



URBAN WEST DANCE CENTER

2020 - 2021

DESIGN STATEMENT

Problem statement

This project will deal with the planning and detailed design of a new building intended to house a center for dance in Milwaukee’s Riverwest neighborhood: The Riverwest Dance Center. Bringing together two local dance groups that normally compete for funds and facilities (one classical ballet, one contemporary dance), these groups have joined to build the new center.

Located on the east side of Fratney Street between Nash and E Vienna, the new Dance Center will allow these groups to share resources, rehearse in proximity to each other and provide alternative entertainment programming within a vibrant creative neighborhood. In addition to rehearsal halls, the new center will contain dance teaching studios which are a major source of income for many dance groups.

Two majors donors for the project (\$3M each) have emerged: an elderly conservative man who made his fortune in the brick & stone industry and demands that the new museum be masonry or some other solid, heavy and lasting material, and a young liberal who has fallen in love with the idea of light and ephemeral technologies like transparent glass or translucent polycarbonate as new age materials and requires it as a condition of her gift.

“...my working method has more often than not involved the subtraction of weight. I have tried to remove weight, sometimes from people, sometimes from heavenly bodies, sometimes from cities; above all I have tried to remove weight from the structure of stories and from language.” Italo Calvino, Six Memos for the New Millennium

Historically, architects have pursued a goal similar to Calvino’s through the dematerialization of the building envelope and also the decoupling of structure from enclosure. This is not to imply a correctness to such an approach but only to observe the advancement of tectonics and structure in this direction in works such as the Gothic Cathedrals or the evolution of skyscrapers. Materially, we probably think of brick and stone masonry as part of the heavy camp while metals, glass, wood, and plastics would be light. But what about heavy timber and log cabins? The filigree stone window detailing seen at Chartres is the epitome of lightness. Confronting the question of weight in architecture has resulted in works of fantastic technical performance. Dance too considers weight as a primary instrument for describing a story. Balance and counterpoint weave a narrative between performers for sheer delight and storytelling. When two or more ballet dancers move their bodies together, forces can be amplified. In some cases, the addition of weight can even accelerate movements as opposing bodies are put into orbit. The contrast between heavy and light can be seen in pas de deux where one dancer serves as a foundation for movements and structure. Dance can be a wonderful metaphor for architecture. Today in contemporary construction we are hearing a renewed conversation about the merits of weight in architecture.

Architecture 825 Comprehensive Design [HP]

Spring 2021
TRF 1:15pm-5:00pm

Course room number: Architecture 382/390



ADAPTATION + RENOVATION

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1 of 14

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be distinct, resolved, and suitable for development. One of the schemes will be chosen and further SD advancement. SD will count for 25% of your final grade.

Design Development Drawings and Models: During design development, each student must complete a revised building model, a tectonic model of a part of the exterior, a structural model, 3 well-crafted

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DESIGN STATEMENT

Design Concept

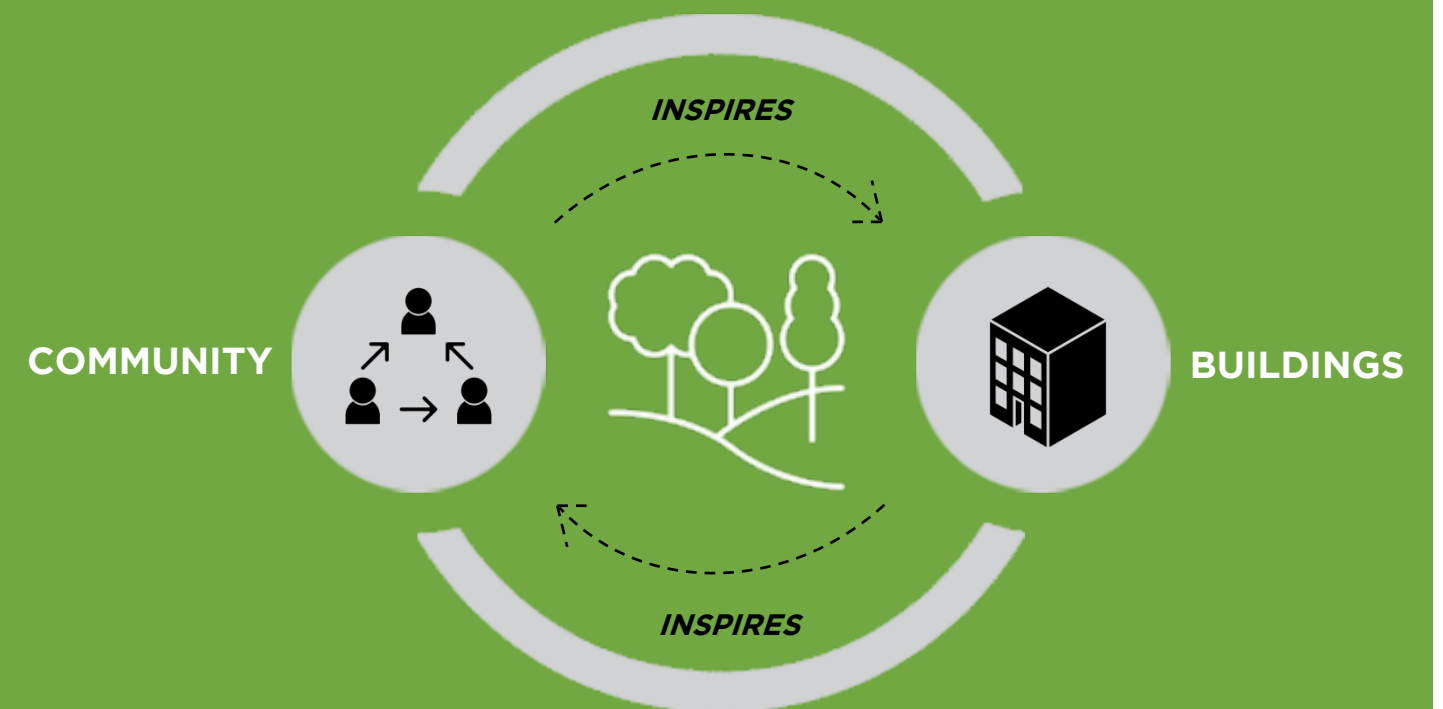
My interest in the commons is grounded in a desire for the conditions necessary to promote social justice, sustainability, and happy lives for all. As simple as that. These are topics addressed by a large variety of social movements across the world that neither states nor markets have been able to tackle, and for good reasons.

The Site is located in a predominant black neighborhood where the neighborhood lacks proper infrastructure and provides very less of opportunity to the community to express their voice and opinions, provide proper open spaces, healthy lifestyle, etc.

When the client approached us asking us to design a dance center for 10 million dollars, all of my peers and studio mates made very beautiful and efficient designs. However, I feel that as a designer it is not only my duty to make a wonderful building for my client and the dance troops but also to uplift the community by creating a commons for them. This not only creates a bond between the building and community but also gives the dance center a chance to become a part of the neighborhood. Various meetings were arranged where the discussion took place about the maintenance of the building which will be taken care by the stakeholders identified within the community.

It is architectures responsibility to move ahead and progress but make sure everyone is on the ride.

Regards,
Designer



Dance is movement of the human body through space over time.

Architecture and its spatial qualities are experienced by the human body through movement over time.

SITE

The site selected for this project is in Milwaukee's Riverwest neighborhood on the east side of N Fratney Street between Nash and Vienna. There is a new brewery in the warehouse on the north end of the site. To the south is a brick factory building formerly used for processing furs for coats but which is undergoing adaptive reuse for artist live-work spaces and hipster lofts. Currently occupied by an overgrown vacant lot and the rather modest 'Goat Palace' (which used to be a tannery), the site is around 209' wide and 311' deep. While perhaps economically unfeasible, there has been discussion of using one of the Rehearsal Studios as the stage for an outdoor venue if a huge movable, insulated wall could somehow be worked out.

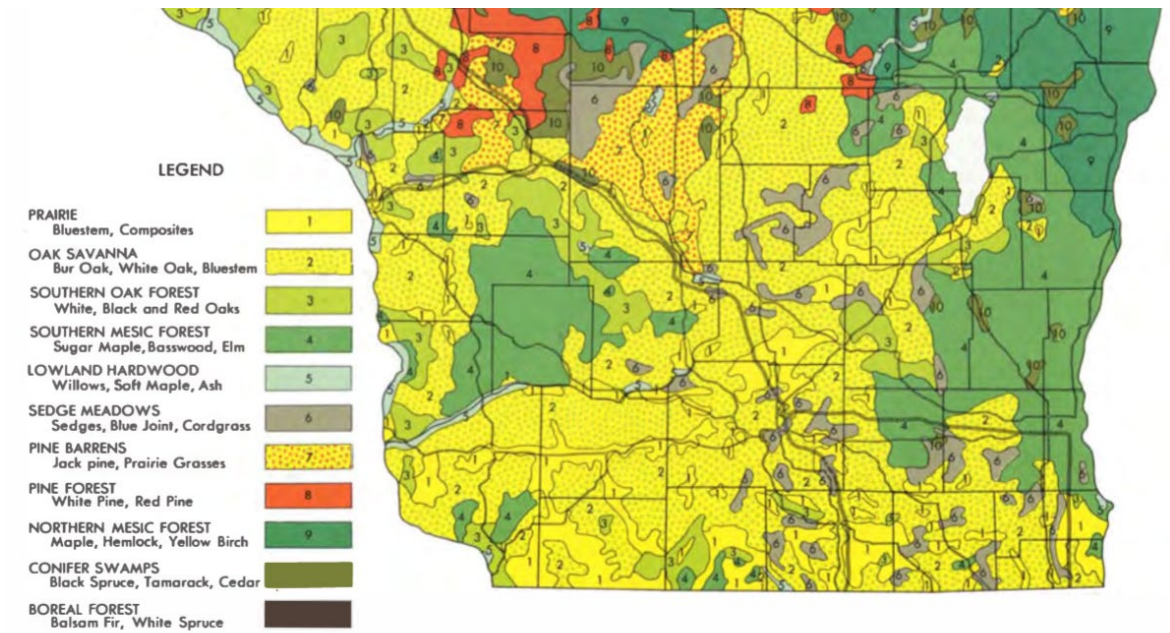


The Riverwest Dance Center would like to develop an outdoor performance space for 200 people on the property with a stage area of 60' wide x 48' deep



NATIVE VEGETATION

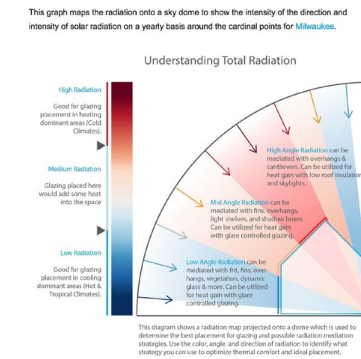
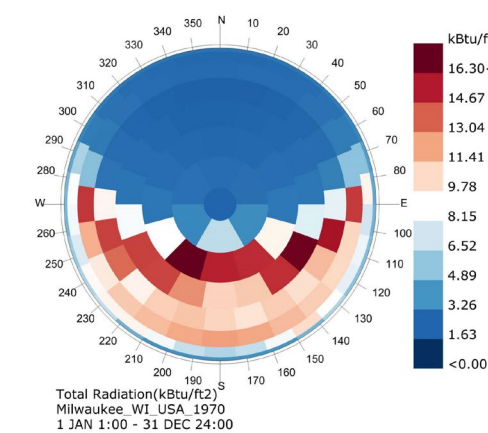
Documentation providing an insight to the conditions on the site prior to occupancy and what native species existed on the site. From what kind of trees or vegetation cover existed. Whether the original cover was boreal forest or deciduous forest, were there grasslands and bushes or wetlands and vegetations.



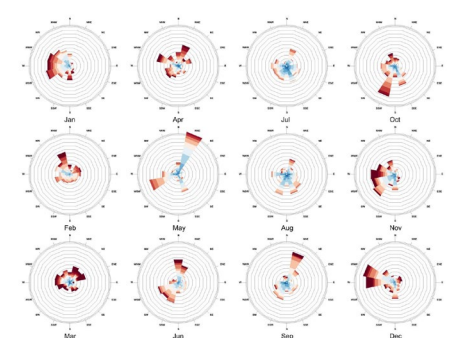
CLIMATE ANALYSIS

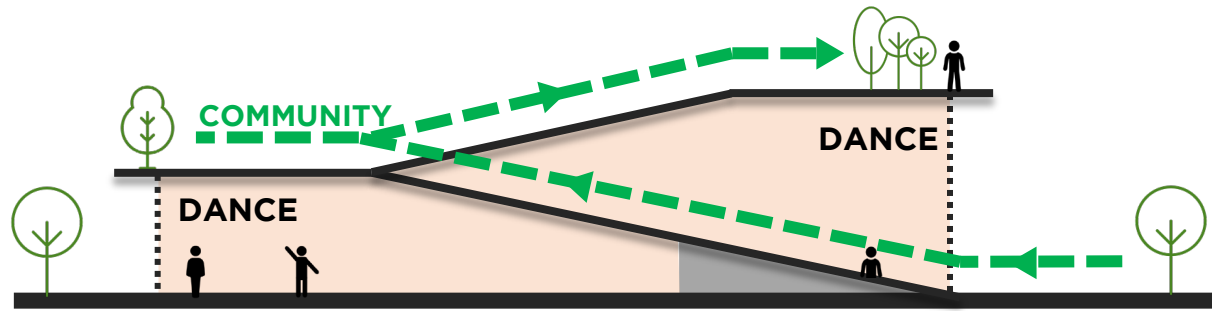
Using psychrometric charts to determine the healthy environment of building and using as less energy but making the most comfortable space for the inhabitants of the building

CLIMATE ANALYSIS RADIATION BY SKY SEGMENT



CLIMATE ANALYSIS WIND

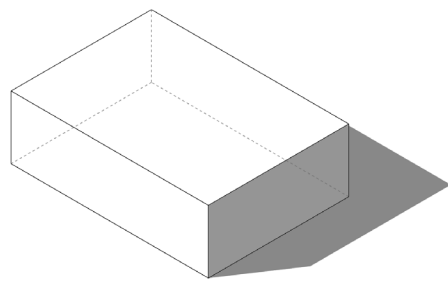




The building design is just a simple roof (the black line) shaped in a way which creates space underneath for dancers, space above for various activities for the community.

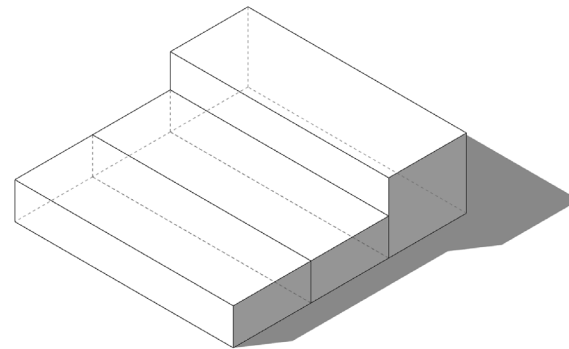
DESIGN PRINCIPLES

The design drivers or decisions related to the design of the project are based on the requirements and goals discussed with the client. Also, many discussions and meetings were held with the community and stakeholders which contribute to make a commons which will be maintained by the community members themselves.



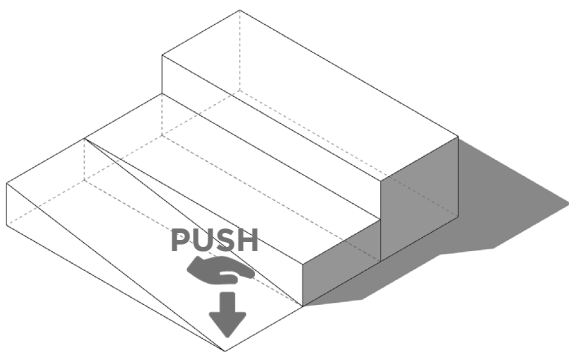
01 IDENTIFICATION

The total square foot of the project required by the client leads to an ordinary box building.



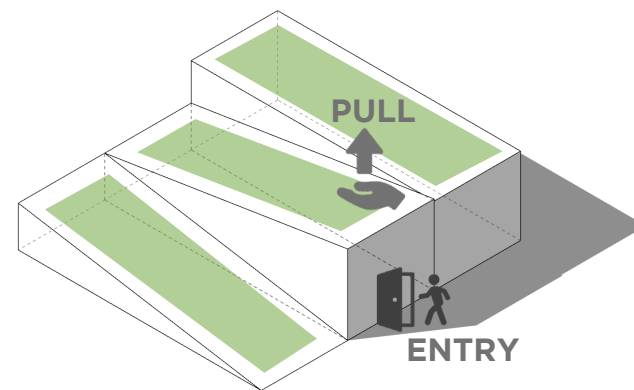
02 ORGANIZE

Strategically organizing spaces with different functions together but also a hierarchy in the height for the dance hall



03 FORM MAKING

The push and pull play makes it more inviting, the garden starts at ground level and lobby is now matched with 30' height of dance hall, giving it an interesting form



04 INVITING

The roof transforms itself into a garden, amphitheater, stage, gym area, sculpture park and much more inviting the community to use it



INTEGRATION

Integration of the program along with the needs of the neighborhood makes it a successful design.



EQUITABLE COMMUNITY

Including community into the design process to understand their needs better



ECOSYSTEM

The building creates an ecosystem bringing back the greenery and micro vegetation along with birds, and many other species



WATER

The stormwater strategy of the project collects water to feed back to the greenery making it self-sufficient.



ECONOMY

The building budget was 10 million dollars, every specification is well within the total budget making it practically possible & not conceptual



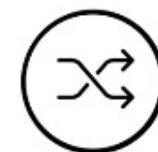
ENERGY

The natural light through the north facing windows flood the central atrium in the building reducing use of energy.



RESOURCES

The building uses geothermal system to heat and cool making it efficient and sustainable



CHANGE

The idea is to inspire the building through community and inspire the community through the building making it the "commons"

The birds eye view showing the form of the building, shaping itself to be inviting to the community with a 100 feet garden. It then shapes itself to become a flat stage along with an amphitheater seating giving an outdoor stage to dancers to connect with the community



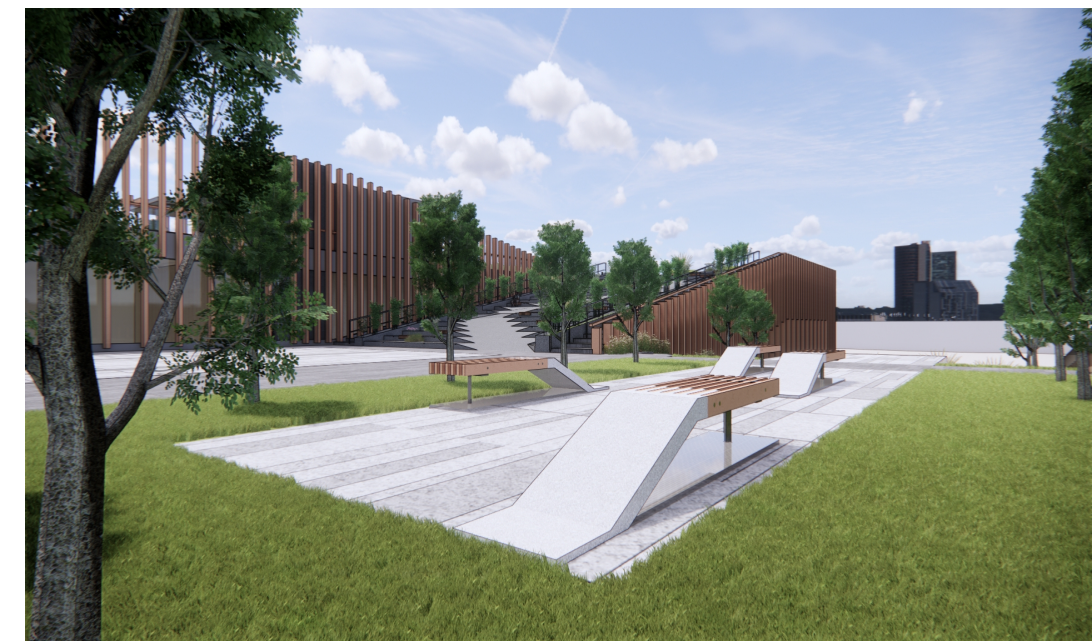


The beautiful moment of overlap where the community is using the roof to express their voice through a protest and the dancers are using the dance halls for rehearsal. This moment of penetration where the louvers are alternated to create this exchange of interest.

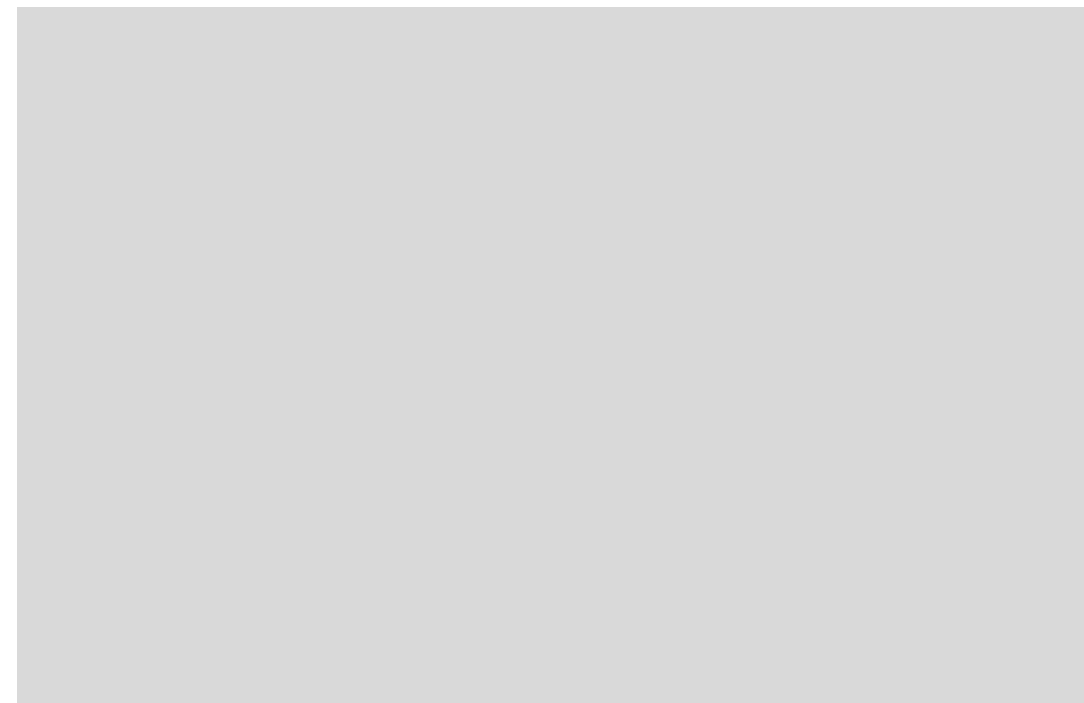


The exterior of the building uses Geolam is a sustainable wood-plastic composite used primarily for architectural elements, cladding/soffit and commercial decking. Made of 70% – 80% recycled materials and 100% recyclable.

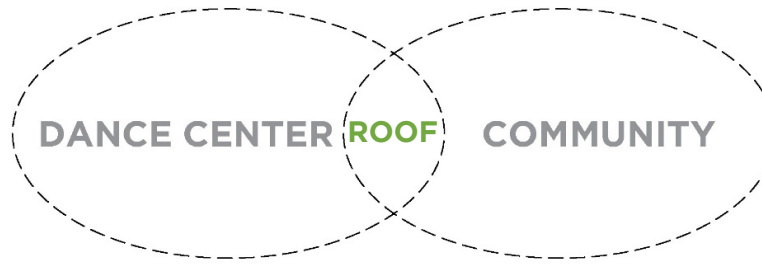
The use of the louvers are positioned in a simple vertical manner enhancing on the strong form of the building. Whenever there is a moment of exchange between the inside & outside the louvers are alternated creating a penetration in the skin.



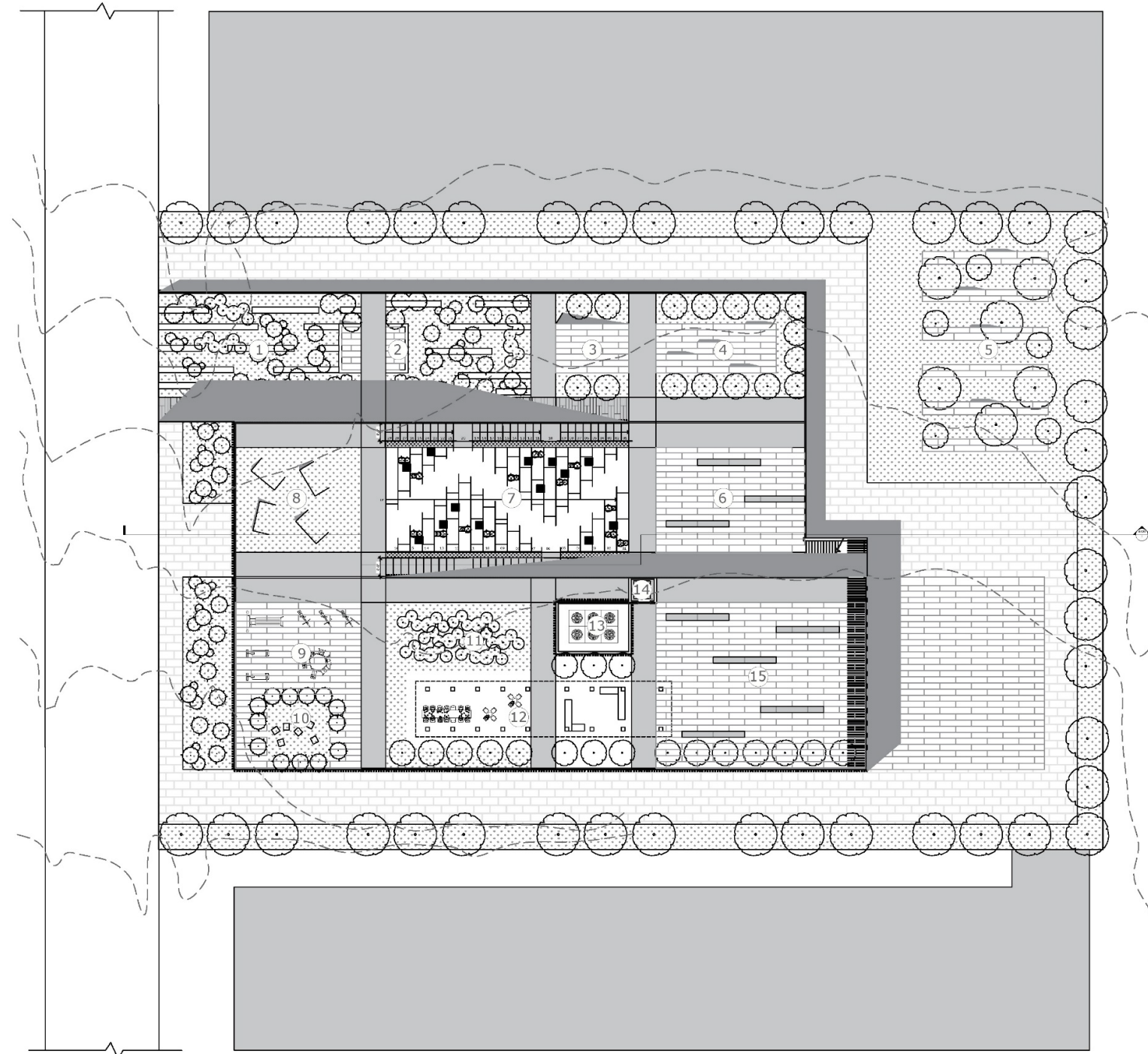
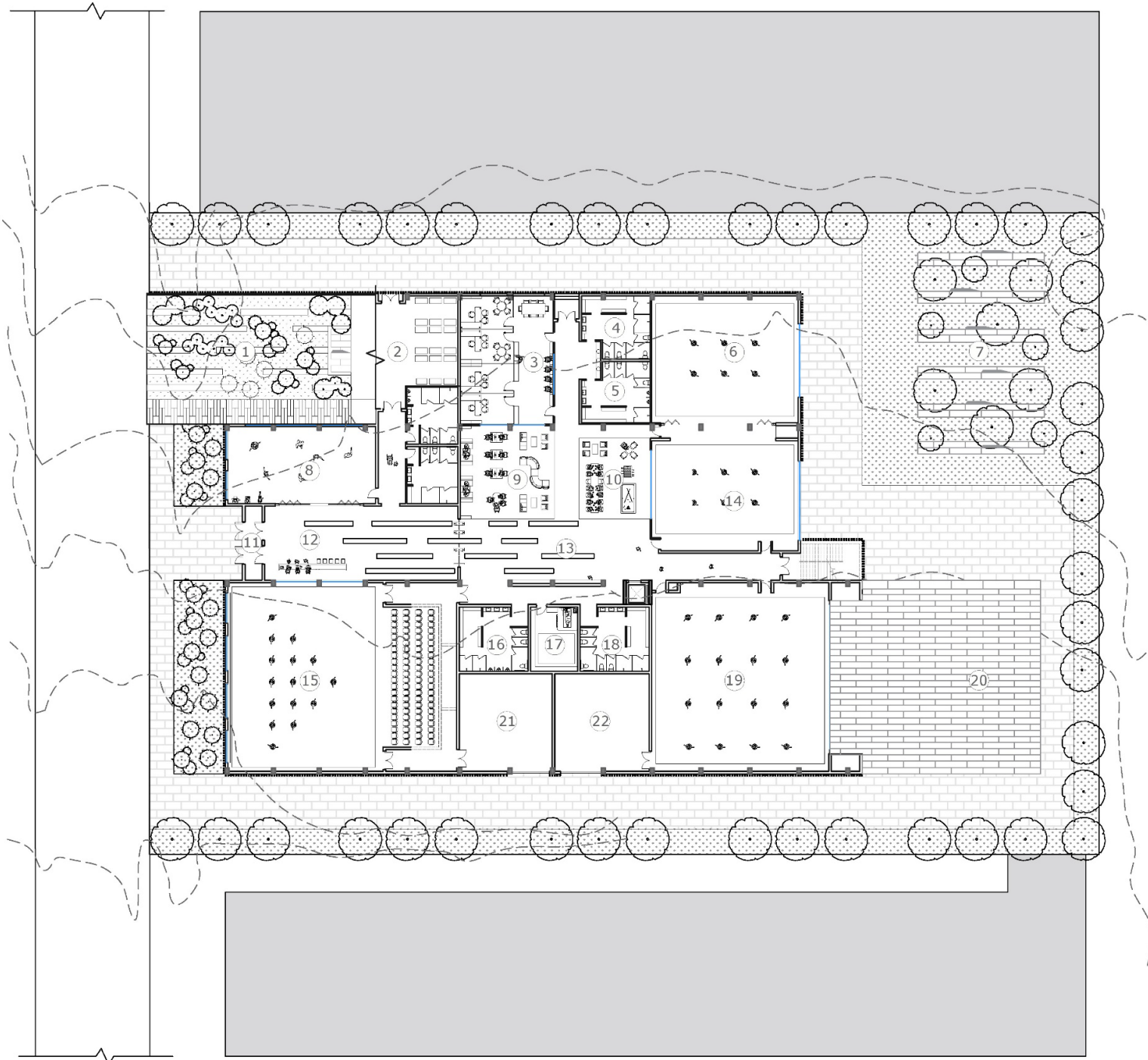
The building can be thought as the form has emerged from the ground and is creating a hill like approach which can be used differently with the seasons – from a lush green garden with the butterflies and the birds in the fall and a perfect place for sledding during the winters.



- 1. Outdoor Garden
- 2. Catering & storage
- 3. Administration Dept.
- 4. Toilets (female)
- 5. Toilets (male)
- 6. School Studio 01
- 7. outdoor Landscape
- 8. Community Studio
- 9. Library & Study
- 10. Lounge Area
- 11. Entry Vestibule
- 12. Entrance Lobby
- 13. Communal Space
- 14. School Studio 02
- 15. Dance Studio A
- 16. Toilet (male)
- 17. Physical Therapy
- 18. Toilet (female)
- 19. Dance Studio B
- 20. Outdoor Seating Plaza
- 21. Receiving
- 22. Shop

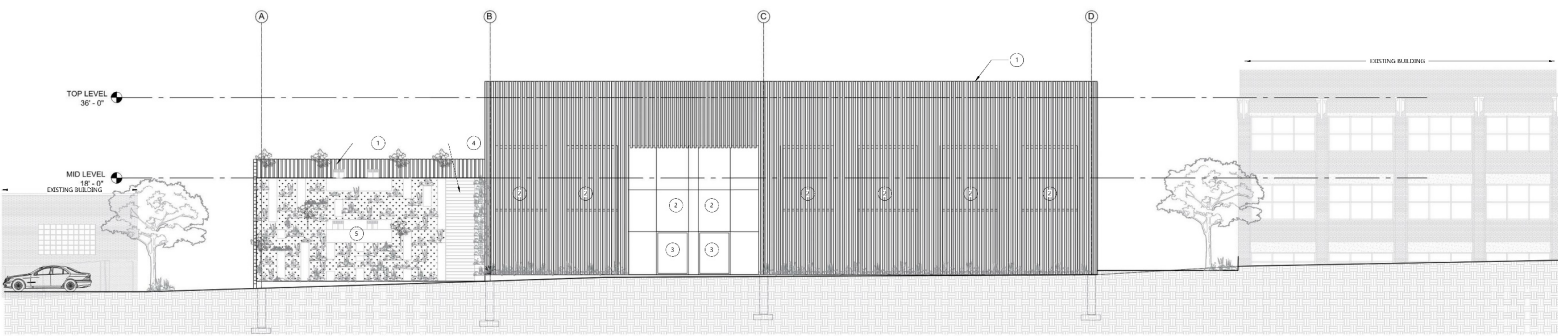


- 1. Outdoor Garden
- 2. Beer Garden
- 3. Stage
- 4. Seating Plaza
- 5. Outdoor Landscape
- 6. Performance Stage
- 7. Amphitheater
- 8. Sky-lit Garden
- 9. Gym & Exercise
- 10. Sculpture
- 11. Urban Farming
- 12. Communal Dining
- 13. Mechanical & Toilets
- 14. Elevator (two way)
- 15. Flexible Event Space

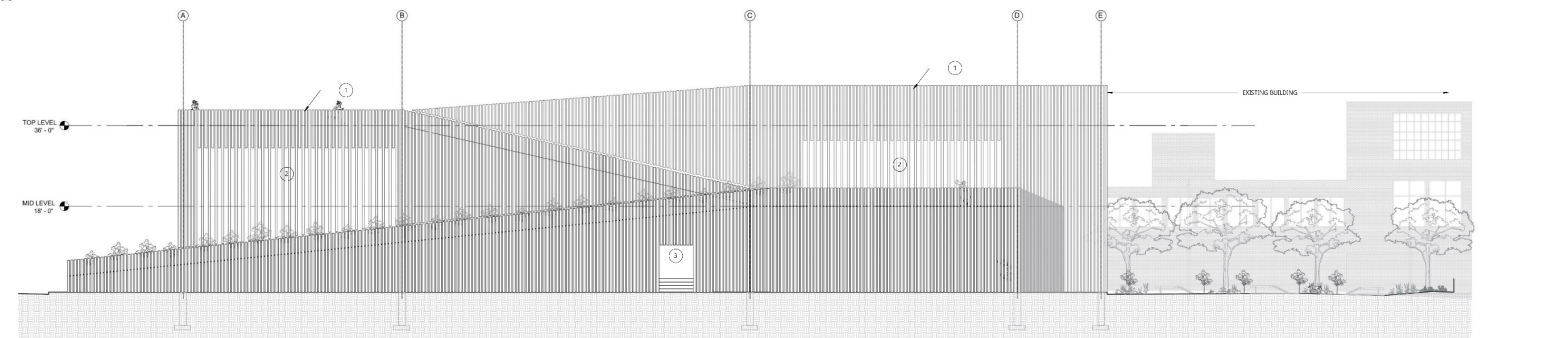


ELEVATION

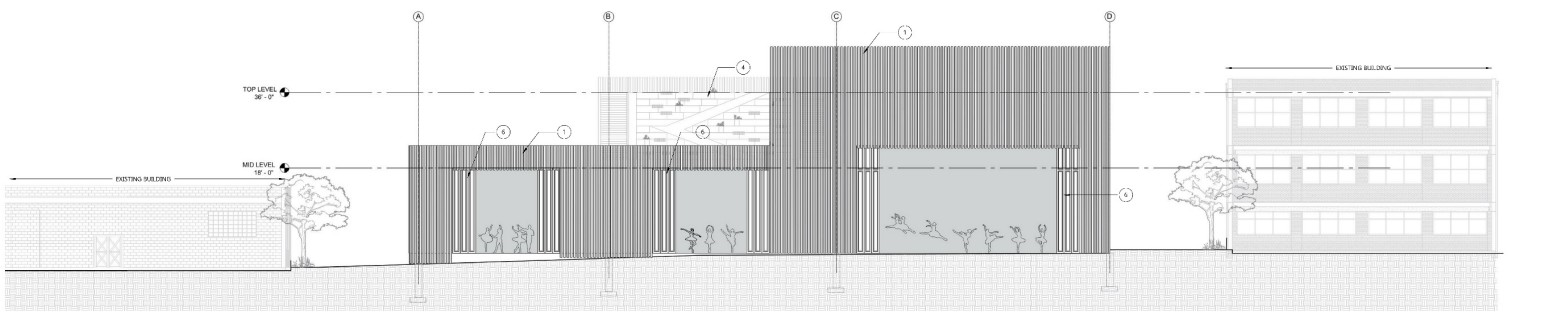
The building form has a drastically different elevation on each side. The building can be thought of as a series of hiking trail but wrapped around with vertical wooden louvers giving it a skin which also looks different throughout the day creating interesting shadow effect creating a sense of depth.



1 WEST ELEVATION
A201 3/32" = 1'-0"



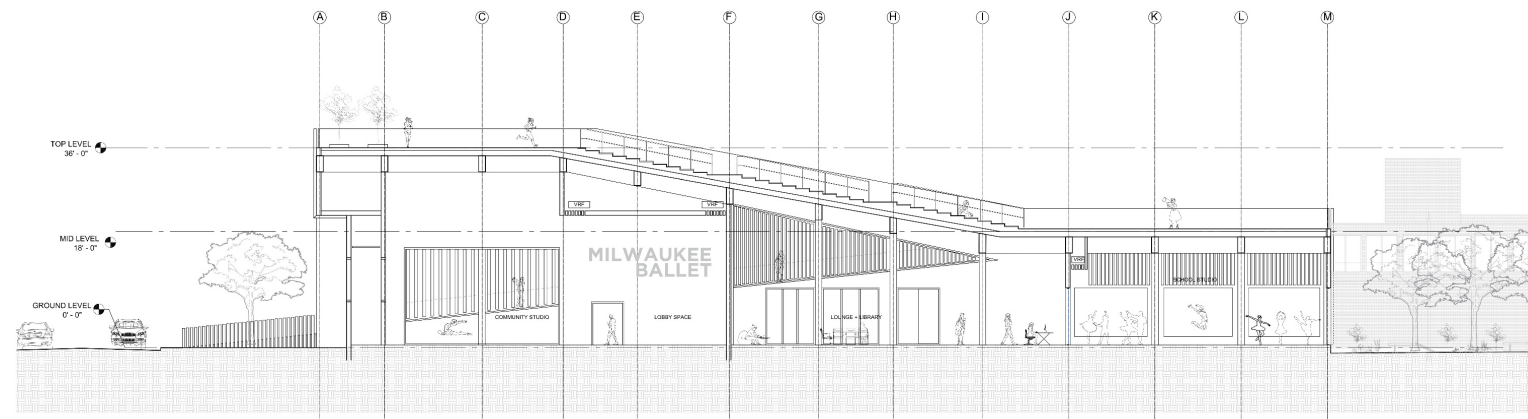
2 NORTH ELEVATION
A201 3/32" = 1'-0"



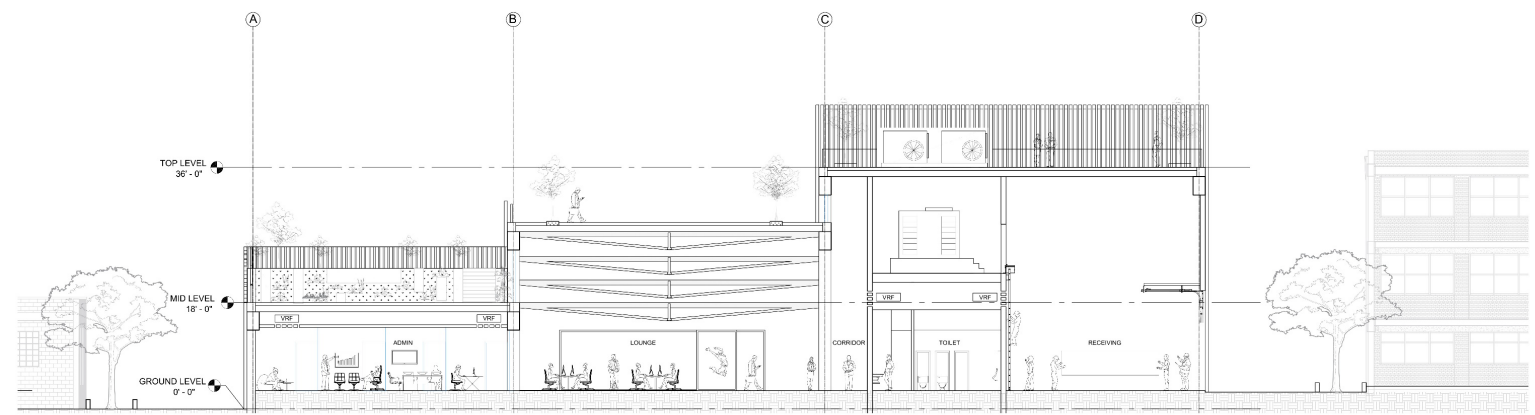
3 EAST ELEVATION
A201 3/32" = 1'-0"

SECTIONS

The space within the building moves very organically, entering in the 30 feet tall lobby gives a grand entrance experience and shares the height with the dance halls. The spaces where such a height is not needed the ceiling transitions itself. The openings are strategically placed on the northern side bringing in more natural light.



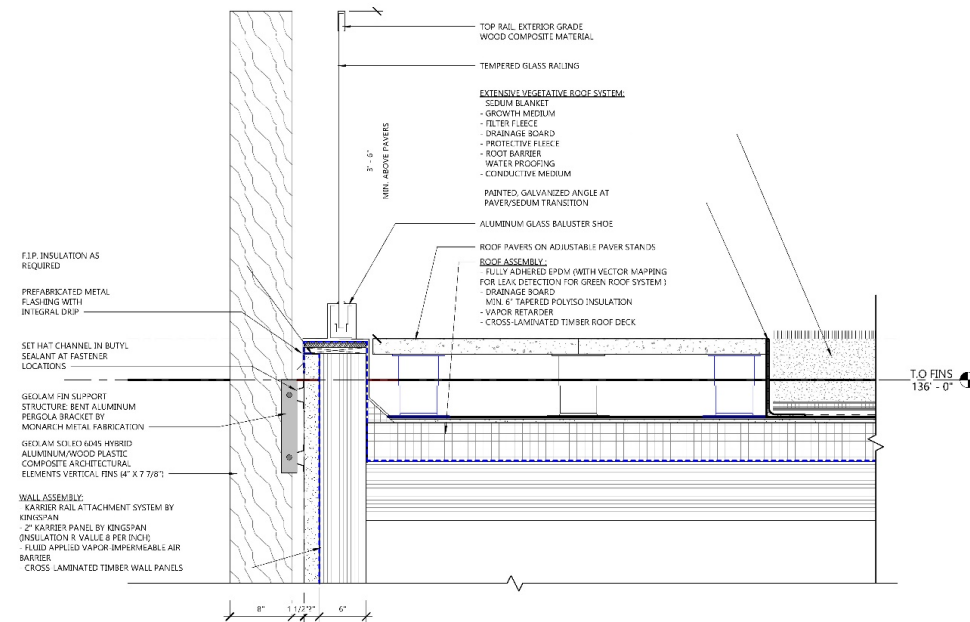
1 BUILDING SECTION AA
A301 1/8" = 1'-0"



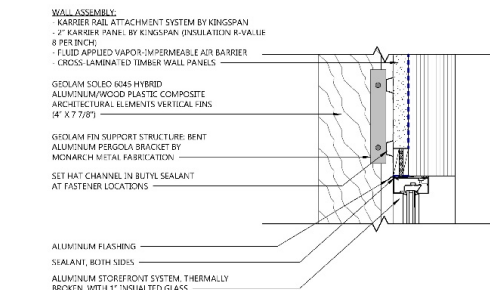
2 BUILDING SECTION BB
A301 1/8" = 1'-0"

DETAILING

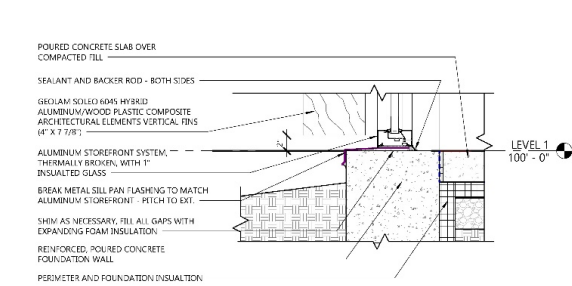
The project had a very practical approach ending up with a 50-page construction set along with specifications and detailing developed in order to create the same desired aesthetic and experience envisioned in the conceptual stage to make sure the building performs the way it is intended to.



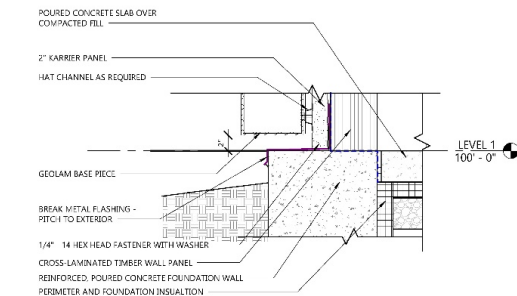
1 PARAPET DETAIL
A500 1 1/2" = 1'-0"



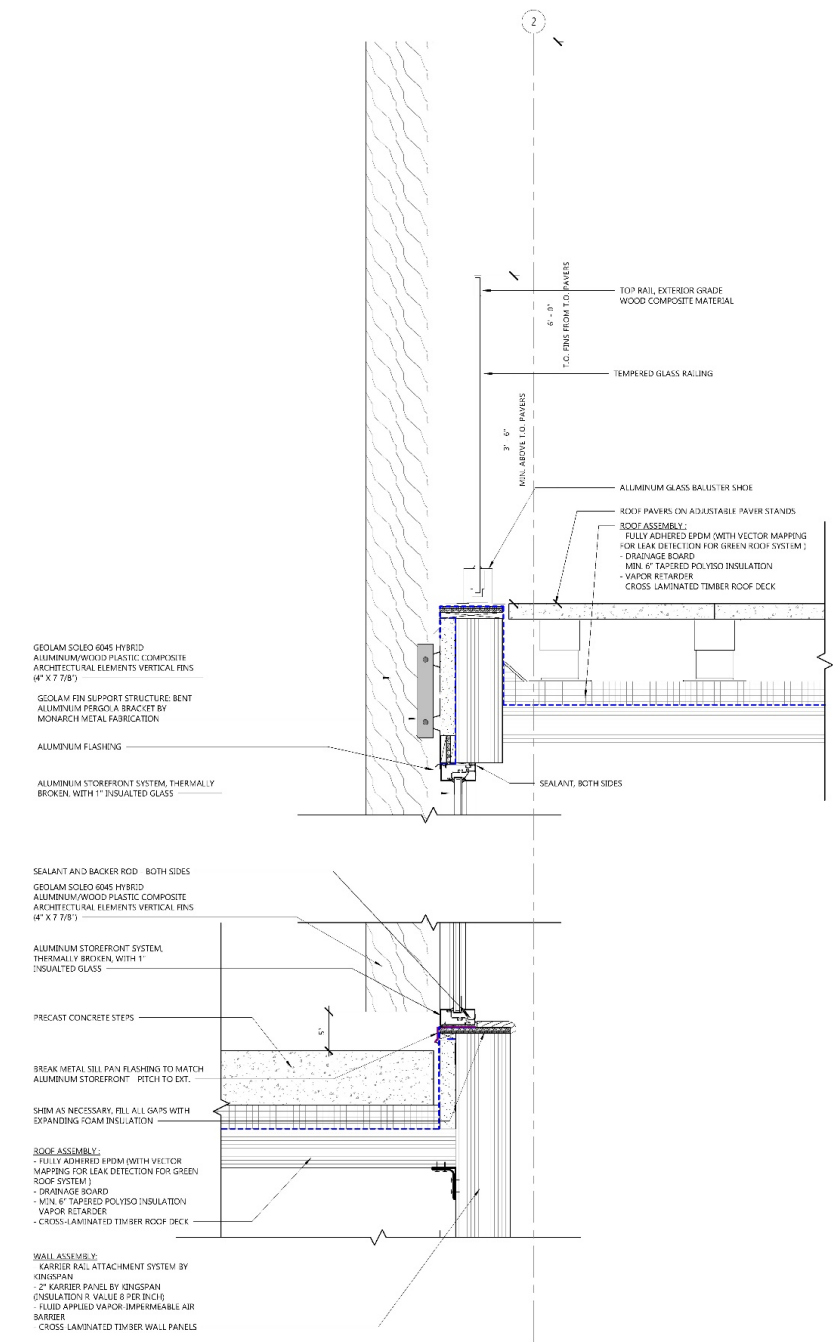
2 DETAIL AT WINDOW HEAD
A500 1 1/2" = 1'-0"



3 BASE DETAIL AT WINDOW SILL
A500 1 1/2" = 1'-0"



4 FOUNDATION DETAIL
A500 1 1/2" = 1'-0"



5 CLERESTORY DETAIL @ STEPS
A500 1 1/2" = 1'-0"

PROJECT

URBAN WEST
DANCE STUDIO
ARCH 825
COMPREHENSIVE
STUDIO

3740 N FRATNEY
ST
MILWAUKEE, WI
53212
ISSUE

NO. 825.04C.02.01.01

PROJECT INFO

Date: 05.11.2021

Author:

SHEET TITLE

EXTERIOR DETAILS

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