2012

Broad to Marshall Bridge | A City Block Interior That Separates and Connects Place

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This is a project about an old city block.

It once housed confectioners, jewelers, restaurateurs, pharmacists, and retailers in street-level parcels with residents in the apartments above. Now, it is home to a barber, a few restaurateurs, and street vendors. Over 200 years of building and development have shaped what is now the north 100 block of E Broad Street and although most of it still stands, it shows the effects of renovations, time, and neglect.
This is also a project about paths.

As sidewalks move pedestrians along streets they provide paths to retailers, employers, homes, and places to gather and be. Instead of traveling alongside the city block, this project proposes a pedestrian path through it. By stitching together a series of fractured building parcels, the path begins and ends three hundred feet apart at the sidewalks of Broad and Marshall streets.
Lastly, this is a project about movement.

This bridge between Broad and Marshall Streets serves as a bridge between two different types of places. The collection of parcels that are united in purpose for the sake of this work touch with walls, floors, and ceilings and where they do, create opportunity for passage. Horizontal movement through the city block happens through large volumes defined by planes and program. Vertical movement occurs through perforated shafts and open layers that allow for users to comprehend distance and direction traveled.
As **curator** I see collections and connections. I question the order in which information is distributed and the effects of juxtapositions and layers.

As **editor** I analyze intention and impact. I use filters to negotiate the necessary and desirable.

As **artist** I question the definition of this space at this moment for these people. I delay function and use, for a moment, to explore the unknown.

As **documentarian** I acknowledge my role in the chronology; I harness the skills of both the journalist and the story-teller.

As **observer** I witness and process. I think more than I feel.

As **maker** I love and hate gravity. I act on successes and failures. I feel more than I think.

I think of myself as part curator, part editor, part artist, part documentarian, part maker, and part observer; a designer.

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I interact with light and dark, soft and hard, obvious and obscure, sensitive and callous, the opposite and the similar and the points in between.

Rather than seeing interior or exterior I see the points along the lines creating edges and filling gaps; together defining and describing space. These points are manifestations and representations of events past and ideas future that share a set of unifying characteristics. I see these characteristics as dependent upon regional, cultural, economic, and personal qualities that, as design criteria, allow each exercise to be unique.

I categorize these combinations so that I can process and communicate aesthetic and ideology. It is my nature to make associations and I choose to study, interpret, and selectively use criteria to create habitable spaces; in the process contributing to a beautiful temporal landscape.
1.3 Thesis Statement

To give five parcels and three rooftops that were born independently of each other, yet attached, identity through shared purposes.

To create a path between Broad and Marshall Streets that is specific to pedestrians and different than sidewalks along 1st and 2nd Streets.

To design spaces within and along the bridge that feel personal to residents and allow visitors to see a glimpse of Richmond's soul and vibrancy.

To plan openings and planes that speak to time and seasons, embracing natural light and exposure to natural elements.

To develop a program that engages people actively and passively by focusing on spaces that allow for the exchange of goods and also of ideas.
2.0 Research

2.0.1 Parcel 112 basement level
The project site is the north 100 block of E Broad Street in downtown Richmond. This city block is comprised of parcels, five of which are within the project scope. The streets defining this city block are Broad, Marshall, 1st, and 2nd Streets.
Jackson Ward, Gilpin and Monroe Ward are residential neighborhoods with architecture representing more than a century of Richmond history. The Maggie L. Walker National Historic Site four blocks from the project site and nearby are the recently renovated Hippodrome Theater and the Greater Richmond Convention Center. Details from Gothic, Greek Revival, Italianate and Late Victorian styles are exhibited in public buildings and single family homes. Once called “The Harlem of the South,” Jackson Ward is still home to restaurants, shops and residents although much of its building stock is in decline.

Virginia Commonwealth University and the Medical College of Virginia campuses continue to grow and develop new property in the adjacent neighborhoods. This has increased the need for student housing, retail and parking in the surrounding blocks.

Hollywood Cemetery is on the US National Register of Historic Places with a garden landscape and wandering paved paths through sections of headstones and crypts dating back to the mid-1800s. The State Capitol grounds include acres of green space frequented by Richmonders and tourists during daylight hours. Monroe Park and Shockoe Hill Cemetery are lesser known sites and landmarks that offer park amenities and green spaces.
Harvey’s Progressive Barbershop anchors the corner of 1st and Broad Streets below a local landmark; the Coca-Cola sign. In 1980, Standard Drug’s application of a monolithic aluminum storefront was still visible. It covered parcels 102 - 110 E Broad Street extending from level 02 to the roof. In the mid-1990s it was removed.
In 1890, Broad Street was a dirt-paved main artery for horse-drawn vehicles and pedestrians. Telephone poles, wood-frame, and masonry buildings at an average of three-stories lined the street.

By the 1920s, trolley cars and automobiles, in addition to horse-drawn vehicles and pedestrians, crowded the cobblestone-paved street. Infrastructure needed for electricity impacted streets and buildings.

In the 1950s, a central median addressed the need for designated automobile lanes. A monolithic aluminum storefront was added to parcel 102 - 110 when Standard Drug purchased and remodeled.

<table>
<thead>
<tr>
<th>Site</th>
<th>Evolution of Broad Street</th>
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<tbody>
<tr>
<td>2.1.3</td>
<td>1920s intersection of 7th and Broad Streets</td>
</tr>
<tr>
<td>2.1.4</td>
<td>1919 intersection of 6th and Broad Streets</td>
</tr>
<tr>
<td>2.1.5</td>
<td>1920 Broad Street - west of project site</td>
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<tr>
<td>2.1.6</td>
<td>1950s intersection of 1st and Broad Streets (Standard Drug storefront visible to the right)</td>
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By 1990, a fully developed and landscaped Broad Street median allowed for additional infrastructure like street lights, stop lights, and signage. The asphalt-paved streets had developed into three lanes traveling in each direction for buses and automobiles. Bike lanes were not provided. Pedestrian traffic was concentrated on sidewalks and designated street crosswalks.

In 2011, the Standard Drug aluminum storefront had been removed and the majority of the east 100 block of Broad Street was vacant. Many of these parcels became vacant when Standard Drug was purchased by CVS in the 1990s. Street vendors are now present on weekends and weekdays selling jewelry, CDs, ephemera, and clothing. There are bus stops along the block on both Broad and 1st Streets. As there are still no designated bike lanes, cyclists occasionally use the sidewalk. This area is no longer Richmond’s central retail and banking district.
2.1.9 Sanborn Map (left) - current city block site plan (right)
Richmond Sanborn Fire Insurance Maps provide lease lines and dates valuable in understanding parcel edges prior to Standard Drug's acquisition.

The north 100 block of E Broad Street was radically altered in the 1950’s when Standard Drug purchased approximately five parcels. During the remodel, dividing walls on level 01 between parcels, were demolished to create an open general store with entries at Broad and 1st Streets.

After selling Standard Drug to CVS, parcels 102 - 112 were purchased by Douglas Development in 2005. The property is zoned as B-4 Business and acreage is approximately .45 acres.

Parcels 102 and 104 are two-stories while parcels 108 and 110 are single-story spaces with access to a basement. Parcel 112 was three-stories high until it collapsed in 2011.

Key | Scope and Square Footage

- **current and proposed:** vacant and occupied parcels not in the project scope for level 01
  - ~ 50,000 sf

- **current:** paved parking lot (exterior)
  - **proposed:** The Grove, General Store both in project scope for level 01
  - ~ 14,000 sf

- **proposed public rooftop parks in project scope for levels 3A, 3B, and 3C**
  - ~ 9,000 sf

- **current:** vacant building interior
  - **proposed:** Market Place, Market Plaza, Kiosks, The Courtyard, The Community Wall, project scope for level 01
  - ~ 11,000 sf
Key | Scope and Square Footage

- current and proposed: vacant and occupied parcels not in the project scope for level 01 or 02  ~ 57,500 sf
- current: paved parking lot (exterior)  ~ 14,000 sf
- proposed: The Grove, General Store both in project scope for level 01
- proposed: public rooftop parks in project scope for levels 3A, 3B, and 3C  ~ 9,000 sf
- current: vacant building interior  ~ 3,500
- proposed: Restaurant project scope for level 02
Construction on the city block began in the 1890s and lasted through the 1920s with ongoing renovations as tenants changed. Masonry, wood-frame, and steel-frame structural systems are represented. Plaster was laid over wood lath and some of the upper levels show signs of wallpaper and wall sconces - remnants from apartments. Four different column types are visible in parcels 108, 110, and 112. There are large holes in masonry walls where anchors and braces have been removed. Level 01 is open to the outside through parcel 112 and the loading dock and therefore has the same air quality as the exterior of the building. Light filters from those points into the building. The storefronts are boarded and do not allow light. Level 02 is very dark due to all windows having been bricked and filled. The rooftops provide views in all directions and are accessible by stairs only. Trees along Broad Street are tall enough that they extend past the rooftops. Street sounds are loudest on level 01 and the rooftops. The remains tell the story of the construction, demolition, renovation, and abandonment of these parcels.
Building | Existing Conditions | Color and Texture

peeling paint on storefront cement, peeling paint over ceiling tiles, plaster over brick, fading plaster, peeling wall-paper
The storefronts are the name tags: the “hello, my name is____”. The Broad Street storefronts are a mix of styles and materials that give insight into the history of Broad as a retail center for the city. Look above the entries and new details emerge.

During removal of the Standard Drug aluminum storefront much of the original brick and stone building facades were damaged.
What is asked of a storefront?

It reveals an interior to entice customers and an exterior to provide patrons with views. It conceals the interior to create mystery and the exterior to provide privacy. It also provides a time-line for understanding the evolution of a city block.
Building | Existing Conditions | Loading Dock

- Existing Conditions:
  - Loading Dock

- View Options:
  - East view from 1st Street to the loading dock at the back of parcel 110
  - View to Broad Street, from the loading dock, through parcel 110 (elevation change from loading dock to parcel 110 = 1' - 7"

- Additional Descriptions:
  - South view from Marshall Street into the loading dock at the back of parcel 110
  - Northeast view from 1st Street to Jackson Ward, alongside the parking lot in the northeast corner of the project site

- Building Features:
  - Layered
  - Tiered
  - Colorful
  - Portal-like
  - Blunt
  - Geometric
  - Reduced
  - Annexed
Site Descriptors

Building | Existing Conditions | Parcels 108, 110

- open
- hollow
- peeling
- skeletal
- colorful
- informative
- muted
- haunted

View from within parcel 110 - loading dock to the right

View through parcels 108 and 110 in the loading dock

(opposite) View through parcel 108 and 110 in Broad Street
Building | Existing Conditions | Parcel 112

View from within parcel 112 to the north, toward the main building.

View from level 03 of parcel 114, into parcel 112, looking north.

South view from within parcel 112 to Broad Street - storefront remains.

View from within the main building to the south, toward parcel 112.

View from within parcel 112 to the north, toward the main building.

alive
colorful
soft
secretive
layered
exposed
amputated
calm
joyful
contradictory
unglued
Building | Existing Conditions | Parcels 102, 104

parcel 104 storefront

(apposite) parcel 102 storefront

contained
sealed
defined
pierced
split
The Broad Street storefronts have the ability to read as a solid face that runs the length of the city block. Upon inspection, it is revealed that each storefront is independent. The bass wood, laser-cut, storefronts shown on the opposite page were part of an exploration for this analysis. The storefronts were ultimately cut as separate pieces to be used in a scale model for the site.
view from rooftop 3C, north toward Jackson Heil

view from rooftop 3C, toward rooftop 3B and Broad Street - door opens to existing stair leading to parcel 104 (shaded/hidden in project schematic)
Building | Existing Conditions | Columns Level 01

<table>
<thead>
<tr>
<th>Column Type</th>
<th>Description</th>
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<td>Column Type 3</td>
<td>Steel</td>
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<tr>
<td>Column Type 4</td>
<td>Steel</td>
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The only documentation available for existing conditions was a basic site plan that included parti walls, some stairs, and doors. Dimensions were verified through site visits during the fall of 2011 and spring of 2012 to use in drafting interior elevations, building sections, and floor plans.
2.3 Site and Building Research | Summary

The project site provides significant and abundant details from which solutions can be drawn. However, it is not enough to only allow existing conditions inform the current design. Understanding the site’s history adds texture and dimension.

The city block was built over time and based on the needs of a city during the late 19th and early 20th centuries. Those needs are similar today in that Broad Street is slated to become, again, a center for retail and a vibrant neighborhood for residents, patrons, and tourists.

The specific parcels in this project no longer resemble their original forms yet they keep parts of their original outlines. The masonry walls are rich in color and texture and provide warmth in an overwhelmingly vacant space. Seeing sky and hearing birds while in parcel 112 or on the rooftops provides an incredibly relaxing quality amidst loud buses and voices.

Restoring the Broad Street storefronts and modifying them in a way that responds to their new lives feels right. Jackson Ward is a neighborhood where neighbors are greeted on front porches and stoops. Broad Street is a neighborhood where patrons are greeted through advertising and glass.

Broad Street’s storefronts are not one-dimensional; they change as they move from street to roof. As streets level they are at their most transparent. The facades of the second and third levels reveal less about the retailer and more about the building style.

Accessibility is a challenge for these buildings with multiple level changes between parcels 110 and 112, the grade change between Broad and Marshall Streets, and the lack of an existing elevator or adequate means of egress from the rooftops.

| Street Section Diagram - Proportions and Sight Lines |

| Block Plan Diagram - Access Intersections and Lines |

| Access | Sight Lines Levels 01 and 02 | Sight Lines Rooftops |
2.4 Case Studies
Case Study | North Christian Church
Columbus, Indiana
Eero Saarinen
This is a case study about site and path. The North Christian Church is located on a flat, 5.5 acre, suburban, site on the north side of Columbus. It was completed in 1964.

The immediate site is landscaped and suburban but the greater “site” that is significant as an endpoint for this unique path would be earth. How does a building become a vessel to facilitate passage or connection, spiritually or mentally, between this world and another?

“...So I think this sanctuary should be elevated and make you climb up to it. There is another reason why this church must be elevated and that is the site. It is a flat site in a residential district. The church must be elevated so that it stands proudly above the parked cars and the surrounding little ranch-type house and can be seen. There is another thing about the approach... Now, this church will have a cemetery connected with it. I think it might be a good idea to place the church in the center of the cemetery. Then every time they came to church, people would have to face up to the stark reality that man is not immortal. Cemeteries can be beautiful places...”

— Saarinen (works cited)

When the endpoints, this world and the next, are so heavily emphasized, what weight does the path between them bear? It flexes and shifts as decisions are made by the pedestrian and is susceptible to influence.

When the path occurs mentally what are the triggers, like change in elevation or change in lighting, that provide the momentum?
"...After the approach, there is the act of entering. There should be awareness of a changing environment, like a decompression chamber from the outside world into the church. Maybe you would go down and then up again into the sanctuary. The light, of course, would begin to change, too."

"...Maybe we can even have a sort of reverse seating - that is, with the seating coming from the bottom and narrowing up toward the center, like a pyramid or a cone, with the communion table at the summit and the pulpit suspended even higher on one side. Every one would be joined in looking upward, instead of down at the back of some one’s head. I don’t know. We will have to see if that would work with sight lines and circulation of the congregation. It may very well not.”

— Saarinen, 1960

![Building Photo](image1)

![Saarinen’s Sketches](image2)

![Site Plan](image3)

![Building Section](image4)

![Building Photo](image5)

Daylight through oculus

Bowl-shaped main sanctuary

Daylight-filled ambulatory space

Lead-coated copper and steel supports

Site
This is a case study about program, site, and strategy. The headquarters for German bank, HypoVereinsbank, were previously located within the block in what was once Munich's central banking district. HypoVereinsbank moved in 1998 and the construction of Herzog + De Meuron’s competition-winning concepts were completed by 2003. Funf Hofe’s five courtyards and the connecting passages are spaces for retail shops, restaurants, residences, galleries and offices.

“...What initially appeared to be a disadvantage, proved a stroke of good luck. Instead of having to contend with the facades of the historical neighborhood, intervention in an existing structure made it possible to create unexpectedly exotic spaces. The buildings acquire volume and shape by being placed like fillers around the spaces cut out of the interior of the block.”

– herzogdemeuron.com (works cited)

The spaces between become a path providing access through a city block. The existing buildings that give shape to this path push and recede creating room for programmatic elements to occur. As the path “envelopes” these elements they, in turn, create momentum.
Funf Hofe translates as five courtyards which are named Amirahof, Maffeihof, Perusahof, Portiahof, and Viscadihof. The four streets creating this city block are Theatinerstraße, Salvatorstraße, Maffeistraße, and Kardinal-Faulhaber-Straße. Five distinct personalities are exhibited through these courtyards. Open to above, the courtyards and several passages provide natural light and the feeling of a city contained within the block - an inner city.
Case Study | The High Line
New York, New York
2009 section 1, 2011 section 2
Diller Scofidio + Renfro

This is a case study about site, program, and path. The overall site is the Lower West Side of Manhattan which is comprised of smaller sites; Chelsea, the Rail Yards, the Meat Packing District, and the Gallery District.

The project inserts a new place within these existing sites and yet does not obscure them. The program is both loose and strict - how is a public park made personal?

"Interpretation of inheritance"
- dsrnyc.com (works cited)

There is an interdependence between path and points along the path in this particular case study. The surroundings and the associated views influence the program and space planning yet the defined path (an existing elevated train track) also influences these things.
The High Line has multiple access points along its one and a half mile run. The stairs at these access points lead park visitors from street level to park level through an opening meant to emphasize the shift in elevation. The park follows an existing path carved through several neighborhoods by the old elevated freight rail line. The lower section begins in the Meat Packing District and winds its way north through Chelsea, Gallery District and ending at the Rail Yards. Although the neighborhoods change the design of the High Line does not. Built in the 1930s, the High Line lifted freight trains 30' above street level.

Views, sight lines and the High Line’s wild, overgrown and natural past influence the current landscape. Flexible, multi-use, gaps allow the community to insert themselves into the plan.
The Zaragoza Bridge Pavilion was designed to be a bridge, gateway and pavilion for the 2008 Expo Zaragoza in Zaragoza, Spain. This case study is about path and site. The site is the Ebro River and the shores on either side. As a bridge between two shores, the basic project criteria included moving people from one side to the other. As a pavilion, the challenge became to move, stop, and gather.

"...The Zaragoza Bridge Pavilion is organized around 4 main objects, or “pods” that perform both as structural elements and as spatial enclosures. The Bridge Pavilion design stems from the detailed examination and research into the potential of a diamond shaped section – which offers both structural and programming properties. As in the case of space-frame structures, a diamond section represents a rational way to distributing forces along a surface."

— dezeen.com (works cited)

The form and program are more independent of each other in this program. There is more of an awareness than an influence by either element of or upon the other. Where the “pods” taper or open to engage views to the surrounding sight the gap shrinks. When there is less of a relationship between the form and the activities occurring within the pavilion spaces the gap grows.
The bridge pavilion is both a means of travel across the Ebro River and a destination for those exploring the Ebro and exhibits on display inside.

The bridge pavilion’s program is that of an interactive exhibition space. Each pod has a unique character and the overall shape and structure create buffers and transitions between them. The overall length is 885’ from river bank to river bank.
Case Study | A Line Made By Walking
| A Snowball Track

England
Richard Long

A Line Made By Walking was created by Richard Long walking back and forth, in a field, for hours until the flattened grass caught daylight in a way that created a visible line. In A Snowball Track, the path is dictated by the mass of accumulated snow that is constantly changing and therefore the path is somewhat less predictable than say, the path created by Long in A Line Made By Walking.

In both works there is an intervention in the landscape. Long explored measurements of time and distance through lines and movement. What are the points along the path that direct the path - what creates change or momentum? What is the relationship between the intervener and the intervened?

This case study is about path and process. It is an exception to the set of four paths used to describe the previous four case studies. Richard Long's interventions upon landscapes took advantage of the unpredictable forces of nature. Forces like the way light reflects off grass or snow clumps to make mounds. The path is so heavily influenced by these forces yet these forces are beyond our control. In the other case studies, “lines” and “points” are identified and the relationship between them determines their path type. The points at which Richard Long’s paths change direction, shape, size, or type appear to be random but are controlled by nature. Long seems to embrace the relationship between the intervener, the landscape, and nature.
The Block was a sculpture installation I created in the spring of 2012. Using a language of unfinished, bass wood blocks, in five different shapes and sizes, in combination with a sound track made of ten field recordings from the thesis building site, I created paths through a room. The inspiration was Richard Long’s A Snowball Track and the desire to explore the distance travelled between the Broad Street and Marshall Street sidewalks through sound.

The installation site was a critique room in the Fine Arts Building on VCU’s campus. To experience the piece, a laptop was used to play a four-minute soundtrack while viewers walked through and around the piece. The soundtrack was created by editing, looping and layering the ten field recordings.

The intention was to explore the ability and then inability, to identify individual sounds. Where is the tipping point at which the unique sound qualities become unrecognizable and the sounds instead become defined as a larger sound or mass?

The blocks were representative of sounds and their organisation dependant upon the layering and exposing of them. The paths were created in a way that responded to the soundtrack yet the viewer (and listener) experience was not timed so the experience did not necessarily provide viewers with that information. That element provided a challenge that seemed appropriate. My hand as the artist was perhaps most apparent in the soundtrack and lines created by the block layout. Conversely, my hand was perhaps least felt in the specific visible objects and overall environmental qualities, like, lighting.
2.5 Case Study Analysis

These case studies served as tools to understand paths, programs, sites, and processes. The project site was selected prior to the research and therefore the desire to explore the relationship between movement along a line and the spaces through which that line moves drove the development of the four path types. As the research evolved, several key conclusions developed:

- The site provides stimuli and is not a canvas.
- Movement requires momentum which is generated by engagement.
- Programmatic elements must attach themselves to tangible elements.
In Demetri Porphyrios’s writing, *Heterotopia: A Study in the Ordering Sensibility of the Work of Alvar Aalto*, he describes qualities of work considered to be homotopic or heterotopic.

“...Thus, if homotopia was an ordering sensibility growing out of its own devotion to link, and by linking to guarantee continuities, heterotopia will now grow out of the predilection to always circumscribe the autonomy of every ordering gesture, while by assuming the ever-changing criteria of an aphasic, it will always refuse to relate.”

According to Porphyrios, characteristics of heterotopia include:
- achievement of cohesion through adjacency (edges touch, fringes intermingle, extremities denote beginnings)
- un-matching appearances
- lack of predictable hierarchy
- never commemorates the transition in the joint
- never establishes bonds
- emphasizes singularity of parts

Are homotopic, rational and functional synonyms? Are heterotopic, irrational and organic synonyms?
The path is both horizontal and vertical and extends from Broad to Marshall Streets; from 3'-0" below Broad Street to level 02, and ultimately to rooftops A, B, and C. The Broad to Marshall Bridge provides an understanding of the city block through its ability to communicate building construction, technology, and economy that speaks to the origins of, and impacts upon, the site.

In order for the path to function it must have momentum. The program includes business types and activities that target residents of Jackson Ward and downtown Richmond so that the bridge can be used as both a means and an end.
3.0 Program

Site photo from within vacant parcel 114 (adjacent to project scope)
Market Place

Six kiosks offer goods on both sides of the main path between Broad and Marshall Streets. Patrons can purchase food and other goods as they move between the ends of the main path. The soapstone tile pattern touches both ends of the path at the Broad and Marshall Street sidewalks.

Community Wall

Printer and digital information sharing point for residents.

Program | Level 01 | Indoor

The programmatic elements of level 01 include, primarily, spaces for the exchange of goods. The Market Place and General Store sell goods while the Community Wall offers the ability to advertise them. The Market Plaza provides a place where these goods can be enjoyed alone or with others.

Market Plaza

Fixed and loose seating at the Broad Street storefront provides opportunities for people-watching and gathering. Seating closer to the central stair is looser and provides greater flexibility.

General Store

The grounding element at the Marshall Street end of the path that offers groceries. It overlaps with the "main path" and in the process becomes a more developed kiosk.
The Steps
A gathering place and front porch for the bridge where socializing and relaxing occur on terraced steps that wrap the north corner of the General Store and face the Jackson Ward neighborhood.

The Grove
A rehabilitated, landscaped park space that wraps the steps and buffers the bridge from traffic on 1st and Marshall Streets as well as provides green space for the neighborhood.

The programmatic elements of level 02 are, primarily, spaces that support the exchange of ideas. They’re loosely-programmed to allow for both social interactions and moments of introspection.

Courtyard
A loosely-programmed outdoor space comprised of ramps leading from the street level and “main path” to 3’ 0” below street level. It includes a stair to rooftop park 3C and is landscaped with soapstone terraces and vegetation on walls and floors. It provides an urban garden for moments of both introspection and discussion.

Program | Level 01 | Outdoor
Restaurant
The mid-point between the hustle of Broad Street and the distanced calm of the rooftops. Cocktail seating has views into the central stair through narrow windows connecting to circulation between top and bottom levels. The dining area looks out over Broad Street and into the Market Plaza. The menu offers individual and family style dining options which is re-iterated in the dining area seating configurations.
Access is available through the central stair and the elevator.

Rooftop Parks
A loosely-programmed and landscaped space for gathering, playing, and being. Views in almost 360 degrees provide connections to Broad Street, Jackson Ward, and beyond.
Rooftop 3A is accessible through the central stair and rooftop 3B. Rooftop 3B is accessible through the elevator and other rooftops. Rooftop 3C is accessible through the elevator, Courtyard stair, and rooftop 3B.

Program | Levels 02 and Rooftops 3A, 3B, 3C
The restaurant on level 02 provides patrons with the opportunity to understand the building in a unique way. Windows from the restaurant face north, east, and south. To the north, patrons enjoying cocktails look through narrow windows to the central stair. This stair is a major axis for the building providing access from level 01 to the rooftop parks. It has a glass ceiling at its west end meaning that in the afternoon and evening sunlight should reach the level 02 stair landing. The restaurant is also accessible by elevator. To the east, patrons can peer down into the Market Plaza below. To the south, patrons look out over Broad Street.
The restaurant is organized around a centrally-located bar that backs to the plating alley in the kitchen.
The Rooftop Parks are accessible via the central stair, Courtyard stair, and elevator. They are a combination of landscaped and hard surfaces and provide spaces for games, gathering, and being. The landscapes are unique to the neighborhoods they face meaning that rooftop C is the most diverse.
4.0 Process
Understanding a path involves analyzing the points creating the line. The diagrams to the left illustrate an analysis of level 01 and movement from side to side, a process of understanding volumes, terminations, and circulation. What are the different and similar characteristics of terminations at Marshall Street versus Broad Street?
Parcels 102, 104, 108, 110, and 112 were not all built at the same time. As the city developed, these infill projects led to what is now a solid row of storefronts on the south and east faces of the block. 1st and Marshall Streets are not completely lined with storefronts due to the paved parking surface covering the northwest corner of the block. As Standard Drug modified these parcels to create a super-store, parti walls were demolished and steel beams were added to span openings. This led to, what feels like, an amorphous, open space on level 01. The initial building analysis yielded an understanding of the existing column grids for each parcel and by overlapping these grids, modules became apparent. These modules aided in decisions regarding new walls to form the boundaries for the project.
Sketches and models assisted in the analysis of the existing conditions. Understanding the existing walls and surrounding parcels helped in decisions regarding new wall types and locations. The green in the sketch to the left represents an early idea for “pooling areas” where pedestrians would find pockets of space for introspection. Ultimately, this idea was altered to allow for “pooling” in the Courtyard and on the rooftops. Challenges included circulation and visibility to communicate dead-ends for pedestrians needing through-access.
Variations in color tone indicate density of city sounds relating to program elements. Red dots indicate possible circulation between entries at Broad and Marshall Streets. A difficult point occurs near the center of the city block where an intersection is created by entries into the alternate “fingers” extending off the main path.
Based on existing walls, existing column grids, program, and path analysis, an order emerged that gave form to one main path and two branches (or fingers) off that path. The dashed lines indicate different forms that became spaces for the "exchange of goods." The two smaller rectangles are small kiosks, the mid-size rectangle is a larger kiosk, and the largest square became the General Store. The two boldest, longest lines are the organizing walls from which kiosks and the General Store are suspended. Those two walls are obvious in the final floor plan and designate the main path that runs from Broad to Marshall.
These models use bass wood and chipboard to explore relationships between one primary path, two secondary paths and a change in elevation from below grade to rooftop. They were also tools in understanding the ways in which organizing elements dictate overall composition.
These models use bass wood and chipboard to further explore perimeters and the difference between hinges, intersections, and joints.
Process | Concept Models

- Use simply than represented
- Path interrupted by access to OS
- Easily lay of both paths affected by path standard but not broken
- Should quickly but not difficult to close
- Allows easy access to level OS
- Independent but connected by access

- More mix of significantly transparent
- Paths supported by access
- Not just connected to party and access but non-support for paths + access
- Main support + connections for model part through brown ta mat array
- Passed by people who forming queen?  

2 February connected north to main path
These models use combinations of bass wood, task board, foam core, chip board, and trace paper to explore circulation and volumes.

On this page the white task board yields to the bass wood and foam core forms.

On the following pages the voids represent literal and figurative spaces. The trace paper form mimics its host as if it is a memory that is loosely attached.
Once building and site analysis merged with program development, the concept exploration accelerated. The big idea was to create order within the existing fractured spaces and also form smaller spaces within the overall. It was based on the relationship of parcels to a city block and the desire for individuality within a mass. Once these ideas emerged the project slid along the scale more quickly between detailed interior to urban planning and the triggers that push toward one end of the scale versus the other.
Level 01 required rigorous analysis to understand the existing conditions. The program changed from a loosely-defined indoor park to a series of bookstores and eventually settled on a combination of retail and park space. This final program was based on the idea that this space should be something that residents both need and want. To be sustainable it must be flexible (kiosks provide opportunities for small business owners) yet consistent in its offerings. Based on site analysis there is a need for areas of respite which the Courtyard, Steps, Grove, and rooftop parks provide.

Adjacent parcels, not in the project scope, shape parcels 108 and 110, specifically creating boundaries.
The existing space has a stair to rooftop C and two sets of locker rooms; both of which would be demolished. Kitchen planning and flow dictated the use of an existing wall along the column line as the division between kitchen and dining.
The rooftops are currently accessible by one stair through parcel 104. In the proposed solution, the central stair would extend to rooftop A and a new Courtyard stair would access rooftop C. Shorter stairs would exist between all of the rooftops and elevator access would be available to rooftops B and C.

Accessibility, egress, access to direct sunlight and shade, and views were the main drivers in design decisions.
The proposed soapstone floor tile is in a pattern that varies over the length of the path between Broad and Marshall Streets. As the pattern moves away from the sidewalks toward the center of the city block, it loosens. This pattern is based on a 21' x 21' module found in the primary steel column grid. From that module came an alternating pattern of rectangles in different tones and finishes. The soapstone types are Old Dominion, Climax, and Clouds. The three finishes specified are honed, gauged, and brushed. This pattern and its tightening and loosening over the course of the main path was also influenced by the audio field recordings used in The Block and The Building, explained in detail in this book.
Two audio tracks were made from sixteen audio field recordings at the East 100 block of Broad Street in downtown Richmond, the project site.

Recordings for The Building communicate six different points along a path through four of the building parcels within the project scope. Recognizable sounds may include birds, water dripping, footsteps, rocks skidding, cars, buses, and human voices. Field recordings for The Building were taken between 3 - 5pm on weekdays in the spring of 2012.

Recordings for The Block communicate ten different points around the building’s exterior along the sidewalks of Broad, Marshall, and 1st Streets. Recognizable sounds may include human voices, car stereos, buses, doors slamming.

The project site stretches 300' from the sidewalk at Broad Street to the sidewalk at Marshall Street.
This story is about a blind mouse that lives in a building that used to be a grocery store. She's an old mouse and used to get fed pastry crumbs from the red-haired cashier but now settles for scraps from the dumpster left by construction teams at the loading dock. When she was younger, and not blind, the city block was packed with people visiting the shops and restaurants. Due to all the foot traffic, she usually traveled inside walls, or at night, to avoid being seen. Being a little claustrophobic, the narrow walls kind of freaked her out. When she explored at night, her favorite spot to visit was the top landing of a stair that led to the basement. It faced a storefront looking out to Broad Street and from there, if she sat near the landing’s edge, where the stair met the wall, she could people-watch without being noticed as people paraded by the window. It was like being at the movies, or so she’d been told, and sometimes her neighbor from the optical store would join her. If mice dated it would have been a date. After these non-dates, she would follow the edge of the floor, where it met the wall, all the way back to her parcel. Often, she scurried so close to the walls that she left a little streak where her fur wiped clean the dirty base-board.

One morning she woke up with a headache that turned to dizziness that, before she knew what was happening, turned to blindness.

Not even her mouse-doctor knew what caused it but he told her to stick to traveling inside the walls for safety’s sake.

After a few weeks of staying inside the walls she was miserable and freaked out. Then she heard a voice; it was her movie-buddy come to see why she hadn’t been at the stairs in a while. She explained and he listened and then he told her she should meet him that night, at the stairs, for the show. She didn’t see the point. He told her it would be good for her to get out.

This night, as the city block sounds changed, signifying the transition from day to night, she thought about the invitation. She decided it was better than staying inside the walls especially since she was gaining a little weight and felt even more claustrophobic than before.

She left the walls through a crack at the wall base and scurried along the edges, eventually arriving at the stairs. Her movie-buddy called out to her and she heard him move to sit nearby. As she listened to the sounds coming through the big window she became aware of her movie-buddy talking. After a few more seconds she realized he was narrating. He told her about the people, clothes, cars, bicycles, other animals like squirrels and birds, as well as the weather and the holiday decorations on the stores across the street. She asked him why he was narrating and he said it helped him remember the details for his novels.
The story of the blind mouse and the associated work of art shown on the previous pages stemmed from a sculpture assignment to bring narrative into a piece and then relay that narrative through layers of details.

A Mouse Romance created a space that glorified unassuming materials. It implied a sense of whimsy and magic. The mesh was distressed, bent, and frayed by hand to make undulating forms that mimicked cascading hair or water falls. It is meant to inspire feelings of playfulness and comfort. For a blind mouse on a date, even a carved-out hole in an old wall might feel this way.

The mesh strips were attached to the wall in an equally-spaced row. There was a sense of order in the construction of the piece that spoke to the construction of an actual wall system in which a mouse might live.

The piece was completed in the spring of 2012 and installed in a VCU Fine Arts Building critique room. Materials include light-gauge aluminum mesh, aluminum wire, nails, and newspaper.
5.0 Solutions
WHAT IS A PATH?
The path is both horizontal and vertical and extends from Broad to Marshall Streets and from 3’-0” below Broad Street (base of the courtyard) to 1’-7” below Broad Street (Marshall Street) to Broad Street to Level 02, and ultimately to rooftops A, B, and C. The Broad to Marshall Bridge provides an understanding of the city block through its ability to communicate building construction, technology, and economy that speaks to the origins of and impacts upon the site.

In order for the path to function it must have momentum. The program includes businesses and spaces that target the residents of Jackson Ward and Downtown Richmond so that the bridge is used as both a means to an end and an end (destination).

In the perspective to the right, the yellow wall is back-lit wood veneer. This wall occurs at both of the major intersections: at the central stairs and at the “joint” where circulation can turn to enter the courtyard. These walls are also where public rest rooms are located.

The soapstone tile pattern varies as it moves from Broad and Marshall Streets toward the heart of the city block. As it nears the center, the pattern loosens. This pattern is based on a 21’ x 21’ module found in the primary steel column grid. From that module came an alternating pattern of rectangles in different tones and finishes.

The soapstone types are Old Dominion, Climax, and Clouds. The 3 finishes specified are honed, gauged, and brushed.

The sounds of the city have a similar effect. At the Broad and Marshall Street entries to the bridge, the city is loudest and most chaotic. As the path moves away from the streets and into the city block interior, sounds become muffled and patterns are less identifiable.
PARCEL 102 | ROOF A
PARCEL 104 | ROOF B
PARCELS 108 AND 110 | ROOF C
PARCEL 112

SITE PHOTOS COURTESY OF TYLER KING AND EMILY SMITH

HISTORY OF A CITY BLOCK

1890
TELEPHONE POLES, WOOD-FRAME AND MASONRY BUILDINGS AT AN AVERAGE OF 3-STORIES - BROAD STREET WAS A DIRT-PAVED, MAIN ARTERY FOR HORSE-DRAWN VEHICLES AND PEDESTRIANS

1920
TROLLEY CARS, AND AUTOMOBILES, IN ADDITION TO HORSE-DRAWN VEHICLES AND PEDESTRIANS, CROWD THE COBBLESTONE-PAVED STREET. THE INFRASTRUCTURE NEEDS FOR ELECTRICITY IMPACT THE STREET AND ITS BUILDINGS.

1950
A CENTRAL MEDIAN ADDRESSES THE NEED FOR DESIGNATED AUTOMOBILE LANES. A MONOLITHIC ALUMINUM STOREFRONT IS ADDED TO PARCELS 102 - 100 WHEN STANDARD DRUG PURCHASES AND REMODELS.

1990
A FULLY DEVELOPED AND LANDSCAPED BROAD STREET MEDIAN ALLOWS FOR ADDITIONAL INFRASTRUCTURE. TRAFFIC LANES ACCOMMODATE 3 LANES OF TRAFFIC IN EACH DIRECTION WITHOUT DESIGNATED BIKE LANES.

PHOTOS - FROM TOP
1   EXTERIOR VIEW ON BROAD STREET FACING NORTH
2   INTERIOR VIEW FACING SOUTH TOWARD THE BROAD STREET ENTRY IN WHAT IS PROPOSED AS THE "MARKETPLACE"
3   VIEW FROM WITHIN THE PROPOSED "COURTYARD" FACING SOUTH TOWARD BROAD STREET
Section 1 - north / south section through the main path from Broad to Marshall Streets.
Section 2 - east / west section through the Courtyard stair and central stair (following page)
NOT IN SCOPE

OPEN TO ABOVE

ROOFTOP C

ELEVATOR ACCESS TO MARKET PLAZA
AND ROOFTOP

MARKET PLAZA
COURTYARD

SOAPSTONE,
LANDSCAPED
TERRACES

SCAFFOLDING-LIKE STAIRS
PROVIDE ACCESS AND EGRETES
TO / FROM THE ROOFTOP

LANDSCAPED MOUNDS FOR
RECLINING, PLAYING, AND
GATHERING

ACCESS TO RESTAURANT
ACCESS TO ROOFTOP A

COCKTAIL SEATING AT WINDOWS
The yellow wall is back-lit wood veneer and this wall occurs at both of the major intersections on level 01. The central stair / Courtyard stair is intersection #1 and the "joint" where the main path turns into the Courtyard is intersection #2. These back-lit walls also serve as way-finding elements signifying level 01 rest room locations.

Level 02 restaurant windows (to the left) open to the Market Place and Plaza.
Renderings were created using a combination of hand and computer-based techniques. To the left is a hand-drawn perspective based on a model built using Revit software. The perspective was rendered by layering marker, colored pencil, pen, and watercolor. Photoshop and InDesign were then used for final preparation. Some drawings were done on trace paper and scanned to take advantage of wrinkles and texture provided by the trace.

These techniques were used, in different combinations, for all of the project documentation.
SECTION FACING NORTH (MARTHA STREET) - TERRAZO KERSEY STORE

Restaurant - Proper Section Facing East

Documentation | Sections and Elevations
It all comes back to movement. The collection of parcels that are united in purpose for the sake of this work touch with walls, floors, and ceilings and where they do, create opportunity for passage. Horizontal movement through the city block happens through large volumes defined by planes and program. Vertical movement occurs through perforated shafts and open layers that allow for users to comprehend distance and direction traveled.

Sound familiar?

The previous sections cut through the main path and the primary intersection (01) highlighting the ways in which change in elevation triggers an evolution in the path.

Understanding the momentum necessary for movement and then the practical ways through which people could be moved through these parcels was a turning point in this project’s development.
A 1/16" scale model was built to explore both existing conditions and solutions. Bass/plywood in 1/8" and 1/4" thicknesses was used to illustrate existing walls. Task board was used to indicate new walls and chip board formed the site. Rooftop landscaping was indicated with scored, green basswood treatment and The Grove was modeled using dried plants.
Solutions | Model | Overall

[Images of architectural models showing various views of rooftop A, interior views with rooftops removed - Market Plaza, Market Place, The Courtyard, and intersection #1 - facing south, and interior and exterior views with rooftops removed - Market Plaza, Market Place, The Courtyard, Community Wall, The General Store, and The Grove - facing north.]

(apposite left) interior views with rooftops removed - Market Plaza, Market Place, The Courtyard, and intersection #1 - facing south

(apposite right) interior and exterior views with rooftops removed - Market Plaza, Market Place, The Courtyard, Community Wall, The General Store, and The Grove - facing north
The General Store (without roof) and The Stepsview facing south from Marshall Street into the main path - entry into The General Store to the right view facing southwest toward The General Store, The Steps, and The Grove

Solutions | Model | The General Store
exchange of goods at larger kiosks attached to the new wall defining the main path

exchange of goods at smaller kiosks attached to the existing wall separating parcels 110 and 112 (Courtyard)

intersection #1 cutting across the main path to connect the central stair and Courtyard
6.0 Conclusions

What began as a design challenge evolved into a project about the following:
- personal process
- rigorous investigation
- consistency
- defining place
- paths
- means of communicating time and distance
- joy through work
- intentionality
- urban context
- spaces within spaces
- wayfinding through layers
- sounds
- team and individual

“In the nature of things:

Art about

mobility,
lightheartedness,
and freedom.

Simple creative acts of walking and marking about
place,
locality,
time,
distance,
and measurement.

Works using raw materials
and my human scale
in the reality of landscapes.

The music of stones,
paths of shared footmarks,
sleeping by the river’s roar.”

-- Richard Long
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1.0 Introduction

1.1 Standard Drug Sign, 2011

2.0 Research

2.1 Parcel 112 Basement Level

2.4.1 N Christian Church Building Photo

2.4.2 N Christian Church Building Section

2.4.3 N Christian Church Saarinen's Sketches

2.4.4 N Christian Church Inside The Chapel

2.4.5 Northwest Facade Funf Hofe

2.4.6 South facade Funf Hofe

2.4.7 Persuasive Interior Courtyard Funf Hofe

2.4.8 Perforated Bronze Skin Details Funf Hofe

2.4.9 Seating Area High Line

2.4.10 Night View Zaragoza

2.4.11 View The Line, Azure, September 2011, pp 102-107

2.4.12 Schematic Rendering Zaragoza

2.4.13 A Snowball Track

2.4.14 A Line Made By Walking

All images not cited taken by Emily Smith.


9.0 Works Cited