



the formless:
a designer's dialogue
with process

Formless

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Graduate Thesis
Master of Landscape Architecture
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DEDICATION

This is dedicated to my wife Ashley
and dog Tyson.



ABSTRACT

The idea of formlessness in landscape architecture is defined as dynamic processes, such as wind blowing and plant growth. These are not things you associate with a given form, but a fluid and dynamic process. Specifically, this thesis looks to create a dialogue between the landscape architect and these dynamic processes to shape space over time.

How can a designer's dialogue with the formless and dynamic processes of the landscape shape space over time?

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INTRODUCTION

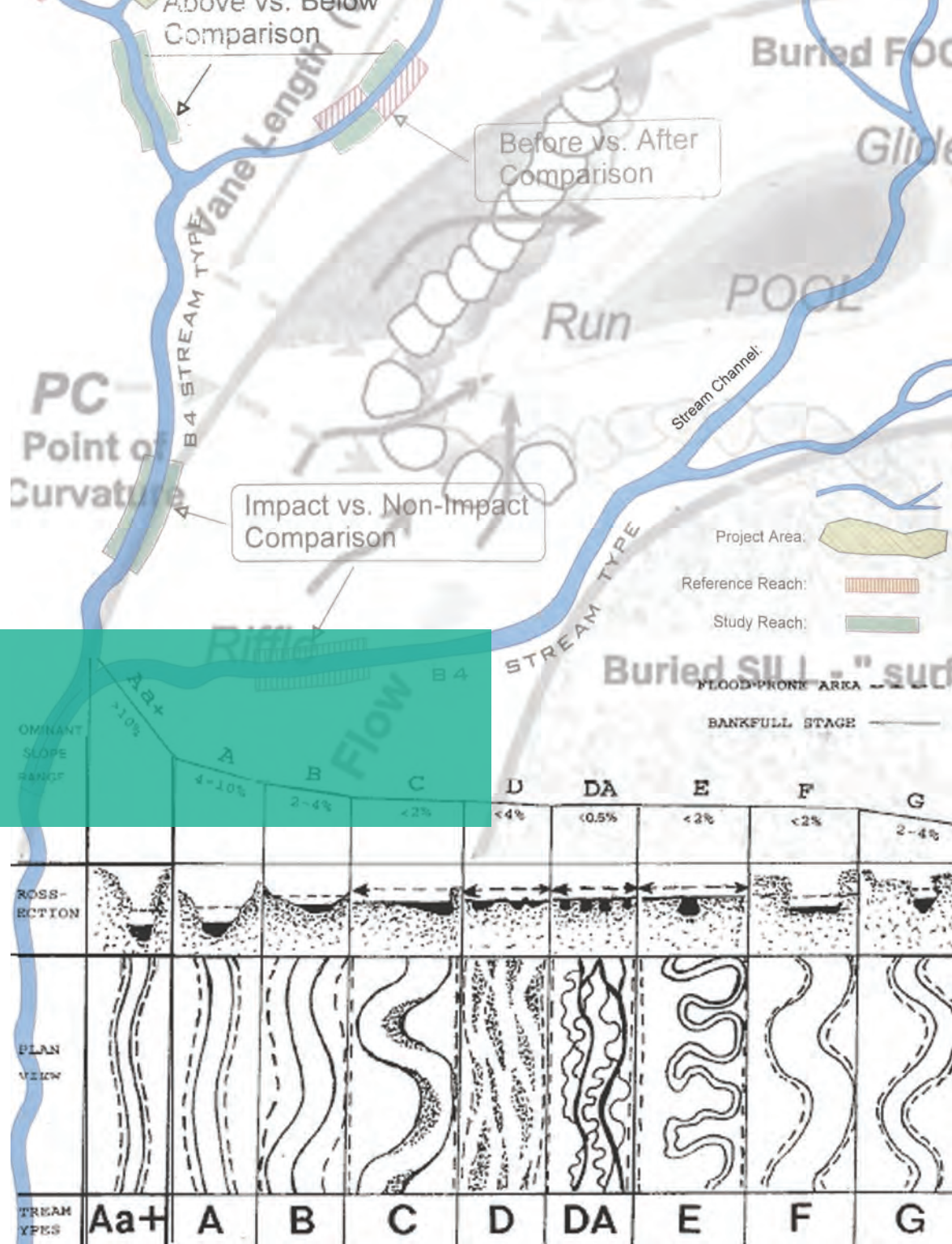
My thesis did not start with the idea of the formless, it was the result of a process. As a result, this thesis book is as much of a demonstration into me finding the Formless, just as the projects in this book are seeking too in regards to landscape architecture. The formless as defined throughout is not anti-form, as all things created are manifested in form, but as dynamic processes of the landscape, such as: plant succession and people moving through a site.


This thesis looks at a designer's dialogue, or call and response approach, to design with these processes to continually shape space over time. This book is a chronological timeline of the process that unfolded to discover the Formless in landscape architecture. This investigation stemmed from an initial investigation into form generation in design, beyond my traditional approach, euclidian geometry, as well as reading work from Julian Raxworthy's Ph.D. thesis of landscape architecture about process discourse and work from the architectural experimentation lab known as Formlessfinder.

This idea of Formless seeks to push the envelope in regards to the role of a landscape architect. Instead of just designing a space to evolve over time, and then walking away from it, there seeks to be an active engagement, that facilitates that change over time, as the change is occurring, through a dialogue with the processes that shape the spaces in which we live.

STREAM RESTORATION

My journey began by trying to unpack the process of stream restoration and how the form of most projects is driven by an in depth study of surrounding streams, and a mimicking those found to be successful streams, within the new project. I wanted to investigate how as a designer, there was a role that could be celebrated in this process, as to not only design something to appear as natural, but celebrate the profession of landscape architecture.



A photograph of a stream restoration project. In the foreground, a concrete curb borders a grassy area. The stream flows through the center, with several rectangular gabion baskets (wire mesh cages) placed in the bank. These baskets are filled with woody debris, such as branches and twigs. The background shows a dense forest of trees. A semi-transparent teal text box is overlaid on the middle of the image.

This is my attempt at the smallest scale intervention in stream restoration that highlights the role of the designer, in substituting a natural approach, with a highly man-made piece. I chose to do so by addressing the bank stabilization and habitat enhancement by replacing root wads that are lodged in the bank during construction, with gabion baskets that were then filled with woody debris from the project maintenance.



Although the exploration into stream restoration was before I was engaged with the formless, it unknowingly began to lead me down the path towards it, when I began to critically evaluate what I was trying to achieve through these investigations.

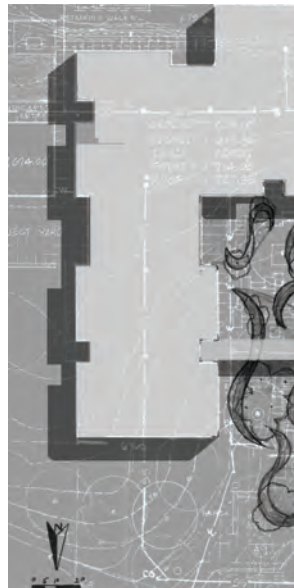
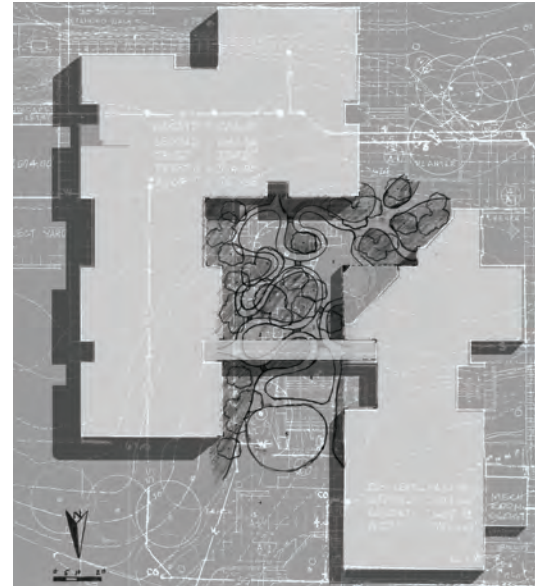
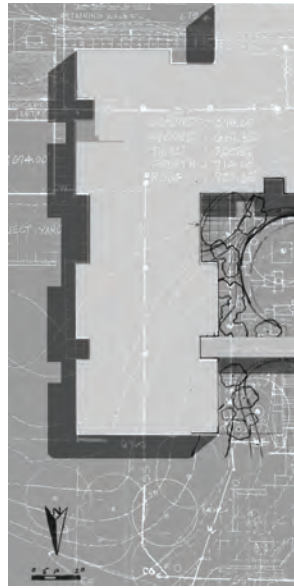
I began to realize that I was not wishing to challenge the science of stream restoration projects, as they were sound, and by not being a scientist, I don't have the expertise to do so. But I began to challenge the form, and wished to find a way that the form, or designed outcome, of these stream restoration projects could change, and not be about looking as if they were always there, occurring in nature, but responding to these restorations in a way that celebrated the design of them.

However, I began to realize this may not be the best avenue to explore this, as it would require a large amount of ecological, biological, and overall knowledge that landed outside the field of landscape architecture, that would not allow me to explore this effectively and efficiently.

FORM MAKING

In response to my previous explorations, I began process drawings that were focused on giving form to the space, without using the rigid, geometric framework, of the surrounding building. Although they came across as arbitrary and did not achieve what I was trying to accomplish, and did not offer any new knowledge. I was drawing, without really knowing what I was trying to discover through these drawings.





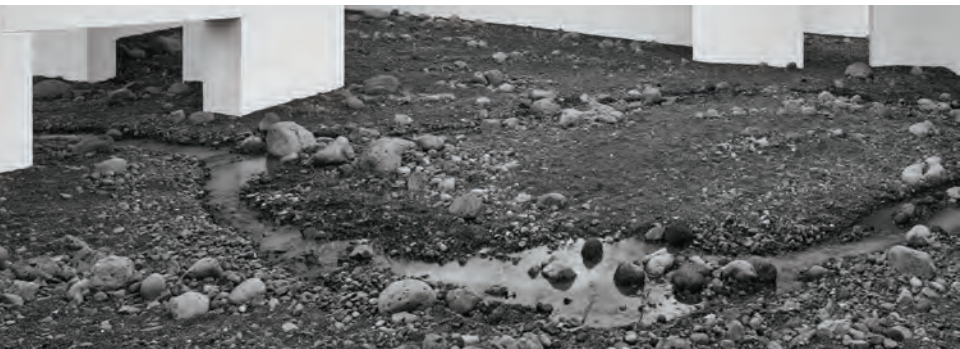
case study: BERLIN BLOCK

The Berlin Block, created by Gustav Lange, in Hamburg, was a perfectly square limestone cube that then had a controlled, slow, drip of water. This form was used to highlight the process of decay and degradation. As well as allowing the process of degradation to set up a new set of conditions with cracks and crevices, holding pockets of decomposed limestone, and catching soil and seeds, fostering growth of mosses and ferns. This project set up an initial set of conditions and set a process in motion and let it unfold.



1 Gustav Lange

case study: RIVERBED



2 Olafur Eliasson

This art installation entitled 'Riverbed', by Olafur Eliasson at the Louisiana Museum of Modern Art, in Denmark, has had a profound impact on my exploration into the Formless since the onset. This was one of the first pieces I saw that really struck me in regards to a fluid and dynamic process, and its ability to be made legible against a baseline, that of the stark white walls of the museum.

In an interview on this piece, Eliasson states that although these conditions are man made, there is an unexpected nature about it, that changes each time he visits. These uncertainties allow a process that was set in motion, by the designer, to remain in motion, and through interactions by Eliasson, and patrons of the museum, the course of the water may be altered, and your experience in the space may change. As the forces acting upon it change, and shape the space and environment, your experience and engagement will change as well.

This is something I cling to in regards to the life of a project being given a new life daily, as the processes of the space determine much more than the original installation could have accounted for.

case study: FORMLESSFINDER

Formlessfinder is an experimental laboratory oriented towards the moments of formlessness in architecture. A statement by formlessfinder, “we embrace the raw, the unprocessed, the unstable, the ephemeral, and the degradable,” helped me arrive at the decision to engage with the process of plant succession within my thesis, because of its ephemerality, and the ability to engage with a process that is unstable, uncertain, and ephemeral.

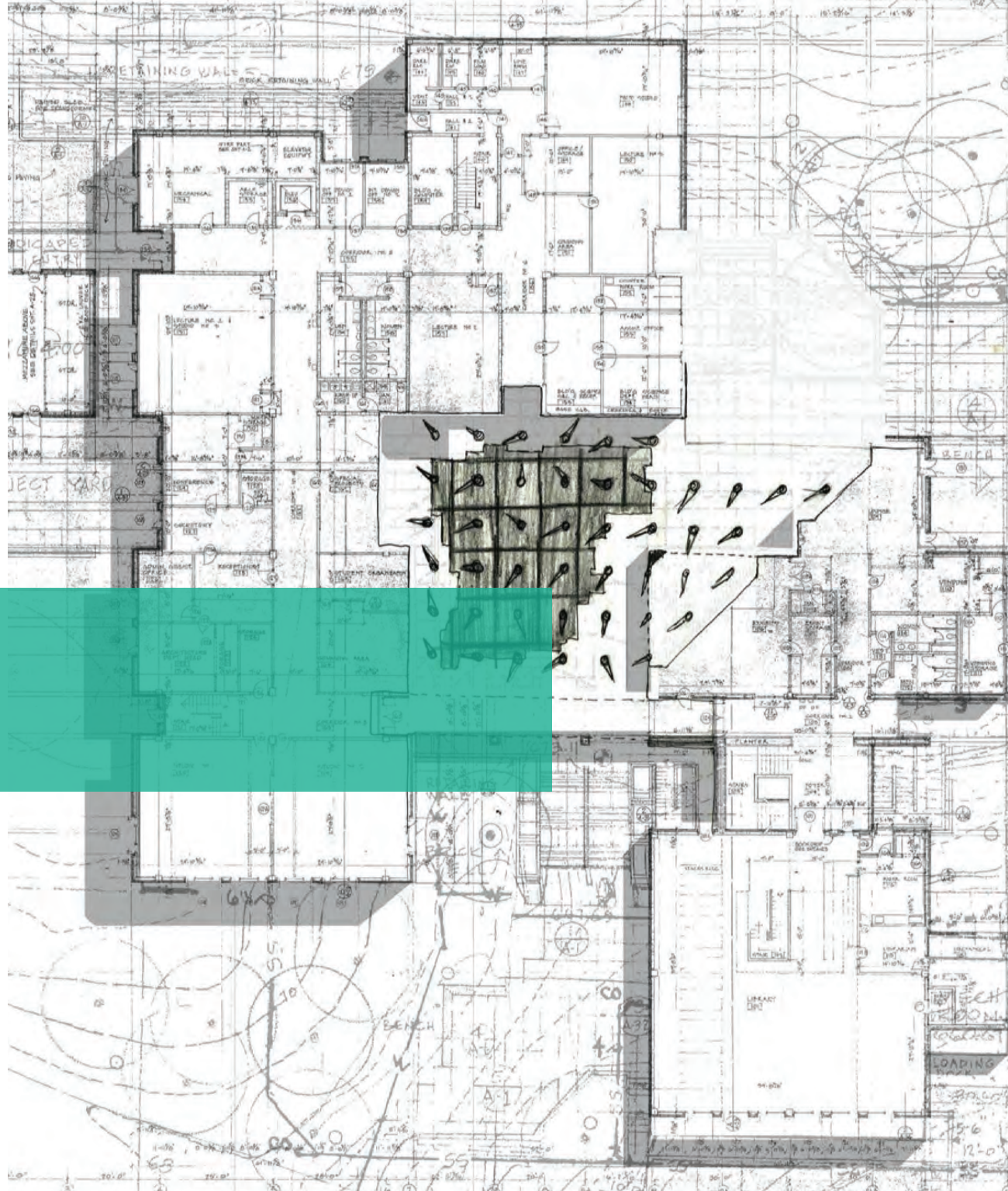
Formlessfinder seeks to foster a new form of interaction and engagement with space, and not only offers new understandings of space and material, but of collectivity and social experience. These are pieces that I sought to achieve through my interpretation of the formless in landscape architecture. By offering a dynamic process that could be manipulated, and responded to, offering a new set of conditions that change the way the space is perceived, and engaged with, throughout the life of the space. In contrast to maintaining a process in a given state, and having a repeat experience.

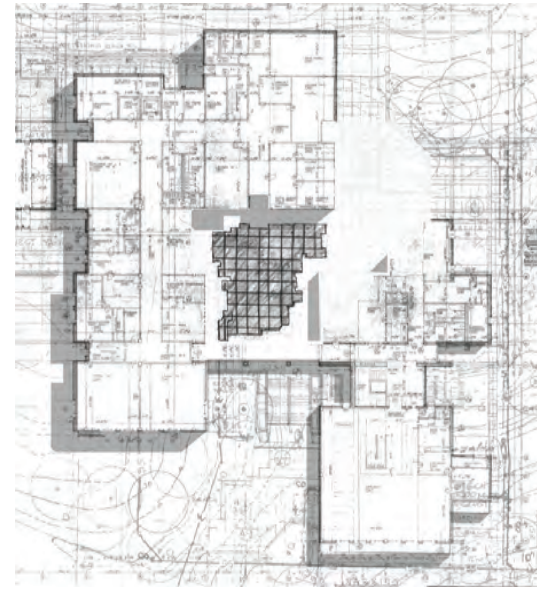
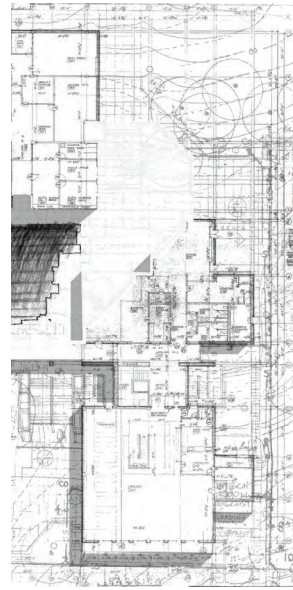
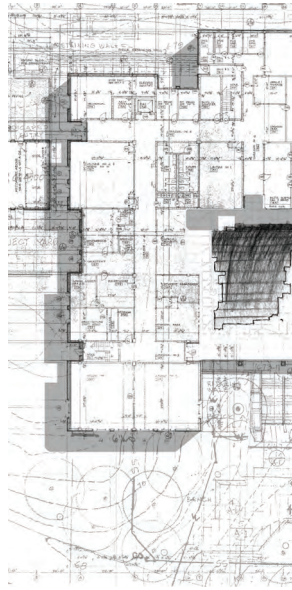
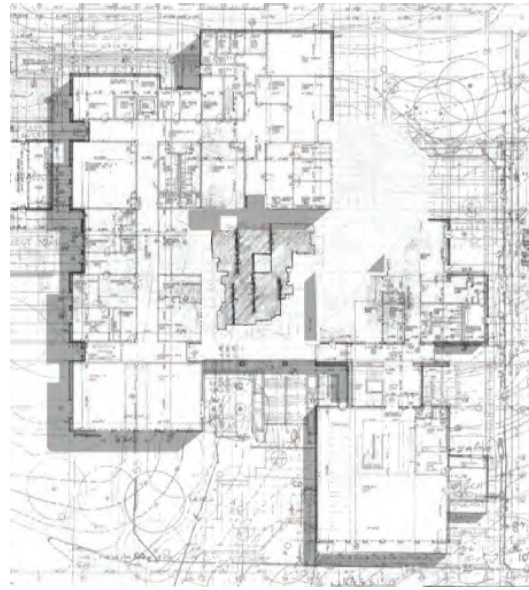
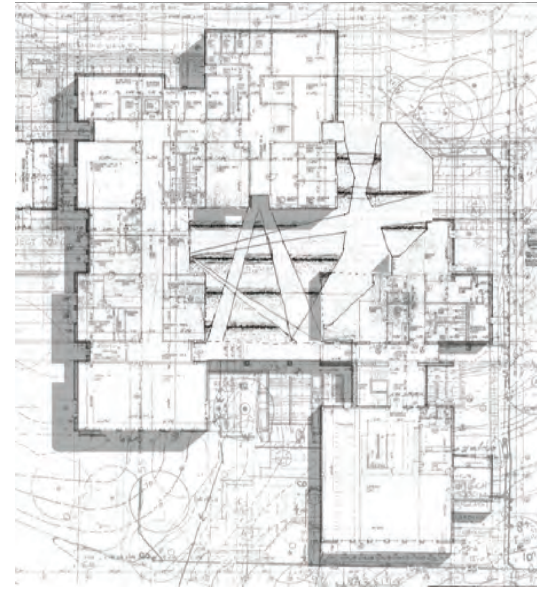
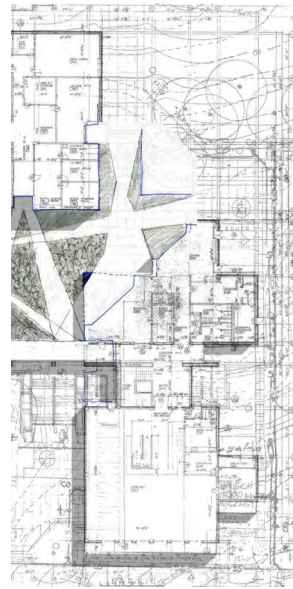
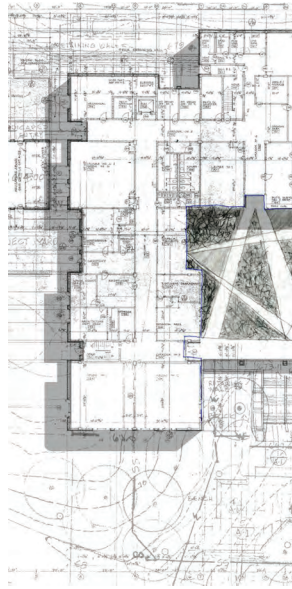
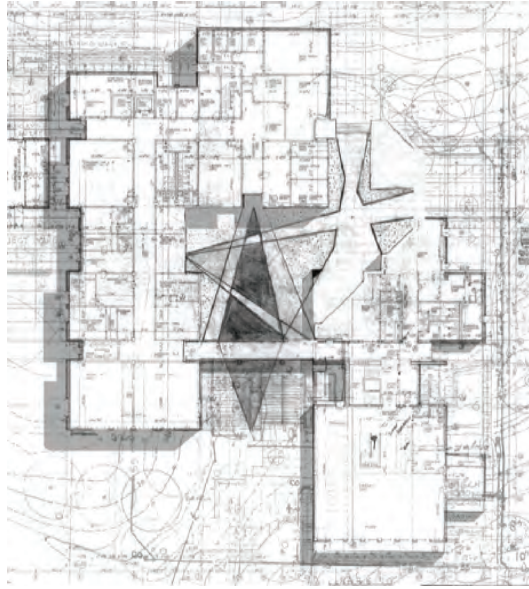


3 Formlessfinder

PROCESS

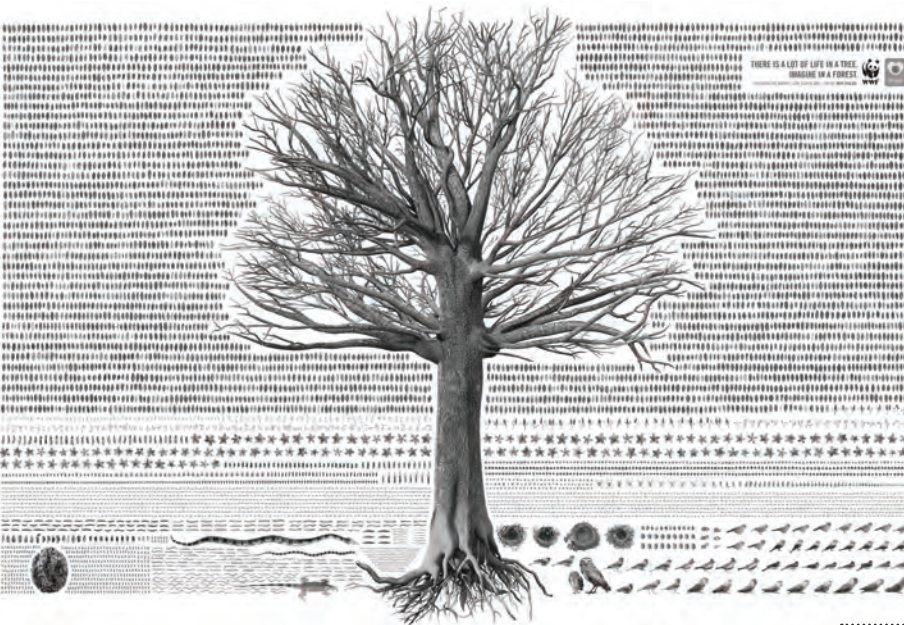
After analyzing case studies, and evaluating my previous process drawings, I began to create diagrams that sought to highlight process within the Dudley Hall courtyard, and how those may be captured, harnessed, or brought to light. Expanding beyond the process of people moving through the site, but other processes, such as wind and light.





case study: ECO INVENTORY

This diagram representing an ecological inventory by Murilo Melo for the WWF (World Wide Fund for Nature) looks at one tree in Brazil and graphically depicts an ecological inventory of a tree and its greater impacts. When I began to explore the notion of plant succession as a process to unpack within a space, this graphic became a tool that allowed me to think of a process as having an inventory component, and allowing that to be a gateway into a designer's dialogue with process. This fed into my first design approach of the Dudley courtyard, detailed next.



4 Murilo Melo

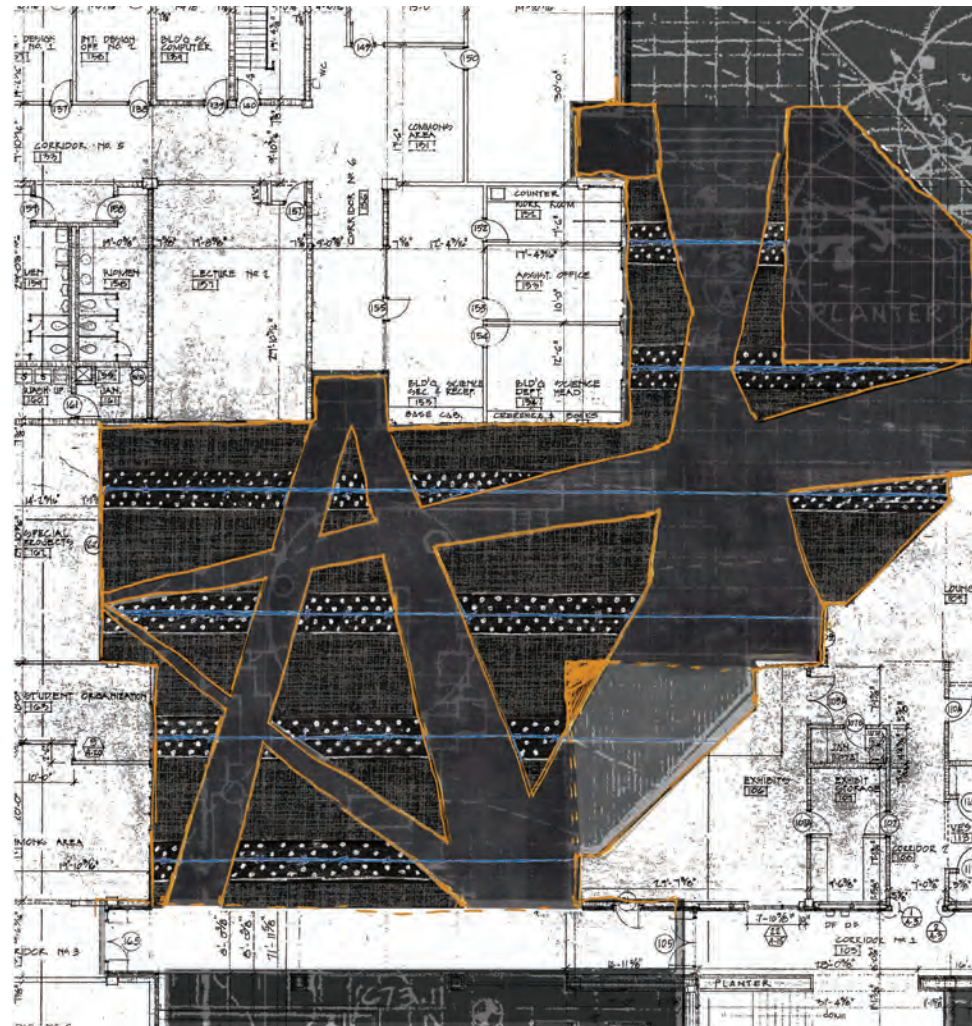


SITE SELECTION

The site selection for this thesis is the College of Architecture, Design, and Construction building at Auburn University, Dudley Hall. The first design test included the courtyard area surrounded in red, with later iterations extruding to the north and south of the area. This site was selected due to the phased approach throughout each intervention, which corresponded with the timeline of most university students. The ability for students to be involved in the initial investigations, be here for a few years of plant growth and process, and also being there to see the designer's response to process.

PHASE 01

I began in this first design by expanding upon my previous study of pedestrian paths of movement through the site. This was based on a prediction from witnessing the way the site is traversed currently, as well as speculation of future desire lines upon completion of the ongoing renovation. I then gave a hierarchy to the process, by making the paths with the highest predicted pedestrian paths the biggest. This created forms, that were then filled with structural soil topped with gravel. The blue line indicates a fencerow that was installed in the beds, and a painted line across the walkway, to act as a baseline throughout the phases to judge process and progress. The swath along each fencerow was planted with a pre selected plant pallet of native plants, and seeded with another select group of native plants.



PHASE 02

Due to the call and response nature of this thesis exploration, there is a time to leave a process, or processes, and allow them to unfold. This plan shows where the plants that were planted, and seeded, begin to grow and respond to their conditions. All the while also affording the opportunity for the unexpected to occur, such as birds utilizing the fencerows to perch, and dropping seeds outside the initial plant pallet.



PHASE 04

The final phase of this installation depicts the growth and spreading of plants within these new communities and a revelation process occurs, of the nuances of these conditions, that were made possible by a direct, and intentional move by the designer, myself.

This was a good first pass at a design dialogue over time. However, there were some constraints to this, such as predicting the paths of people, and giving that a hierarchy, instead of allowing that process to give itself hierarchy and form. As a result of that, the process of plant succession was confined to a given form, instead of being allowed to emerge on its own.



A black and white photograph of a courtyard. A white path or wall runs horizontally across the middle of the frame. The ground is dark and textured, possibly gravel or soil with some small plants. A teal-colored rectangular box is overlaid on the upper right portion of the image, containing white text.

My first design test in Dudley courtyard was a good stepping stone into the Formless, by allowing me to experiment with process to shape a space. However, it was a very mild approach, and although I was looking at process, I still created a form that each process was then placed into. The processes were not dynamic and engaging, or ongoing, but still relegated into a form. This was something that I had to push and expand moving forward into a more rigorous approach to Finding the Formless. I did that by first stepping outside the world of landscape architecture, and from my affinity for working in plan view. I wanted to take the notion of pouring paint, and the process of generating form as demonstrated in the earlier installation by formlessfinder. I chose to create a series of paint explorations that allowed me to achieve different results, and then combine those findings into one piece to explore the Formless through a new lens.

DRIZZLE

Although there were eight individual interpretations of pouring paint, there were three that really drove my final compilation piece. The first painting portrays a series of walls and then a small and steady stream of grey paint, at normal viscosity, was drizzled it in front of a box fan, allowing the process of wind to disperse the paint. I then repeated the process with the orange paint, allowing the paint to build up along the wall and create layers, while also creating voids and spaces behind the walls.



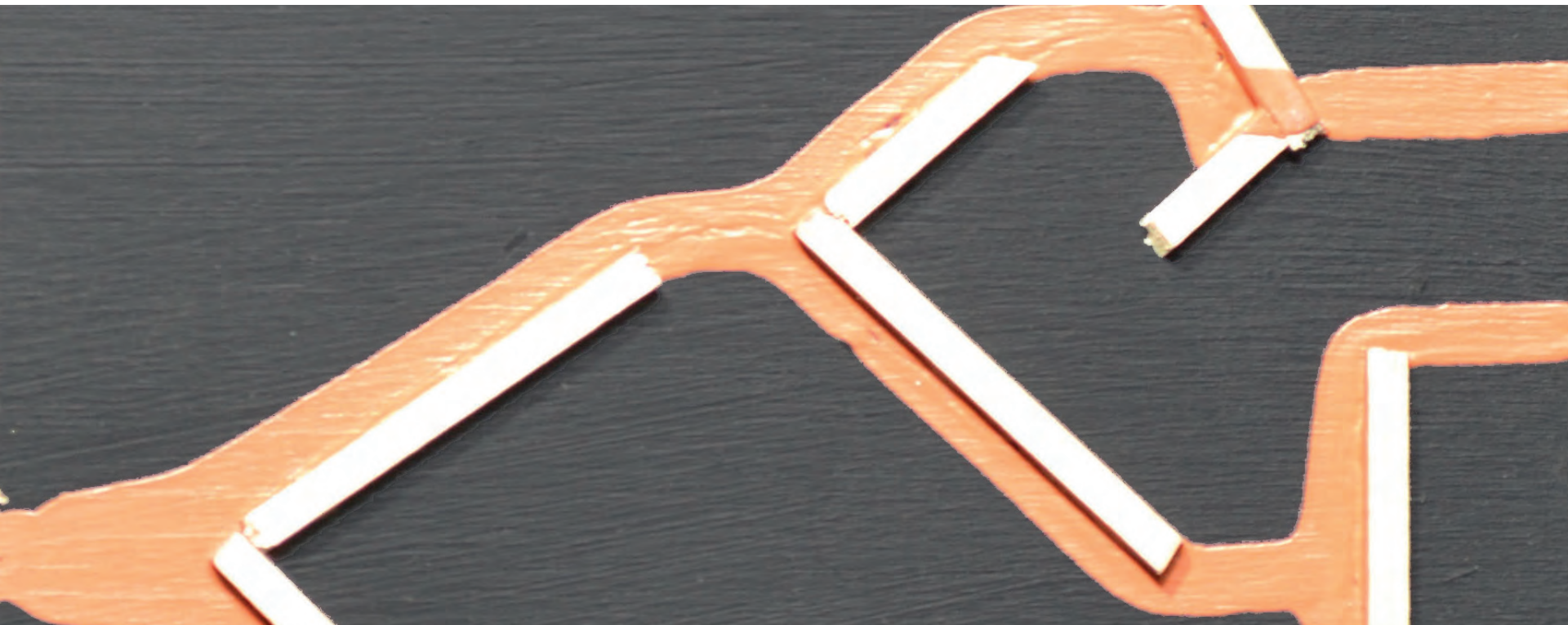
DROP

This piece involved dropping a tennis ball covered in grey paint from three feet high, creating a splatter pattern, due to the process of gravity. This was then repeated with another ball covered in orange paint, before dropping the ball covered in grey paint a second time. This created a layered effect, concealing and revealing portions of the two different paint colors. It also created intricate patterns completely different in nature from the drizzle approach.




DRAIN

The third piece looked at diversion and aggregation. I achieved this by watering down the paint and slightly tilting the board at a downward angle and pouring the paint, allowing the pre-placed walls to divert the paint, and conceivably fill up in the other inverted spaces. However, what was interested was the fact the paint did not fill up in the spaces as I had anticipated. And although this was not as I had planned, it was still beneficial, as it gave me a way to talk about the unexpected. This unplanned result was a representation of a process unfolding, and responding to a set of conditions in its own way.





This piece combined my findings from the individual studies of pouring paint and as a designer, my conscious decisions, to create a piece that responded to the results of each phase of the paint pouring. I set up a baseline, the grid, and a few walls on the board. Then utilized the process of wind blowing to splatter the grey paint on the piece. Due to the void created behind some of the walls, I chose to enforce those by adding more walls. I then rotated the board 90 degrees and poured the white paint while the board was tilted downward. Then watered down the orange paint to get a different result from pouring the paint at the same angle and rate. Unexpectedly, the pink emerged from leaving the watered down orange paint overnight. Once utilized in the painting, the pink created a result I previously could not have anticipated. This then resulted in a translation into the world of landscape architecture and how it could inform a future design featuring an ongoing dialogue.



Upon further investigation of the completed piece, I began to evaluate each paint and its role within the composition. The white paint, which was the second paint I poured, was done so at a slight angle like the individual exploration. It was poured at a normal viscosity, and performed mostly as expected, by flowing down the board, with some fingers branching out at each score. Due to its color on the black board, it also sticks out rather well.

This can be translated into the world of landscape architecture to represent the predictable pieces of a process, and in regards to plant succession specifically, the dominant plant species of a given area.



The orange paint was a response to the white paint acting rather mildly, in a predictable manner. I chose to water it down, yet pour it at the same rate, and angle, as the white paint. Because of the thin nature, it just seemed to run over everything, and only branch out slightly at the seams. However, after leaving it out overnight, the orange, as it dried, had begun to show hints of pink in places. There was an intrinsic beauty in the subtleness of the pink, and its ability to emerge out of the process of drying.

This subtle nature can be translated into the landscape in the instances where the designer is involved, and chooses to engage. A designer does not have to make a heavy handed gesture, or response to process, in order to make their design intention known.



Another landscape translation arises from the emergence of the pink paint. This was the result of leaving the watered down orange paint sitting over night. It was something completely unexpected that emerged. Due to the thin viscosity of the pink, it spread differently when blown by the fan than the grey did. Because of this it was able to expose the break in the wall in an way that could not be predicted.

This can be translated into the unexpected plants. Based on the micro-climates, and original plant pallet, a set of plants can be expected; however, because of the processes involved in a space, there is always the unexpected, or invasive plants, that arise. This painting allowed me to think of these in a new way, and celebrate them. However, by doing this, another discovery was made, the ability to overuse, and overcommit to a plant, or process. Because all you see when you look at this is the pink, and it does not celebrate the nuances or intricacies, but becomes to dominate.

TEST 02

Upon completion of the paint piece, I began to explore Dudley Courtyard again. First I created an 8'x8' concrete unit system, with voids of gravel, all covering a structural soil suitable for plant growth. The size was determined because of its ability to be an occupiable space on its own, or part of a larger space. The upper and lower portions show each horizontal row to be a 6" step, to accommodate the topography of the site. The ramp allows the middle portion to remain flat. This was then seeded with a pre selected plant pallet of 6 plants, which grew where people were not walking, and where specific conditions were suitable for each plant.

PHASE 01

This initial phase shows the paver system at installation, with no plants actually planted. This is the phase in which uniform seeding of the plant mixture occurs. And then left for the process of plants to grow and emerge, and respond to the other processes that are impacting this site.



PHASE 02

This shows the second phase, and people moving through the predicted corridors of the site, because they are not predetermined as before. The plant communities then begin to occupy the spaces people are not walking. This initial growth would consist of grasses, and small shrubs and trees that stay within the straight lines of the gravel beds.



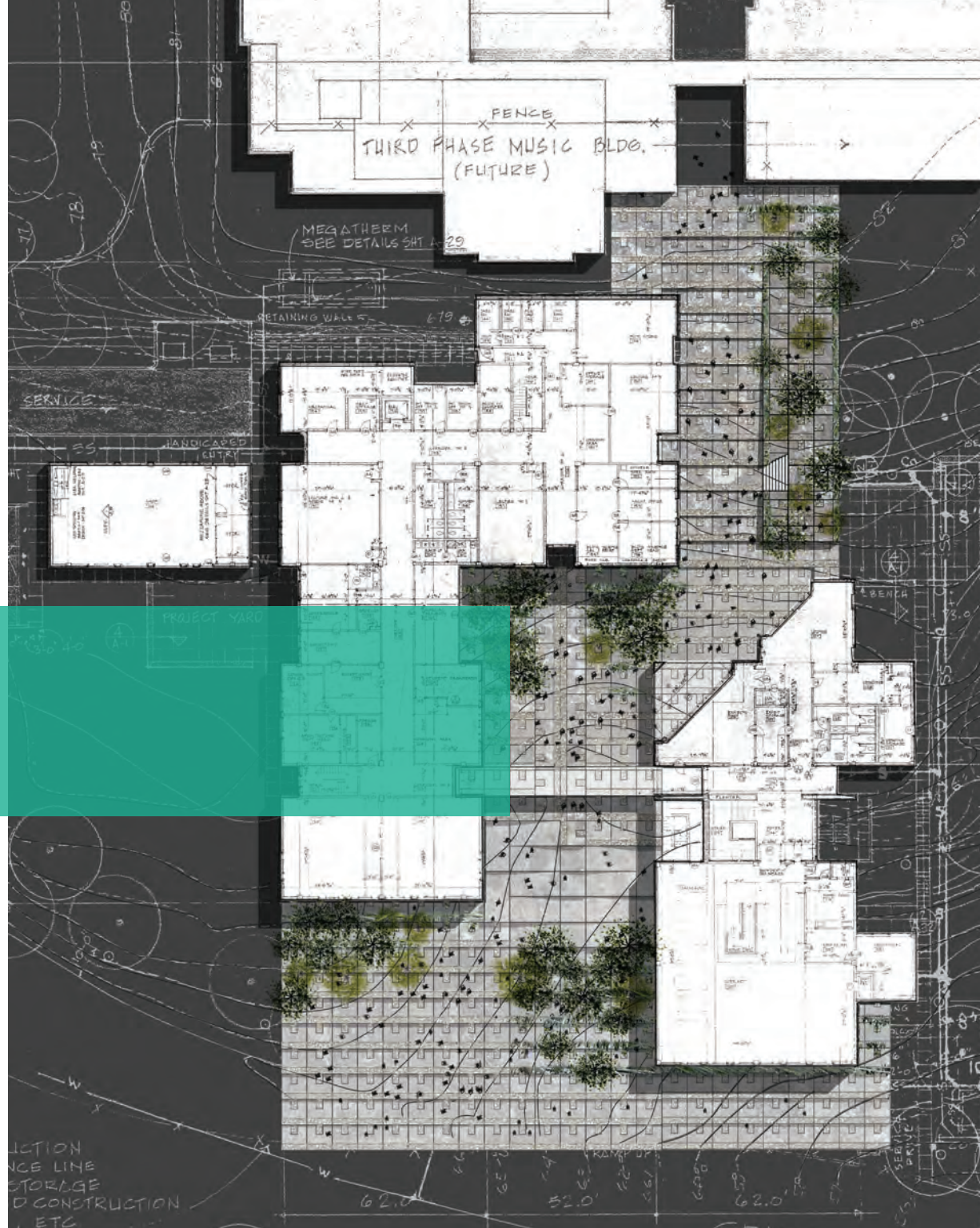
PHASE 03

Phase three highlights the my first engagement as a designer, and it is only a subtle move of orienting the pavers of the most used pedestrian path, from the top of the ramp, to the main entrance to Dudley Hall. While the remainder of the plants are left to grow and spread as conditions and processes allow.



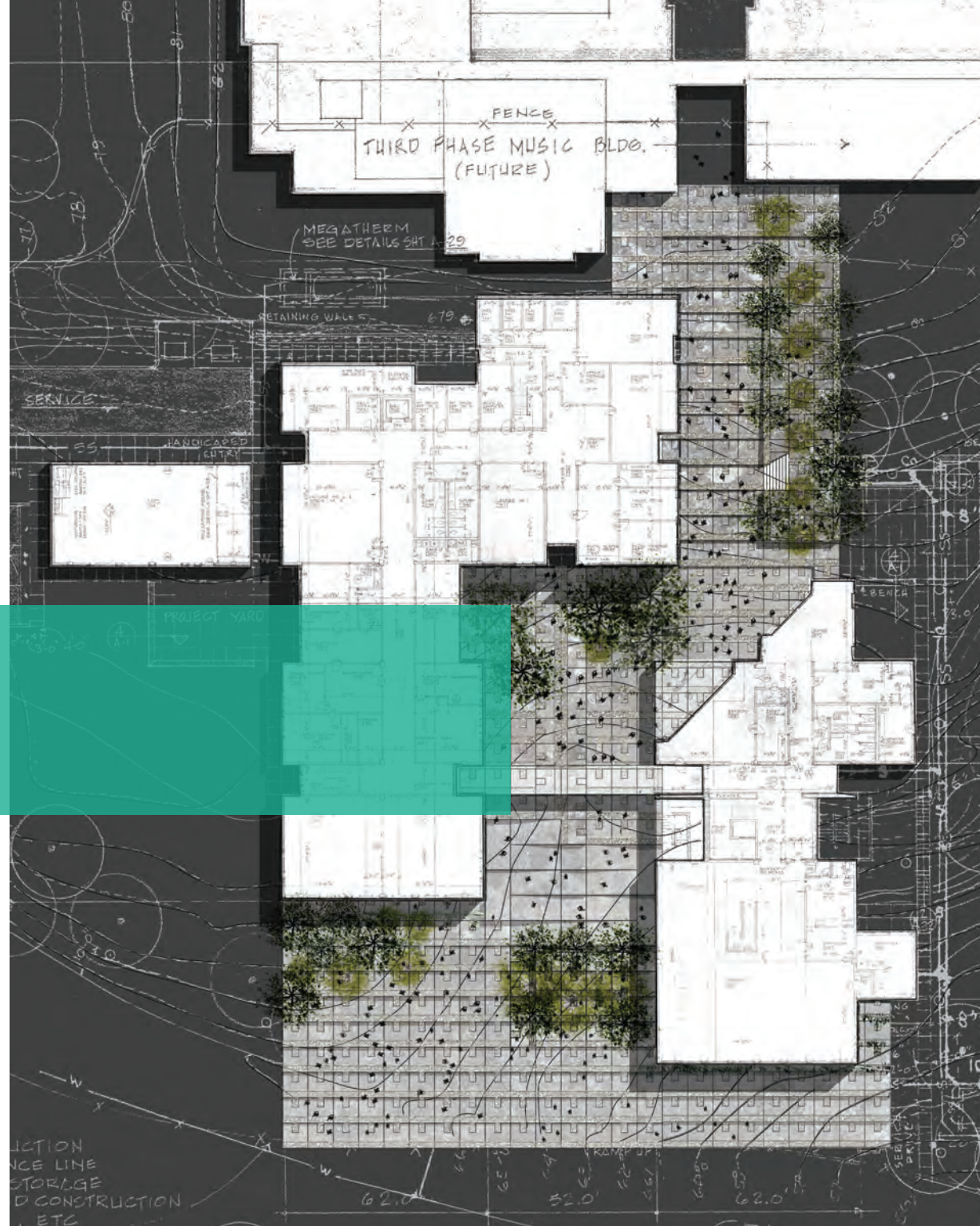
PHASE 04

This plan shows my decision to reinforce the plant community adjacent to a major corridor running north and south, that I predicted to have little traffic, which would result a large plant emergence. I did so by bringing in fill soil, and elevating that plane to create a patio space, and then replanting the plants that were there originally, to provide shade for the space.



PHASE 05

The final phase shows again, a continual growth of the plants, and plant communities, while my engagement here is similar to what I did previously, but in the lower portion of the courtyard, below the ramp. And creating a grid of the trees that were growing here, and another flat space, through infill, in which people could gather.





This design exercise began to highlight the formless processes taking shape in the space. However, when I began to investigate it, and critique it, I began to realize it wasn't doing enough in regards to process, or engagement. It didn't speak to the specific site conditions, that were being engaged. This is evident by flipping through the phases, it really only shows only the same plant groups, in the same location, getting bigger. This doesn't account for the nuances of the site, the micro-climates, or address the sunlight and water needs of different plants. This drove the next design exploration, really focusing more into the specifics. I also wished to have more of an engagement, such as the first design did with the inventory of process. Instead of just adding dirt, and planting the plants back, I sought to have a dialogue with the plants and process in the next design test.

PLANT PROFILES

This is the list of plants I selected for the initial seeding of my final design investigation. I limited the list to a small sample of the Piedmont region, 6 plants. This was to showcase the micro-climates, and not be confused as to which plants grow where. I also broke them up into 2 plants for early, mid, and late succession phases each. This ensures a seed bank that will extend beyond the initial conditions of the site.

ANDROPOGON VIRGINICUS

Commonly known as broomsedge, it is an early successional clumping grass that is very prevalent in the piedmont region and is one of the first plants to show up after a disturbance, or a field is left fallow. It grows up to about 3 feet tall, and is a golden brown. It is widely dispersed throughout the region by wind.

.....
5 Andrey Eremin



BETULA NIGRA

River birch as its referred is an early succession tree that fascinates me. It has an exfoliating bark that provides a year around aesthetic appeal, and the light green foliage that produces a filtered shade on the ground is nice, especially in the hot Alabama summers. They can also grow in upwards of 50' if the conditions are favorable, often having multiple trunks.



NYSSA SYLVATICA

Black Gum is a mid succession tree that grows anywhere from 30-50' tall, yet takes a while to reach that height, as it is slow growing. It is noted, and chosen, for its incredible fall color ranging from scarlet to orange to yellow, and its dark purple fruit, as well as offering shade relief during summer, and sun in the winter, once the leaves have dropped .



ACER RUBRUM

Specifically, Acer Rubrum 'Autumn Flame' was chosen as the second mid successional tree to be seeded on site. It is also another deciduous tree dropping its gorgeous, and vibrant, red fall foliage, once winter comes. It is also an excellent shade tree as well. Also, due to the large number of seeds it produces, it is a major bird and squirrel attractant.

.....
7 Nguyen Thai



CERCIS CANADENSIS

Eastern Redbud is a small, late succession understory tree. Given the right conditions, it only grows 15-30' tall. It has a yellow fall color, but is most known for its pink, purple, or fuchsia buds that occur in early spring. Before the tree ever buds out, its stems are covered in blooms, making it stand out against most of its surroundings that time of year.




CORNUS FLORIDA

Flowering Dogwood, like the redbud, is a small, understory, late succession tree, growing under the shade of the larger surrounding trees. It has the same growth habit as the redbud, at 15-30' tall. It is known for its early spring blooms that are often a pure white, and usually signal Easter is near. It is also known for having distinct red berries.

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8 Eaton, M.E.





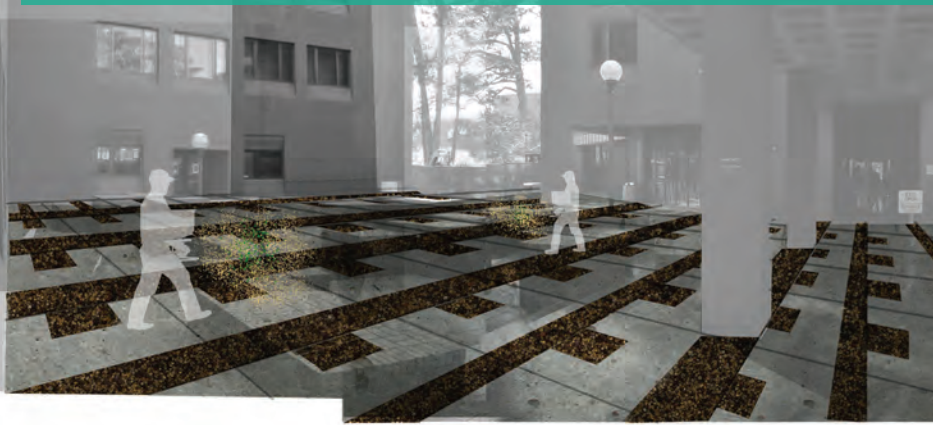
This investigation into the initial plant pallet was necessary upon realization that the nuances of plant succession within the courtyard were not explored within the last design test. These plants are all native plants of the Piedmont region, and span all three successional phases. Due to the fact they are native, they can all grow in the given conditions of the site. Also, by selecting a set number of species, it allows the micro climates to have a voice, instead of having plants cover the entire space at all times. There will be a push and pull among plants as the conditions change over time. And with my help as a designer, a dialogue will begin to unfold, allowing the courtyard to change over time, not only effecting the way people engage with the space throughout each phase.

TEST 03

After exploring plant succession, and selecting a plant pallet to work with, I began to explore Dudley Courtyard again. I chose to keep the 8'x8' concrete unit system, with voids of gravel, with a structural soil throughout, suitable for plant growth. This was then seeded with a pre selected plant pallet of 6 native plants.

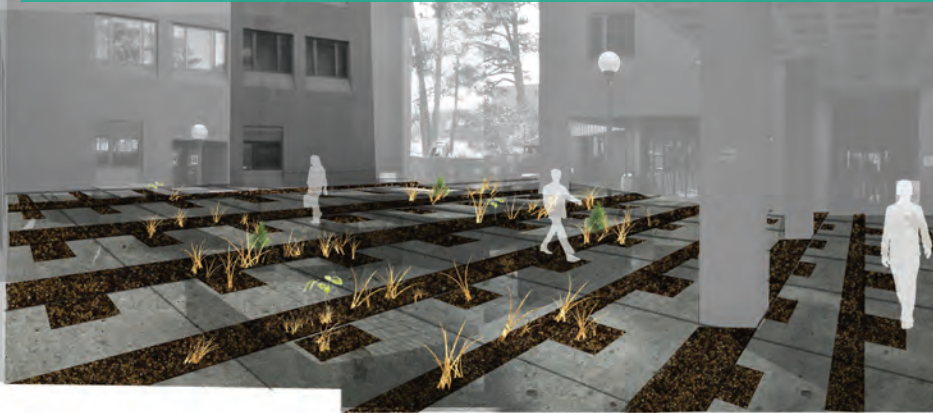
PHASE 01

The first phase shows the initial installation of the unit system. This is where the seed mixture is combined with sand, in order to get an even distribution across the entire site. Allowing the processes of people, sun/shade, water, and animals to determine where plants will emerge and how people will engage the site.



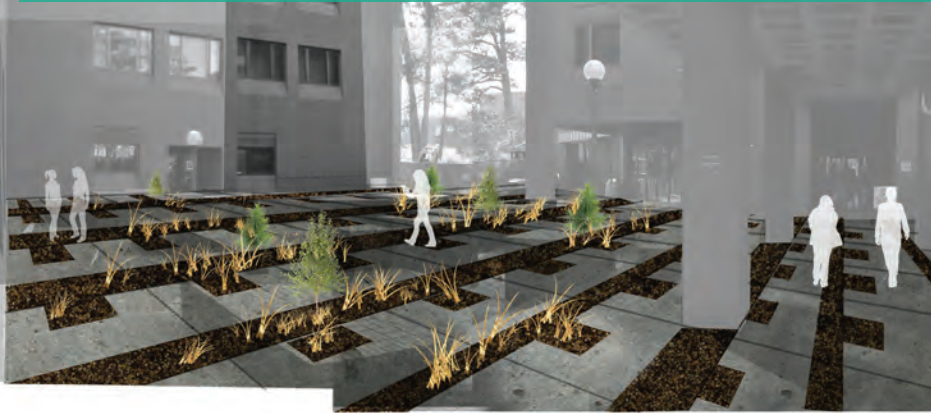
PHASE 02

This second phase of the design, shows where people move through the site, as well as the location of the andropogon (gold) that begins to emerge in the sunny locations, with little or no foot traffic. It also begins to show little crosses indicating the early succession trees that begin to emerge.



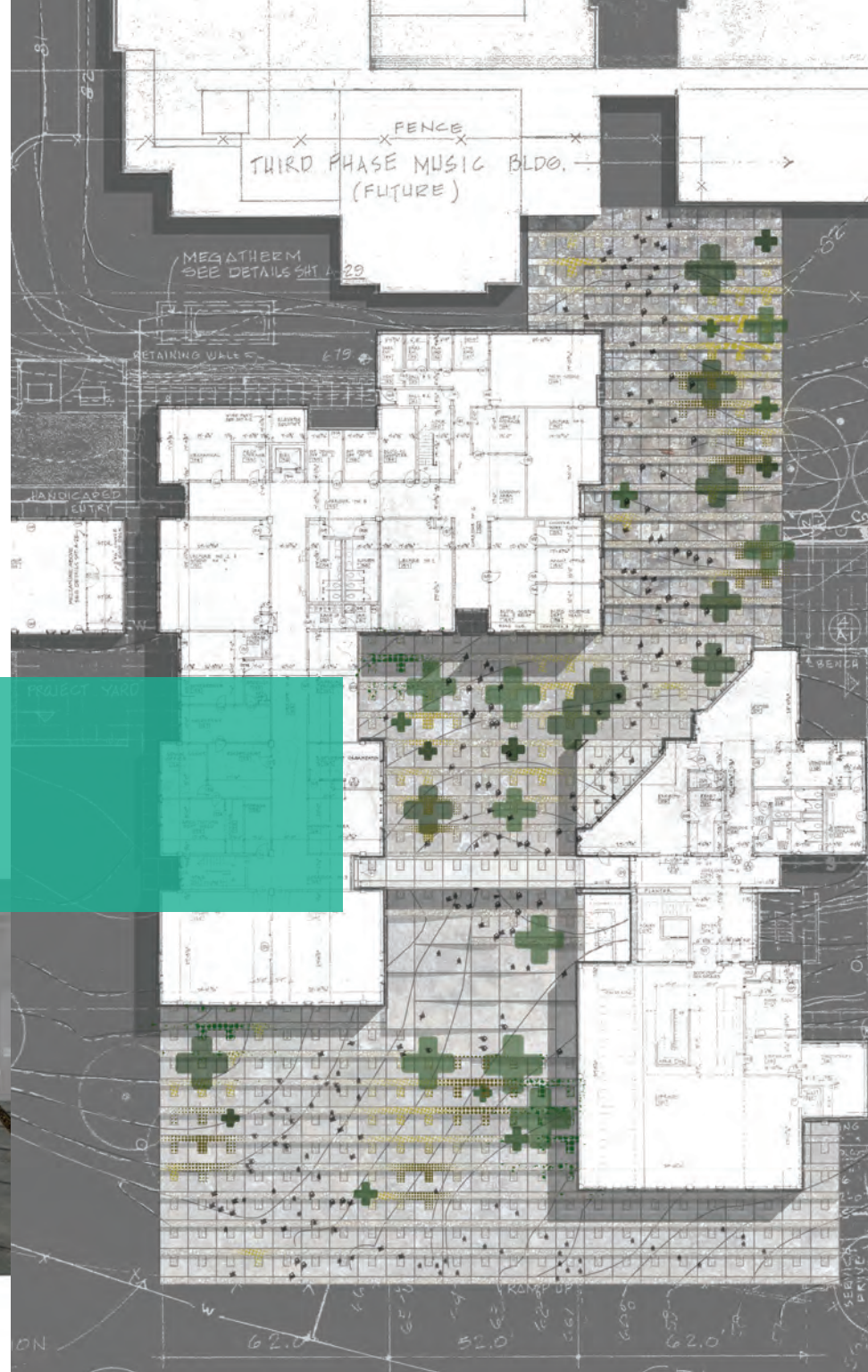
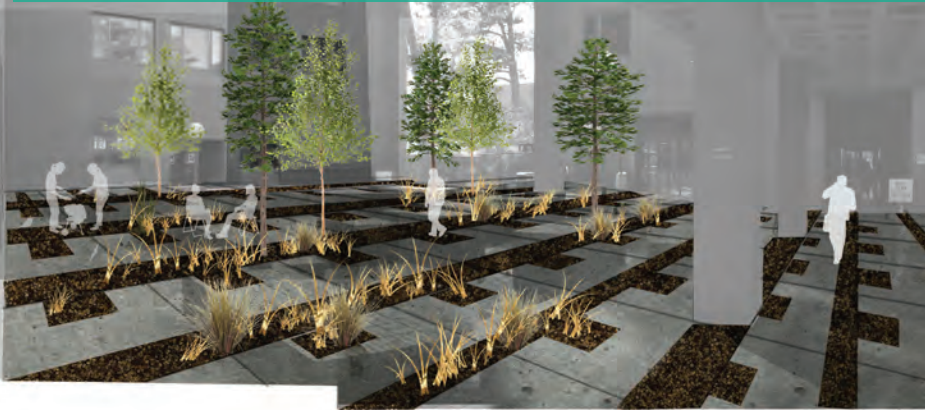
PHASE 03

This phase is just a growing diagram of the plant communities and the trees. There is not any involvement from me at this point, just allowing the process to unfold and the plants grow. This is a phase in which the call is formed, and a my response will be determined by what the processes reveal.



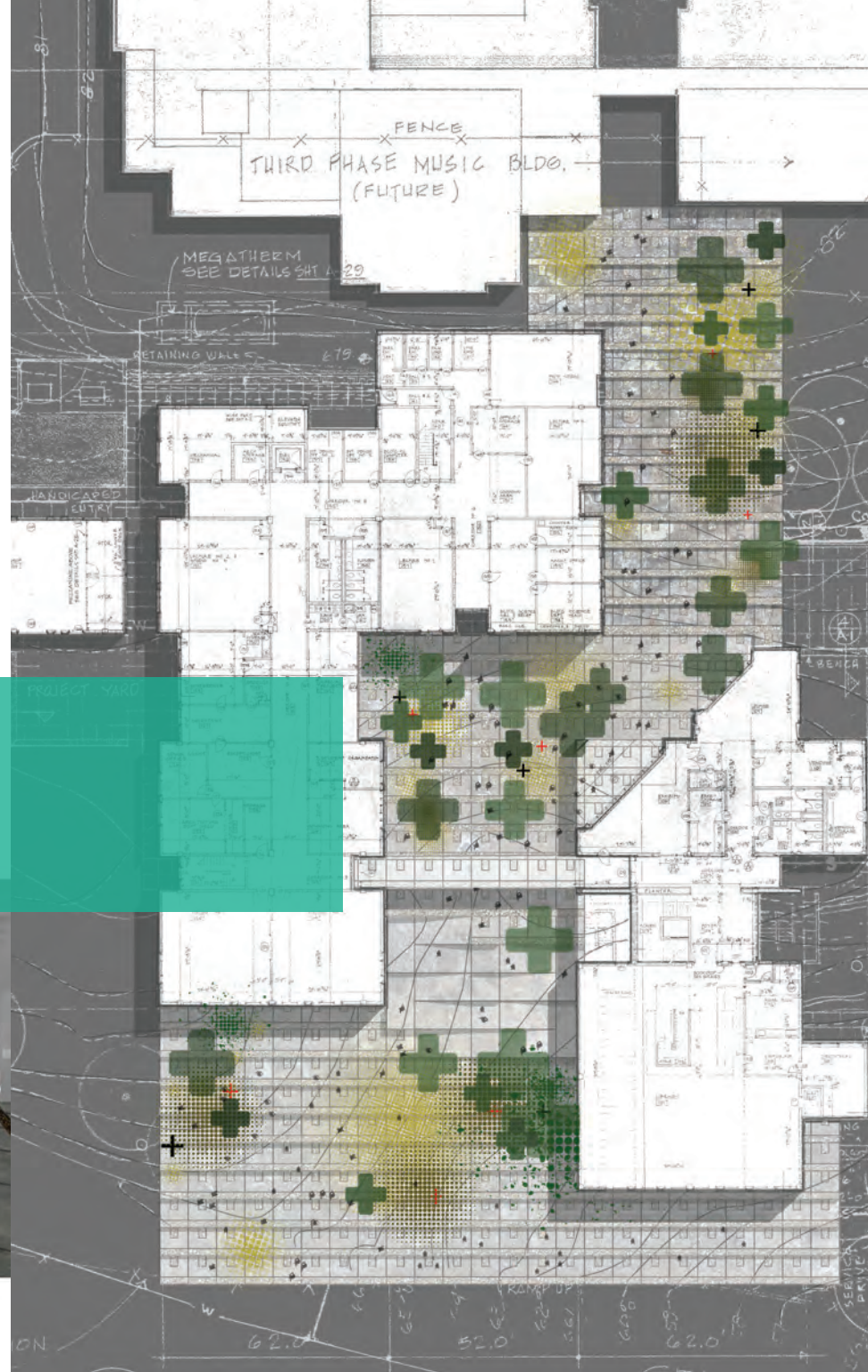
PHASE 04

At this point I went in and relocated some of the trees that have been growing, reinforcing the walkway from the top of the ramp, to the front door of Dudley Hall. As well as the shaded area below the ramp, and the edge of the walkway going upwards. It also shows the different grasses pushing and pulling with each other, vying for dominance on the ground level.



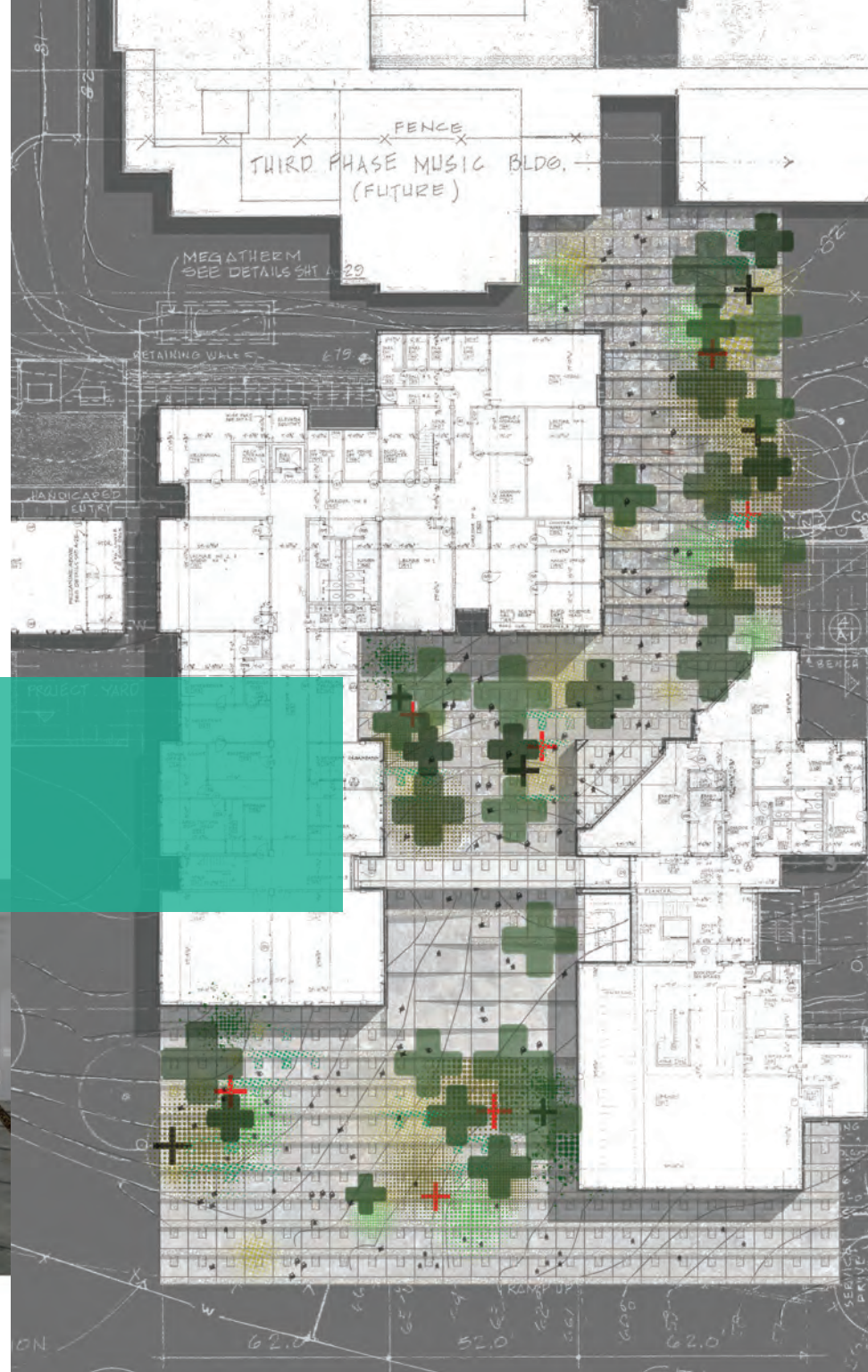
PHASE 05

This phase maintains the most recent changes, allowing the trees to grow, altering the light levels on the ground plane, resulting in the grasses such as the andropogon receding, and others taking its place. It also shows a new set of crosses that begin to emerge, highlighting the next successional phase of plants to emerge based on the nuances of the site.



PHASE 06

This phase shows more diverse plant communities beginning to emerge and create a mosaic throughout the site. It also shows all the trees of the site getting bigger. This phase is about the process unfolding and taking shape, while the designer watches, and investigates, anticipating what my next move in the dialogue may be.



PHASE 07

This final phase shows the final move by the designer. Here I chose to remove many of the first successional trees, and relocate the remainder, as well as move some of the mid and late successional trees. I chose to reinforce existing shade in some areas, while creating an abundance of light in previously shaded areas. Creating a completely new dynamic within the site.





CRITICAL ANALYSIS

While this final design came close to pulling all the pieces together in the journey to find the Formless. When I began to evaluate this final test, and see what should be done moving forward, it became clear that this is much more difficult than I imagined it to be at the onset. Although this design test sought to depict the process of plant succession in response to people walking through the site, wind, and sunlight, there are still so many factors and processes that simply could not be accounted for.

Another critique I have of my design is the plan view graphics. They depict the plants, such as the andropogon and other emerging plants, as a field. This works diagrammatically; however, this approach also renders half of the walkways covered, which would not be the case. Although the edges may be blurred in some instances, as the plants creep, or sway over the edge, they will not inhibit walking, or dwelling, as depicted in the plans.

Moving forward, I would explore more rendering approaches, because by nature of drawing, or creating, you are giving form to what I am trying to engage with, the formless. This creates an obstacle in translation, as depicting process is something that I don't think this thesis has mastered. Although my approach becomes more successful as the design tests move forward, by becoming more loose, and dynamic, such as the processes themselves are by nature.

Further investigation into the design revealed another shortcoming, which is the actual designer's dialogue, or engagement, that occurs. I did not clearly articulate, or define, the nature of the designer's role, and it comes across as arbitrary. This could be explored further by creating a set of criteria by which to judge whether a design decision, or engagement, should be made. I think this could also be expanded upon by the creation of more graphics, and phases, allowing there to be a depiction of more moments, and dialogue, instead of depicting such large scale moves from phase to phase.



However, through this process, it has made me realize that the representation of process, or the formless, only gets you so far. There must be a performative aspect to the process that is physical, that the designer sees, feels, touches, and responds too in a real life setting, to fully engage in what is the formless. Due to the dynamic nature of process, there will always be an uncertainty in the depiction of process.

This has allowed me to rethink the future of the profession, by not only designing and leaving a project, but just as a horticulturist or gardener, a landscape architect can now take ownership of a project, and have a prolonged life and dialogue with that project. However, instead of engaging with it in a way that maintains it to remain in a given state, by being involved in a call and response nature with the processes of the site, it is continually changing, allowing the designer to design with each intervention and tweak of the process, challenging the way the formless is perceived, and the space in which the formless occurs is understood.

APPENDICES



book citations

Eaton, M.E. Dogwood, n.d. <http://biodiversitylibrary.org/page/11447722>.

Eliasson, Olafur. RIVERBED, September 11, 2014. <http://en.louisiana.dk/exhibition/olafur-eliasson>.

Eremin, Andrey. Broomsedge, n.d. <http://thumbs.dreamstime.com/z/dried-bush-grass-panicles-white-background-28382988.jpg>.

Hill, David. "Berlin Block, Hamburg," n.d.

Melo, Murilo. There's A Lot of Life In A Tree, Imagine A Forest, n.d. <http://murielomelo.com/65642/554986/-/wwf>.

Nyssa Sylvania, n.d. <http://etc.usf.edu/clipart/85200/85220/85220-nyssa-sylvatica.htm>.

Raxworthy, Julian. "Novelty in the Entropic Landscape: Landscape Architecture, Gardening and Change." University of Queensland, Australia, n.d.

Ricciardi, Garrett, and Julian Rose. "Formlessfinder." Formlessfinder, n.d. <http://www.formlessfinder.com/>.

Seiberling, Stephen, Alan Weakley, and Peter White. Redbud, n.d. http://www.ibiblio.org/openkey/intkey/images/Cercis_canadensis_var_can002.jpg

Thai, Nguyen. Red Maple, n.d. <http://thumbs.dreamstime.com/z/young-maple-tree-305937.jpg>.



research references

Barnett, Rod. "A Ten Point Guide to the Formless in Landscape Architecture," 2010. http://www.rodarnett.co.nz/pub/news/a-ten-point-guide-to-the-formless/files/A_Ten_Point_Guide_to_the_Formless.pdf.

———. "Formless." October 24, 2014.

Bataille, Georges. *Visions Of Excess: Selected Writings, 1927-1939*. Edited by Allan Stoekl. 1 edition. Minneapolis: University of Minnesota Press, 1985.

Bois, Yve-Alain, and Rosalind E. Krauss. *Formless: A User's Guide*. First edition. New York : Cambridge, Mass: Zone Books, 1997.

Corner, James. "High Line at the Rail Yards." *Field Operations*, October 24, 2014. <http://www.fieldoperations.net/project-details/project/high-line-section-3.html>.

———, ed. *Recovering Landscape: Essays in Contemporary Landscape Architecture*. 1st edition. New York: Princeton Architectural Press, 1999.

Dent, Andrew, Leslie Sherr, George M. Beylerian, and Gail Peter Borden. *Material Innovation: Architecture*. 1 edition. New York, NY: Thames & Hudson, 2014.

D.I.R.T. Studio. "HIGHLINE." *Dirt Studio*, October 24, 2014. <http://www.dirtstudio.com/#highline>.

Eisenschmidt, Alexander. "The City's Architectural Project: From Formless City to Forms of Architecture." *Architectural Design* 82, no. 5 (September 2012): 18-25. doi:10.1002/ad.1456.

Lave, Rebecca. "The Controversy Over Natural Channel Design: Substantive Explanations and Potential Avenues for Resolution." *JAWRA Journal of the American Water Resources Association* 45, no. 6 (December 2009): 1519-32. doi:10.1111/j.1752-1688.2009.00385.x.

Reed, Chris, and Nina-Marie Lister, eds. *Projective Ecologies*. Har/Chrt edition. ACTAR, Harvard Graduate School of Design, 2014.

Rosgen, Dave. *Applied River Morphology*. 2nd edition. Pagosa Springs, Colo: Wildland Hydrology, 1996.

———. *Applied River Morphology*. Wildland Hydrology., n.d.

———. "The Reference Reach - A Blueprint for Natural Channel Design," n.d.

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