

S E L E N A Z H E N

WORK SAMPLE

EDUCATION

CARNEGIE MELLON UNIVERSITY

Bachelors of Architecture, 2020
Minor in Human Computer Interaction

INDIANA ACADEMY FOR SCIENCE, MATHEMATICS, & HUMANITIES

Academic Honors Diploma, 2015

SKILLS

DIGITAL

Rhinoceros 3D
Sketchup
AutoCAD
V-Ray
Grasshopper
Revit
3DS Max

ADOBE SUITE

Photoshop
Illustrator
InDesign
After Effects
Premiere Pro
Dreamweaver

UI/UX DESIGN

Sketch
InVision
Figma
Prototyping
HTML/CSS
Python

ANALOG/FABRICATION

Drawing
Drafting
Model-Making
Laser Cutter
Woodshop
3D Printing
Photography (Digital)

RECOGNITION

STEWART L. BROWN MEMORIAL SCHOLARSHIP

2019 Scholarship Recipient, recognized for professional promise as measured in both attitudes and scholastic achievement. Juried by AIA Pittsburgh.

AIA PENNSYLVANIA STUDENT AWARD

2019 Recipient, recognizes the exceptional scholastic achievement and future architectural promise of a graduating student.

ANDREW CARNEGIE SOCIETY SCHOLAR

2019-2020, Scholars represent an embodiment of CMU's high standards of academic excellence, volunteerism, leadership and involvement in student organizations, athletics or the arts.

INDIANA ARCHITECTURAL FOUNDATION

2018 Scholarship Recipient, for academic excellence as an architectural student.

EXPERIENCE

TEACHING ASSISTANT

Jan 2018 - May 2018, Jan 2019 - May 2019

SCHOOL OF ARCHITECTURE & IDEATE, CARNEGIE MELLON UNIVERSITY

Provided in-class instruction and assistance to students for each course.
Courses: Digital Media (2018), Learning about Learning (2019)

UX DESIGNER

June 2019 - August 2019

MEDIAMATH, NEW YORK, NY

Worked with the UX Design & Research team to define on a new visual design system for MediaMath's new platform direction. Included creating style tiles, component and pattern iteration, desirability study research (to validate direction with stakeholders), and a final Design System via Invision DSM.

EXPERIENCE DESIGNER

June 2018 - August 2018

BLUECREW, SAN FRANCISCO, CA

Redesigned and refocused BlueCrew's user experiences by creating mockups, branding guidelines, and prototypes. Aligned with the app developer team to iterate on user interfaces and user interactions.

FRONT-END DEVELOPER & GRAPHIC DESIGNER

June 2017 - August 2017

ZINC TECHNOLOGIES, SAN FRANCISCO, CA

Redesigned and redeveloped Zinc.io, PriceYak, Subtotal, and Lionfish product websites. Commissioned to redesign website and app UI, reimagine branding, and create logos.

LEADERSHIP

AIAS NATIONAL ADVOCATE

May 2019 - Present

AMERICAN INSTITUTE OF ARCHITECTURE STUDENTS (AIAS)

Working towards forming an awareness of "empty activism" and its potentially negative impacts, as well as to create a positive movement around actionable activism. Previously served as **Treasurer (2016-17)**, **Vice President (2017-18)**, **Chapter President (2018-19)**, **AIA/YAF Liason (2019)** for AIAS CMU Chapter.

CARNEGIE LEADERSHIP CONSULTANT (CLC)

August 2019 - Present

CARNEGIE LEADERSHIP CONSULTANTS, CARNEGIE MELLON UNIVERSITY

Collaborated with fellow CLCs to improve and empower student leaders. CLCs are students who have been trained in leadership development and facilitate peer-led leadership training to students across campus.

FINANCE CHAIR - BEAUX ARTS BALL

August 2017 - Present

BEAUX ARTS BALL COMMITTEE, COLLEGE OF FINE ARTS

Directing and overseeing the planning of the Spring 2020 Beaux Arts Ball for the College of Fine Arts. Previously served as **Associate Chair (2017-18)**.

TECHNOLOGY TRACK CHAIR

August 2015 - March 2016

AIAS 2016 NORTHEAST QUAD CONFERENCE, PITTSBURGH, PA

Planned and organized a national architecture conference with 500+ attendees.

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HIGH RISE 'UNTITLED'

A project looking at the role of the architectural promenade and how it can be adapted to the typology of the high rise, using Donald Judd's writings and artistic outputs as intellectual and inspirational ideas for concept.

BIOTECHNOSPHERE BATHROOM

A built installation space that fosters mutualistic interactions between human and fish.

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HETH'S AGRICULTURE + SCULPTURE PARK

A sculpture park project focused on understanding and organizing the forces that underly urban form, such as resource flow, systems, and water infrastructure.

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NEW EXPERIMENTAL THEATER FOR NYC

An experimental theater for the World Trade Center Performing Arts Center, tackling the same site, program and constraints as those of the professional design team, with a focus on human experience and sequence

HIGH RISE ‘UNTITLED’

4th Year | Fall 2019

48-400 Advanced Synthesis Option Studio: High_Rise 'Untitled' 2018, New York, NY

Studio Coordinator/Professor: Gerard Damiani

PROJECT INTRODUCTION

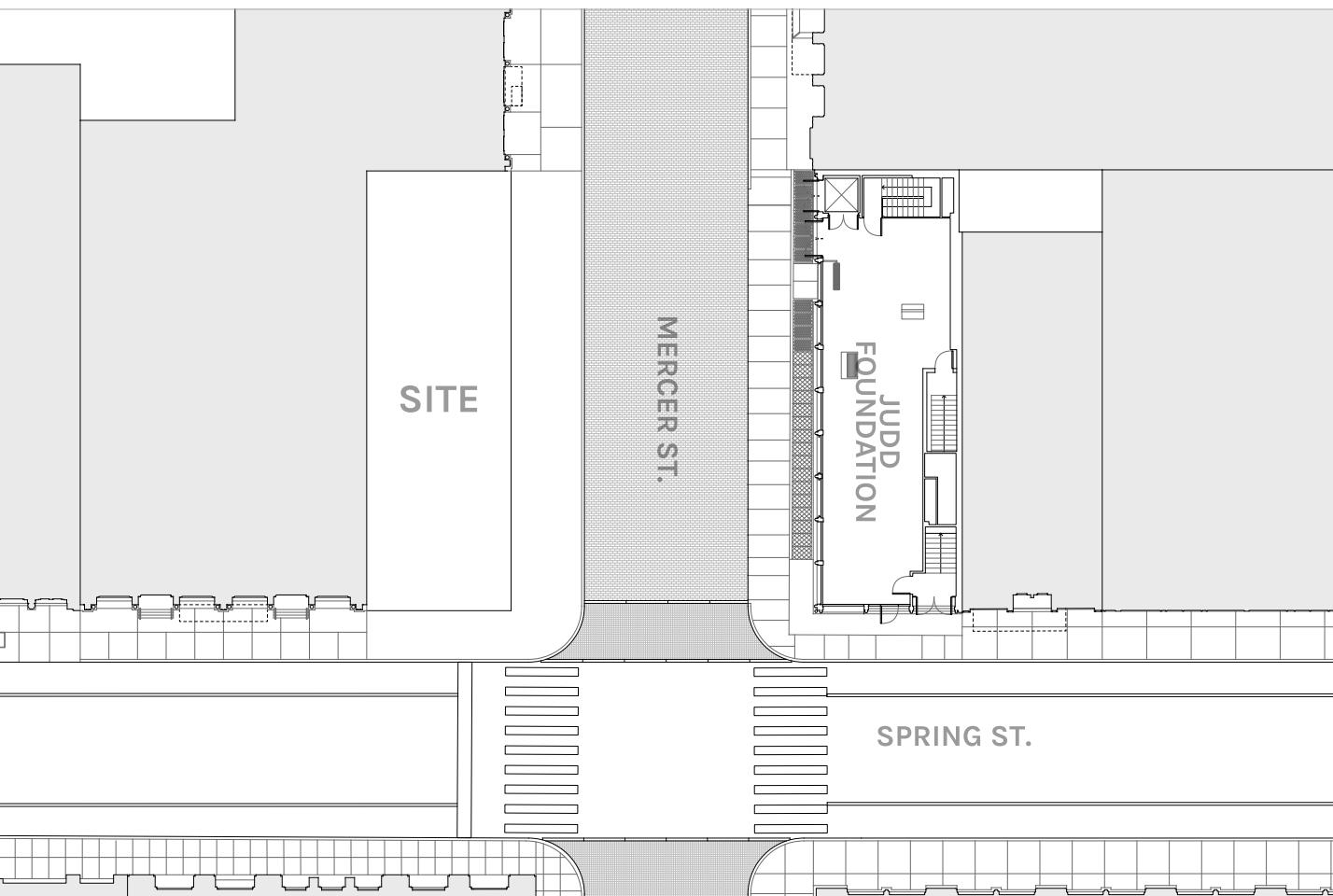
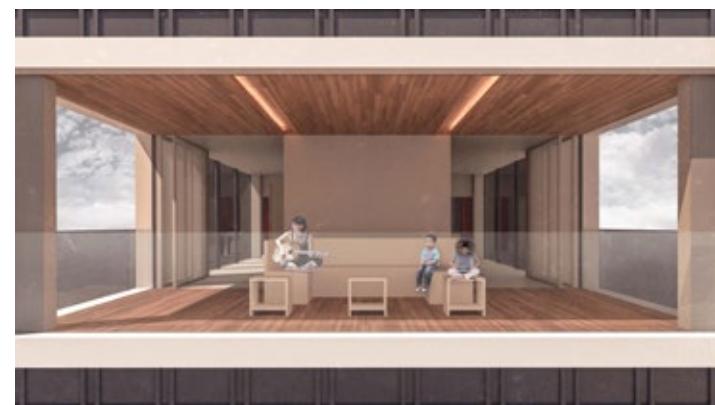
The introduction to the studio was initially written by Professor Gerard Damiani, and is paraphrased here.

"This studio will look at the role of the architectural promenade and how it can be adapted to the typology of the high-rise. The promenade architecture first described by Le Corbusier as a sequence of spaces and direction of movement in the Acropolis in Athens is a way of constructing views, vistas and experiences. The high-rise, an American typology, acknowledges maximizing building area but does not address the role of the architectural sequence. This studio will investigate the high-rise typology through the hybridization of the typology with the architectural promenade.

This studio will focus on the writings and artistic output of Donald Judd as the intellectual underpinning of the studio, which will inform the spatial and detailing agenda of the studio project. Often considered an artist of obdurate space, Judd's works are highly refined being conscious of their context (what he called fundamental realities), space,

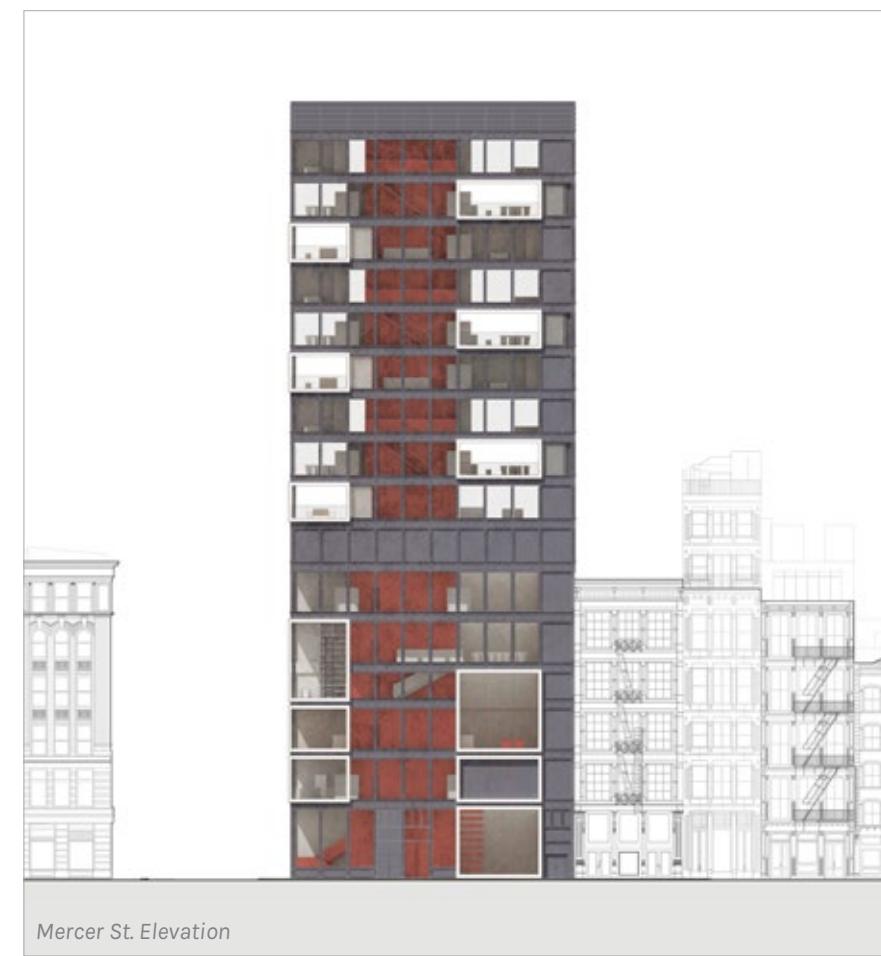
material, color and detail. An inspiration to architects such as Steven Holl and Herzog & de Meuron, the works of minimalist artist Donald Judd (1928-1994) spanned both art and architecture through a search for autonomy and clarity for the objects and the spaces they occupy."

The program will focus on a urban high-rise structure located in SoHo in New York City directly across from the Judd Foundation. The building is to be a high-rise construction (75 feet or higher) consisting of vertical galleries, a museum store, studio workspaces for visiting artists, and apartments.

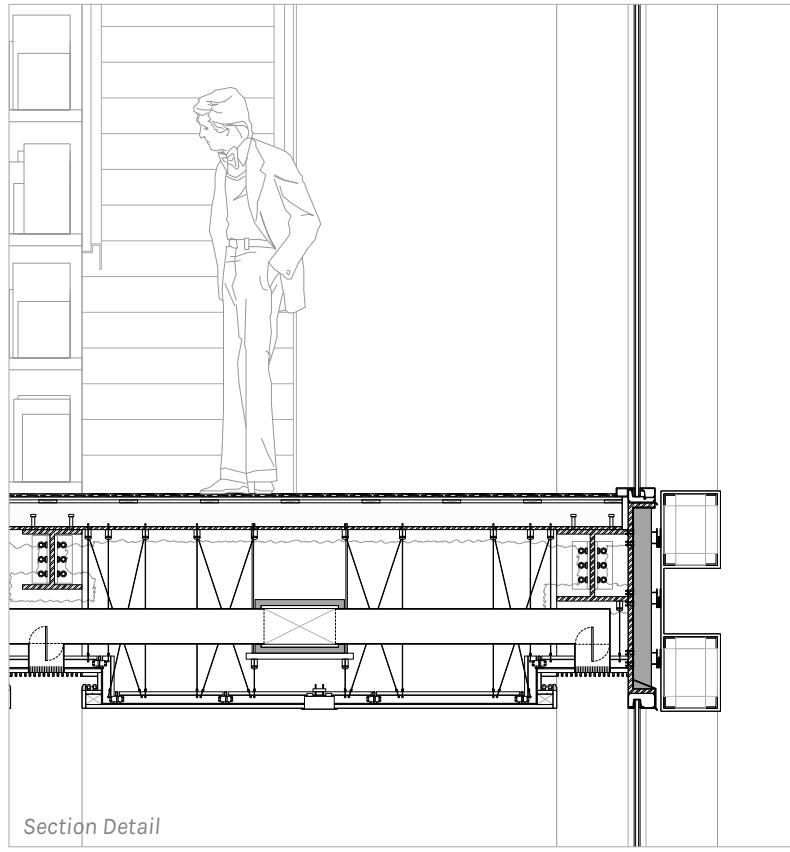




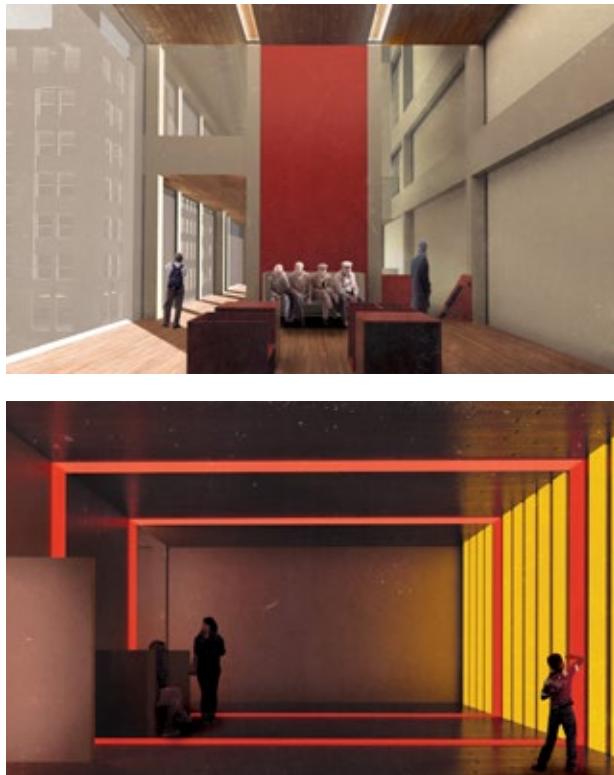
Spring St. Elevation



Mercer St. Elevation

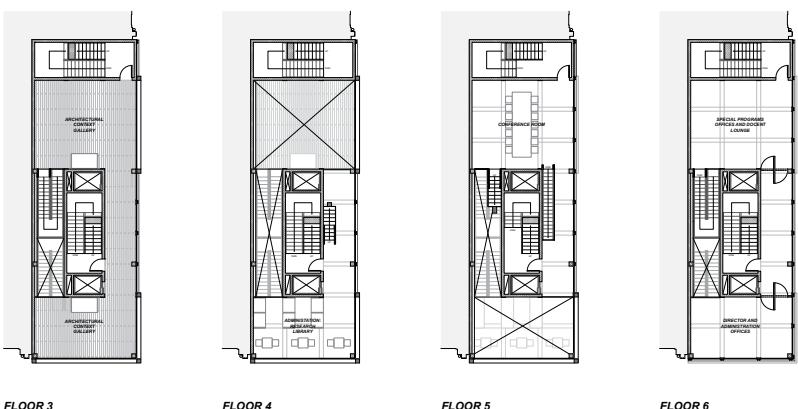
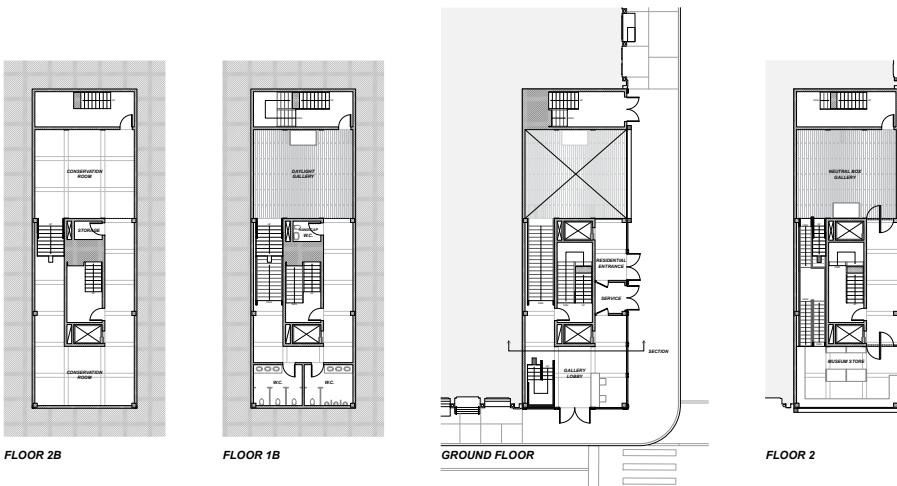


Section Detail

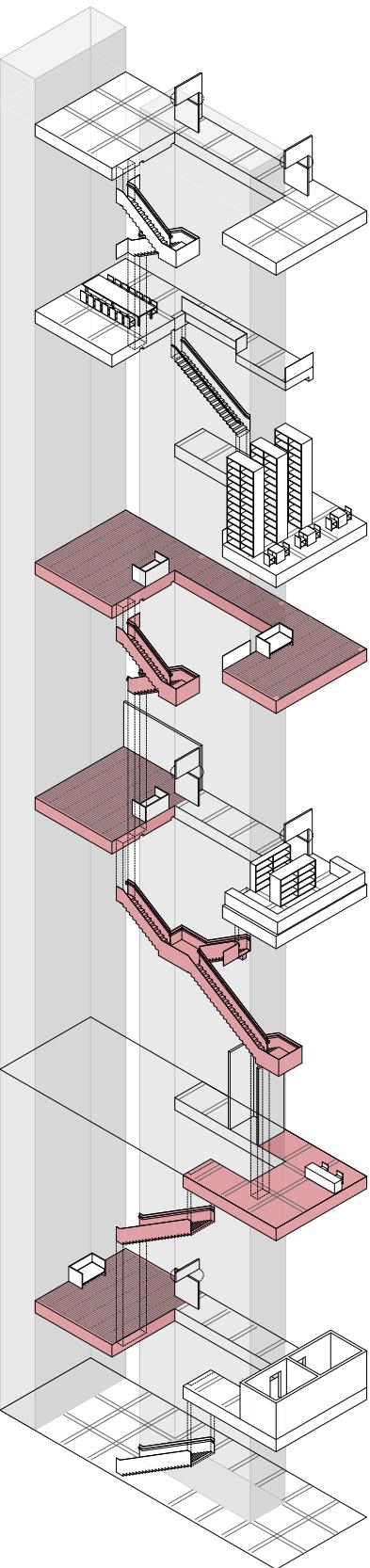
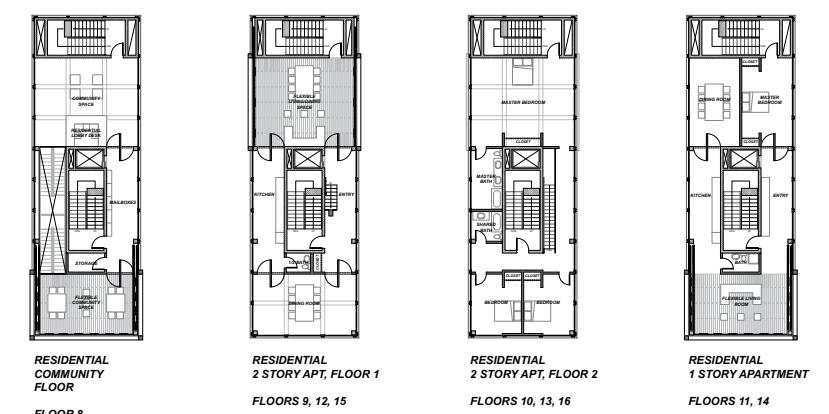


[TOP] Architectural Context Gallery
[BOTTOM] Neutral Room Gallery - Dan Flavin Inspiration

MUSEUM ANNEX



RESIDENTIAL UNITS



Gallery Sequence



LUNAR GALA - SURFACE

CARNEGIE MELLON UNIVERSITY

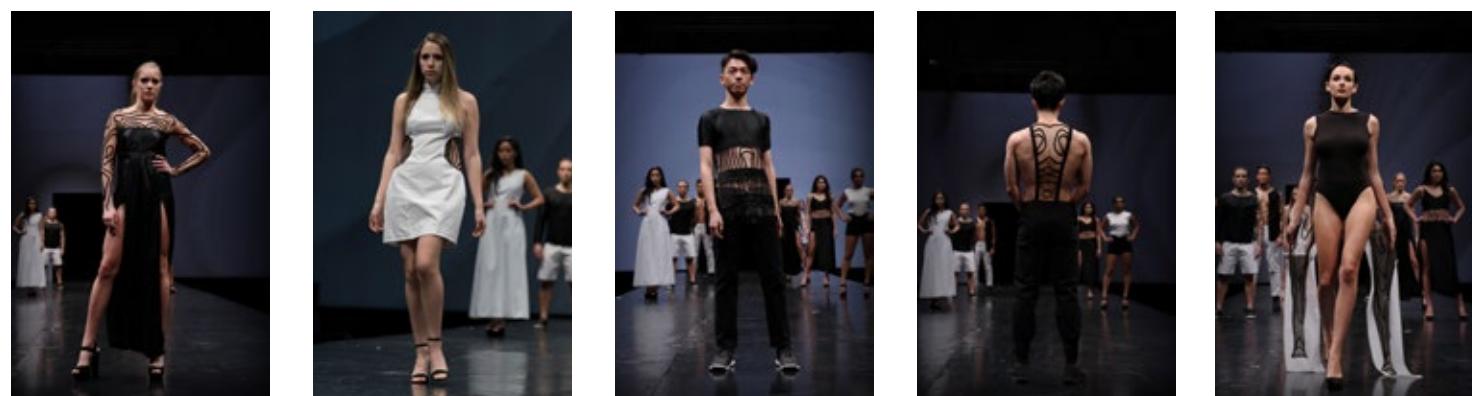
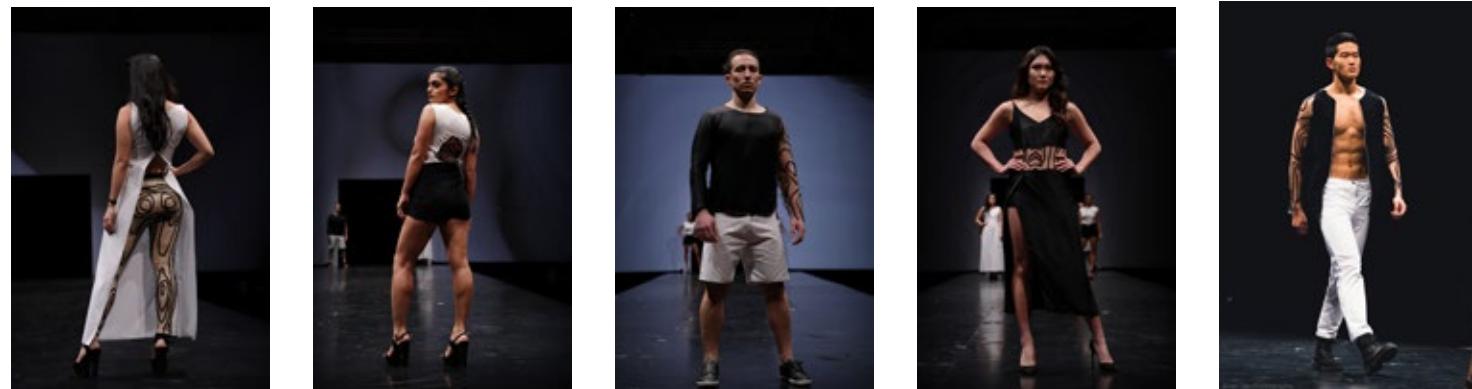
Design + Construction Process: Fall 2017 - Spring 2018

Runway Show: February 17, 2018

SURFACE explores the issue of the distortion and trivialization of the human body into objects of desire. The veneer of mesh, overlaid with cut contours, is a constructed external appearance that illustrates areas of the socially ideal body, exposing those who wear it to appreciation and admiration, but also leaving them vulnerable to objectification. As the line progresses, the body becomes more clearly exposed than upon first impression. It is meant to represent an exaggerated set of physical attributes that emphasize the scrutiny of our bodies – conscious and subconscious, external and internal.

More about Lunar Gala:

Originally created in 1997 to ring in the Chinese New Year, Lunar Gala has transformed into a highly anticipated event that hundreds hope to be part of and thousands hope to come see. While staying true to its original intent, it has developed into a much larger production and has become a more impactful organization to the CMU and Pittsburgh community. Every year, the theme of the show is centered around the Zodiac animal of the lunar calendar. Now, Lunar Gala is arguably one of the largest fashion events in Pittsburgh, having sold out



over 1200 seats each year with 140+ students involved in producing, designing, modeling, and dancing in the show. Students across all majors and cultures create original and creative lines, infusing technology and complex materials with wearable fashion.

In collaboration with Michael Powell.

Photo Credits: Brian Tao, Monica Godfrey, Wilson Chan, Fengyi Hu

NEW EXPERIMENTAL THEATER FOR NYC

Fourth Year | Spring 2019

48-601 Advanced Synthesis Option Studio: 4-D Architecture - Narrative, Hierarchy, Procession and Rhythm in Design

42-408/418 Theater Architecture I & II

Professor: Hal Hayes

STUDIO INTRODUCTION

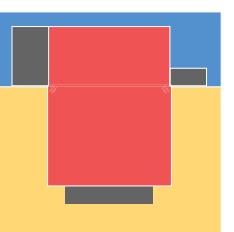
The introduction to the studio was initially written by Professor Hal Hayes, parts of which are rewritten or paraphrased here.

Over the course of the project, the studio collaborates with Drama and Masters of Arts Management (MAM) students to develop mastery of the technical requirements of performance art through co-requisites 42-408 & 418, Theater Architecture I & II. These 4-D Studio and Theater Architecture courses were created to study and design hyper-flexible performance spaces which respond dynamically to an artist's creative vision and the audience's evolving desires. It is built on the understanding that while architectural space is largely three-dimensional and static, human occupancy is inherently four-dimensional and dynamic.

The site is immediately adjacent to the 9/11 Memorial and One World Trade Center megastructure. The World Trade Center Performing Arts Center (PAC) is the most anticipated, and controversial, addition in a generation to Manhattan's rich performing

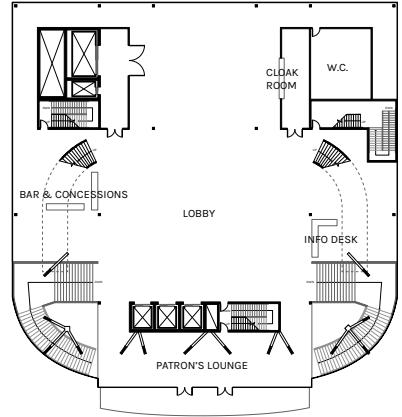
arts ecosystem. This 1200-seat three-theater complex is a real project currently in design and planning. This studio tackles the same site, program and constraints as those of the professional design team, which required us to develop mastery of the technical realities of performance productions, construction methodologies, structural & mechanical systems and community/stakeholder activism.

In addition to developing technical and construction skills, the project is also largely about understanding occupancy and human experience. The design of a theater is particularly unique, as movement, occupancy, and experience are amplified and exaggerated.

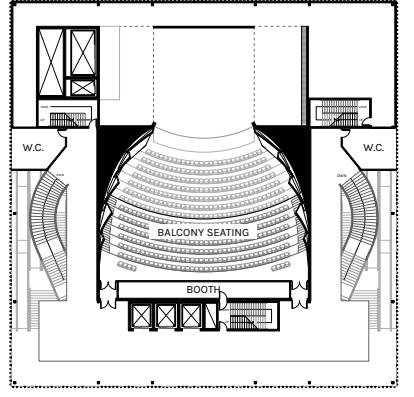


PARTI DIAGRAM
PLAN

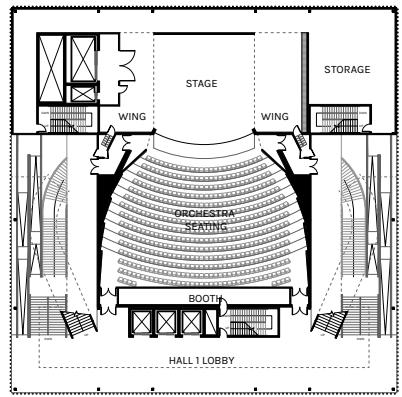




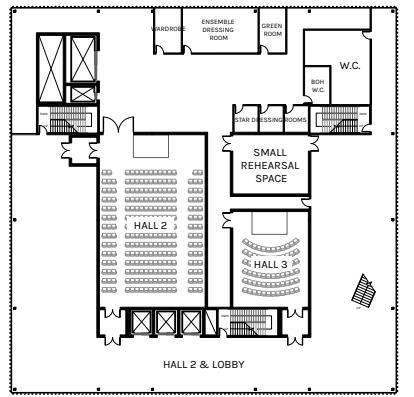
LEVEL 2



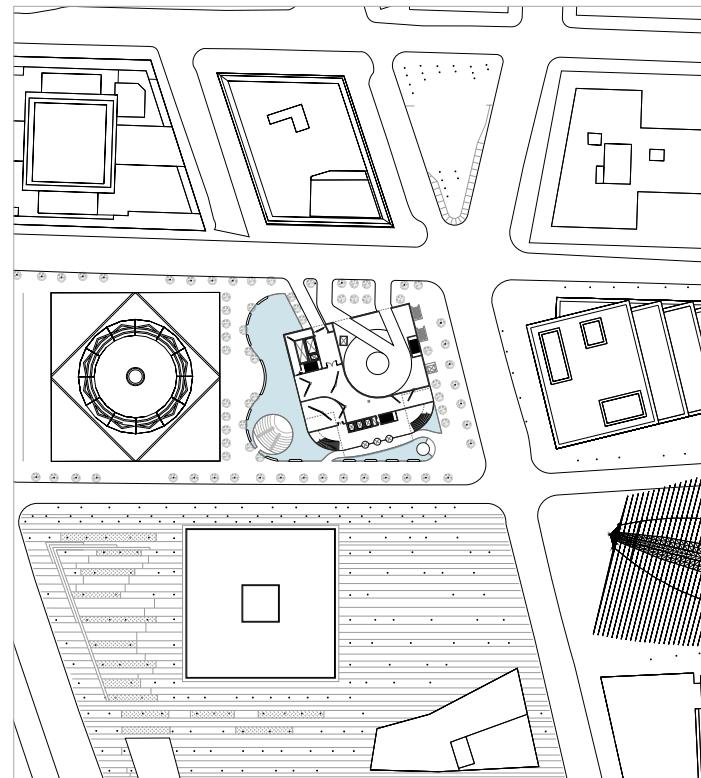
LEVEL 5
HALL 1 BALCONY



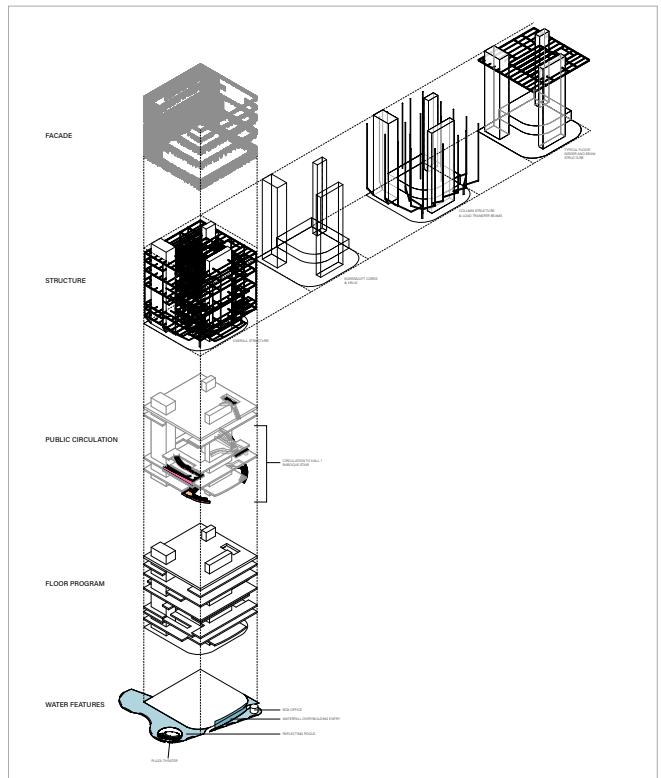
LEVEL 4



LEVEL 8
HALL 2 & 3



12 Site Plan



Systems Diagram

BIOTECHNOSPHERE BATHROOM

Fourth Year | Fall 2018

48-734 Reactive Spaces and Media Architecture

Professor: Jakob Marsico

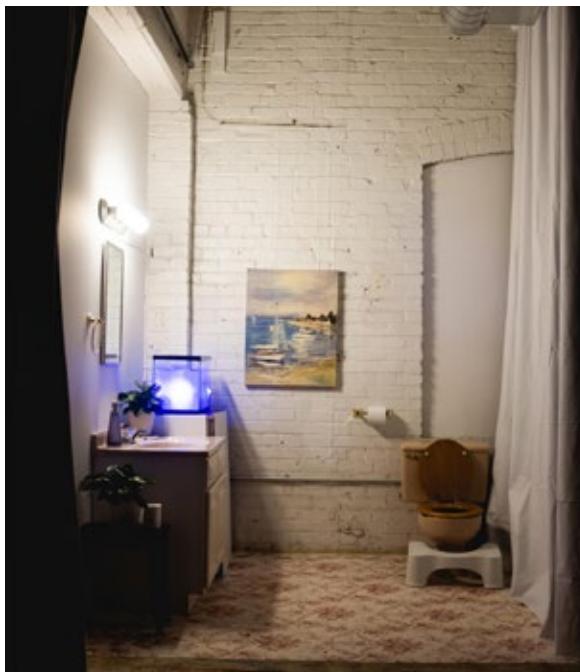
With hopes that the future of mankind will live in greater integration in the natural world and coexistence with its creatures, our team used this foresight to create a space that exercises telepresence in both the natural world and our own. We decided to foster our own space of integration, using fish as models to better envision the mutualistic interactions we foresaw between creatures of the natural world and humans.

The Bathroom is a bathroom in which a fish tank houses its own fish-scaled replica of our human-scaled bathroom. In The Bathroom, the usual consequence of a person's action is amplified by one that affects the fish's world and vice versa. Brightness tracking and basic circuitry were employed to facilitate three main interactions.

Program: Touchdesigner, Arduino

In collaboration with Soonho Kwon, Miranda Luong, Johanna Mcallister, and Nicole Matis.

Photos by Soonho Kwon.



KNOCK A knock on the fishs' tank produced an echo of a knock in the human bathroom.



LIGHTS A fish entering their own bathroom turned on the lights of the human bathroom.



BUBBLES A human sitting on their toilet caused bubbles to emerge from the fish's toilet.



HETH'S AGRICULTURE + SCULPTURE PARK

Fifth Year | Fall 2019

48-400 Advanced Synthesis Option Studio

INFRAstructure: Forces Underlying Urban Form

Studio Coordinator/Professor: Christine Mondor

STUDIO INTRODUCTION

The studio is focused on a scalar understanding of infrastructure, from the micro, meso, and macro scales and query the possibilities for occupancy. The design problems shift scales, allowing one to understand that each scale is an opportunity for design. Through this, one will learn to understand resource flows in placemaking, in system functioning, and how designs and design processes can activate human experience.

The majority of the INFRAstructure studio was spent designing at the meso-macro scales; the intent being to organize the Heth's Run valley into an arts and sculpture park that would also serve as a critical piece of Pittsburgh's water infrastructure. In addition to the required program, the final result must also be able to contain at least half of the capacity of Reservoir 1, in the event of potential reservoir contamination.

We expanded the program to allow for more recreational activities. This includes boathouses and boating opportunities, a



Site Location in Pittsburgh

bathhouse, restaurants, and an education center. As for organizing water infrastructure, the project uses four containment dams, an archipelago island system, and a main directional channel to serve as water management, outdoor art spaces, and occupiable areas. These work among floating agricultural paddies, to help create a relationship between the neighborhood and recreational program within the site. Aquaculture also becomes another recreational and agricultural aspect of Heth's Run, as the landscape and paddies can provide a self-sustaining ecosystem for this practice.

This project was designed and created in collaboration with Zhuoying Lin.



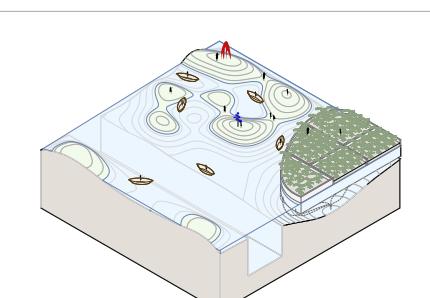
Rainfall and Water Catchment Areas



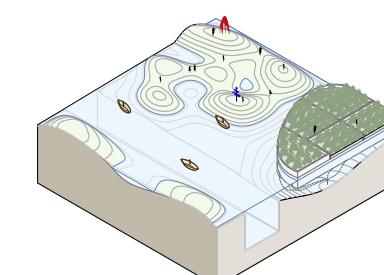
Solar Analysis



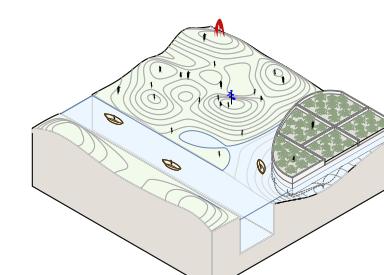
Final Urban Site Plan



VERY WET



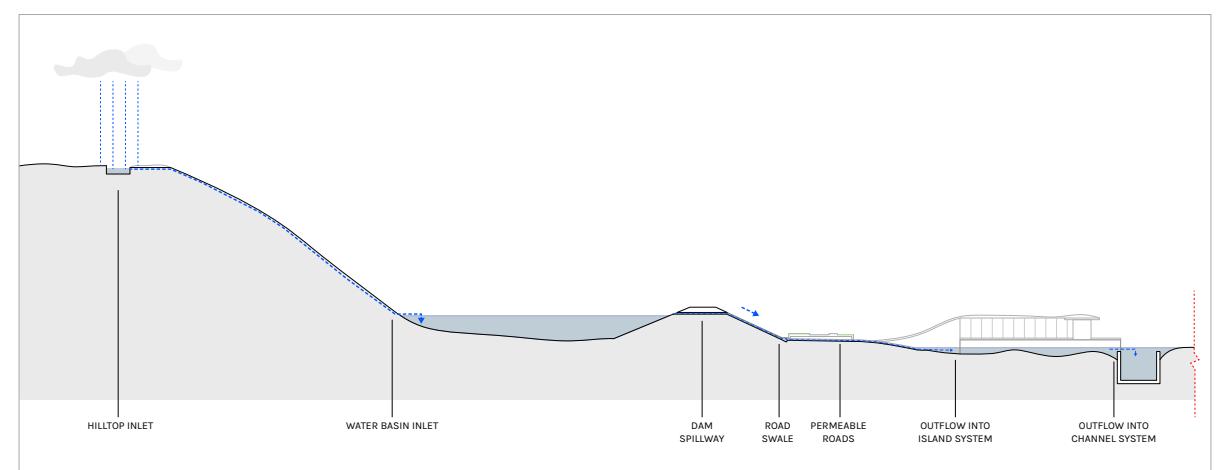
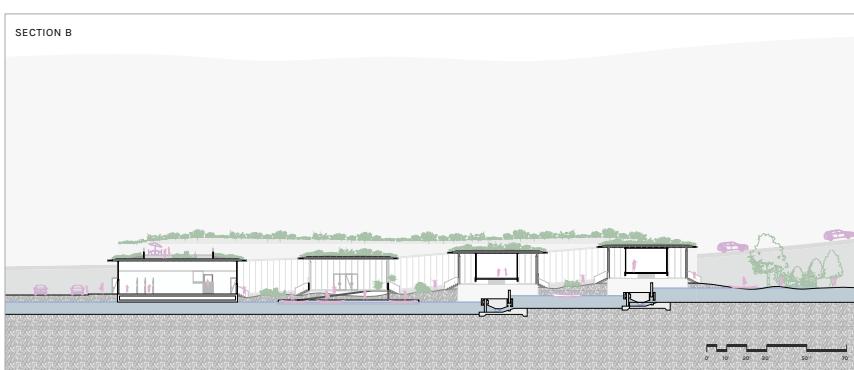
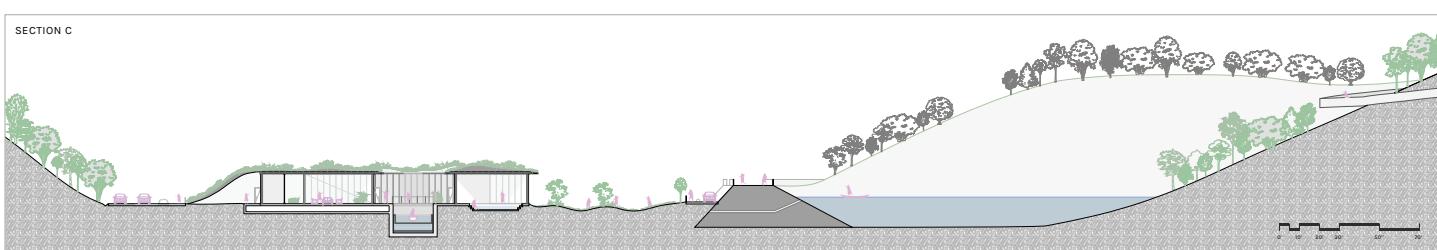
WET



DRY

Water Occupancy

Visitor + Education Center



[Top] Render 3: Dam and Overview

[Middle] Render 2: Restaurants and Agriculture

[Bottom] Water Flow Sequence Diagram