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### Mapping The Unseen

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## Mapping The Unseen | Scalar Explorations

### Introduction

All sites exist first as places. Before places become objects of urban planning and design, they exist in personal experience, hearsay, and collective memories. Standing between planners and designers and the sites on which they hope to act are socially embedded narratives. And, while these place narratives can be ignored, they cannot be wholly erased. Places are never empty.<sup>1</sup>

A city is a palimpsest of our experiences, attitudes, and collective vision. Cities are robust and durable artifacts of human activity and aspiration. The built or designed infrastructure of the city is not only a context for urban activities and functions; it can also express ideologies that facilitate social, economic, and cultural life. *Mapping the Unseen* is an exercise in learning to ‘observe’ the multi-dimensional experiences of the city constantly in a state of flux, revealing its fragmentary nature within its collective promise. It provides opportunities to create a new urban vision as architects, planners, and urban design students engage their evidence-based findings to develop new programmatic opportunities that connect to the structural, physical, and social context based on equity to meet the needs of today’s diverse citizens.

Design is, in part based upon a deep structural analysis of existing site conditions, which leads to value judgments and design decisions. The spatial experience of architecture provides a critical ground for interpreting of the architectural ‘program.’ Thus, mapping as a generative tool with new forms of representation gives each student the agency to explore possibilities architecturally through formal and spatial design interventions that engage innovative programming to create urban places and spaces where equity, justice, and environmental stewardship prevail. Through student projects, this paper manifests how a new urban vision is developed through innovative programming that responds to grave concerns over affordability, densification, and climate change?

### Theoretical Framework

“Cities are central to virtually every challenge we face – and essential to building a more inclusive, sustainable, and resilient future.”<sup>2</sup> The call is to the makers of the city: educators, architects, planners, and urban design students, to challenge the existing norms of market forces as disruptions to historical patterns and orders, creating ruptures, scars, and traces that are evident today.

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<sup>1</sup> Beauregard, Robert A. (2005), *Site Matters, 'From Place to Site: Negotiating Narrative Complexity.'* Taylor and Francis e-book

<sup>2</sup> Guterres, Antonio. (2022). *United Nations Secretary-General.* UN News.

Manfredo Tafuri's assertion of a frontierless city: where sites and boundaries are forever shifting, brings into question - issues of equity: social and spatial justice, climate change, and carbon footprint; more than that, these forces play a pivotal role in transforming the city into an emergent global urban condition that begs the question: How can our cities be reformatted as multi-functional urban centers to respond to the needs of today's global citizens? How can innovative mapping and new representational techniques reveal characteristics of space as a means to explore and inform new architectural constructs? Why is adapting the existing city grid and infrastructure critical to promote new programs and public-private partnerships to tackle shelter, affordability, access and climate change?

Cartography, maps are symbolic representations of information - parts to whole relationships illustrating data in the most simplistic terms on both micro and macro scales. However, in the 20th c, artists, architects, and activists used mapping to open up all possibilities of discovery and vision. It is more than just a tactic for gathering information and data. Situationists used the technique of *derive* as a rapid passage through varied ambiances of the fragmentary nature of the city. *The Naked City* maps are potent attempts to connect out-of-context fragments of the city in new relationships. They are forced to create an explicit understanding of the city that offers instructions on operating, maneuvering, and living in it.<sup>3</sup> Buckminster Fuller developed a methodology to generate The Dymaxion Map through a series of projections suggesting an alternate vision of an interconnected world as Spaceship Earth that equips humanity with a better tool to address existential challenges and systems interventions. James Corner asserts that,

“... mapping is not endless data accumulation but is rather better seen as a practice of relational reasoning that intelligently unfolds new realities out of existing constraints ... that are crucial for the effective construal and construction of new worlds.”<sup>4</sup>

Building upon these theoretical frameworks *Mapping the Unseen* seeks to investigate the city to reveal nuances around materiality, texture, light, scale, proportion, programming, enclosure, shading, permeability, accessibility, history, and demographics to give new meaning to a place through personal experience. It challenges the makers of the city: architects/planners, and students of urban design and architecture to unravel the complexity of cultural significance as embedded in the urban condition – part-to-whole relationships at overlapping scales of inquiry from the city, to the block, to the street, to the building detail to reformulate. Representational strategies also play a pivotal role in exploring new connections within the built environment, and mapping techniques continuously shape them. They are opportunities to raise questions within a new framework, thus creating a fertile ground for exploration in a contemporary setting for the architectural construct.

<sup>3</sup> Schoonderbeek, M. 2017. *Mapping Experimentation in Architecture and Architectural Design*, A Theory of 'Design by Research.' Taylor and Francis e-book.

<sup>4</sup> Corner, James. 2011. *The Agency of Mapping: Speculation, Critique and Invention*. The Map Reader

James Corner's assertion that a map is a project in the making that can evoke design potential in a site was tested in the upper-level urban design studio. Building on the theoretical framework of cartography and contemporary discourse, students interrogated their sites by questioning the city and its physical, social, and cultural landscapes. Specifically: the public realm, infrastructural system, access to transportation, issues of equity, and spatial justice. These investigations document the visceral and experiential impressions of the urban context, allowing students to 'observe' and 'feel' the effects of design decisions on human behavior. New forms of representations capturing their observations and experiences of the site as a generative process give each student the agency to set into motion new opportunities and promises within the city.

## Mapping | The Project

The pedagogical approach engages three specific interdisciplinary frameworks:

1. Investigating the City - gathering qualitative and quantitative data emphasizing historical and theoretical conceptions of contemporary urban space, particularly on observation of given realities through documentation, experimental and experiential mapping.
2. Diagramming and Visualization Tactics - Quantifying data as visceral engagement of observed data collected by engaging with materiality, imagery, ambiances, and cultural and social values.
3. Scalar Composite Mapping - Exploring new and innovative interdisciplinary representation techniques activating spatial analysis as both projective and performative that can inform the architectural construct in making engaging 2d and 3d physical media.



Figure 1 | Brainstorming - Mapping

Source | 5th year Focus Studio 2014

Through inquiry at varying scales, the goal is to develop a methodology for mapping as a creative and performative act to unravel the scarred ruptures in the city. The mapping process generates the artifact (s) not as an end goal but as a springboard for what will come next. In the creative act lies the potential for innovative practices expressed not in the invention of novel form but in the productive reformulation of

what is already given. Unexpected solutions and effects may emerge by showing the world in renewed ways. Composite mapping tactics can reinterpret the questions to respond to the current context. This form of expression gives agency not just data collection but opportunities to reshape the worlds in which people live, as evidenced in the final projects. The studio pedagogy of *Mapping the Unseen* has grave potential to be applied to real-life scenarios by architect-planners to respond to the challenges cities are facing today: spatial equity, social justice, active and safe public realm, access to transport, and most importantly, a sustainable city as outlined by United Nations.

### ***Case Study 1 | Public Space Comes Alive<sup>5</sup>***

As asserted, the relationship of mapping to the given site directly impacts design outcomes, which are put to the test in the fifth-year focus studio. The assignment was in response to Atlanta Streets Alive's call to activate a 2 1/2 mile stretch for a community-building human-powered event that explores concepts such as tactical/guerrilla urbanism to build a happier, healthier, and more sustainable Atlanta. The project had 2-parts:

- a) Mapping as a generative tool to select a site for intervention;
- b) Design intervention as Site Specific - DIY

The studio was split into two groups of eight each. Each group was to strategize to observe and analyze the site using an interdisciplinary theoretical framework and ethnographic research methodology: observations/mapping/interviews and other tactics to explore new readings of the site collectively and individually. The design challenge was to propose a site-specific DIY intervention using found materials fabricated in the school of architecture's wood shop and digital lab.

### ***Group 1 | Bamboozlers | Claiming the Right to Public Space***

Each member of the group mapped the site to unravel the physical, social, and cultural aspects of the site through various filters of investigation. The next step was to devise a strategy to organize their findings into a 3-d mapping construct to represent individual students' data as a color-coded framing model. Each frame of the analysis portrays a different category. Each category has a grid that provides maximum and minimum levels, thus leading to the most promising site. The site selected was at the corner of Boulevard and Ralph McGill. It is a private, green lot with a dirt trail with no grass. This trail is a "donkey path" created by locals cutting the corner along the hypotenuse, which was intriguing and showed the potential to highlight through an iconic urban installation.

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<sup>5</sup> Public Space | *Sites of Action(s)*, ARCH 5998F: Focus Studio 2014

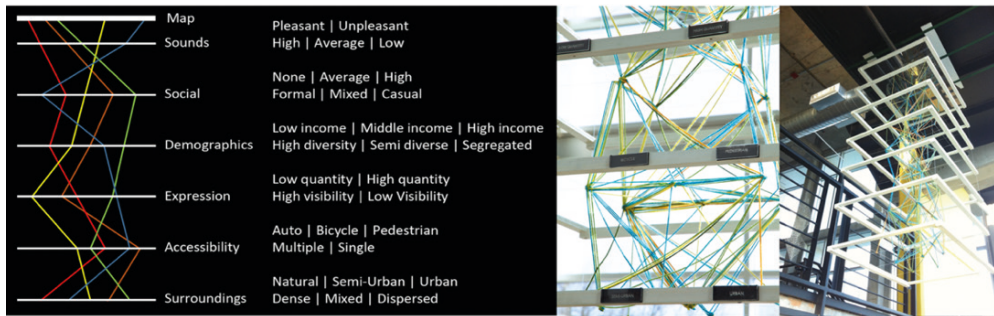


Figure 2 | Mapping manifested site opportunities and design strategy | Bamboozlers

Source | *Public Space Comes Alive - 5th year Focus Studio 2014*

The vision to accentuate the path as a symbolic threshold to mark the bike route along Boulevard was, in essence, pushing the boundary of the bikers - to test if they would notice such an installation and stop and interact with it. As is evident in the documentation, citizens of all ages did stop to pause and play with the structure – thus proving our hypothesis right.

Mapping directly impacted the design intervention of an iconic Bamboo installation. “Bamboozler,” whose form, shape, color, materiality, texture, fabrication, and installation created an inviting gesture to an otherwise sketchy part of the route in front of a pawn shop was a spectacle in the public space as one spectator tweeted “I was bamboozled by the Bamboozlers!”



Figure 3 | Breaking Boundaries through design strategy | Bamboozlers

Source | *Public Space Comes Alive - 5th year Focus Studio 2014*

With a design-build intervention, students were in awe of their success – giving them the agency to believe in the power of architects as social agents of change.<sup>6</sup>

<sup>6</sup> Public Space | *Sites of Action(s)* Student Testimony, ARCH 5998F Focus Studio 2014

**Group 2 | *Les Enfants de Rues* | *Claiming the Right to Public Space***

Biking through the streets, this group divided the Atlanta Streets Alive route into seven zones delineating transition areas along the path. Each student analyzed a sector and then produced an experiential response to the site in conjunction with three keywords. These signifying words convey the student’s sensory reaction. The site selected was the highest point with a view of downtown Atlanta. The performative aspects of biking, fluidity, and speed generated the composite mapping as a site-specific artifact in the making with sound and imaging in the studio space alcove. The artifact directly impacted the design, materiality, tectonics, fabrication, and assembly.



Figure 4 | Mapping manifested site opportunities and design strategy | Spectacle for all ages | Les Enfants de Rues

Source | *Public Space Comes Alive - 5th year Focus Studio 2014*

Mapping manifested site opportunities and design strategy, which is aptly described by student testimonies as is evident from the installation’s images.

“Life was unleashed - as the public biked and walked through it. To see the children climb and imagine what the space could be was an insightful experience. To see Boulevard transition from a buffer zone to a zone of action/meet and greet was a clear vision of how the collaboration of a designer’s vision and the public’s involvement can promote the evolution of an existing dead space.”<sup>7</sup>



Figure 5 | Breaking Boundaries through design strategy | Les Enfants de Rues

Source | *Public Space Comes Alive - 5th year Focus Studio 2014*

<sup>7</sup> Public Space | *Sites of Action(s)* Student Testimony, ARCH 5998F Focus Studio 2014

An excerpt from *Sampling the Public Space* by a student team sums it up:

”To understand how space operates, every instrument must be explored. The material used in the space had a significant presence, and shapes gave meaning to the experience. Sounds were sources of reference throughout the navigation of the public space. An encounter was more than an image or color; it was a matter - humanity proved to be very responsible and accountable for one another, changing my perception of the unseen and the unheard. The simplest conversation meant more than it had ever before. Every voice had a weight and could easily be distinguished in a crowd. At times, the wind seemed to carry one conversation to another side as if nature wanted us all to interact and be part of each other’s lives somehow. The space was alive, and every entity played a key role in composing this beautiful and thrilling experience.”<sup>8</sup>

The agency of mapping as a creative act was put to the test in this exercise, the scope of which, as a real-life project, stands testimony to James Corner’s assertion that a map is a project in the making that can evoke design potential in a site. These examples provide evidence of mapping the unseen to yield new imaginaries that can shape our experiences in the urban realm to break the social and cultural norms of architects as social agents of change.

### **Case Study 2 | *Mapping the Unseen – Creating an Urban Vision***<sup>9</sup>

Building on the 20th c theoretical framework, students in Urban Lab studio interrogated the Buckhead loop by questioning the urban fabric and the role of architecture within the city and its context. Students examined the evidence of forces of change along Peachtree and Lenox Roads through mapping techniques and image-making. The goal was to unravel the narrative of the Buckhead loop within the ½ mile radius of Buckhead and Lenox Marta Stations as opportunity zones for Transit-Oriented Communities engaging Density, Diversity, and Design.

In teams of two, students began investigating the Buckhead loop. Next, they zoomed in on a particular zone of interest to focus their analysis on by raising questions: is it disjunction or disparity found at all levels: social/political/cultural? Is it the issue of scale? Boundaries? Demographics? Land use? Public transit? Amenities? Street life? Access? They then set the site’s limits to a 1-mile radius to critically analyze and collect data through the following filters: historical memory, land uses, public spaces, social mix, cultural life, streets, transportation and access, and more. Collecting and analyzing data together with experiential-sensory aspects of the site, students used keywords, photography, graphics, images, digital mapping, and aural expressions as a strategy that led to discoveries.

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<sup>8</sup> Public Space | *Sites of Action(s)* Student Testimony, ARCH 5998F Focus Studio 2014

<sup>9</sup> *Urban Lab*, ARCH 4014; 2022



James Corner’s assertion that,

”... mapping is not endless data accumulation but is rather better seen as a practice of relational reasoning that intelligently unfolds new realities out of existing constraints.”<sup>10</sup>

was manifested in the 2d and 3d artifacts presented by student teams. Marshall McLuhan’s phrase *The Medium is the Message*<sup>11</sup> provided a strategic framework for new and speculative forms of representation to augment the mapping process. A compositional strategy had to be devised where materials, tools, and techniques were aligned to fabricate the artifact.

The mapping process generates the artifact(s) not as an end goal but as a springboard for what will come next. In the creative act lies the potential for creativity practices that are expressed not in the invention of novel form but in the productive reformulation of what is already given. By showing the world in new ways, unexpected solutions and effects may emerge.<sup>12</sup>

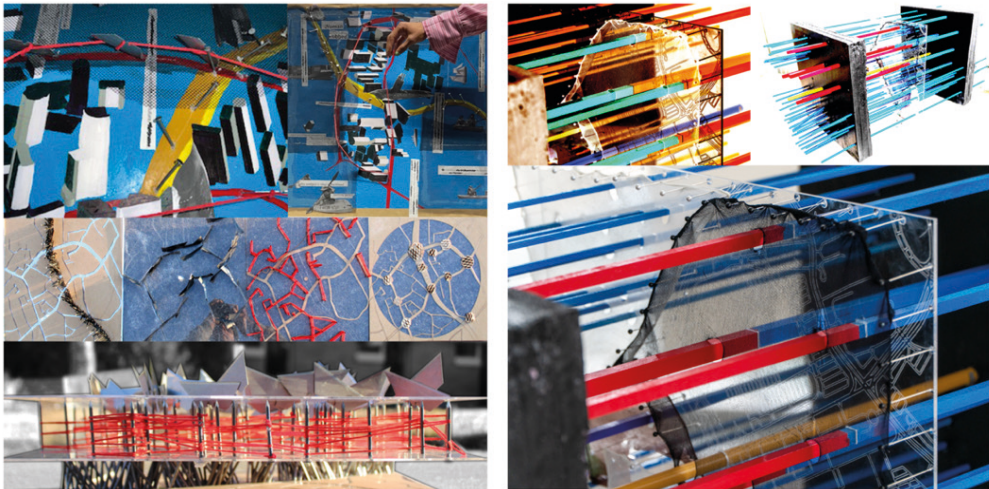


Figure 6 | Mapping manifested site opportunities  
Source | 4th year Urban Lab Studio 2022

### *Mapping | Design Interventions*

Mapping led to discoveries and opportunities for the final project Creating an urban vision. Each team had to develop a project brief outlining a program for TOD Transit-Oriented Communities engaging Density, Diversity, and Design within the Buckhead

<sup>10</sup> Corner, James. 2011, The Map Reader, *The Agency of Mapping: Speculation, Critique and Invention*.

<sup>11</sup> McLuhan, Marshall. 1964, *Understanding Media*, McGraw-Hill.

<sup>12</sup> Corner, James. 2011, The Map Reader, *The Agency of Mapping: Speculation, Critique and Invention*.

loop. Each proposal was unique programmatically, from co-housing to artists' colonies to mixed-use, mixed-income housing with a public realm. A pedestrian-friendly walkable community where culture, arts, and economic opportunities promote sustainable and equitable urban growth engaging, Density, Diversity, and Design within the Buckhead loop.



Figure 7 | Mapping manifested site opportunities and design strategies

Source | 4th year Urban Lab Studio 2022

Unique projects that were the outcome of the methodology established created a new vision for a city that is historically an affluent community. Student project named ‘Buckhead Fashion District.’ won the competition sponsored by a local firm. Their abstract sums up the success of the studio,

”Described as “swanky,” “chic,” “white & wealthy,” by the backroom journal. Buckhead, as a city, has these high-end retail stores and nowhere to show off these designs. The city is set up to be the fashion hub of Atlanta. This project aims to establish more true public spaces, introduce affordable housing, create a fashion node for Buckhead, and update Lenox Square Mall by returning it to its roots and making it open air again.”



Figure 8 | Creating an Urban Vision  
Source | 4th year Urban Lab Studio 2022

Urban Lab 2023 tackled the issue of ‘Housing for the Missing Middle,’ in Buckhead, an affluent suburb of Atlanta. Tasked with the problem, students used mapping to analyze the issues facing the discrepancies in income, housing shortage, accessibility, social service, education, and so forth which was unravelled in the first module Mapping the Unseen which then led to precedent analysis for housing typology and Transit Oriented Development. Program is a direct outcome of each group analysis which then sets the framework for the final project, Urban vision as is illustrated in the student project ‘Link.’



Fig 9 | Creating an Urban Vision  
 Source | 4th year Urban Lab Studio 2023

Over the years student testimony attests to the studio pedagogy’s success on the urban level as been extremely interesting and unique to unraveling how architectural projects engage with the street section on a human scale. Public – Private explorations challenges architecture student to work at multiple scales to solve the city’s issues, , “... we must think not only of the spaces that we are designing but also how the pedestrian interacts and experiences the space in the 3<sup>rd</sup> dimension.”

Creating an urban vision as a masterplan with a focus on housing was an opportunity to develop a unique program within an existing context that students have to negotiate: transit, roads, buildings, programs, people, and culture,

“... little by little, we understood what urban life was all about – we proposed a modern art museum as an anchor institution to pull people into Buckhead around the Lenox Mall area. Building programs with stratified Housing, including shopping, restaurants, public spaces, and plazas with robust street culture and experiences, will be incorporated. Our team utilized model-making to analyze multiple aspects of a given project in 3-dimensions, which led us to visualize a rather complicated field of design in a way that made it simple and effective. We can certainly walk away from this studio, realizing that architecture is about our experiences within space.”

## Conclusion

The transformation of cities worldwide demands new strategies to respond to the needs of more diverse people than ever before. Composite mapping tactics at various scales can reinterpret the questions to manifest further readings of the current context. This form of expression gives agency, not just data collection but opportunities to *re-shaping of the worlds in which people live*,<sup>13</sup> as evidenced by the student projects at two different scales: public space activation and suburbia redevelopment.

The studio pedagogy of *Mapping the Unseen* has grave potential to be applied to real-life scenarios by architect-planners to respond to the challenges cities are facing today: spatial equity, social justice, active and safe public realm, access to transport, and most importantly, a sustainable city as outlined by United Nations Conference on transforming world's urban area,<sup>14</sup> that we as educators and professionals must incorporate in our teaching pedagogy and practice.

## Bibliography

Beauregard, Robert A. 2005. *From Place to Site: Negotiating Narrative Complexity*. Site Matters. Chapter 3. Routledge.

Corner, James. 2011. *The Agency of Mapping: Speculation, Critique, and Invention*. The Map Reader, Chapter 1.12, pp. 89-101. Wiley.

Debord, Guy. Kotányi, Attila. Vaneigem, Raoul. 1962. *Theses on the Paris Commune*.

Schoonderbeek, M. 2017. *Mapping Experimentation in Architecture and Architectural Design*, 'A Theory of 'Design by Research.' pp. 68-69. Taylor and Francis e-book.

Guterres, Antonio. 2022. United Nations Secretary-General. UN News.

<https://www.gensler.com/blog/what-genslers-2022-city-pulse-survey-says-about-hybrid-work>

<https://news.un.org/en/story/2022/06/1121392>

<https://www2.deloitte.com/xen/en/insights/industry/public-sector/future-of-cities.html>

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<sup>13</sup> Corner, James. 2011, The Map Reader, *The Agency of Mapping: Speculation, Critique and Invention*.

<sup>14</sup> <https://news.un.org/en/story/2022/06/1121392>