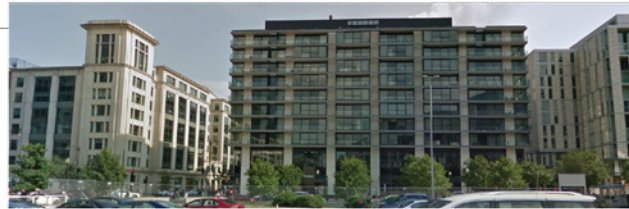
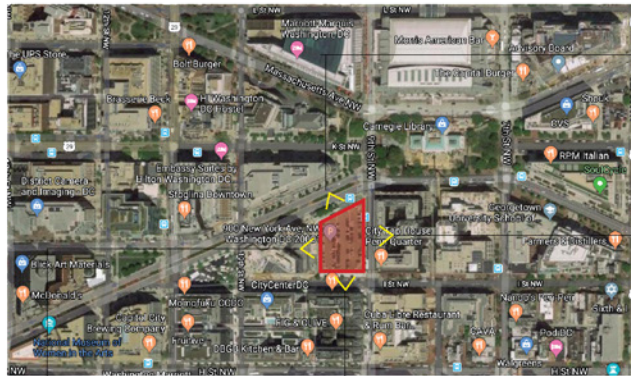
Nest We Grow





# SITE

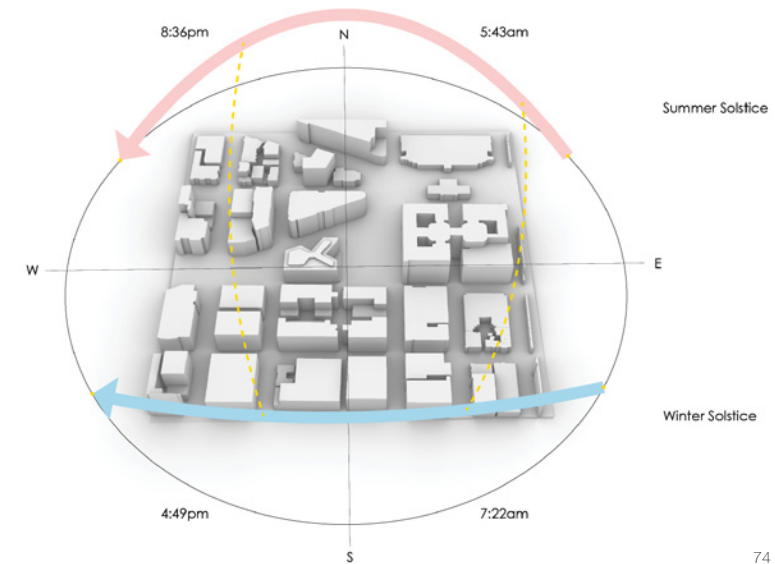
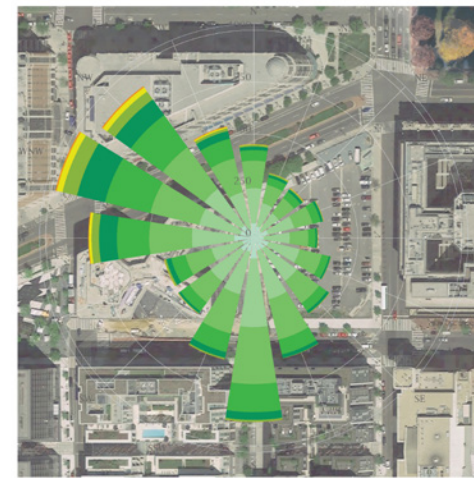
Area: 58,575.14 ft<sup>2</sup>  
 Perimeter: 1,008.05 ft



# DOWNTOWN ZONE

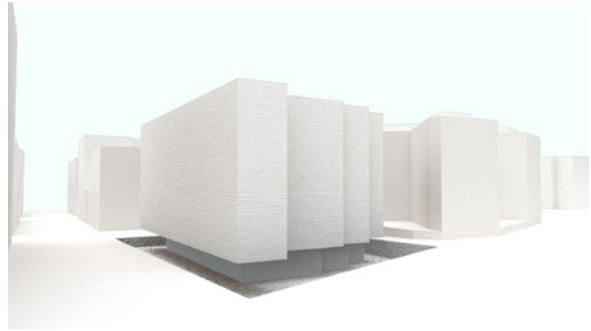
D - 5 - R

Development Standards								
	Floor Area Ratio (max.) <sup>1,2</sup>	Height (ft.) <sup>2</sup>	Penthouse Height (ft.)/Stories	Lot Occupancy (percentage) <sup>3</sup>	Rear Yard (ft.)	Side Yard (ft.)	Green Area Ratio	Zoning Regulation Reference
D-5-R	None (3.5 min. residential)	130 (fronts on right-of-way of at least 110 ft.) 120 (fronts on right-of-way of at least 100 ft. but less than 110 ft.) 110 (fronts on right-of-way of at least 90 ft. but less than 100 ft.) No taller than the width of the street right of way, plus 20 ft (on streets less than 90 ft)	20	100	2.5 in. per 1 ft. of vertical distance from the mean finished grade at the middle of the rear of the structure to the highest point of the main roof or parapet, but not less than 12 ft.	If provided, at least 2 in. wide for each 1 ft. of height of building but no less than 5 ft.	0.20	Subtitle I, Chapter 5

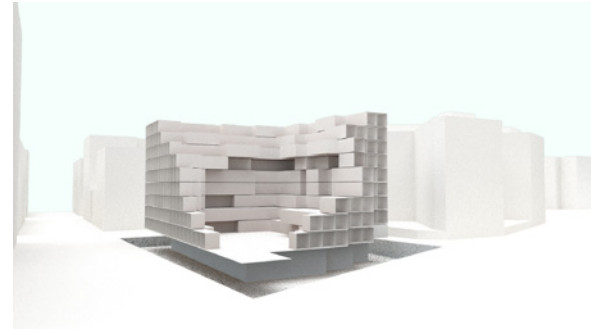




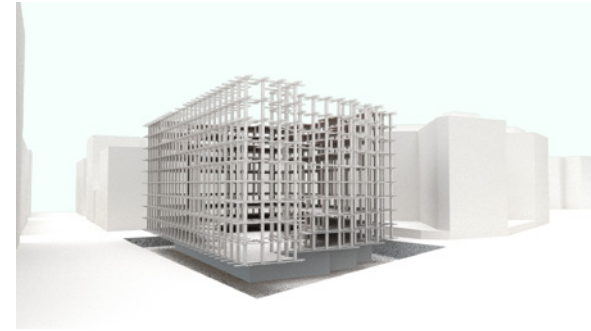
## CONCEPT DIAGRAM



Lifting the volume for the space use. And separate the building from the city by isolate it from the side walk.



Opening the half of volume space for the interior garden for gathering and multiple program .

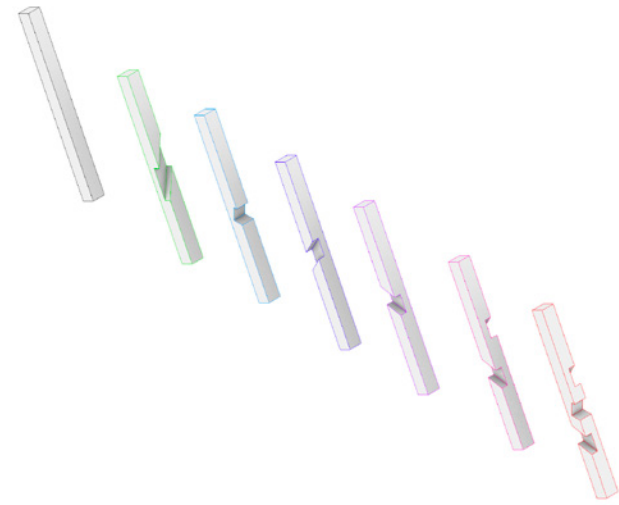


30' x 30' Structure grid to building up the structure of nest and divide the space in the modular way.



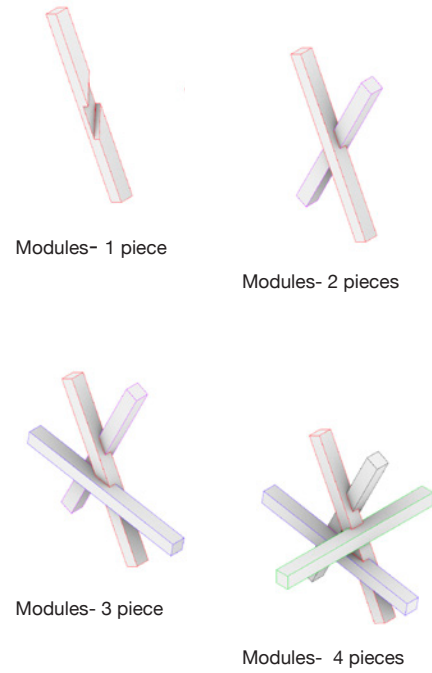
The timber face is installed to different face depends on the light control needs. And the moat protects the buildings.

# JOINTS CONNECTION OF FACADE

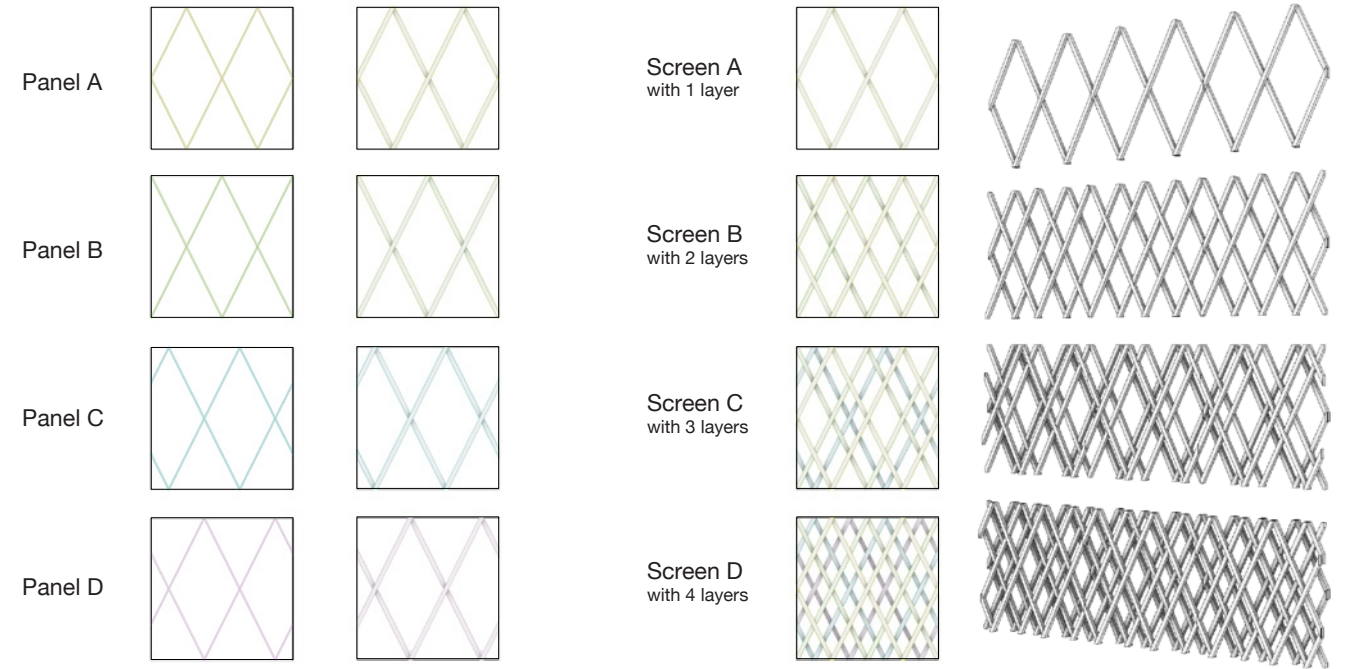


1.Variation of Wood Joints

## 2. Modules

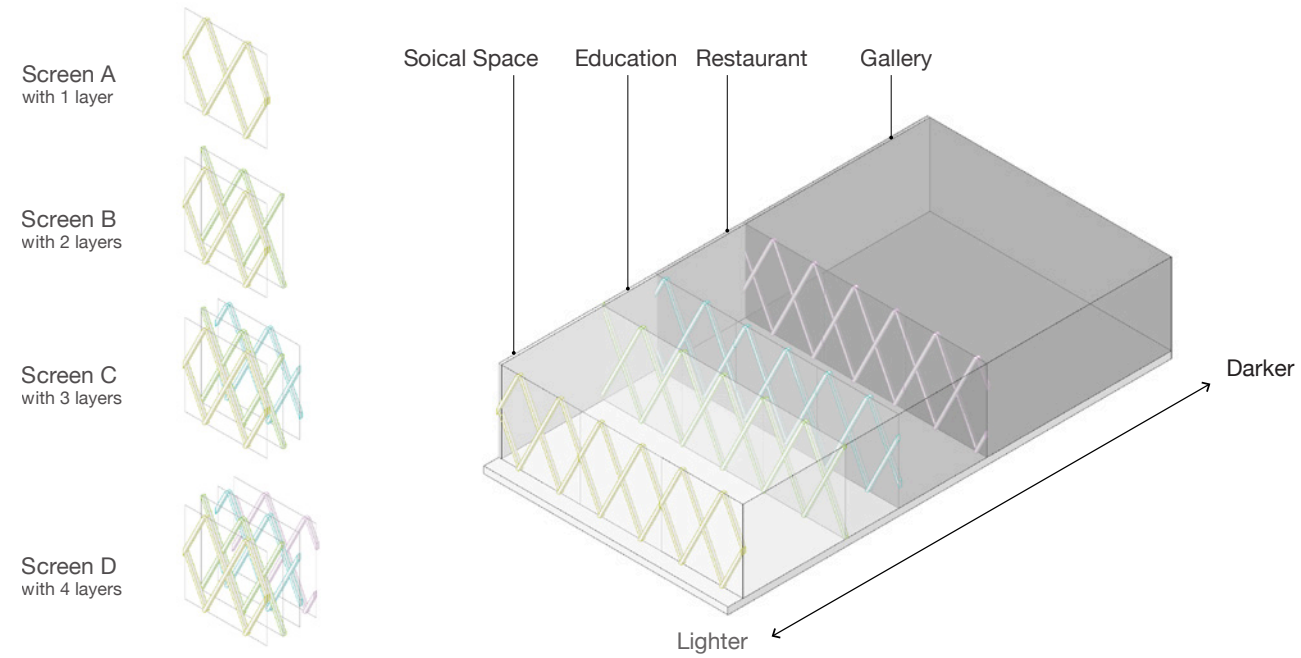


# FACADE PATTERN

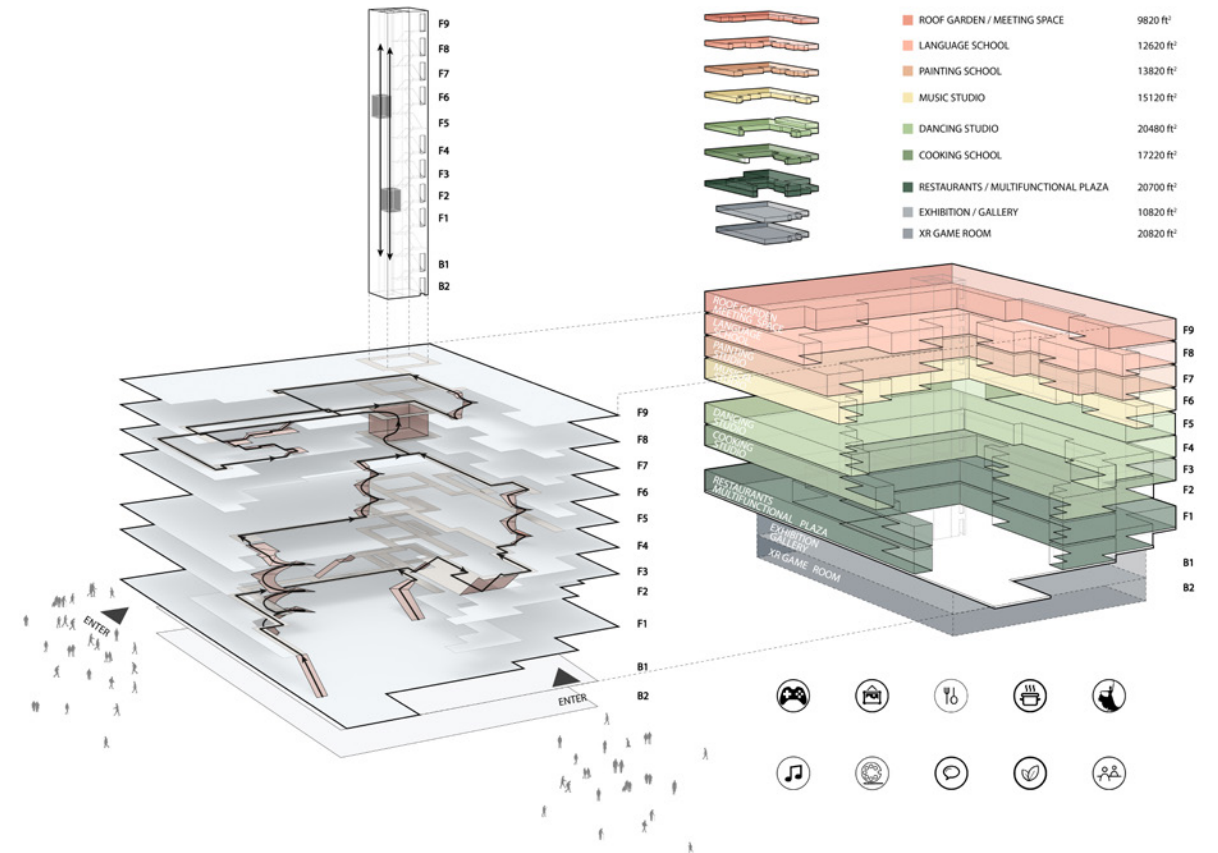




# SUNLIGHT CONTROL



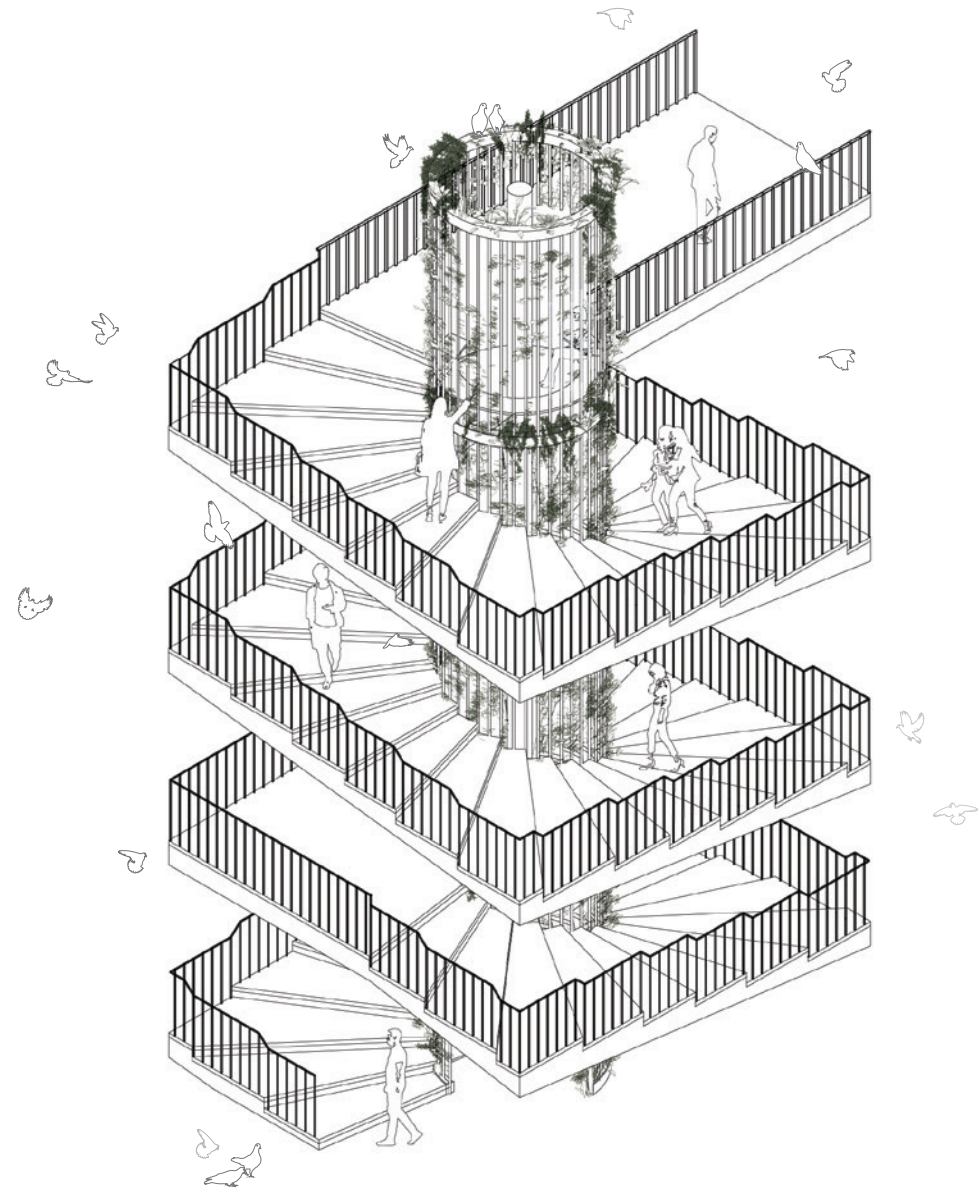
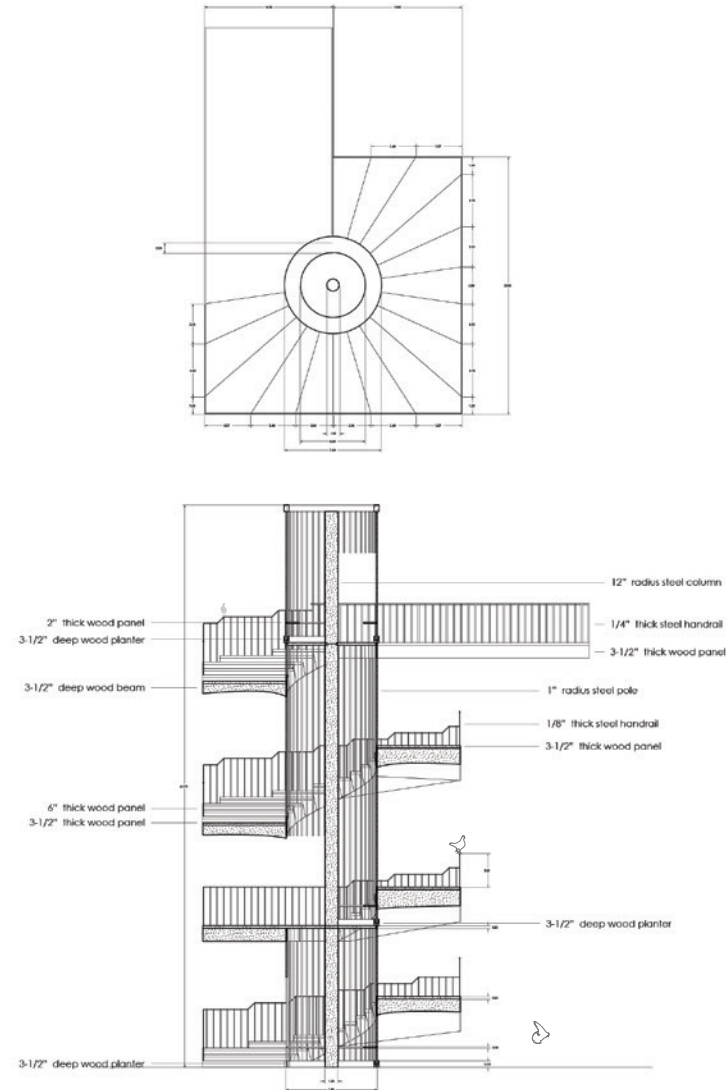
# CIRCULATION / PROGRAM DIAGRAM



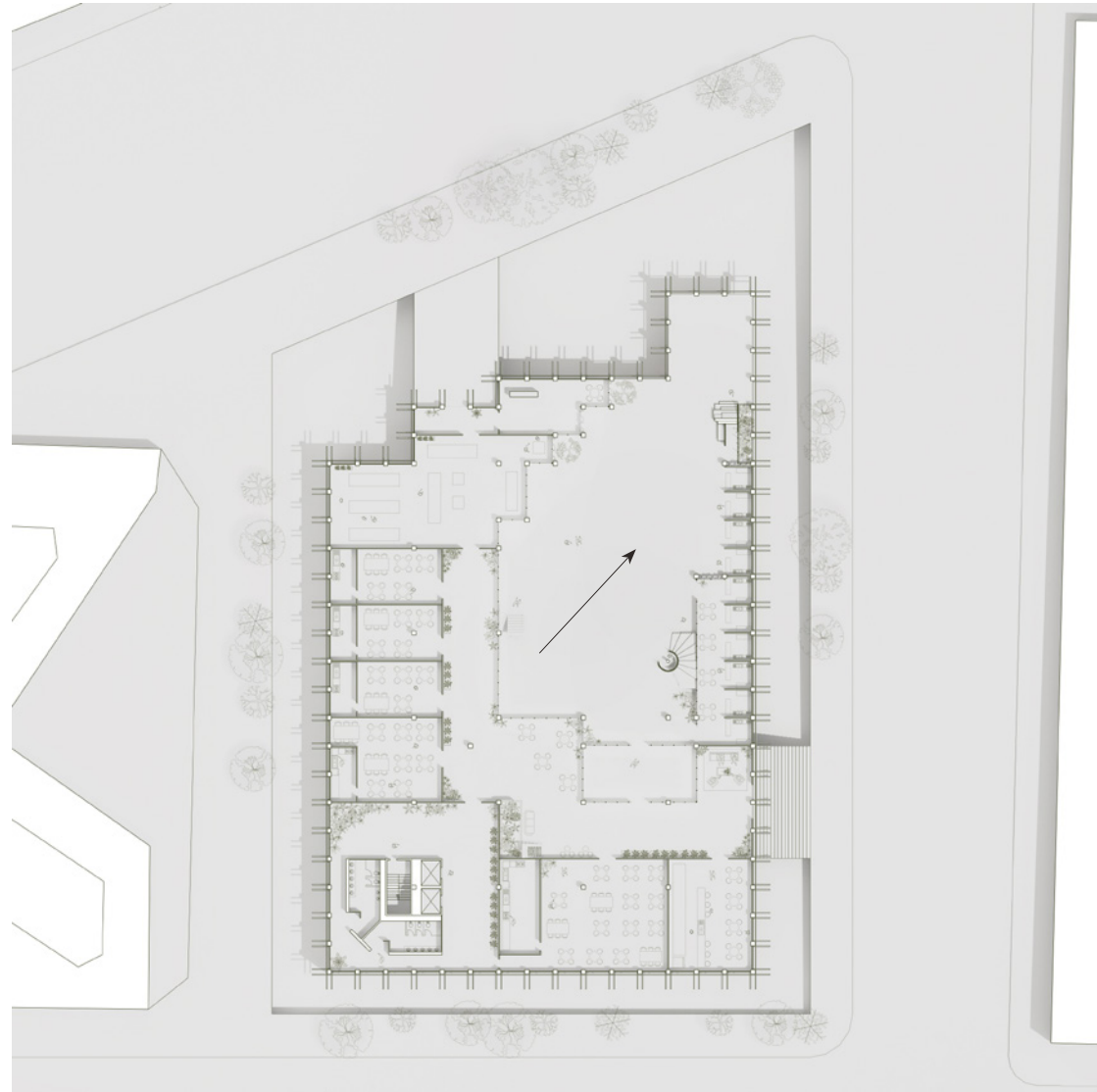




# STAIR DETAIL



## FLOOR PLAN



Ground Floor (loft)  
RESTAURANT + PHARMACY + MULTIFUNCTIONAL PLAZA

## CITY VIEW



Wood facade makes a translucent skin which allows people to see far to the city's view.



## FLOOR PLAN



Third Floor  
COOKING SCHOOL

## INTERIOR VIEW



The cooking school provides enjoyable cooking spaces and utilities that help people learn to make food from different cultures.

## FLOOR PLAN



Fifth Floor (loft)  
DANCING SCHOOL

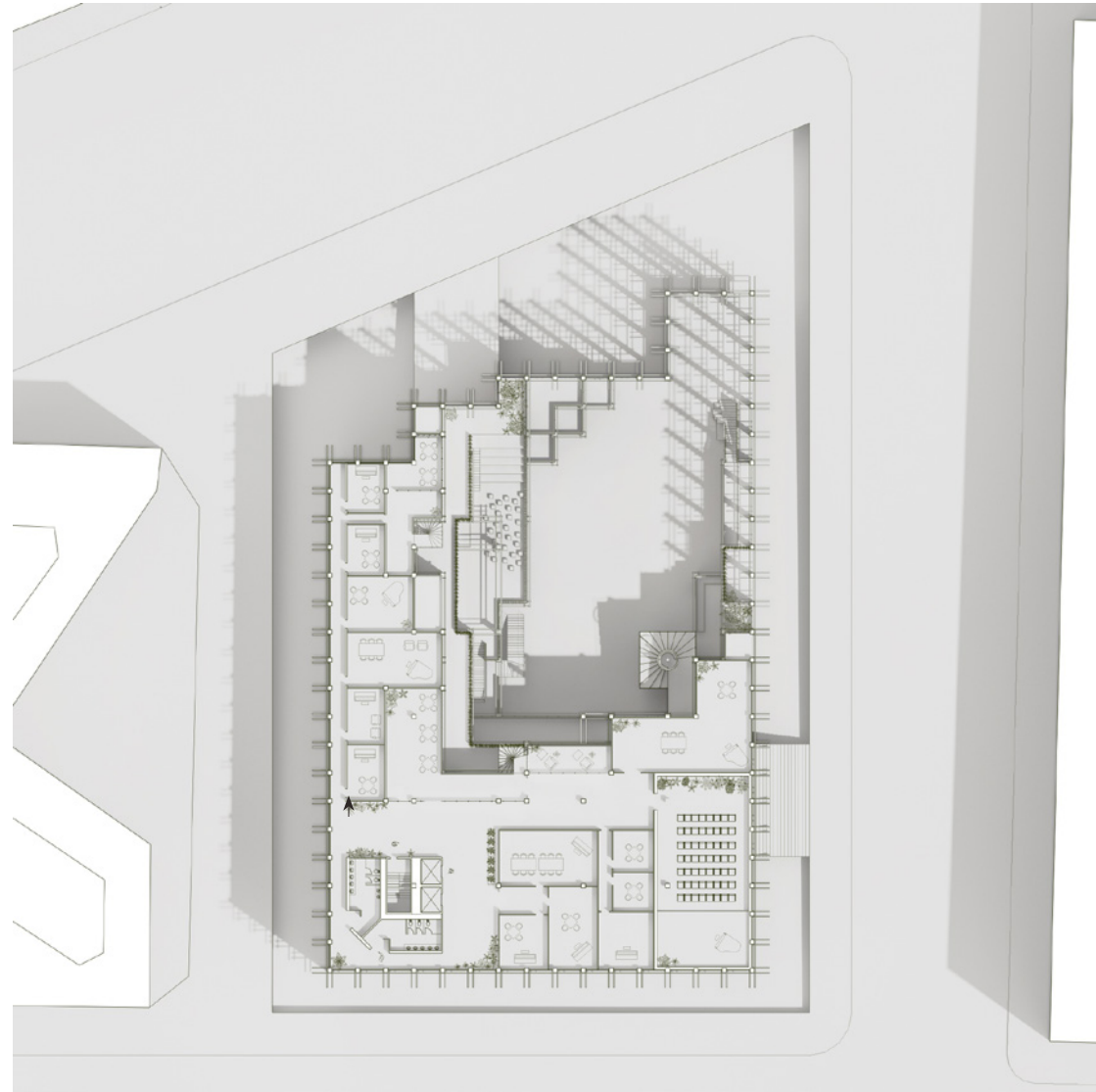
## INTERIOR VIEW



The dancing floor provides various sizes of dancing rooms that allow for many different types of dancing practices. The wood facade helps to manipulate the sunlight.



## FLOOR PLAN



Seventh Floor  
MUSICAL STUDIO

## INTERIOR VIEW



The musical studios are all sound-proof and suitable for versatile types of musical practices. There are also showrooms for musicians to give performance.

## FLOOR PLAN



Ninth Floor  
ROOF GARDEN + MEETING SPACE

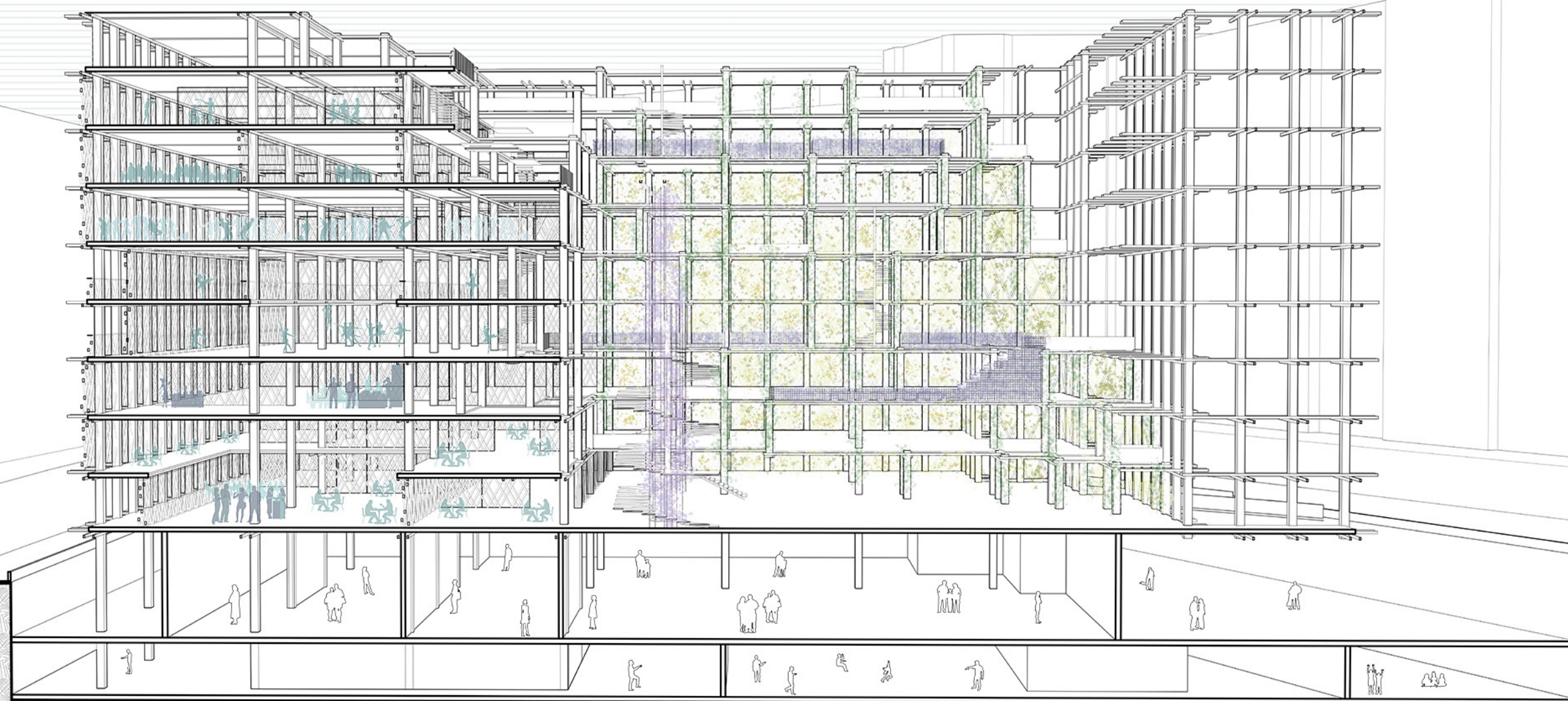
## ROOF VIEW



The roof garden is the best place to enjoy nature, and at the same time, people can have group meetings or parties in those semi-enclosed meeting spaces.



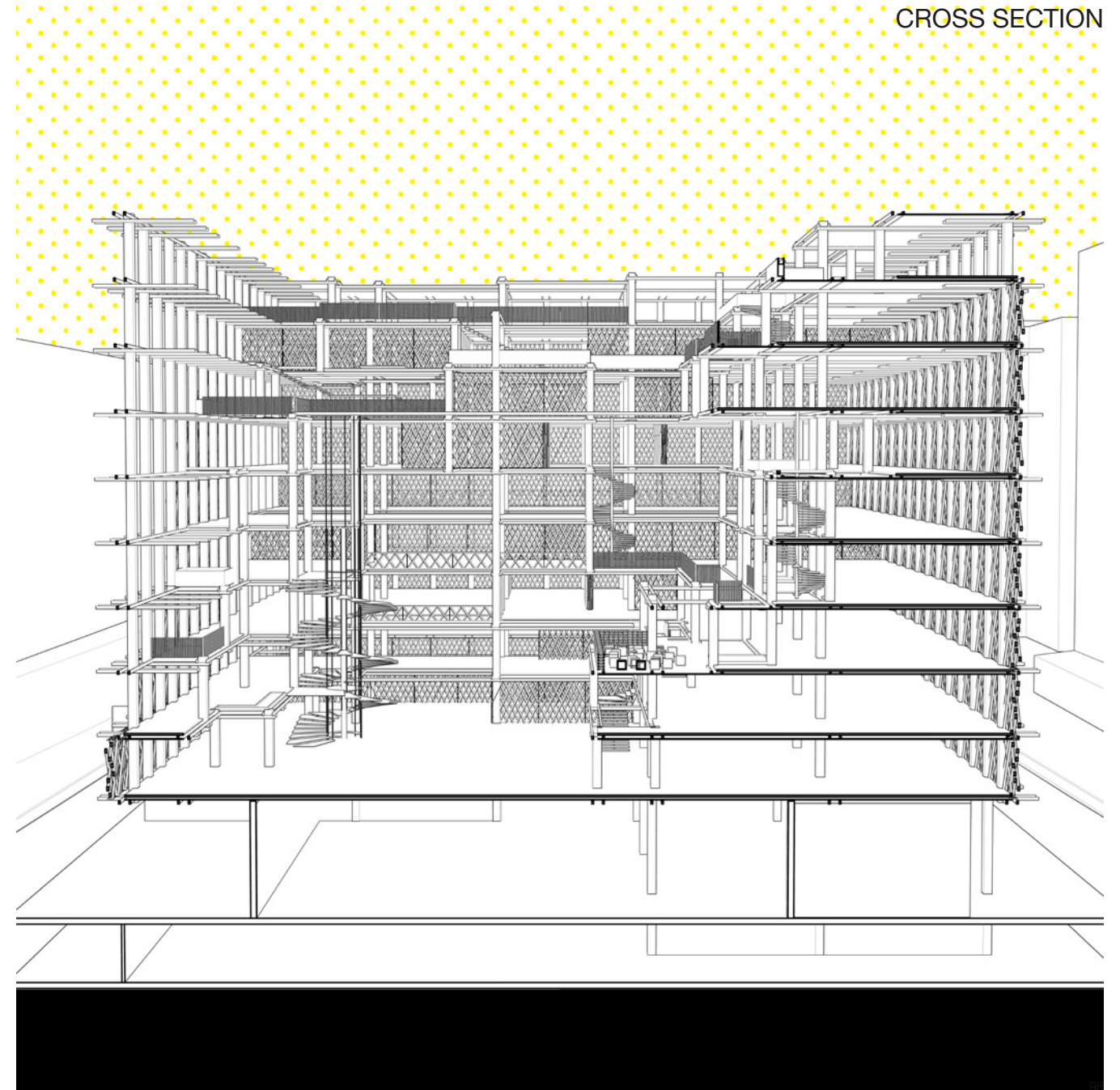
LONG SECTION





*The space looking towards to the interior side of building. And vertical circulation guided people going through building. Espieccally, provied the great expeience in the graden. And the stairs connecting the interior and exterior space.*

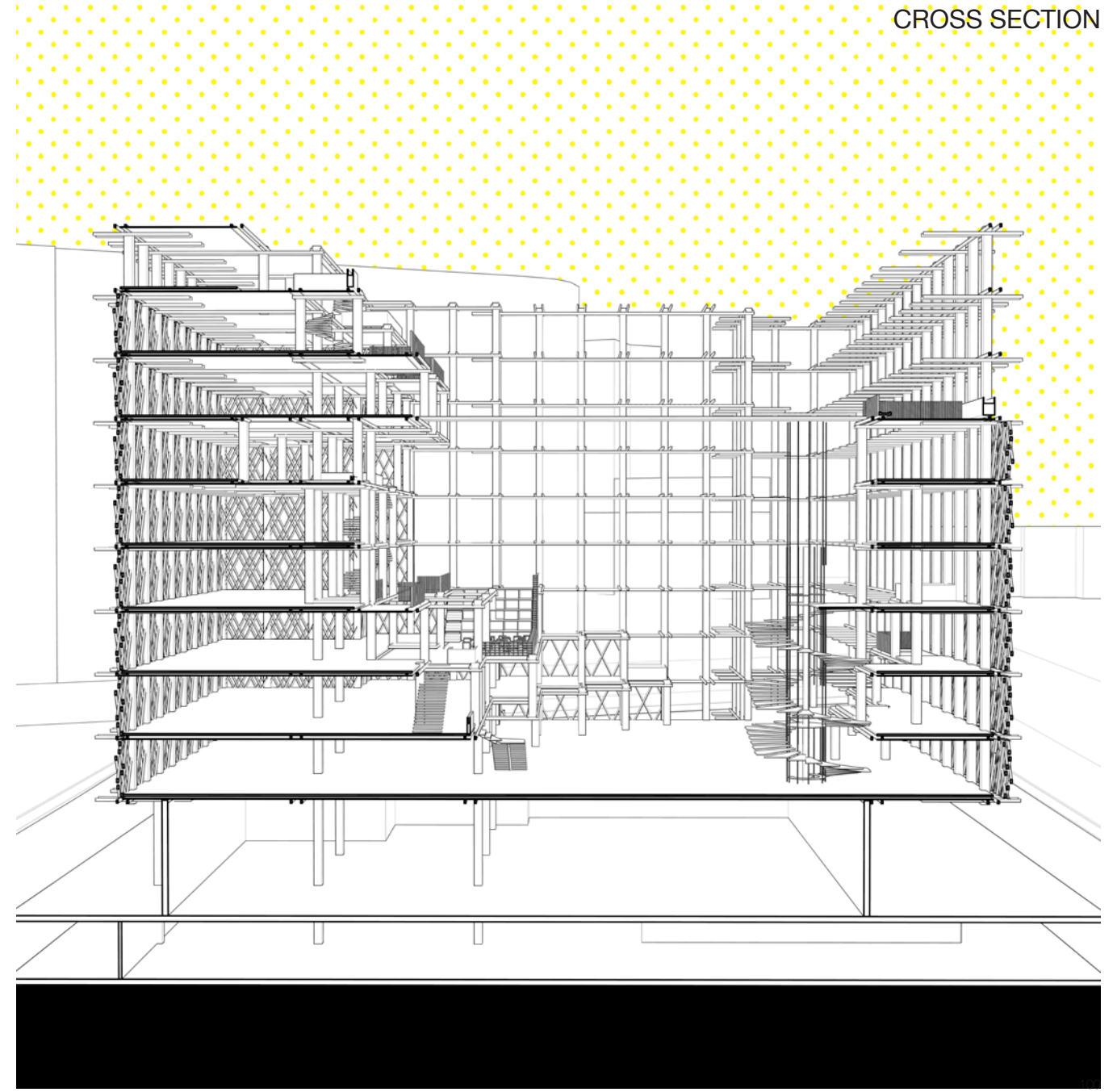
CROSS SECTION



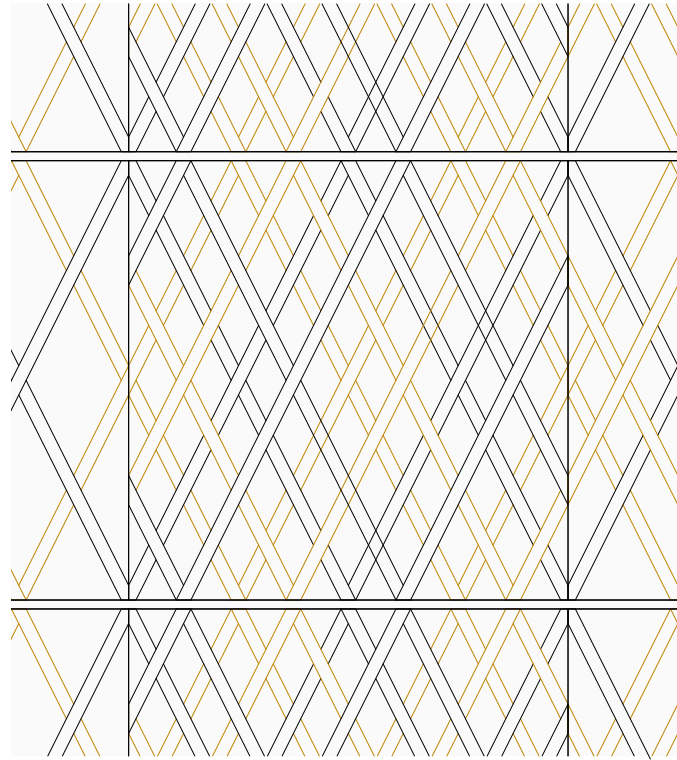


*The view towards  
to the New York  
Ave which is one  
open concern allow  
people seeing the  
city view throuth  
garden .*

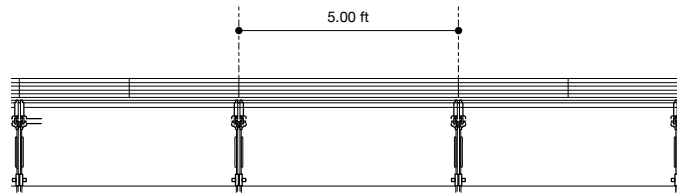
CROSS SECTION



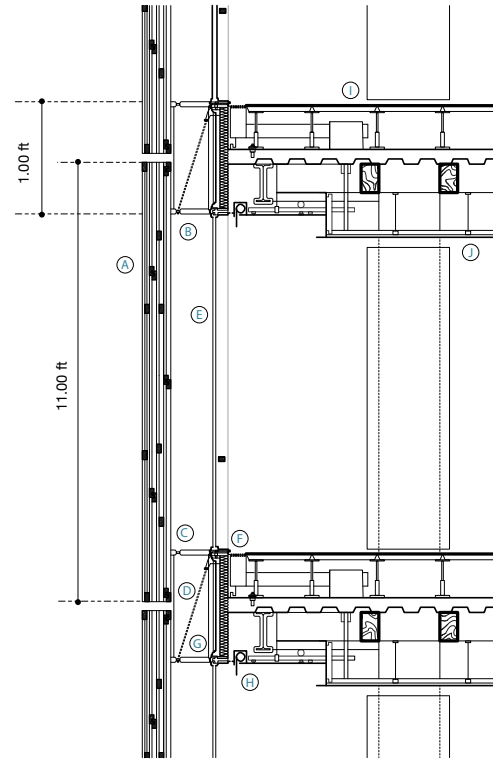
# WALL SECTION



Partial Elevation

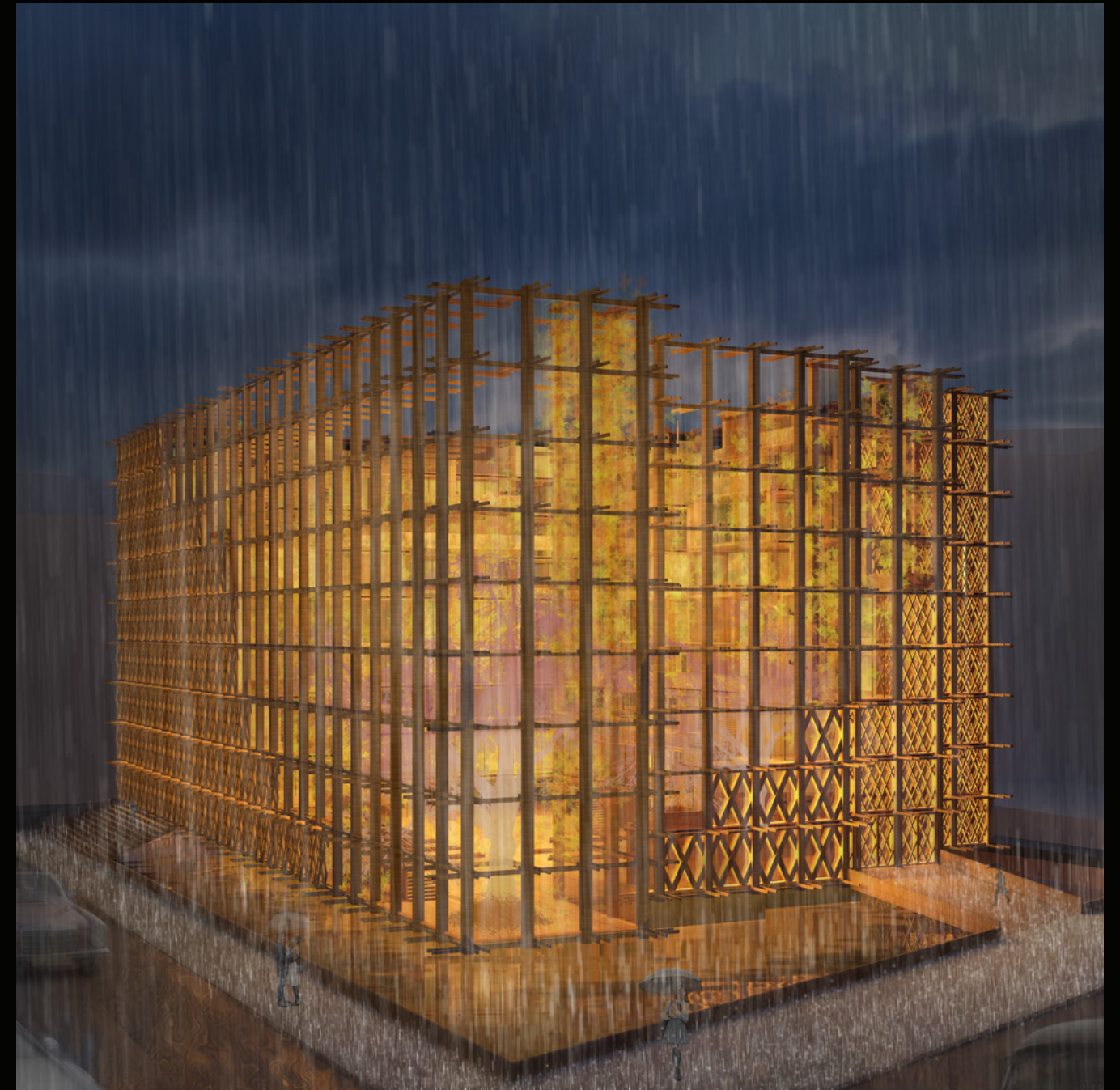


Partial Plan



Wall Section

- A Timever tubes facade with internal aluminum
- B Painted timber vertical strut
- C Painted timber horizontal strut
- D Wood suspension rod
- E Low-iron insulating glass with low-E coating
- F Painted extruded-wood unit frame
- G Painted timber spandrel panel
- H Automated internal shade
- I Raised floor over timber slab on deck
- J Suspended ceiling





# ***KILL THAT LITTLE DEVIL***

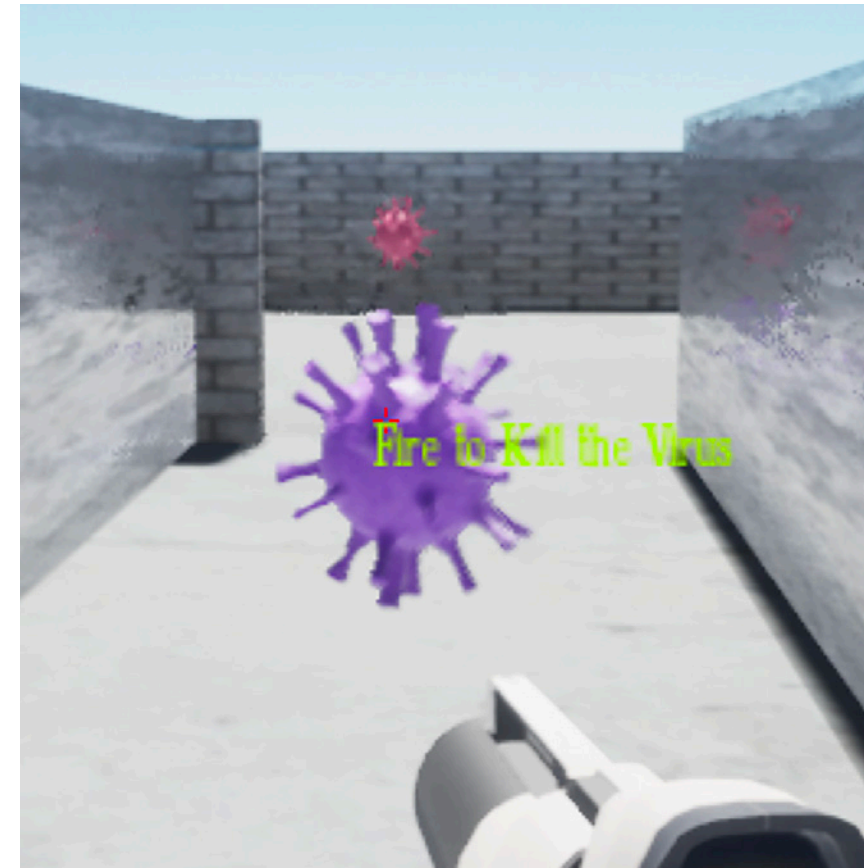
***-The COVID19 Virus***

***VIRTUAL ARCHITECTURE***

YANAN CHENG

LUYI HUANG

NITZAN BARTOV  
COLUMBIA GSAPP  
SPRING 2020



*This Visual Studies workshop borrows tools and workflows from the gaming and virtual reality industries, to explore architectural production through the lens of speculative physics, causality and interaction.*

*Through a playful voice, this small first-person-shooter game not only provide pleasure during playing experience but also let the user feel the serious situation of the current PANDEMIC.*

# BLUEPRINTS

## INPUTS

## OUTPUTS

PLAYER CONTROLLER	}	BOX COLLISION	{	OVERLAP - ENABLE STOP OVERLAP - DISABLE
Q (KEYBOARD)	}	TIMELINE - SET RELATIVE LOCATION	{	START POINT END POINT
A (KEYBOARD)	}			

SET VISIBILITY (MUZZLE FLASH)	{	DO ONCE STOP (GUN AUDIO)	{	PLAY (GUN AUDIO) SHOW (MUZZLE FLASH)
-------------------------------	---	-----------------------------	---	---

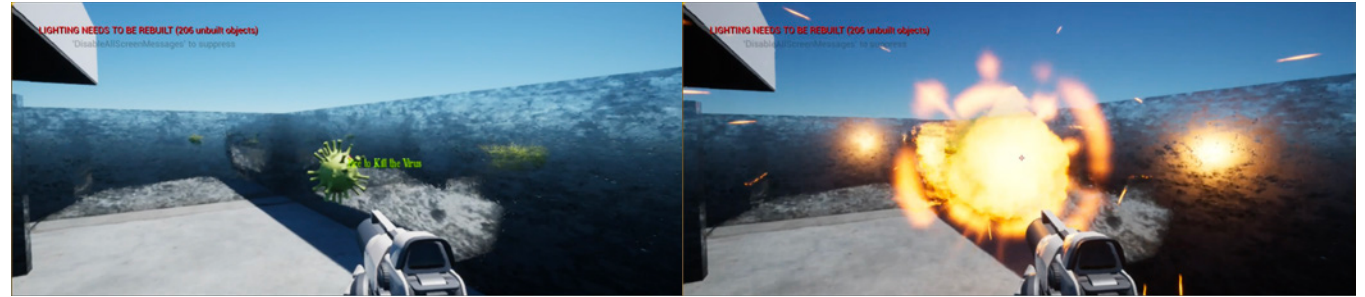
DRAW TEXT PLAYER CONTROLLER	}	PLAYER HUD	{	OVERLAP - SHOW "FIRE TO KILL THE VIRUS"
--------------------------------	---	------------	---	---

DESTROY ACTOR	}	AT LOCATION	{	SPAWN EMITTER PLAY SOUND
---------------	---	-------------	---	-----------------------------

ADD LOCAL ACTOR ROTATION ADD LOCAL ACTOR OFFSET	}	TIMELINE	{	RANDOM FLOAT IN RANGE
--	---	----------	---	-----------------------

ACTOR PLAYER CHARACTER	}	BRANCH	{	< 300 UNITS - SHOW "WIN!" > 300 UNITS - INVISIBLE
---------------------------	---	--------	---	--

.....



Scan QR code to watch the video



# *CHINESE ROOF TILES*

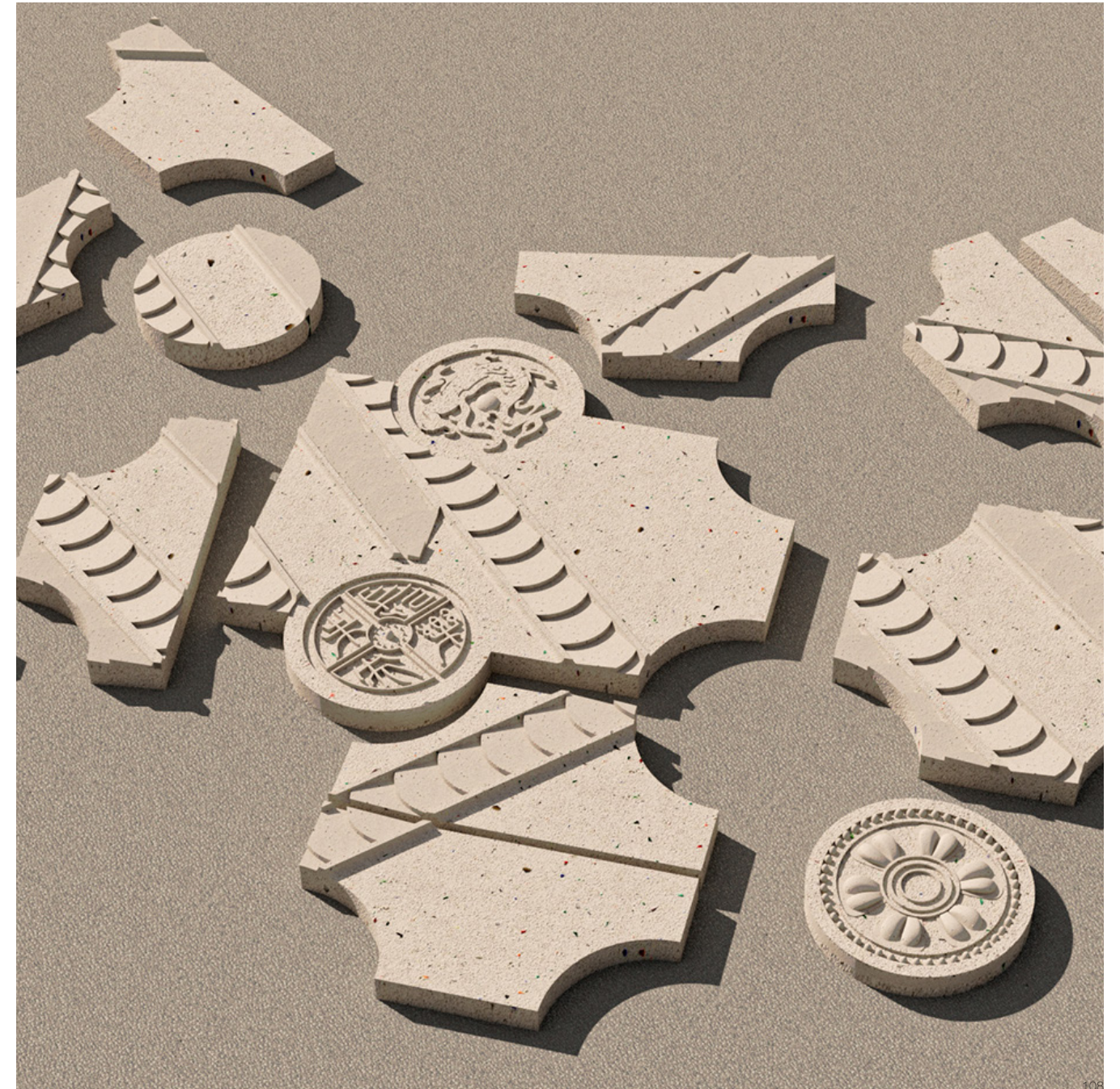
*HISTORY IN THE MAKING*

YANAN CHENG

SHIYIN ZENG

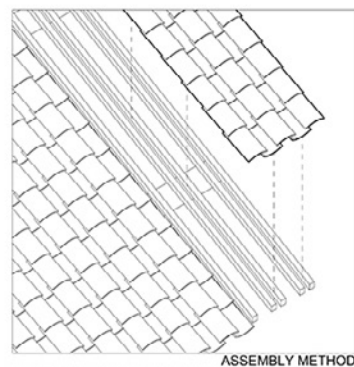
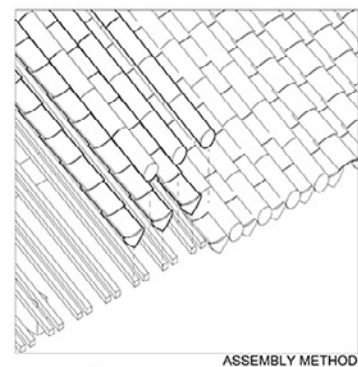
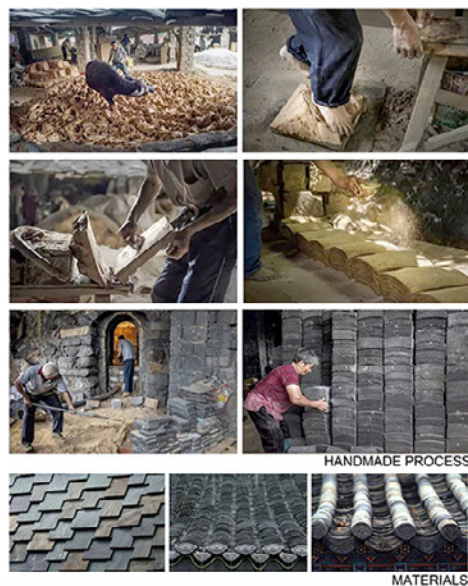
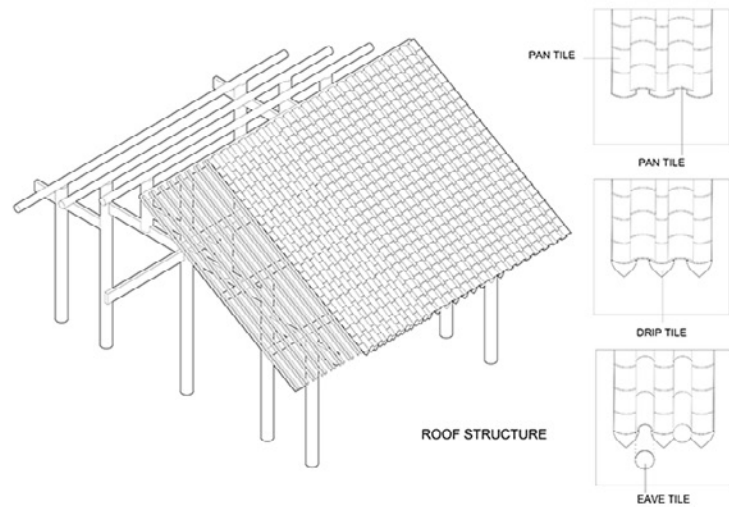
QIAZI CHEN

RUSTAM-MARC MEHTA, TAL SCHORI  
COLUMBIA GSAPP  
SPRING 2020



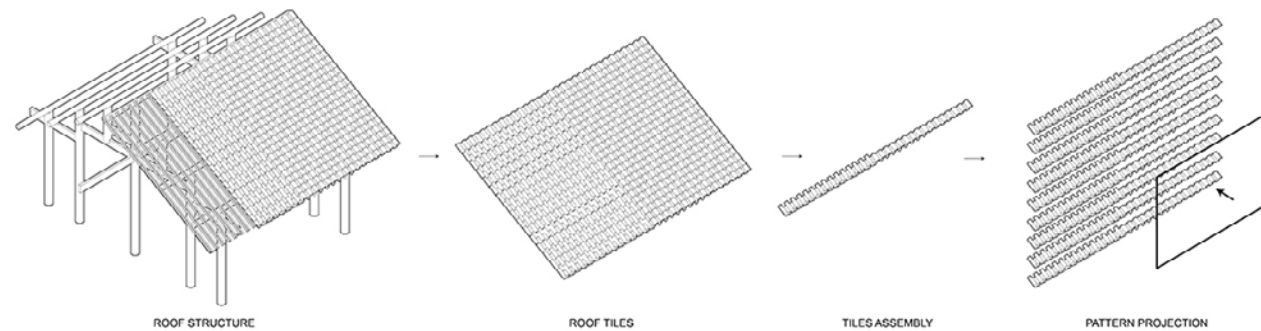


CHINESE ROOF TILES

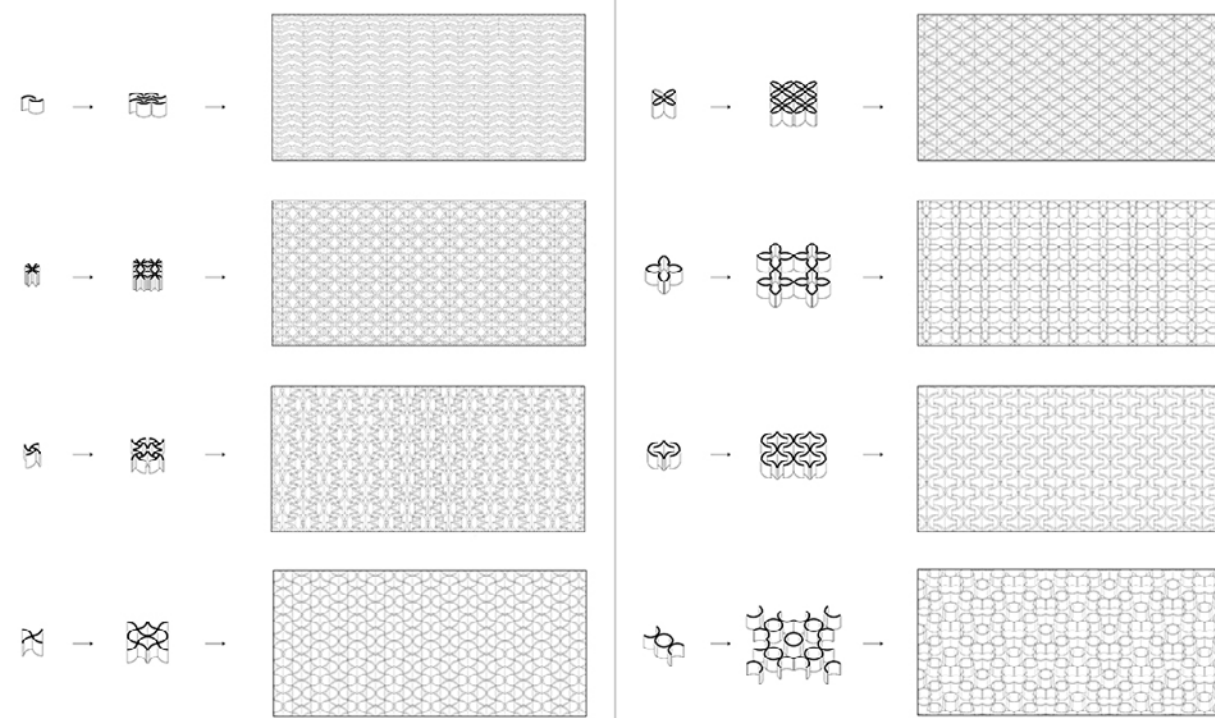


CHINESE ROOF TILES

ROOF TILES TRANSLATION

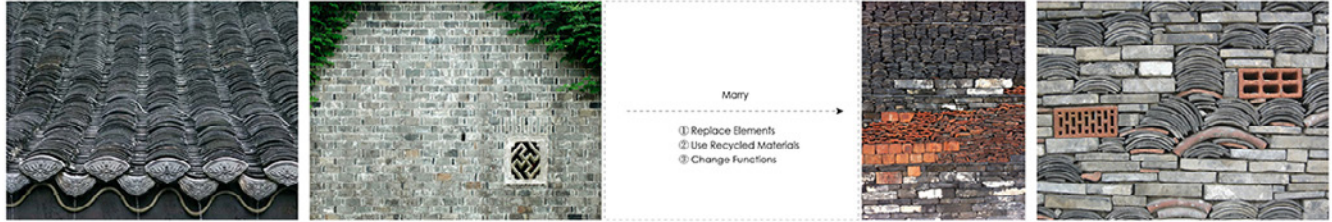


PATTERN DEVELOP PROGRESS



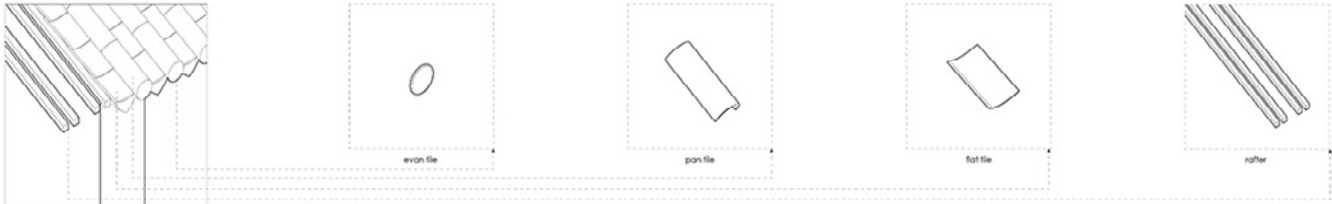


# CHINESE ROOF TILES

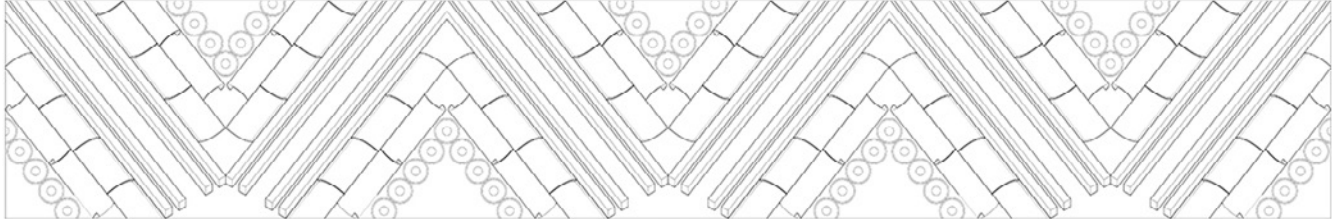


original material      original function      original material + new function

- Many
- ① Replace Elements
  - ② Use Recycled Materials
  - ③ Change Functions



original tile elements



① Replace Elements

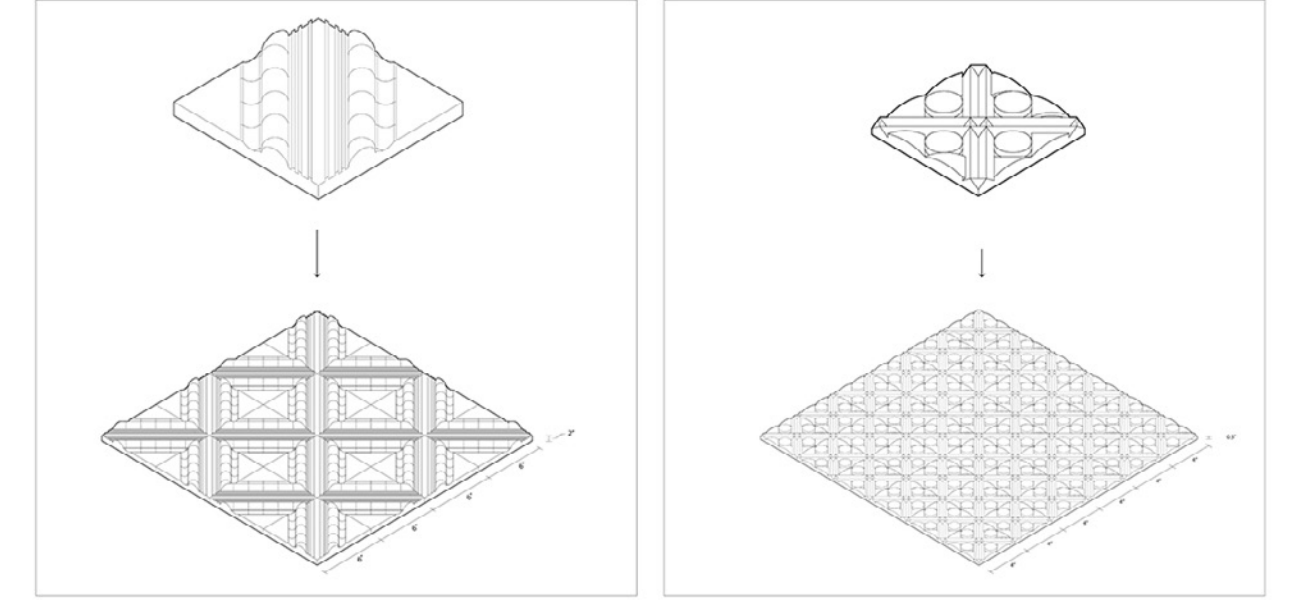
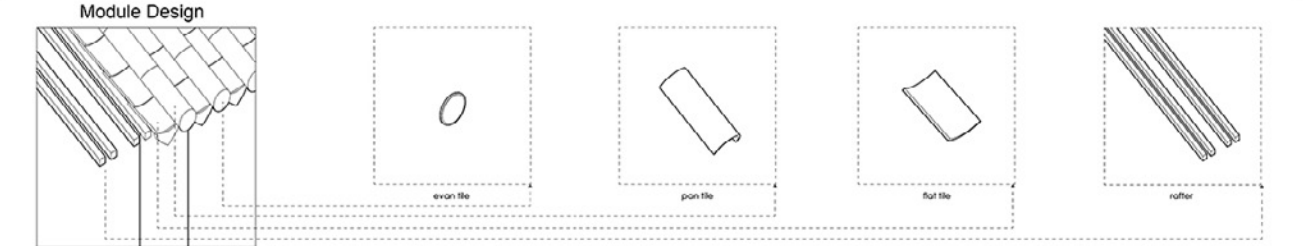
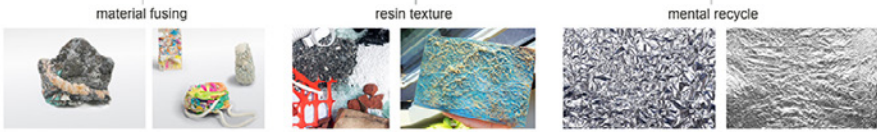
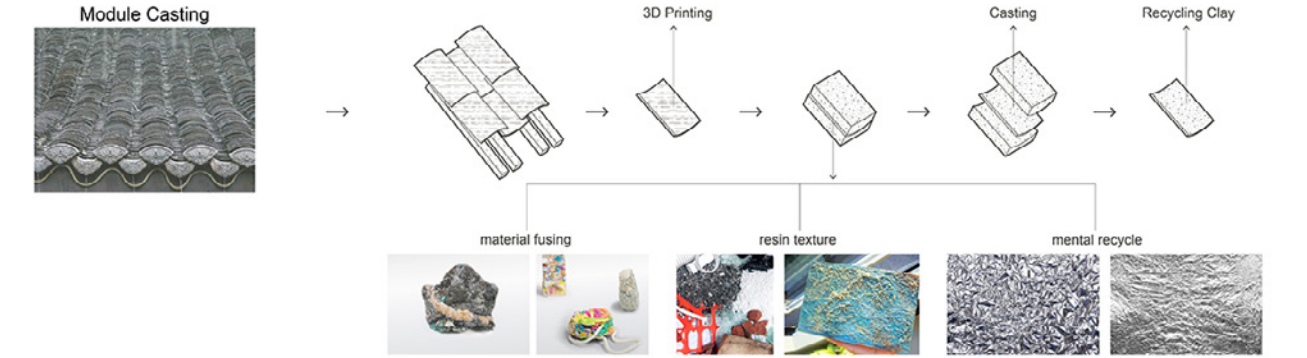


② Use Recycled Materials

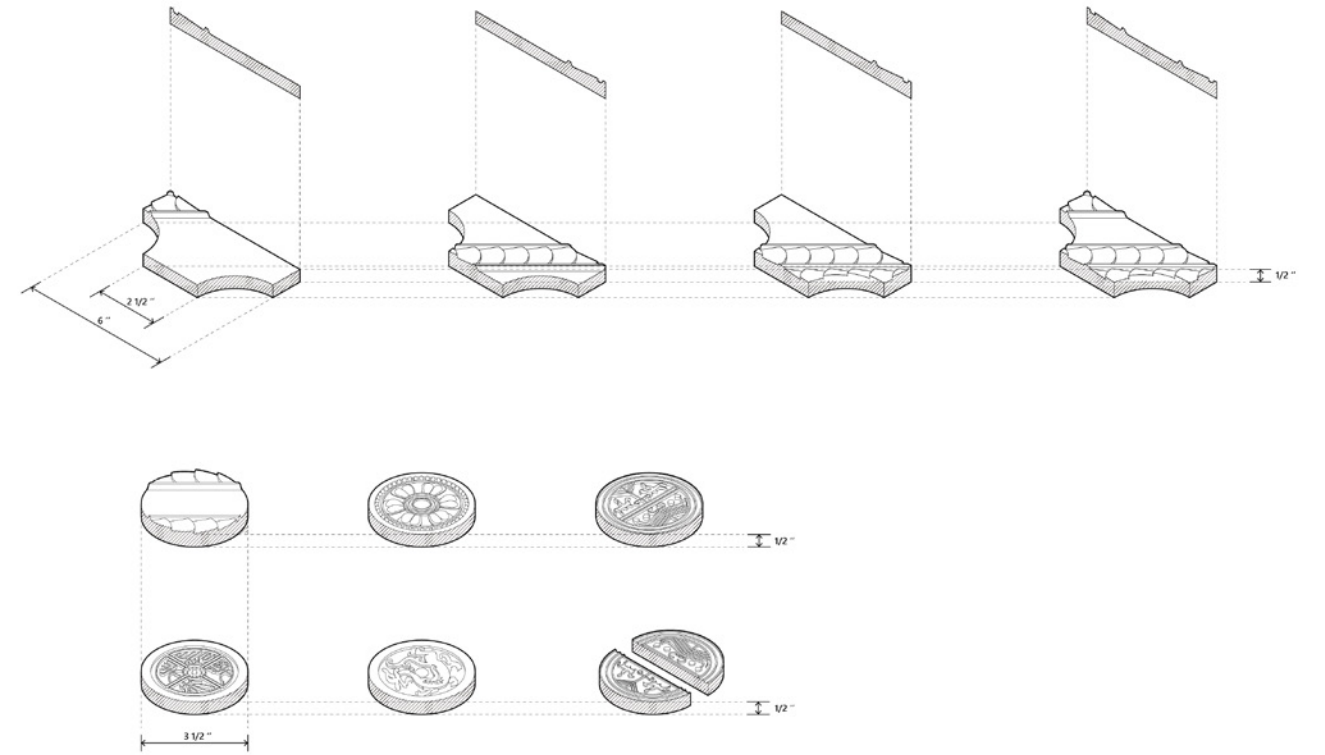
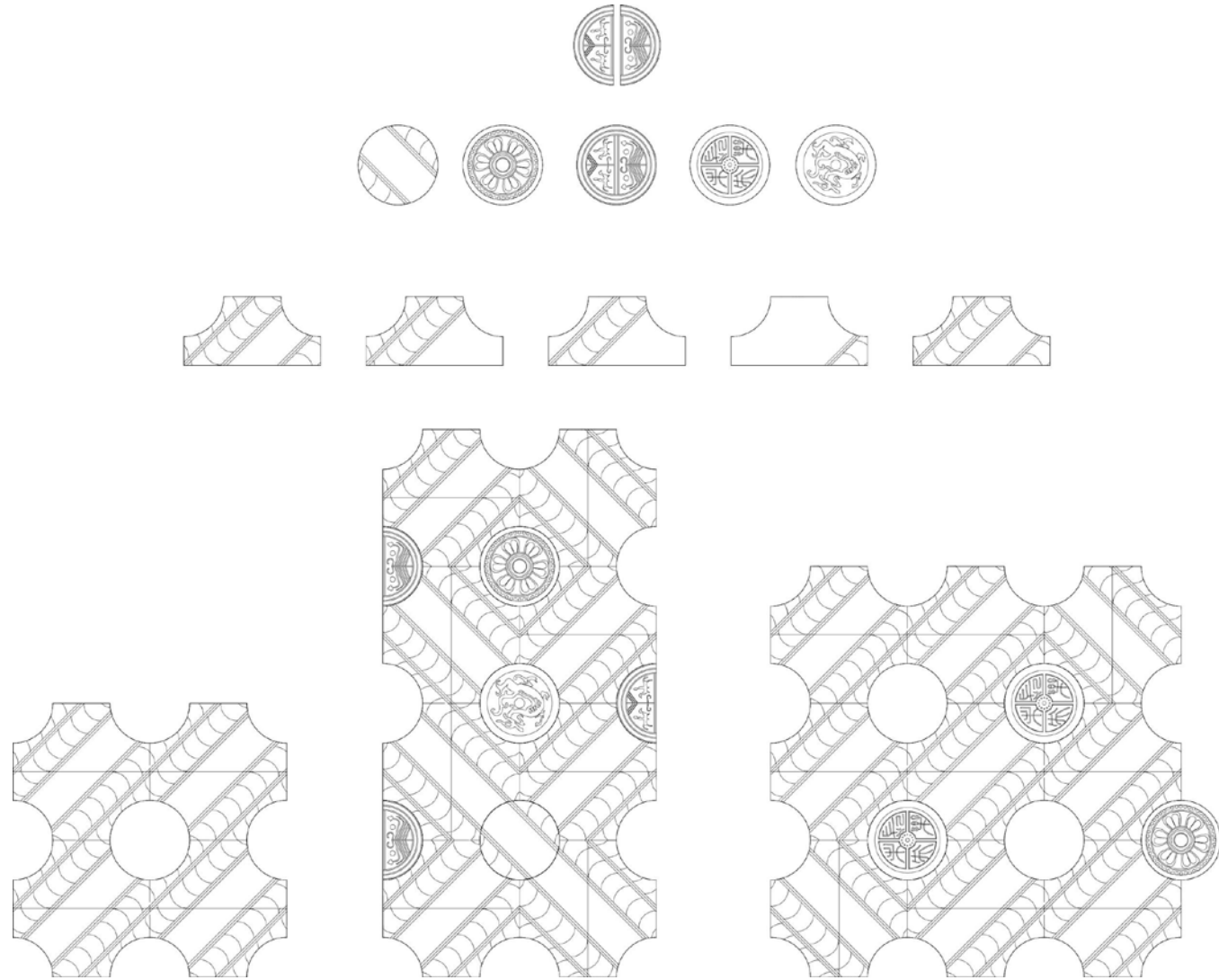


③ Change Functions

# CHINESE ROOF TILES



# DESIGN COMBINATIONS





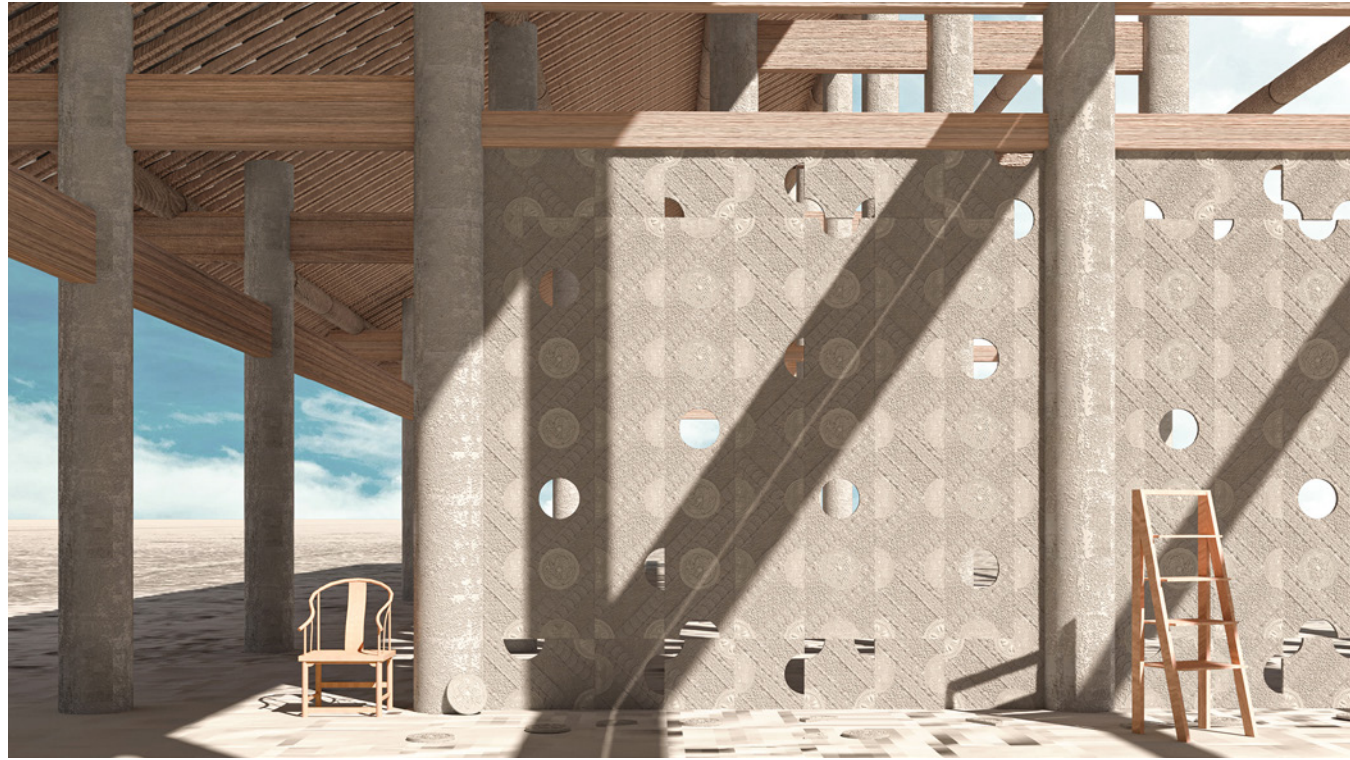


The tiles decorate the interior of a Chinese style reading room with pointed roof.



The tiles echo the real roof above.





The tiles create partition walls of a Chinese style loggia. The circular parts are flexible for future installation according to needs. The texture shows our attempts on casting the tiles from molds made from recycled materials.



The tiles form a screen in a Chinese pavilion at the center of a lake. The space is perfect for meeting close friends, having tea, and reading.



YANAN CHENG

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TEL: 8148809015