A Home for the Thelonious Monk Institute of Jazz

URBAN RHYTHMS
OF WASHINGTON DC

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How can architecture serve as a catalyst to strengthen a transitioning neighborhood without displacing or replacing the local community?

Cities bear the weight of continual change. Across the United States, urban communities wrestle the boundary between the desires of gentrification and concerns for maintaining cultural identity. These ethos are expressed in both the social and physical fabric of the neighborhood. What buildings do we save? What goes away? Can something new introduce value yet inherently belong to the neighborhood? While these questions hold relevance in any city, each city holds a unique DNA. Why does Washington DC feel different than Chicago, New York, or Philadelphia? How does the architecture manifest this genetic code?

I began to seek an architectural program where I could explore these questions. As a trained jazz drummer, music served as an influential creative outlet for me during my adolescence. I desired to create a place that could become a laboratory for jazz music and performance, while simultaneously serving the artist, student, patron and neighborhood. The streets of DC have a rhythm, a genetic code. How can this code be studied and interpreted through the lens of jazz music? Architecture is rhythmic. Users become improvisational dialogue within the form of architecture. My thesis developed these questions and concepts to create a physical home for the Thelonious Monk Institute of Jazz, currently headquartered in Washington DC. The chosen site is located in the city’s transitioning Greater U Street neighborhood.
American cities are experiencing a rebirth in population, culture, and civic amenities. This phenomenon, known as gentrification, provides a unique opportunity for architecture to shape new urban spaces, yet existing communities struggle to remain affordable for local residents and artists.

What buildings do we save? What goes away? How can a place simultaneously serve the resident, artist, student, and patron?

For my thesis, I desired to explore these issues through the creation of a new jazz performance and education center for the Thelonious Monk Institute of Jazz. By analyzing the surrounding streets and buildings through the musical lens of jazz music, the project evolved into a composition influenced by the architectural rhythms of Washington DC.
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New Orleans had a great tradition of celebration. Opera, military marching bands, folk music, the blues, different types of church music, ragtime, echoes of traditional African drumming, and all of the dance styles that went with this music could be heard and seen throughout the city. When all of these kinds of music blended into one, jazz was born.

- Wynton Marsalis

Listen | Interpret

Jazz was born in America. While the music finds its roots in New Orleans, the language of jazz evokes a dialogue with the vernacular of each place it contacts. Many American cities hold a unique jazz legacy, privileged to encounter the art form’s migratory path.

Washington DC became the creative testing ground for a young, Duke Ellington, raised in the city’s Greater U Street Neighborhood. Considered one of the greatest jazz composers of all time, Duke Ellington became America’s influential leader of the big band era. As the nation’s capital, Washington continues this legacy with various outreach programs dedicated to jazz performance, composition, and education.

Founded in 1986, the Thelonious Monk Institute of Jazz serves as a non-profit music education organization headquartered in Washington DC. Well known for its International Jazz Competition, the organization provides national jazz education programs and scholarships to students of all levels. While headquartered in DC, the institute lacks a physical home to host these programs. Seeking to create a center for jazz education, I choose to use the Thelonious Monk Institute of Jazz as a conceptual client for my thesis project.
Searching for Place
Greater U Street “The Secret City”

Susan Piedmont-Palladino suggested that I look for a site in DC’s Greater U Street Neighborhood, which resides 1.5 miles Northwest of the White House. Straddling the internal boundary the original L’Enfant Plan for Washington, U-Street holds a complex legacy. Before the Civil War, Washington DC was carved from two plantation states, Maryland and Virginia, which accounted for more than half of the nation’s slave population. After the declaration of the Emancipation Proclamation in 1863, the undeveloped U Street area became a haven for freed slaves. As Washington remained racially segregated, U Street became an inclusive African American community.

In the 1880’s, many African American architects rose to prominence designing many of the neighborhood’s civic institutions that still stand today, such as True Reformer Hall, the Whitelaw Hotel and the Twelfth Street YMCA. According to historian John Karl Byrand, the area became “distinctly urban, consisting of an eclectic mix of Blacks and Whites of all classes and occupations.”

In the height of Jim Crow segregation in the early 1900’s, U Street became an elite network of African American businesses, civic institutions, social clubs, and religious communities. U Street gained the nickname “Black Broadway” and “The Secret City” as the neighborhood became a prominent showcase of theatre, film, and live music, denied elsewhere in segregated Washington. U Street also became Washington’s destination for jazz performance, fostering the adolescence of influential jazz pianist and composer, Duke Ellington.

After booming for the first half of the twentieth century, Greater U Street fell victim to the 1968 Washington Riots in response to the death of Martin Luther King, Jr. Following the riots, the area became victimized by urban decay, rising crime, and growing poverty. Over the last twenty years, the area has experienced a renaissance. While re-emerging as a place for local musicians, artists, and comedians to create and perform, many physical and social scars remain. Given the complex legacy of music, performance and community reconciliation, Greater U Street provided a rich setting to begin searching for a project site.
Greater U Street
1968 Riot Aftermath

Greater U Street
Present Conditions & Gentrification

Print & Photographs Online Catalog, Library of Congress
Photographs, Personal Collection
Many of the once blighted sites throughout Greater U Street are newly developed, making it difficult to find a site suitable for a large program. While searching, I came across an empty site at the intersection of 10th and V Streets. A vacant church sat on the site’s northern end, with three older garage structures at the east end. With further research, I learned of the Church’s recent historic landmark status.

In regards to my questions of “What buildings do we save?” and “What goes away?” I became intrigued with the idea of re-purposing the church within my project. Situated one block north from historic performance venues, nightlife, and mass transit, the site also serves as a typological threshold between residential row houses and mixed-use commercial buildings. This location allowed the project to sit removed and develop a new identity, while both leveraging and contributing to the culture of the neighborhood.
The vacant church at 10th and V St. held a history firmly rooted in U Street’s legacy. The original congregation stemmed from freed slaves in 1887, becoming home to various African American religious congregations until 1992. Originally built as a single story brick structure, the building underwent a substantial addition of a large third floor sanctuary and corner tower in 1896, designed by architect Paul J. Pelz (who later designed the Library of Congress). The church became vacant following the 1968 riots, and remained empty until 1982. Congregations came and went until the early 1990’s. The church is currently owned by the Washington DC architecture office of DLR Group. Plans for the site are currently pending.
Paul Emmons encouraged me to begin interpreting the site through a musical lens. As a jazz drummer, I wondered how I could “percuss” the site, as a method to audibly understand the neighborhood’s urban morphology. Marcia Feuerstein recommended exploring Washington’s historic Baist Real Estate Survey maps for detailed atlas information surrounding the site.

In the act of playing the drum set, basic “drum beats” are created by overlaying simultaneous rhythms performed by the limbs of the body. For example, the right foot may create a pattern on the bass drum independent from the left hand on a snare drum. I began to think of the streetscape elements represented by the drum set: the snare drum as a row house, the bass drum as an intersecting alley or street, the ride cymbal as footsteps on the sidewalk.

After visiting the map division of the Library of Congress, I chose to document the morphology of V Street for the following years: 1887, 1919, 1960, and the current conditions of 2015. I printed the maps and began to project lines from the streetscape elements. I organized these elements into a standard 4/4 time signature. I then performed and recorded these studies on my drum set. The following pages illustrate this analysis.

The image above illustrates the overlaying rhythms of a basic drum beat. The image to the left illustrates how a quarter note becomes subdivided into eighth notes. While the feel of jazz greatly depends upon the listening and communication of musicians, the traditional “swing” of jazz originates by subdividing the quarter note into triplets.
Scoring the Street
10th & V St. NW

As I listened to the four different rhythmic years of V Street, I recognized how the sound and consistency of the row-house tied each year together. I began to think of the historic 12’ row-house as the “heartbeat” of DC.

My committee suggested that I zoom in to the site and explore the area in greater detail. Transitioning from plan to elevation, I sought to understand the rhythmic layers and composition of the streetscape. In jazz, the band director holds a master score. As a tool for teaching and rehearsal, this score layers the music of each instrument on a single page. I used this method to explore the complexities of windows, doors, alleys and building form along the site’s bordering streets, V St NW and 10th St NW.
V St. Rhythm Score
streetscape elevation collage
As I continued to consider the row-house as DC’s inherent heartbeat, I assigned this typology the value of a single quarter note. I began to think of windows and doors as subdivisions of the quarter note. The diagram to the right illustrates these values. While a quarter note may represent a row house, it may also represent an empty lot, alley, or even a commercial garage door. As buildings grew in size and scale, the quarter note subdivision remained fairly consistent along the street.
The first thing an architect must do is sense that every building you build is a world of its own, and that this world of its own serves an institution.

-Louis Kahn

After completing the rhythmic site studies, I began to clarify a program for the project. As a new physical home for the Thelonious Monk Institute of Jazz, I believed the project should equally serve the student, artist, patron and neighborhood. I created a variety of program narratives to build upon the institute’s commitment to jazz education.

During the academic year, the center would provide after school/weekend music programs for K-12 students. Local musicians have the opportunity to rent practice rooms for private instruction. In the summer months, the center would host a variety of jazz camp programs for middle/high school students. An integrated dorm/housing suite facilitates these residential programs. During the non-summer months, the housing facility would transition into a hostel operation, providing a continuous stream of revenue. Additional sources of revenue would include the provision of ground floor retail spaces along V Street, and an instrument repair shop. Simultaneously, the center would host an artist-in-residency program for two professionals. Funded by grants, the residency program would provide private housing, as well as shared composition spaces, a music library, and recording studio.

A Music Hall for 300-400 patrons becomes the heart of the project. The Monk Institute would host a year-long calendar of student and professional performances, contributing a new venue to the night life culture of Greater U Street. The following drawings represent the project’s compositional progress.
A local architecture firm in Washington DC owns the historic church with plans for re-use. They graciously provided PDFs of the building’s existing condition drawings. I re-drew the documents for simplified representation. The building resides as a load-bearing masonry and heavy timber structure. Since the firm’s ownership, restoration work has begun on the exterior including the replacement of windows and the clearing of overgrowth and debris. While the bones of the building remain strong, the interior requires substantial renovations.

The Church’s southern exterior wall was built as a party wall, intended to align with an adjacent building. Since no building was ever constructed, the brick party wall remains exposed. I loved the idea of celebrating the wall’s raw and tactile beauty within my contribution to the site.
After fully documenting the existing building, I needed a muse to incorporate my previous studies with the design process. Since Jazz music originated in New Orleans, I looked to the city’s musical traditions for inspiration. The music of New Orleans was shaped over hundreds of years by the multicultural influences of the city’s colonial rule by the French and Spanish, and from the immigrants and slaves from Africa and the Caribbean. The tradition of the “Second Line” evolved from jazz funeral parades, where “life is celebrated and death is honored.” Neighbors would hear the bands marching through the streets, and join the party, hence becoming the parade’s second line. The bass drums would provide a consistent beat to align with each marching footstep. Snare drums would begin to overlay different rhythms and accents. A band leader would provide written melodies for brass musicians, allowing the band members to play and harmonize among the rhythms of the drum line.

As I continued to think of the row-house as the heartbeat of DC, I related the typology’s historic 12’ module to the quarter notes of the bass drum. As quarter notes become subdivided into four sixteenth notes, the 12’ row-house becomes subdivided into four, 3’ segments. These 3’ segments hold the potential to become doors, windows, or mullion spacings within the project. As marching snare drums overlay rhythms and accents over the bass drum, doors and windows become accents within the form of the architecture. While listening to various Second Line patterns, I composed an elevation study model. While the project design and form was unknown, this model clarified the project’s compositional and structural ordering system.
Zooming out from the site, I discovered the 12' row-house module related to the widths of streets, sidewalks, and front yard setbacks. Sidewalks, alleys, and front yards range from 10'-12' in width, while streets range from 24'-36' in width. I began to subdivide the context into 12' quarter notes. Larger buildings of greater widths became tied quarter notes, yet still remained roughly divisible by 12'. I then counted the number of quarter notes available on each of the site’s borders.

On 10th St, the historic church provided 3 notes, and the adjacent empty lot provided 5 notes. The space along V St provided 11 notes.

I looked for an inherent rhythm within the form of the church. The large stair tower on the building’s northern end forms the tallest point of the building. I viewed this architectural expression as an accent within the composition. The diagrams above represent possible formal gestures for the project to continue the accented rhythm along 10th St. The diagrams to the right illustrate rhythmic possibilities along V St.
Inherent Triplets
Footsteps & Vertical Movement

Digital Image: Play and listen!
Study Models
Massing Quarter Notes & Accents

I began to create a variety of massing models to explore the program’s organization within the site. I utilized the 12’ row house module as guiding principle for composing different schemes. Given the context of the existing Church, I believed the project should manifest as a complex of buildings, each holding a unique identity. A large music hall would become the heart of the project, acoustically isolated from the other programmatic elements.

Throughout this process, I realized the project required more space. In discussion with my committee, I chose to remove the two remaining garage structures on the site’s eastern edge. This allowed the project to border two streets (south and west), and two alleys (north and east). Images “f” and “g” show the expanded massing concepts.
Structure & Material References

The desire to create a cohesive complex of buildings brought forth complex structural opportunities. Should the complex manifest a single structural material? How can the vertical register of music relate to the project’s structural composition? I first looked to the structural desires of the music hall. I believed a reinforced concrete structure would achieve strong acoustic isolation and provide flexibility for the design of seating and balconies.

While a concrete structure would support the primary public spaces, I desired the private spaces, such as practice rooms and housing, to provide a warmer less institutional setting. Susan Piedmont-Palladino suggested to explore timber as a material for superior acoustic qualities. With further research, I discovered the Bullitt Center in Seattle Washington. Designed to operate as an energy and carbon neutral facility, the project utilizes heavy timber construction above a reinforced concrete podium.

The human act of making music requires air. A trumpet cannot sound without the breath of a performer. A drum cannot achieve tonality without a space to resonate. When thinking of materials, I desired the building to take these breaths. For the exterior, I utilized a concrete rainscreen cladding system to provide tonality to the facade while contributing a new grain to the fabric of Greater U Street.
The drawing below illustrates the early spatial development of the music hall and central courtyard. I desired to create an adjustable wall that would provide varying degrees of audible and visual connections between both spaces, contributing to the improvisational life of the institution.
Preliminary Plans & South Elevation

Taking lessons from the “Second Line” elevation study, I began to organize a structural grid, divisible by sixteenth notes. As a sixteenth note = 3’, I began composing rhythms and groupings of windows influenced by the program of each space. The elevation drawing illustrates a step forward in detail from the previous massing studies.

The south elevation is composed of three structures (unified by sky bridges and the ground level), pertaining to practice, performance, and residence. Each structure is separated by a rest, two entry courts which lead to a large central courtyard behind the music hall. The preliminary floor plans below illustrate initial studies in creating a unified complex of four buildings, including the adaptive re-use of the First African New Church on the northwest portion of the site.
Final Performance | Listen Again
Site Plan

Situated one block north from historic performance venues, nightlife, and mass transit, the site serves as a typological threshold between residential row houses and mixed-use commercial buildings. This location allows The Thelonious Monk Institute to sit slightly removed from the activity of U Street and develop a new identity, while both leveraging and contributing to the culture of the neighborhood.
Dedicated to serving the artist, student, patron, and neighborhood, the project holds a variety of entrances. The lobby for visitors is accessed from the western entry court on the ground level, facing V St. An exterior stairway leads to the central courtyard, while students, staff and artists may enter a variety of limited access entrances to the education suite and housing.
Section b | Music Hall

The music hall and central courtyard reside at the heart of the project. A multi-layered “Intermission Window” sits behind the stage. With the ability to function as a balcony, a transparent boundary, or an opaque sound barrier, the window provides varying degrees of audible and visual connections to the central courtyard, contributing to the improvisational life of the institution.

(additional illustrations on pages 70 & 71)
While the complex appears to reside as separated structures at street level, each building holds connections at both the ground level and basement level. The western building houses the main lobby spaces on the first and second levels. An instrument repair shop faces 10th St. The third and fourth levels are devoted to education, housing practice rooms, a theory classroom, a midi lab, and student meeting spaces. The music hall with seating for 340 patrons resides at the center. The east building holds a small music venue at ground level, with student housing/hostel dormitories above. This arrangement provides multiple realms for living, working, practicing, and performing within the singular institution.
South Elevation

The south elevation is composed of three structures, each holding inherent rhythms divisible by 16th notes. In addition to expressed steel and glass, the facades utilize a concrete rainscreen cladding system. While the education and residential structures respond to the tonality of the existing church’s brick exterior, the dark concrete of the music hall becomes a central accent for the complex.
West Elevation

The west elevation continues the accented expression of the historic church: first the church tower, next a staircase, then an ensemble room. Additional practice rooms face the street, providing musicians individualized platforms of performance. The restored church entrance provides additional access to the music library, composition suites, and the adapted third floor sanctuary/rehearsal room.
Section Perspective

The project’s central staircase serves as the connecting knuckle between the levels of the historic church and the new addition. Users occupy the stair while experiencing the raw, tactile quality of the church’s original party wall. To enter the music hall, visitors enter on the ground level and ascend to the main public lobby on the second level. To distinguish the realms of public and private, the building structure transitions from reinforced concrete at the lobby levels to a heavy timber frame for the education suite above.
Student Rehearsal + Recording Room
adaptive re-use of church sanctuary

Intermission Window
connections to music hall and central elevated courtyard
Music Hall
a student’s perspective

Music Hall & Choir Loft
a patron’s perspective (intermission window closed for performance)
Music Hall | Detail Model
Bibliography & Image Credits

Selected Readings


All other images, collages, and drawings produced by the author.