

# MINGYEONG CHOI

PORTFOLIO 2023-2024

# Mingyeong Choi

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+1 302-897-7248

## CERTIFICATION

**Registered architect | South Korea** **2023**  
**Industrial Engineer of Interior Architecture | South Korea** **2016**

## WORK EXPERIENCE

**HnSa Architects | South Korea** **2018 - 2022**  
Junior Architect | Senior Architect

- Church of the Shrine of Our Lady of the Rosary in Namyang  
Participated in on-site meetings, documented agendas, and organized the archive
- Maehyangri Peace Museum | Collaborated with Mario Botta  
Made documents for building permits, architectural design reviews, and construction  
Consulted architectural design standards such as for disability and green architecture  
Developed design with Mario Botta's studio  
Participated in meetings for construction management and managed on-site issues
- Headquarters for W-Mission (collaborated with Yu Han Michael Lin of 2BXL)  
Made documents for building permits, architectural design reviews, and construction  
Designed and consulted plans for energy conservation
- Headquarters for Deers  
Coordinated with the design company regarding interior colors and signs  
Illustrated shops drawings for interior and sign installs
- Headquarters for Shinhan Art  
Designed the facade and interior along with 3D modeling  
Made presentation materials and discussed designs with the client
- Website management  
Updated projects and their publication and articles

**KOMA Atelier | South Korea** **June - July 2017**  
Intern

- Illustrated architectural drawings and diagrams for publication
- Participated in the schematic design process of a residential complex on Jeju island

## EDUCATION

**Columbia University** | New York, United States **2023 - 2024**  
Master of Science in Advanced Architectural Design

**Kyunghee University** | Suwon, South Korea **2012 - 2018**  
Bachelor of Architecture

## AWARDS & EXHIBITION

**KIA(KOREAN INSTITUTE OF ARCHITECTS ) Convention and Exhibition** **2019**  
· Participated as a team member in the exhibition of the headquarters for Deers which was awarded the 2019 Good place award Made the display model and panel

**Excellence award on the graduate exhibition at Kyunghee university** **2017**  
· Awarded with the graduation project, 'OASIS in YDP', the housing renewal in Yeongdeungpo

**Public design competition on Jeju island** **2016**  
· 3rd Prize | Designed an eco-friendly public bench to vitalize cultural assets in the neighborhood

**Union of Architecture University Students exhibition** **2016**  
· Representing Kyunghee university after winning the competition within the department, a pavilion was built and displayed in Marronnier park

## SKILLS

Revit, Rhinoceros, Grasshopper, AutoCAD, Google SketchUp, Microsoft Office Suite, Photoshop, Illustrator, InDesign, Enscape, Lumion

## LANGUAGE

**Korean** Native | **English** Proficient

LinkedIn



Completing the MS.AAD program at GSAPP was an opportunity for me to expand beyond my existing architectural interests and explore my role across various fields. Throughout the year, meeting diverse architects, landscape architects, artists, and activists, and engaging in lectures and discussions broadened my perspective. This experience marked a turning point in my life, pushing me to consider not just as a passive designer of built environments, but also what kind of person I want to be in society and on this planet, and how I can realize these aspirations. This portfolio organizes my newfound interests into three main themes discovered through the program.

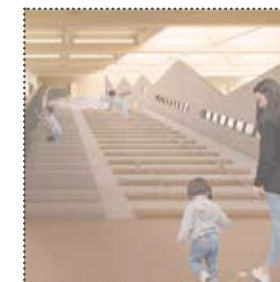


STUDIO 6  
SPRING 2024



**PIZZO SELLA  
MANIFESTA 12**

TRANSSCALARITIES  
SUMMER 2023



DESIGNING FOR CHILDREN  
FALL 2023

COMMUNITY



STUDIO  
SUMMER 2023



**TRASH PEAK**

TRANSSCALARITIES  
SUMMER 2023

ANTHROPOCENE

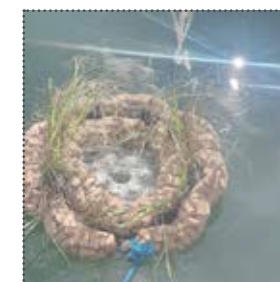


**CONTROLLED  
NATURE**

ARGUMENT  
SUMMER 2023

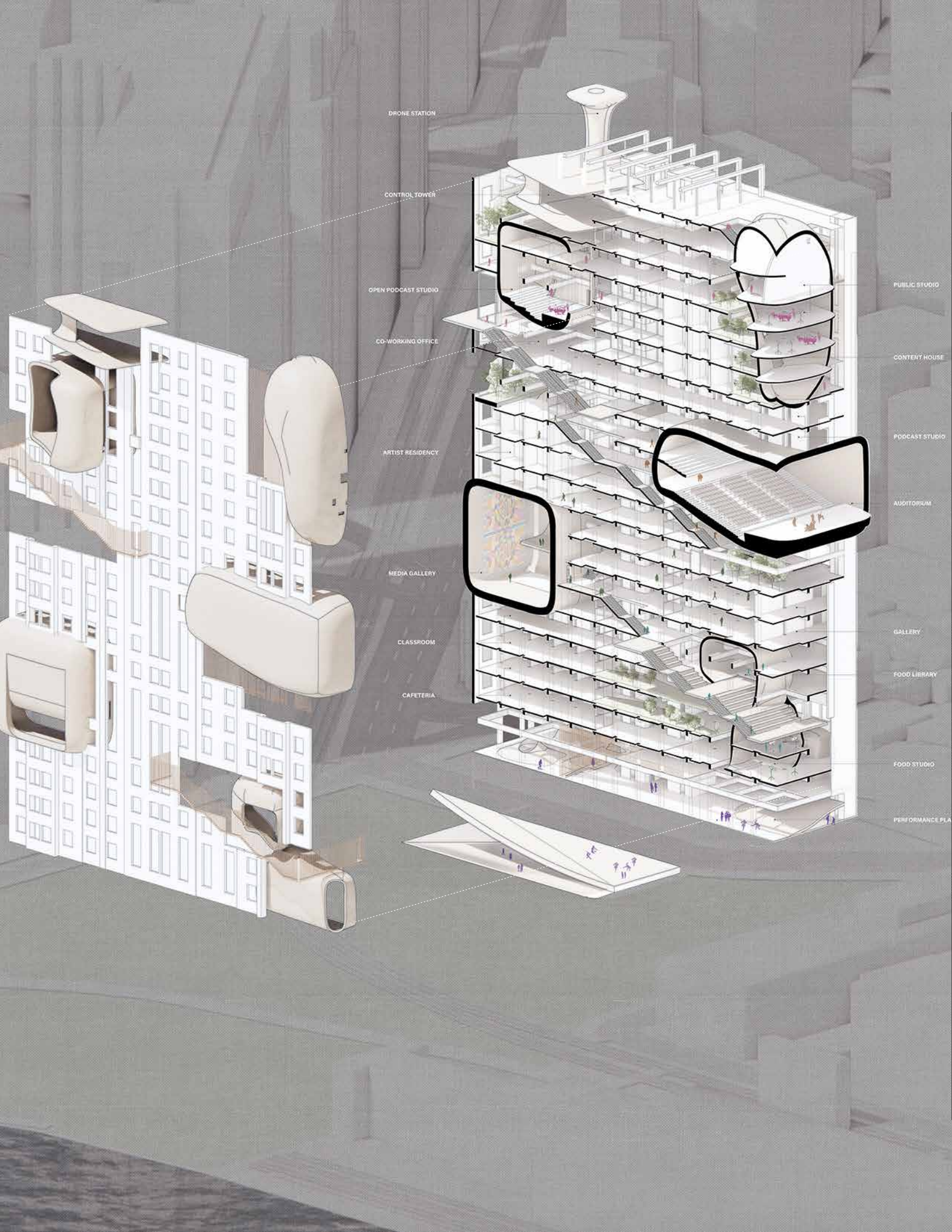


STUDIO 5  
FALL 2023



SEED BOMBS  
FALL 2023

ECOLOGY



## 01 CULTURECAST HUB

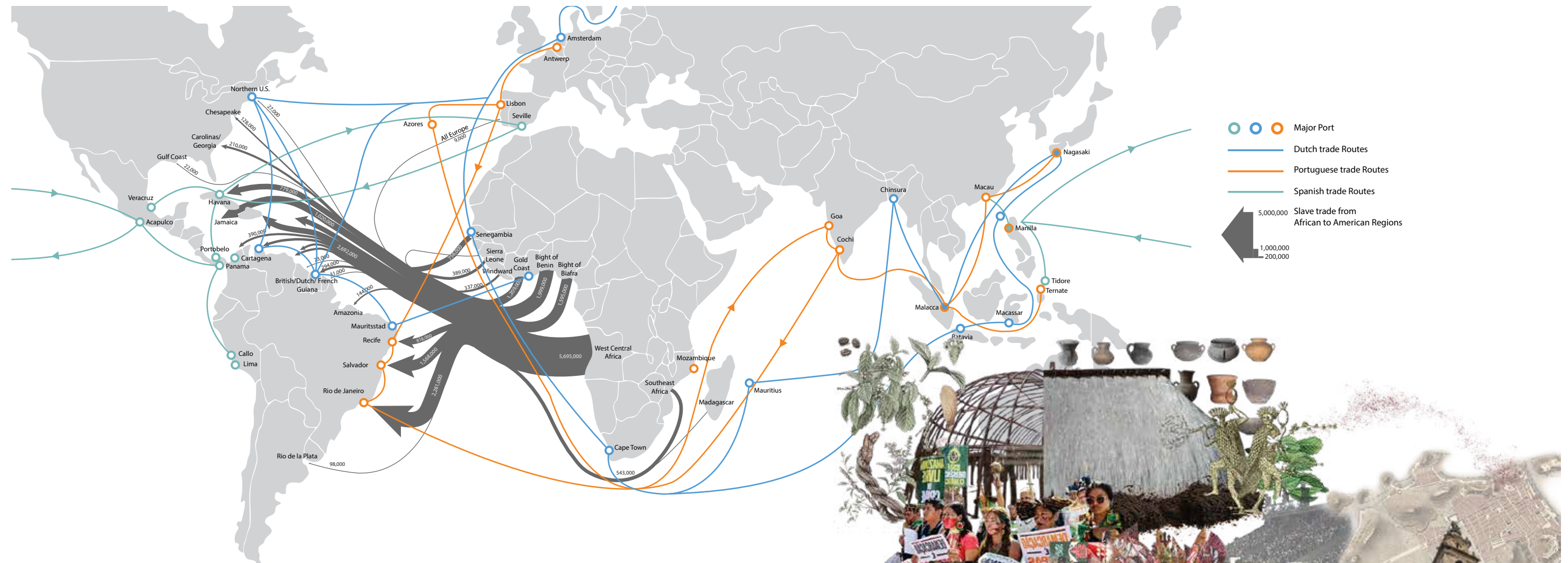
<b>PROGRAM</b>	Cultural center / Adaptive Reuse
<b>LOCATION</b>	Rio de Janeiro, Brazil
<b>INSTRUCTOR</b>	Galia Solomonoff
<b>COLLABORATOR</b>	Chuxi Xiong
<b>YEAR</b>	2024 Spring

*Before diving into our architectural project, we took a deep dive into Rio's population makeup and cultural scene. Over the years, Portuguese colonial rule and the mix of African peoples have shaped Brazil's diverse ethnicity, with Rio standing out for its more balanced racial mix compared to other cities. These demographic traits have heavily influenced Brazil's unique culture. Indigenous and black communities have long used their cultural practices to express themselves and resist colonial oppression.*

*As for our architectural research, we dug into the history of Edifício A Noite and its ties to Brazilian journalism. This building's story is intertwined with Brazil's history of press censorship. Our vision is to transform A Noite into a contemporary hub for information exchange, a place where the voices long silenced by the shadows of censorship can be heard. With the building's top floor formerly housing Radio Rational, we're reshaping it into a sanctuary where marginalized stories, particularly those of Afro-Brazilian and indigenous communities, can thrive.*

*Divided into five distinct sections, each showcasing a different aspect of underrepresented culture and knowledge, A Noite becomes a vibrant mosaic of diversity and self-expression. From dance performances to graphic art galleries, from culinary exploration to video and podcasting studios, every corner of the building pulsates with creativity and exploration.*

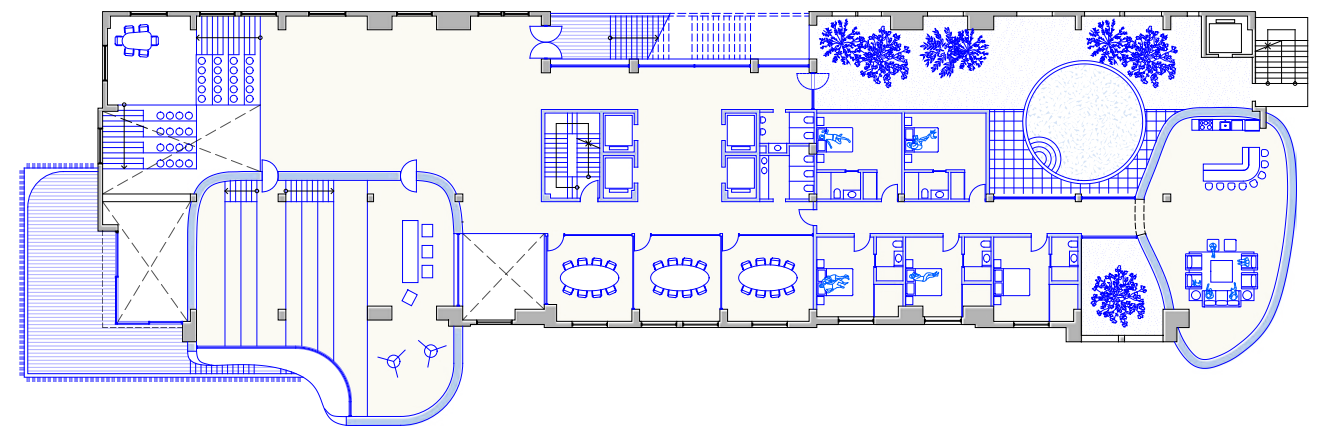
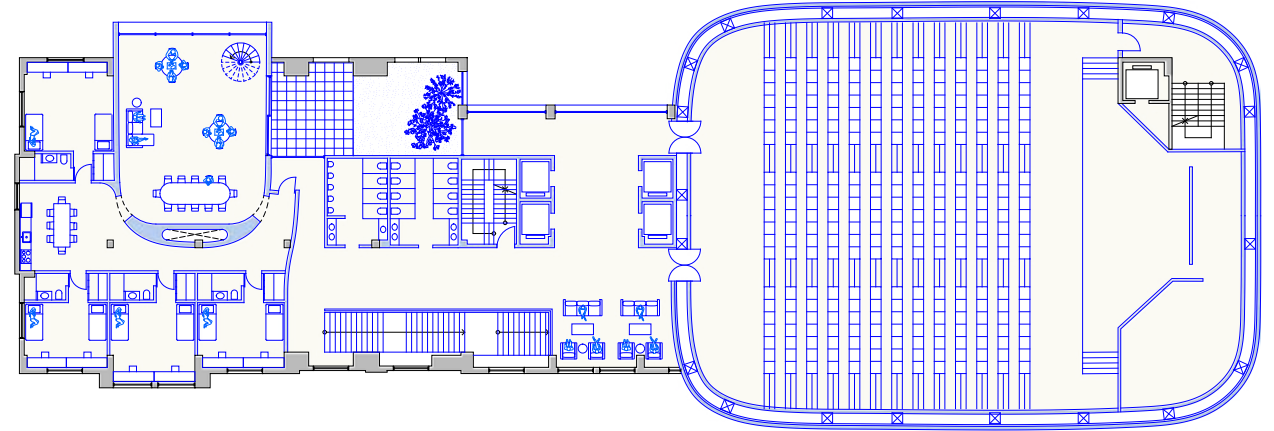
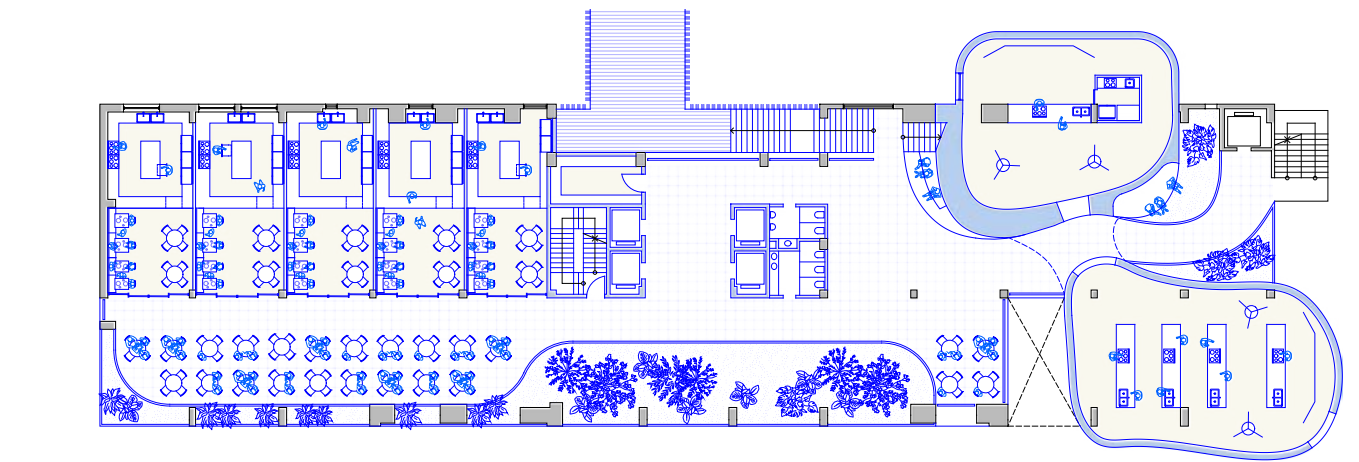
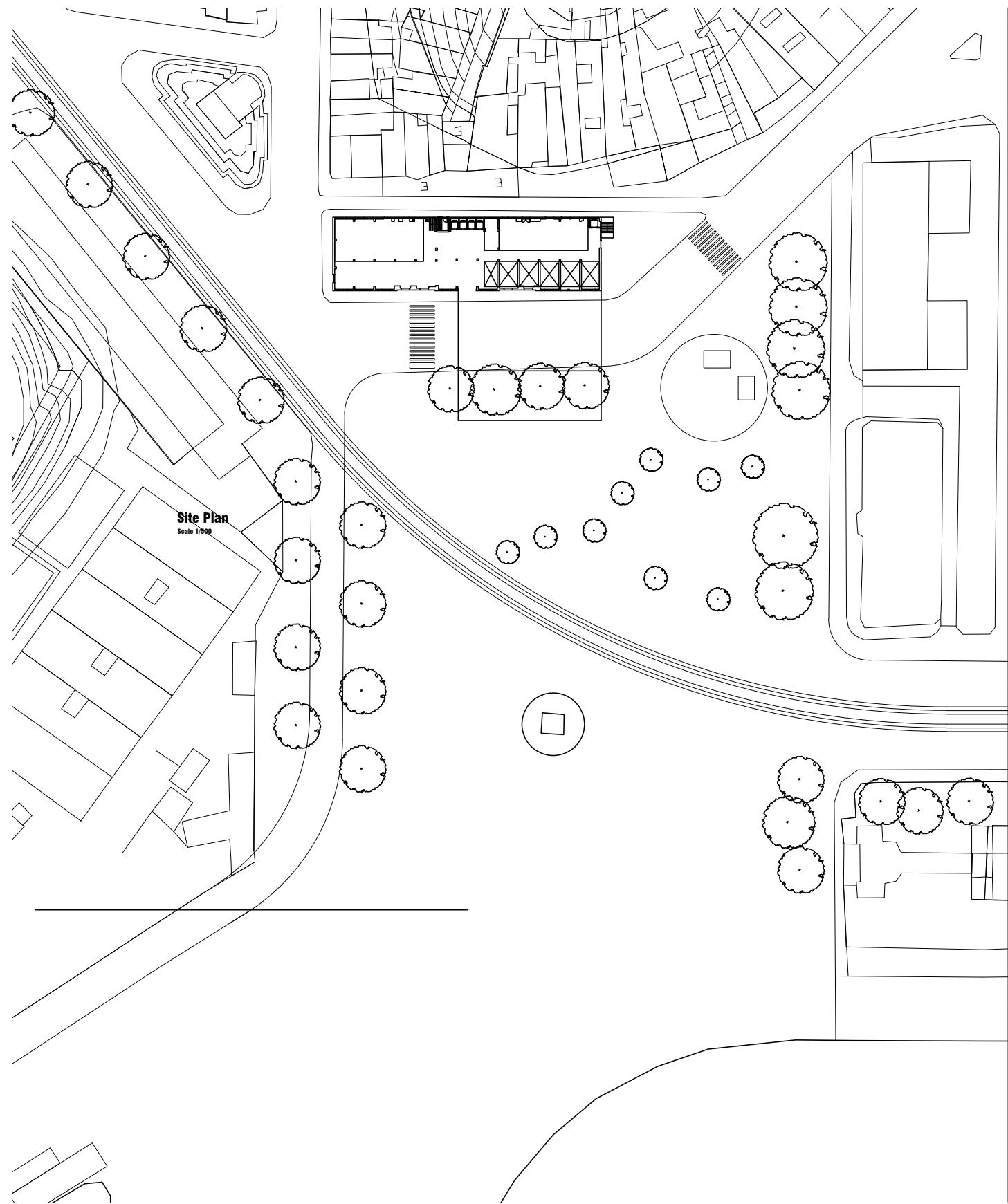
*But A Noite is more than just a structure; it's a bridge between past and present, between silence and expression. Its open atrium and connecting stairs serve as bridges, drawing people from the bustling urban landscape into a space where their stories matter, where their voices resonate. Here, amidst the echoes of history, a new narrative unfolds—one of inclusion, empowerment, and the unyielding pursuit of truth.*

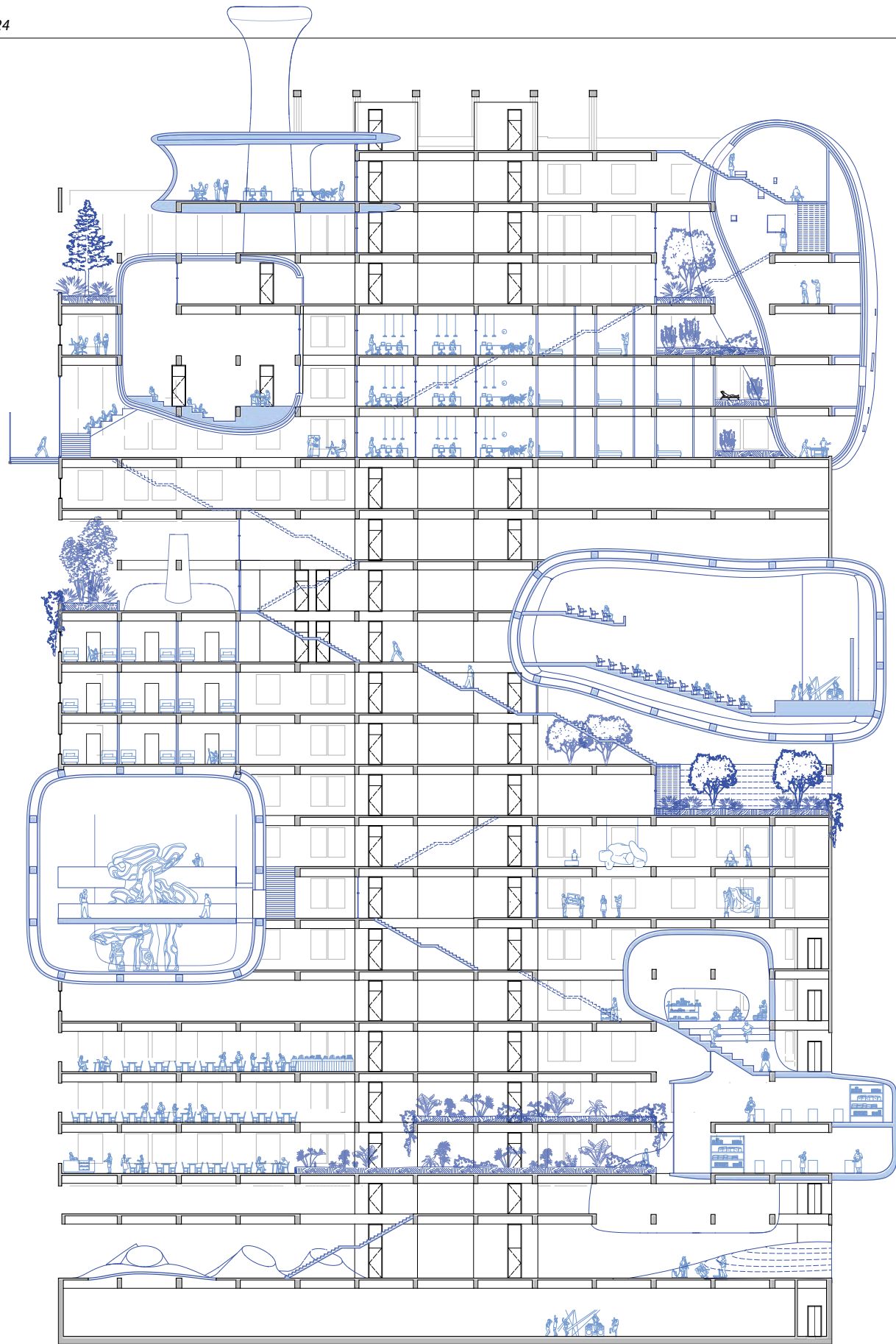


The cultural characteristics of Rio de Janeiro arose as diverse populations migrated here during the colonial period. The Portuguese established their base here, bringing black slaves from the African continent. Indigenous people and black slaves used their culture as a weapon to fight against colonial oppression. Through this, they managed to preserve their identities over the centuries. Over time, their cultures gradually merged, and this fusion has become a driving force in unifying the people of Brazil today. We have carefully examined these cultural characteristics and decided to incorporate them into our project content.

Visitors to the new 'A NOITE' will experience how the cultures of music, dance, food, and art have merged, and they will also sense the painful history underlying these expressions. Furthermore, this space will serve as a gathering place where people can share their personal cultural heritage, interact with neighbors, and strengthen the community spirit of Rio.







The project "Pizzo Sella," designed by Rotor for the Manifesta 12 festival, aims to reintegrate abandoned housing estates as part of the community, noting the historicity of Palermo, Sicily. With minimal intervention, Rotor made unfinished structures a place to feel Palermo's landscape for visitors. From this, Rotor intended to respect the target site's political and social historical values - the illegal process surrounding the development of this site, the intervention of mafia forces, and the government's acquiescence. This project has significant value because Rotor has not repeated the violent development at the site in the past but has restored to residents and visitors.

Manifesta 12 took place in 2018 in Palermo, which has a multi-layered social and cultural history. Palermo was selected as the target site to reconsider the city's socio-economical and cultural structure and to make the informal profile of the city into a place for social change. As one of the projects in Manifesta 12, Rotors minimally intervened in illegally built 1970s housing complexes and considered how to return them to residents.

Italy's social and political problems shaped Pizzo Sella Hill. The phenomenon of unauthorized development arose in the early 20th century due to social and economic contexts, including great poverty and substantial unemployment. Many neighborhoods were built, mostly in coastal areas, with the tacit approval of public administrators. In this context, a 250-acre parcel on Pizzo Sella was bought in the 1970s by Rosa Greco, the sister of a mafia boss. She sold the land to developers, and local officials granted more than 300 building permits in 1977, just days before a new law drastically restricting building went into effect. Construction slowed when local magistrates began investigating the land deals in the late 1980s. In the aftermath of the investigation, most buildings at the construction site remained unfinished. These incomplete constructions permanently altered the hillside, previously designated a nature conservation area.

Rotor's project aimed to reveal the nuances of this local issue by inviting the public to visit the hill, its structures, and the surrounding landscape. They used existing buildings and trails created naturally by the military, local farmers, and wild animals to provide a place to enjoy new scenery. They found a place for visitors to focus on the surrounding nature by utilizing the existing structure. They planned an observatory to harmonize with the surrounding landscape and climate by preserving the materials of the existing buildings, while making subtle improvements to basic structure and accessibility. They also created a bench where people can see the natural environment of Palermo and the unfinished landscape of Pizzo Sella.

Rotor's intervention consisted of modifications such as metal pillars and railings for safety, pedestals for accessibility, and a bench. However, it is a willingness not to repeat violent development on the site by intentionally making minimal intervention in the existing structure. Also, it is the project that the site, forgotten for a long time, includes as a part of the local community with its history as it is.

## 02 Essay : Pizzo sella

**SUBJECT** Transscalarities  
**INSTRUCTOR** Alex Kim  
**YEAR** 2023 Summer



1. Creba, Alison, and Lionel Devlieger. "Deconstructing research: A reverse-engineering methodology and practice." *Architectural Design* 89, no. 3 (2019): 96-101.
2. Garda, E. M. I. L. A., Marika Mangosio, and Mudanò Giuseppe. "The injured coast. The degradation of the Italian coastal landscape between unauthorized development, eco-mafia and regulations." In *Conservation and promotion of architectural and landscape heritage of the Mediterranean coastal sites*, pp. 69-69. Franco Angeli, 2017.
3. Sarah Delaney, "Italy restores its landscape," *The Washington Post*, November 28, 1999, <https://www.washingtonpost.com/archive/politics/1999/11/28/italy-restores-its-landscape/8197b6ff-6ccb-4f2f-b8de-2658000358a3/#comments>



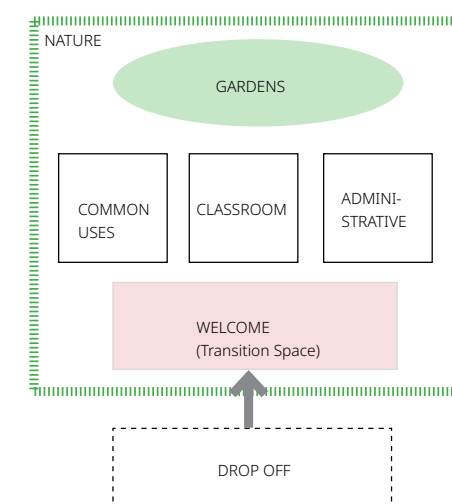


### 03 DESIGNING SPACE FOR CHILDREN

**PROGRAM** Kindergarten  
**LOCATION** Seoul, Korea  
**INSTRUCTOR** Anna Knoll  
**COLLABORATOR** Jungyeon Yang, Doyeon Kim  
**YEAR** 2023 Fall

*Architecture for children must be designed in alignment with their developmental stages, resulting in unique layouts. Not only the layout but also the choice of materials can significantly impact children's psychological states, necessitating careful selection during the design process. This project is tailored for children transitioning from home to kindergarten for the first time. To help them adapt more easily to this potentially stressful change, the design focuses on spatial arrangement, scale, materials, and connections with outdoor spaces.*

*To fine-tune the transition from intimate, private spaces scaled to children's physical dimensions to brighter, more open areas where they can interact with teachers and peers, various layouts have been studied. Materially, the design incorporates natural motifs that support psychological development, utilizing biogenic materials like CLT (Cross-Laminated Timber), plywood, and cork. These materials were chosen to provide sensory comfort—visual, tactile, and auditory—to the children, facilitating a smoother transition into kindergarten life.*









## 04 REVERTING WASTE COLONIALISM

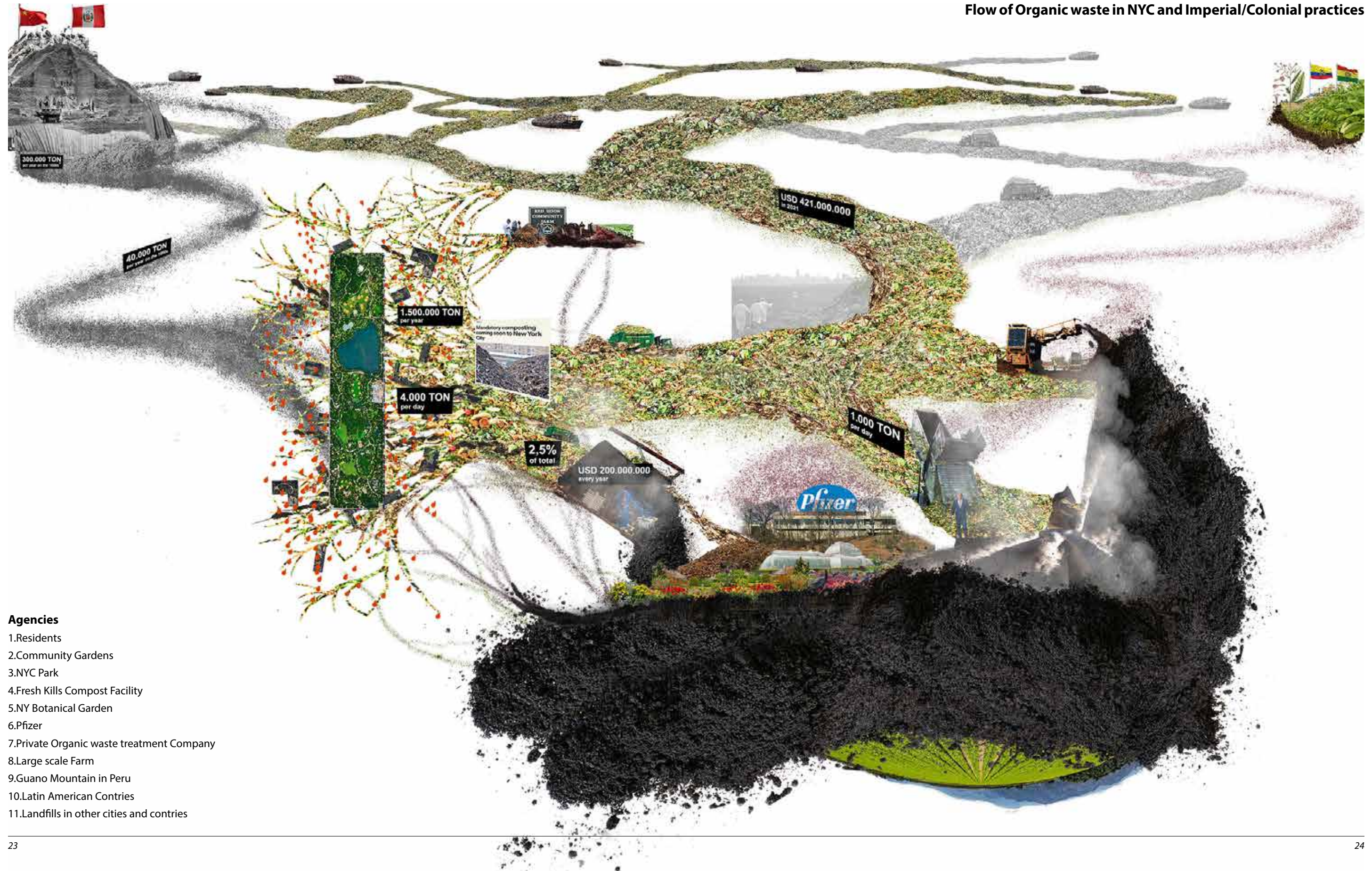
<b>PROGRAM</b>	Infrastructure
<b>LOCATION</b>	Fresh Kills Landfill / Central Park, New York
<b>INSTRUCTOR</b>	Nerea Cavillo
<b>COLLABORATOR</b>	Pedro Pablo Gonzales
<b>YEAR</b>	2023 Summer

*For over 50 years, the massive organic waste of NYC had been dumped in the Fresh Kills landfill. After it closed, this material keeps getting there where is used to making compost and to export the useless part far from the city benefiting big companies of waste management and paying to poor states and countries to receive it.*

*The compost is sold for profit and to supply –among others– the NY Botanical Garden who has Pfizer as sponsor and extract tobacco species from Latin-American countries to profit; and Central Park who extracted thousand tons of guano from Perú Islands –using Chinese people as slaves– to fertilize the land and build the greener and most iconic park in NY, increasing the surrounding buildings’ wealth.*

*To recompose the colonial and imperial practices and histories, the large-scale organic waste management prototype seeks redistributing the management, production, and use of organic waste and compost in Central Park. To this, new compost system façades are installed in the surrounding buildings and the ready-to-use compost –beside the other organic waste of the city – is transported and distributed through a movable modular structure to Sheep Meadow. Here, the waste and compost are used for conservancy and research plants in green houses led by NY Botanical Garden and Pfizer, to build farms for Peruvian and Chinese communities, and to build a monument that symbolizes Guano Island mountain. By 2070 when compost mountain equals guano mountain, people will commemorate the 200th anniversary of the end of guano extraction. Through the intervention, organic waste is permanently processed and kept where it is produced, preventing waste colonialism and making visible what it takes to do so.*

### Flow of Organic waste in NYC and Imperial/Colonial practices



#### Agencies

1. Residents
2. Community Gardens
3. NYC Park
4. Fresh Kills Compost Facility
5. NY Botanical Garden
6. Pfizer
7. Private Organic waste treatment Company
8. Large scale Farm
9. Guano Mountain in Peru
10. Latin American Countries
11. Landfills in other cities and countries

Sensing the colonial history through waste management system

Full Video



*'Trash Peaks,' designed by Design Earth, commissioned for the Seoul Biennale of Architecture and Urbanism in 2017, is the project that placed the undesired waste matters within the geography of Seoul and its surrounding landscape. This project suggested that there is no mythical outside in which the unwanted consequences of industrial and economic life could disappear from view, and alerted people about how to deal with waste issues.*

*Design Earth proposed this project to shift public debates toward waste management systems. Traditional waste management system is that garbage must be kept out of sight as a factually repugnant entity. Design Earth cited "Matters of fact" and "Matters of concern" called by Bruno Latour to propose a new attitude toward the waste disposal system. "Matters of concern" is what happens to "matters of fact" -when you add to it its whole scenography, much like you would do by shifting your attention from the stage to the entire machinery of a theater. By situating waste in the city environment, this project not only stages the issue but also destabilizes how the waste management holds together.*

*Citing Seoul's characteristic areas, Design Earth proposed a design to dispose of waste in the city by combining its geographical context with the characteristics of ecological context and generated waste. For example, 'The Methane Aviary' project dealt with the context of Nanjido, which was a vital landfill in Seoul. Before it became a landfill, it was a significant place for winter migratory birds. However, this ecological value was destroyed since the city government designated it as a landfill for Seoul's waste from 1978 to 1993. Design Earth reflected Nanjido's history and environmental characteristics in the project by excavating a mountain of garbage in Nanjido to reveal waste disposal and create a habitat for birds using existing methane pipes.*

*Design Earth suggested that a terrarium of the Anthropocene might help conceptualize an increasingly troubled relationship with the Earth and draw attention to future fossil strata. Through their cross-sectional diagrams, people can become aware of this relationship by seeing the territories of municipal waste throughout history. They showed in each section the waste created by various human activities and their environmental impact: contaminated underground water in The Leachate Cenotaph, waste from decommissioned landfill in the Janus Bukhansan, construction waste of Seoul in the Towering Construction, plastic waste generated from toy industry in the Platishpere, and E-waste form Yongsan electronics market in the E-Fungi Volcano.*

*Today's Anthropocene was created by indiscriminately dumping garbage and waste created by human activities while removing it in front of our eyes. Design Earth contemplated how to dispose of the garbage in the city with the attitude of "Staying with trouble" rather than putting the garbage generated in the city out of sight. The 'Trash Peaks' project is meaningful in that it raises awareness of what kind of ethical attitude should be taken in the Anthropocene, going beyond the garbage disposal problem in the future.*

## 05 Essay : TRASH PEAK

<b>SUBJECT</b>	Transscalarities
<b>INSTRUCTOR</b>	Alex Kim
<b>YEAR</b>	2023 Summer

1. Ghosn, Rania, and El Hadi Jazairy. "Trash Peaks: A Terrarium of the Anthropocene." *Architectural Design* 90, no. 1 (2020): 32-37.
2. Bruno Latour, 'Spinoza Lecture II: The Aesthetics of Matters of Concern', in *What is the Style of Matters of Concern? Two Lectures in Empirical Philosophy*, Van Gorcum (Assen), 2005, pp 27-50, at p 39: <http://bruno-latour.fr/sites/default/files/97-SPINOZA-GB.pdf>.
3. "Nanjido migrate habitats," Google, last modified July 21, 2023, <https://rrf.seoul.go.kr/content/acwad144.do>
4. Ghosn, Rania, and El Hadi Jazairy. "Trash Peaks: A Terrarium of the Anthropocene." *Architectural Design* 90, no. 1 (2020): 32-37.

### **Water garden designed by Junya Ishigami**

*Designed by Junya Ishigami, Water Garden is a project to create a new ideal forest by transplanting trees from nearby woods and arranging artificial ponds. This project raises questions about the boundary between natural and artificial environments and how to preserve nature. In addition, through the new nature elaborately controlled by humans, the history inherent in the site is overlapped unnaturally to give a new perception.*

*The first question is about the attitude toward the environment. This work looks like a beautiful natural forest. Still, artificial landscaping mobilized the architect's thoroughly intentional arrangement, transplanting trees, and high-level construction technology to create a pond. The architect emphasized that he made the landscaping by reusing these trees to show respect for the environment. However, construction methods were inevitably mobilized that cut down the roots of existing trees, eroded the existing soil, and destroyed the habitats of existing organisms that had lived there for a long time through human intervention. In this context, is the project for the environment, as the architect said? Can this landscape, which embodies the landscape of the architect's imagination, be called 'Nature'?*

*The many trees were transplanted from adjacent property, originally a heavily wooded satoyama (an area between foothills and arable flat land) which was going to be developed into premium villas and a new restaurant. For the construction, all existing trees had to be removed. The architect wanted to create a unique landscape using these trees to preserve them. Although some destruction of the existing environment was unavoidable for the project, to uproot the trees without damaging them, a particular machine, only two in Japan, was deployed to move four trees in one day. He wanted to create a balance between ponds, moss, and trees so that various biota could live in the future.*

*A new landscape was created using natural elements on the site for a long time. An artificial pond was created using a water gate that had existed for a long time, and moss, one of the site's natural features, was placed like a pond. Lastly, trees from the nearby forest were moved and planted to create a landscape combining the three elements, and people were invited to this place. He tried to show a new relationship by creating a unique nature that overlaps my imagination and the site's natural elements and offering a new landscape that people have not seen in the existing nature. Paradoxically, by creating the new nature in a highly artificial way, a new landscape that has never been seen before has been completed. Over time, the fact that it is artificial nature will gradually fade as layers of new aquatic plants and animals are piled up.*

## **06 Essay : Controlled Nature**

<b>SUBJECT</b>	Argument
<b>INSTRUCTOR</b>	Javairia Shahid
<b>YEAR</b>	2023 Summer

*The second question is a contradiction between natural elements, species of trees, and ponds. Moving and rearranging trees are deciduous trees, such as beech, Quercus, etc. These tree species cannot coexist with water close to the natural environment. This coexistence and a new relationship that never existed are created by applying waterproofing in the ponds. In this context, why did the architect choose the natural environmental element, water, even though he had to control nature highly?*

*He created a water pond to trace the site's history, the sluice gate. He chose the technical waterproofing solution to resolve the conflicts due to tree species' characteristics. In the interview with the architect, he responded that he sought to integrate a lot of shapes and different perspectives rather than presenting a single answer or an initial point. Therefore, in the process of putting diverse design elements simultaneously, tension and contradiction between elements can arise.*

*Junya Ishigami's attitude provide new insights through nature. His way of respecting nature can seem absurd if you consider it conservatively. However, we can see an attempt to balance the gesture of preserving nature with the designer's attitude about creating a new landscape, what emotions people will feel in this landscape, and what kind of space for a new creature. In addition, we can see how 'Controlled Nature' affects the environment and people in his attitude to preserve physical nature and the cultural and regional environment while preserving the local context and natural elements together.*



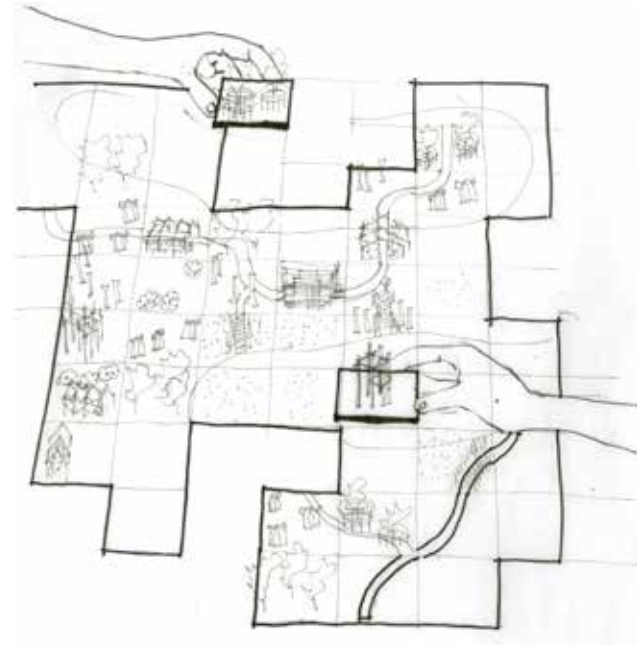


# 07 REWILDING MANMADE NATURE

**PROGRAM** Landscape  
**LOCATION** Marine park, New York  
**INSTRUCTOR** Marc Tsurumaki  
**YEAR** 2023 Fall

*Marine Park in Brooklyn, like other landfills in New York, was developed by dumping garbage. Originally a wetland habitat for diverse species, a significant portion was destroyed during developmental phases and is now used as a park for human recreation. As environmental and ecological awareness has grown over time, the government began restoration efforts in 2000s to revive the original environment, with many residents volunteering and showing interest. Due to these efforts, a considerable number of native species now inhabit Marine Park. Paradoxically, however, 50% of the park is currently being used as a public golf course.*

*The project began in the gap between this reality and the ideal. How can the space of the golf course, previously occupied by a minority of humans, be returned to the native species, including humans? What should be the role of humans in this process? This inquiry seeks to balance human recreational needs with ecological restoration, questioning the integration of conservation and public utility in urban environments.*



-17 C

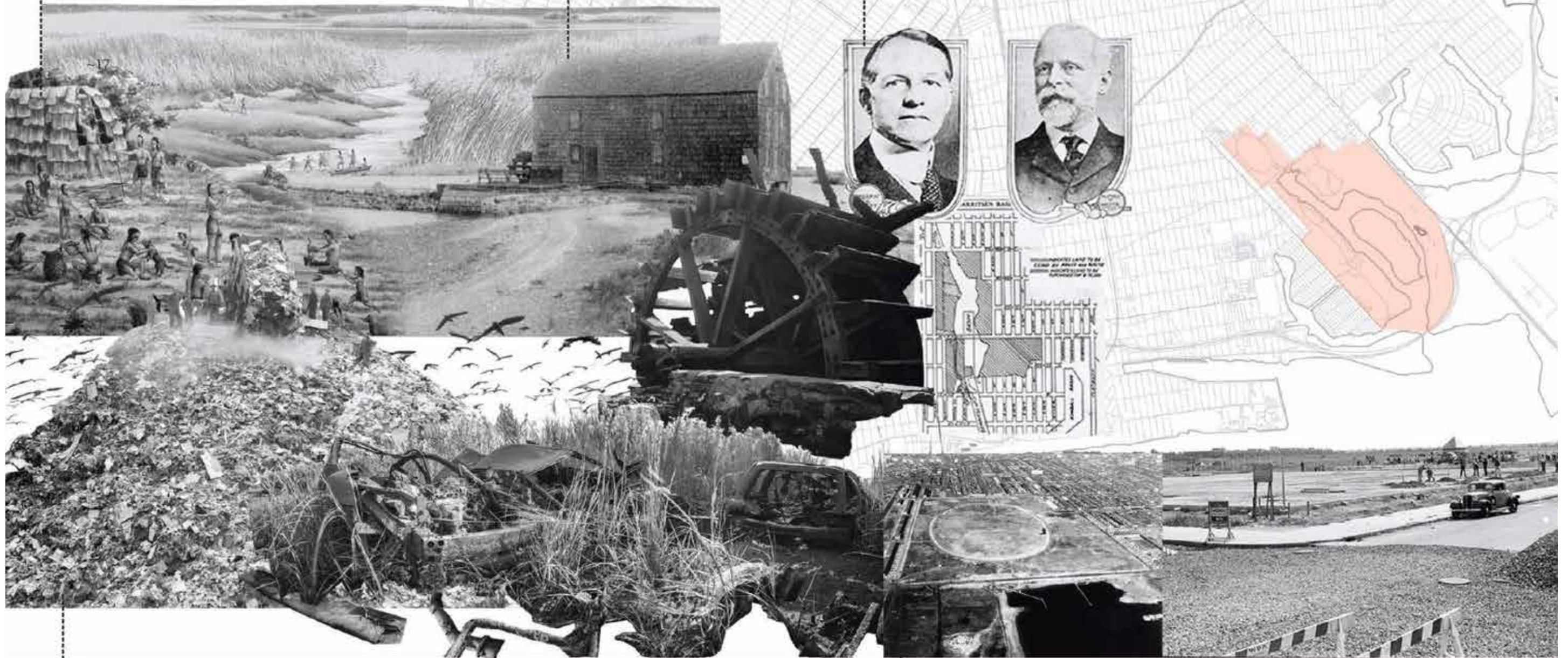
Gerritsen Creek was a popular hunting and fishing spot for Native Americans living nearby. The first Europeans to settle in the area were the Dutch.

17 C

Dutch colonist Wolfert Gerritsen, who built a gristmill and a field house on the creek in the latter half of the 17th century, serves as the namesake of Gerritsen Creek.

1917

In the early 1900s developers began making elaborate plans to turn Jamaica Bay into a port, dredging Rockaway channel to allow large ships to enter the proposed harbor. Speculators anticipated a real estate boom and bought land along the Jamaica Bay waterfront. Philanthropists Frederick B. Pratt and Alfred T. White gifted the city 150 acres in the area for use as a park in 1917, fearing that the relatively pristine marshland around Gerritsen Creek would be destroyed.

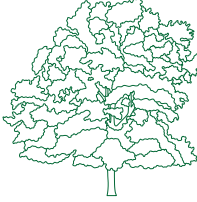





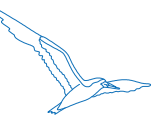


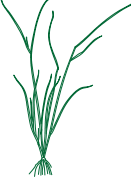
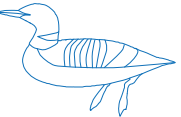



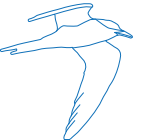



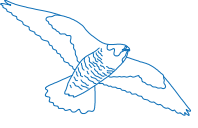



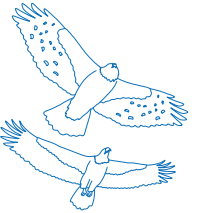



1930s

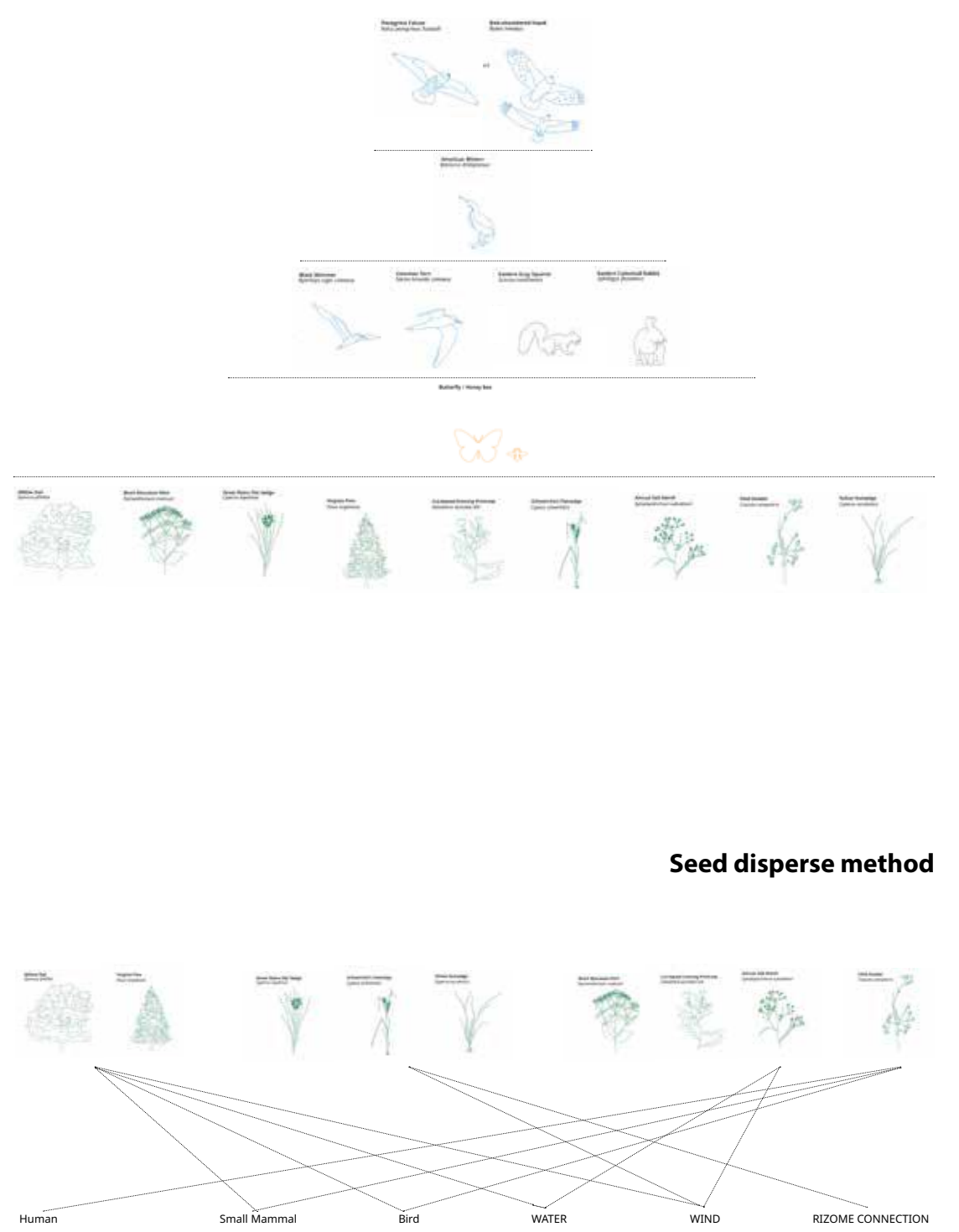
With ocean dumping banned in New York City by the Supreme Court, Moses decided to take the city's trash to fill in marshlands. Using this method, he created Marine Park. Robert Moses also layered sand on top of the garbage, came from the excavation of the Belt Parkway, another Moses initiative.

Over the decades, portions of Marine Park have been improved with recreational facilities. An environmental restoration was supposed to have started in the late 1990s. Despite a decade delay, work commenced in the last decade, and in recent years, some of the grasslands and marshes have been restored to the island.

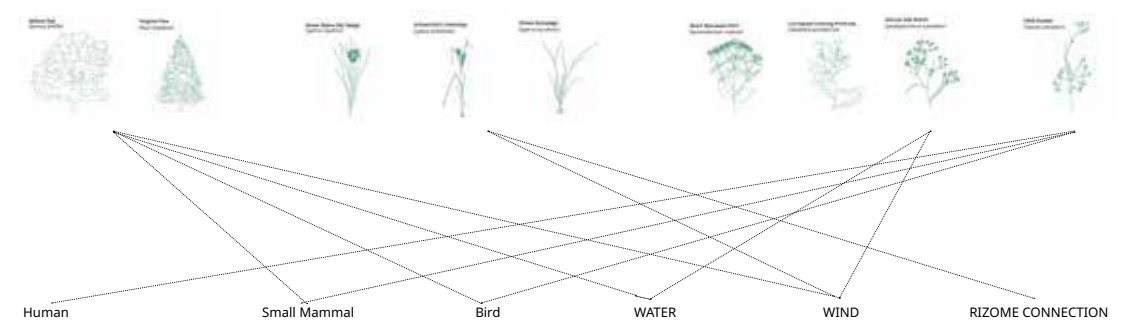
### Native species in Marine Park

<p><b>Willow Oak</b> <i>Quercus phellos</i></p>  <p><b>Requirement</b> Full sun to light shade well-drained soil dry soil</p> <p><b>Threats</b> Wind / pest / disease</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Bird / Small Mammal / Wind / Deer</p>	<p><b>Great Plains Flat Sedge</b> <i>Cyperus lupulinus</i></p>  <p><b>Requirement</b> Full sun to light shade Sandy soil Open Plain</p> <p><b>Threats</b> Construction</p> <p><b>Pollinator</b> Wind</p> <p><b>Agent of seed dispersal</b> Wind / Underground rhizomes</p>	<p><b>American Bittern</b> <i>Botaurus lentiginosus</i></p>  <p><b>Requirement</b> Freshwater / Salt marsh wetland emergent vegetation for nesting</p> <p><b>Diet</b> Fish / Clayfish / Small Mammal</p> <p><b>Migration</b> 5-7 / Breeding</p> <p><b>Threats</b> Loss of nesting area (greater than 10 ha)</p>	<p><b>White-Tailed Deer</b> <i>Odocoileus virginianus</i></p>  <p><b>Requirement</b> Full sun to light shade</p>
<p><b>Virginia Pine</b> <i>Pinus virginiana</i></p>  <p><b>Requirement</b> Full sun well-drained soil dry soil / clay soil</p> <p><b>Threats</b> Wind / pest / disease</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Bird / Small Mammal / Wind / Deer</p>	<p><b>Schweinitz's Flatsedge</b> <i>Cyperus schweinitzii</i></p>  <p><b>Requirement</b> Full sun Sandy Soil Beach / Lake / Stream</p> <p><b>Threats</b> Woody vegetation / Invasive species</p> <p><b>Pollinator</b> Wind</p> <p><b>Agent of seed dispersal</b> Wind / Underground rhizomes</p>	<p><b>Black Skimmer</b> <i>Rynchops niger Linnaeus</i></p>  <p><b>Requirement</b> Full sun Open Sandy beach Foraging Area</p> <p><b>Diet</b> Small Fish / Small Invertebrates and Crustaceans</p> <p><b>Migration</b> 4-11 / Breeding</p> <p><b>Threats</b> Loss of nesting area / Predator / Human disturbance</p>	<p><b>Eastern Cottontail Rabbit</b> <i>Sylvilagus floridanus</i></p>  <p><b>Requirement</b> Full sun to light shade</p>
<p><b>Annual Salt Marsh</b> <i>Symphyotrichum subulatum</i></p>  <p><b>Requirement</b> Full sun Salt pond / Maritime dunes / fresh marshes</p> <p><b>Threats</b> Invasive common reed Deer / Ditching of Salt marshes</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Small Mammal / Wind</p>	<p><b>Yellow Nutsedge</b> <i>Cyperus esculentus</i></p>  <p><b>Requirement</b> Full sun Moist / Sandy Soil cultivated field / Pasture</p> <p><b>Threats</b> -</p> <p><b>Pollinator</b> -</p> <p><b>Agent of seed dispersal</b> Underground rhizomes</p>	<p><b>Common Loon</b> <i>Gavia immer</i></p>  <p><b>Requirement</b> Lake / Reservoir Small islands (less than 5 ha) / Buffer Zone (150m)</p> <p><b>Diet</b> Fish / Clayfish</p> <p><b>Migration</b> Year-around</p> <p><b>Threats</b> Water pollution / Human disturbance / Flood / Predator</p>	<p><b>Groundhog</b> <i>Marmota monax</i></p>  <p><b>Requirement</b> Full sun to light shade</p>
<p><b>Blunt Mountain Mint</b> <i>Pycnanthemum muticum</i></p>  <p><b>Requirement</b> Full sun to light shade Wet / Sandy / Coastal Plain pond / Swamp</p> <p><b>Threats</b> Construction Run-off</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Water / Wind</p>	<p><b>Spotted Horse Mint</b> <i>Pycnanthemum muticum</i></p>  <p><b>Requirement</b> Full sun to light shade Moist / Wet soil Prairie / FloodPlains / Stream bank</p> <p><b>Threats</b> Construction Run-off</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Water / Wind</p>	<p><b>Common Tern</b> <i>Sterna hirundo Linnaeus</i></p>  <p><b>Requirement</b> Beach / Marsh / Lake Discouraging gull colonies (String Grid Structure) Sandy open areas with vegetation for nesting</p> <p><b>Diet</b> Small Fish / Small Invertebrates and Crustaceans</p> <p><b>Migration</b> 4-11 / Breeding</p> <p><b>Threats</b> Human disturbance / Loss of nesting area / Sea-level Rise</p>	<p><b>Eastern Gray Squirrel</b> <i>Sciurus carolinensis</i></p>  <p><b>Requirement</b> Full sun to light shade</p>
<p><b>Cut-leaved Evening Primrose</b> <i>Oenothera laciniata Hill</i></p>  <p><b>Requirement</b> Full sun to light shade Dry / Sandy soil Successional old field</p> <p><b>Threats</b> Construction</p> <p><b>Pollinator</b> Butterfly / Bee</p> <p><b>Agent of seed dispersal</b> Wind</p>	<p><b>Tall Ironweed</b> <i>Vernonia gigantea</i></p>  <p><b>Requirement</b> Full sun to light shade Dry / Sandy / Rocky soil Prairie / FloodPlains / Stream bank</p> <p><b>Threats</b> Specific Insects</p> <p><b>Pollinator</b> Butterfly / Bee</p> <p><b>Agent of seed dispersal</b> Wind / Underground rhizomes</p>	<p><b>Peregrine Falcon</b> <i>Falco peregrinus Tunstall</i></p>  <p><b>Requirement</b> Holes on the faces of rockycliffs Open areas with plentiful prey</p> <p><b>Diet</b> Bird / Insect</p> <p><b>Migration</b> Year-around</p> <p><b>Threats</b> Human disturbance (climbing) / Chemical Contamination</p>	<p><b>Virginia Opossum</b> <i>Didelphis virginiana</i></p>  <p><b>Requirement</b> Full sun to light shade</p>
<p><b>Field Dodder</b> <i>Cuscuta campestris</i></p>  <p><b>Requirement</b> Host plant Stream bank Edge of Wetland</p> <p><b>Threats</b> Red light</p> <p><b>Pollinator</b> Butterfly / Bee</p> <p><b>Agent of seed dispersal</b> Water / Human / Small mammal / Bird</p>	<p><b>Stiff-leaved Goldenrod</b> <i>Solidago rigida</i></p>  <p><b>Requirement</b> Full sun to light shade Dry / Sandy / Rocky soil Grassland Slope / Successional old field</p> <p><b>Threats</b> Construction / Woody vegetation</p> <p><b>Pollinator</b> Butterfly / Bee / Bird</p> <p><b>Agent of seed dispersal</b> Wind</p>	<p><b>Red-shouldered Hawk</b> <i>Buteo lineatus</i></p>  <p><b>Requirement</b> Holes on the faces of rockycliffs Open areas with plentiful prey</p> <p><b>Diet</b> Bird / Insect</p> <p><b>Migration</b> Year-around</p> <p><b>Threats</b> Human disturbance (climbing) / Chemical Contamination</p>	<p><b>Butterfly / Honey bee</b></p>  <p><b>Terrain Typology</b> ● Woodland ● Plain ● Fresh Water Marsh ● Salt Water Marsh</p>

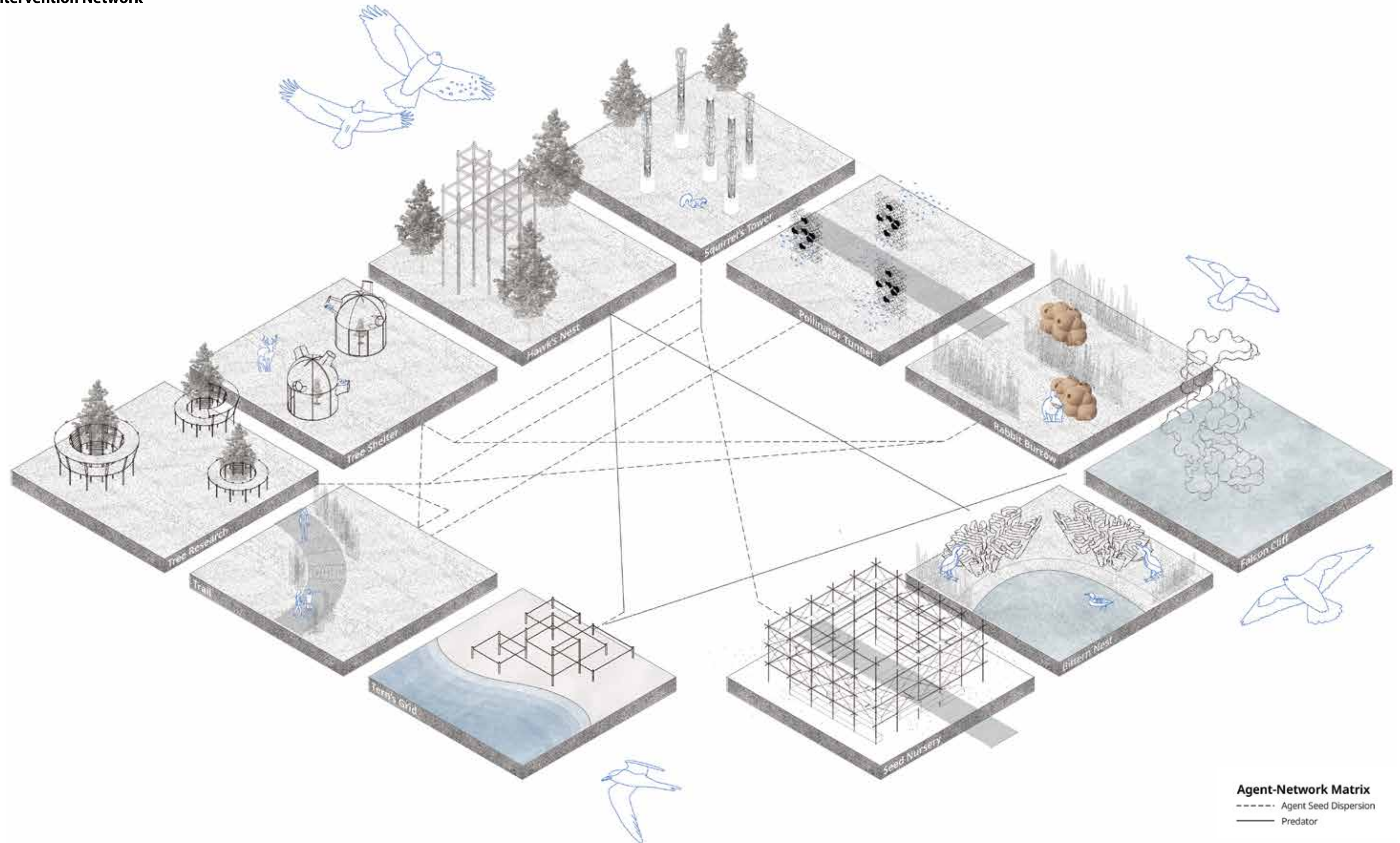
### Hierarchy of Native Species in Marine Park



### Seed disperse method



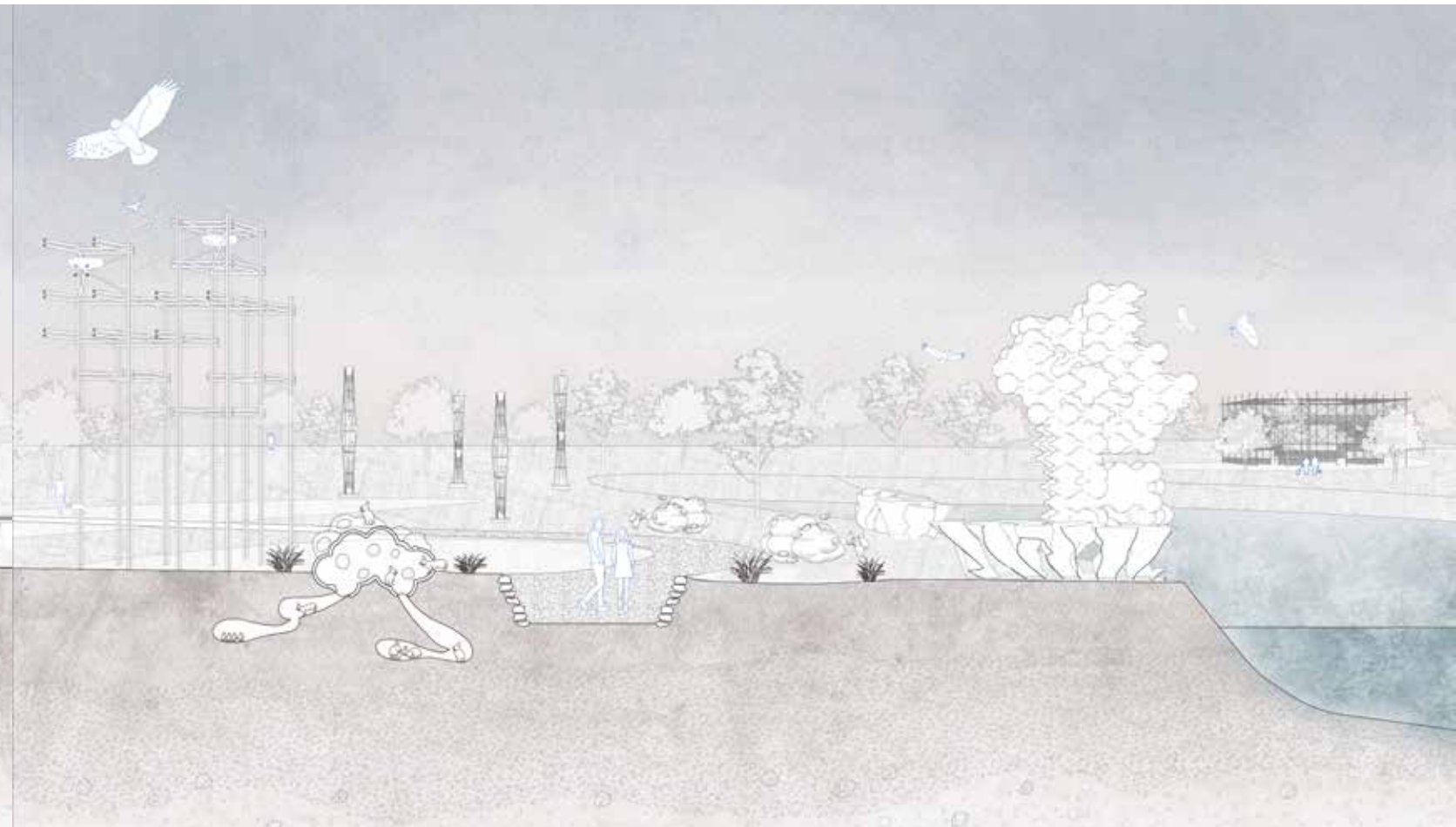
### Intervention Network



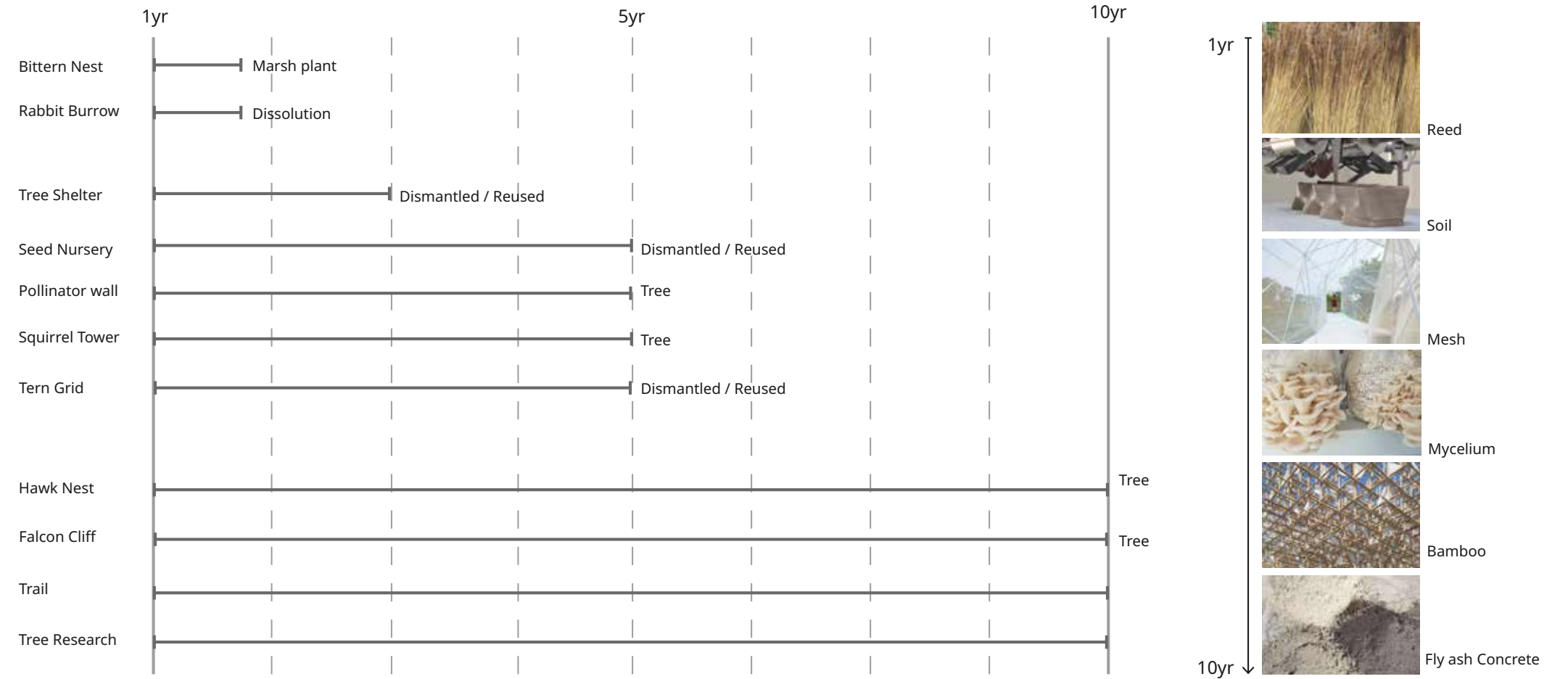
Site plan



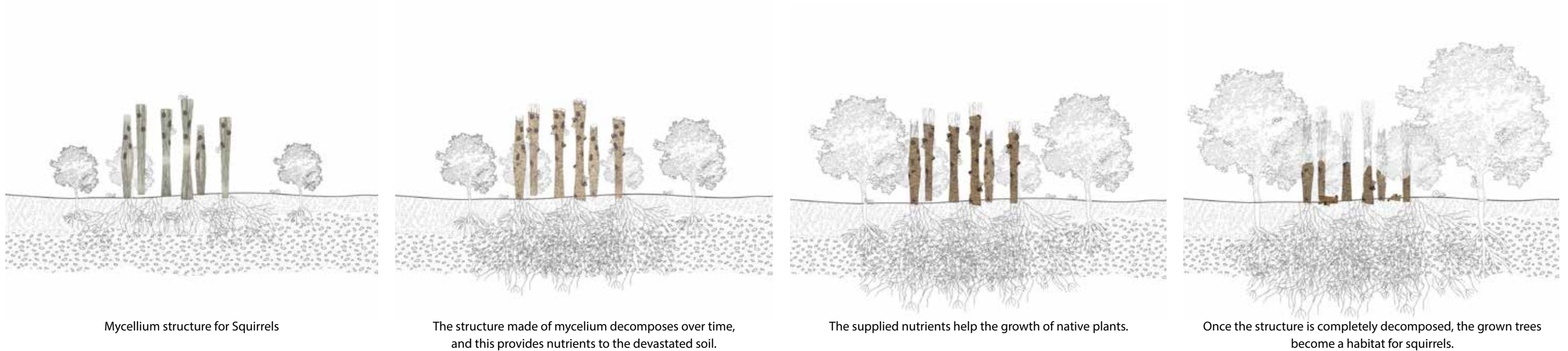
Iterations



**Material by Timescale**



**Decomposition of Material**





## 08 POROUS NEST

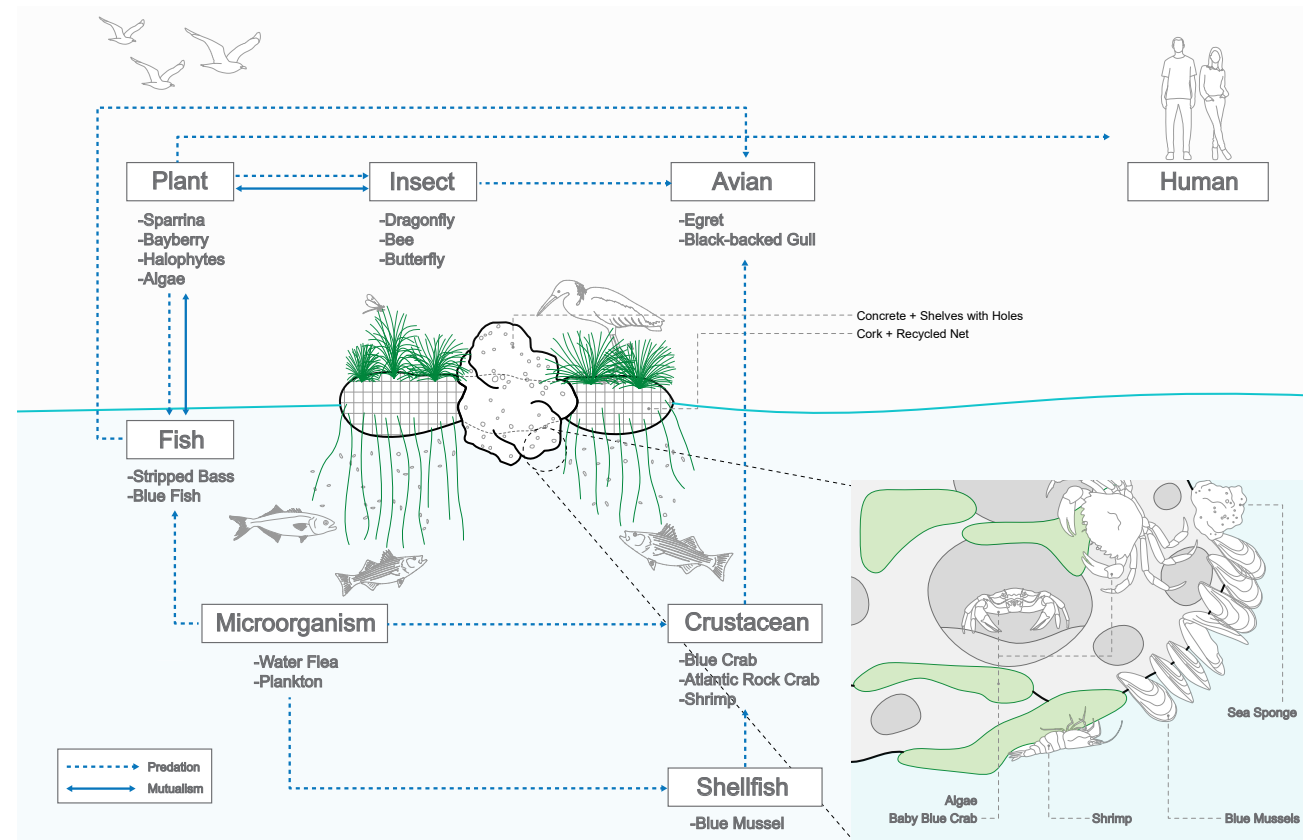
<b>PROGRAM</b>	Landscape Installation
<b>LOCATION</b>	RETI Center, New York
<b>INSTRUCTOR</b>	Emily Bauer-Cieslikiewicz
<b>COLLABORATOR</b>	Joonbae Seo
<b>YEAR</b>	2023 Fall

*We propose a floating landscape that can simultaneously provide habitat for marine animals (fish, marine invertebrates, shellfish) and land animals and plants (Birds, Insects, and plants) that inhabit the RETI Center site. The central structure, which provides a habitat for marine life in the floating landscape, is made of a porous mass like the basalt structure. Algae, sponges, fish, and shellfish can live on the surface, and the holes in the mass provide an environment where small crustaceans can live.*

*The wings surrounding the central structure allow the central structure to float on the water and simultaneously serve as a space for birds and plants. The upper part is a tube structure filled with cork using waste netting. Planting plants creates a virtuous cycle between birds, plants, and insects. The habitats of marine organisms and the habitats of terrestrial organisms are closely connected through a porous mass.*

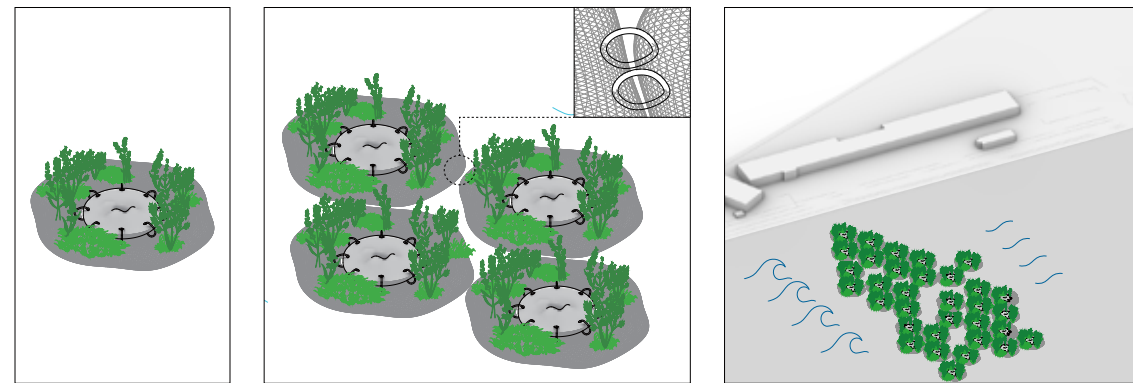
*As the diagram indicates, various biological groups provide each other's habitat and form a feeding relationship. Through the process of this system and the nutrients created between it, marine water quality will be improved, and it will play a role in increasing the value of the coastal area through food supply (plants) for local communities and landscape design.*

**Concept Diagram**

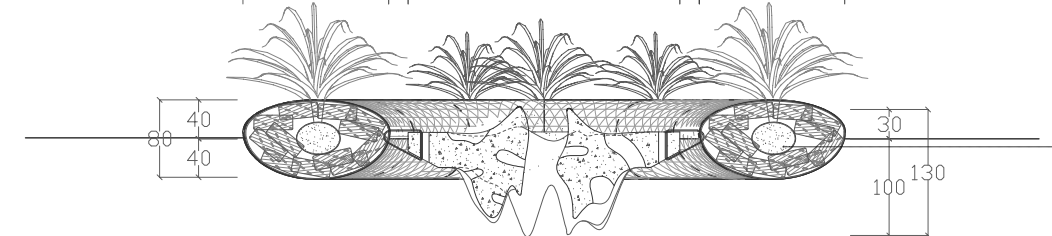
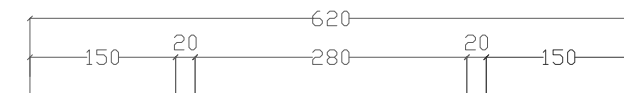
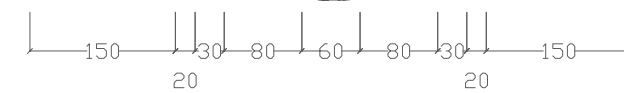
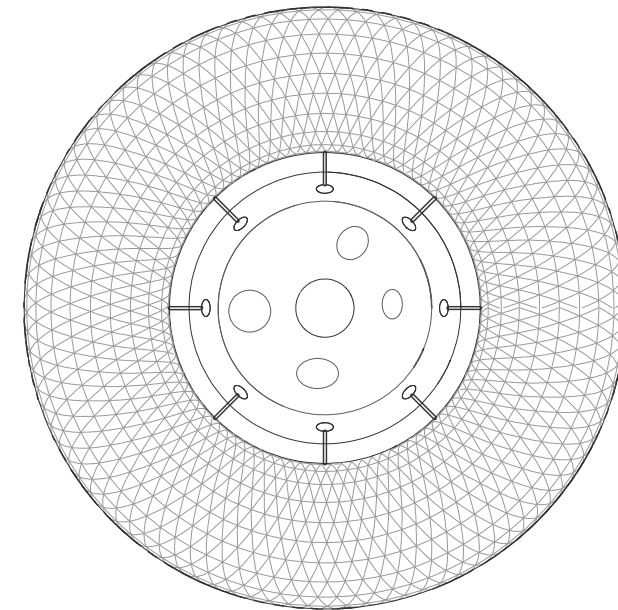
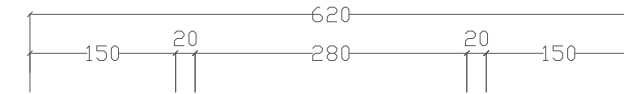


**Drawings**

**Scalability**



<b>The number of structure (Aggregation)</b>	1	2~10	11~		
<b>Location</b>	Shore and Pond with little flow Flushing Meadow Corona Park	Ocean with small wave Red Hook Pier	Need Artificial Island to block strong wave Marine Park Gerritsen Creek		
<b>Stability</b>	0	Single Island	Family Island	Bio-Breakwater Island	100 %
<b>Water Purification &amp; Biodiversity</b>	0	Single Island	Family Island	Bio-Breakwater Island	100 %





**Fabrication Process**



3d printed mold  
putting foams to shape the holes for aquatic species  
casting concrete with sea shells to reduce the weight  
adding cork tubes around the concrete casting for buoyancy



## 09 Essay : Practicing Uncertainty

**SUBJECT** Practicing Uncertainty  
**INSTRUCTOR** Mario Gooden  
**YEAR** Fall 2024

*Klaus Jacob's lecture offered a thought-provoking take on the climate crisis and the ever-rising global temperatures. His graphs effectively highlighted the challenges of adapting to these climatic shifts and the necessary architectural adjustments, particularly relevant to future urban development.*

*His assertion that 'cities are not permanent' brought a fresh perspective to a concept we have encountered before, shedding new light on its implications within politics and economics. The notion that cities need not be permanent fixtures prompts reflection on the ever-evolving nature of urban infrastructure. His thoughts regarding the city's infrastructure as a failing element that needs to adapt to the global environmental crisis are highly relevant, especially for architects who navigate the intersection of various global tensions, encompassing politics, the environment, and society, and how they influence the design process.*

*It triggers this notion of what is ephemeral and how the city can constantly adapt to push specific systems of deployment, which can effectively create an architecture that heals the effects of a post-industrial society. He proposes to elevate subway entrances to address street flooding. This innovative approach suggests the potential to bolster the city's capacity to withstand the escalating challenges associated with flooding. Nevertheless, it is imperative to thoroughly examine the potential hindrances and constraints linked to this proposal. While raising subway entrances appears promising in feasibility and effectiveness, it may not provide a comprehensive solution to the multifaceted flooding issues in New York.*

*Moreover, this discussion transcends the immediate practicality of his concept. Can our society move beyond merely bolstering the resilience and adaptability of cities and instead focus on mitigating climate change? For example, we need to consider issues such as carbon emissions continuously generated from the materials we use in construction and non-cyclical material systems to create multifaceted solutions. The question concerns the appropriate long-term strategy within the intricate web of global tensions, including political, environmental, and societal dynamics and their complex interplay.*

*Rayna Russom's work provides alternatives to dichotomous thinking and fixed classification methods. Even though she tries to break away from dichotomous thinking, when she creates her work, she has fixed values as a writer, and as a result, her work has a specific message that comes from her writer's experiences and values. How does she mediate between the specific message she wants to convey to the public through her work and her direction of breaking away from fixed classification methods?*

*Specifically, in Rayna Russom's work, which practices decolonization by engaging others in the process of remaking the world through rich dialogue by creating a space for conversation among members of society through dialogue on any topic, a question arose: Was not the artist's message already involved in creating a place? How does she evaluate her work beyond providing a place for people to express their diverse opinions?*

*In the introduction to the book Society of the Dead by Todd Ramon, Ochoa talks about how he writes about the concept of Palo, choosing to depict it in perpetual uncertainty through narrative rather than defining it for clarity, and Rayna Russom. Creating a place is understood in the same context. However, this method inevitably reproduces her author's message through each member of society's unique experiences and ways of thinking. During this process, the question arose of the writer's role if the writer's message needed to be understood or developed in a way other than the writer's intention.*

*In conclusion, I was deeply inspired by Rayna Russom's unique way of working - drawing on her imagination to open up new perspectives for the public while creating a space for dialogue. However, the question remains whether the various opinions and expressions derived through this method should be accepted and appreciated as uncertainties without any foundation.*