“...the collages we did made us think of a story to tell - just like how the site showed us that there was a story to tell within itself.”

- Patricia Yao, Project Pipeline Designer
The National Organization of Minority Architects (NOMA) summer STEM program entitled Project Pipeline Architectural Summer Mentorship Program aims to increase the number of underrepresented minorities, especially African-Americans, pursuing careers in architecture. During the summer of 2019, the University of Virginia (UVA) School of Architecture piloted its first version of Project Pipeline in partnership with our NOMA Student Chapter and the Charlottesville Public Housing Association of Residents (PHAR).

The program provided a two-week intensive design experience for seven minority youth designed to improve their pathways to pursue design education and engaged UVA students in learning from and mentoring young people in local K-12 school systems. The summer program extends into the fall of 2019 with events at the Architecture School aimed at enriching UVA students’ experiences through interactions with the program. These plans include an exhibition of design work generated during the summer program, and a public lecture that directly addresses the issues of inclusion and equity that the Project Pipeline program seeks to address.

In the summer of 2018, the UVA School of Architecture adopted an Equity and Inclusion Plan that set new priority goals and actions (https://www.arch.virginia.edu/about/inclusion-equity). The plan notes the racial homogeneity of professions of architecture, landscape architecture, and planning, how that results in a loss for the fields without the incredibly important perspectives of so many creative minds, and commits to developing new programs to change that pattern locally.

The goals of the program were to take the first steps in changing institutional culture, deepening recruiting efforts, and providing multi-scalar and student peer mentorship opportunities for underrepresented potential applicants, current students, faculty, and staff. The Equity and Inclusion plan serves as a guiding document to undergird this change, and major goals include striving for a culture of respect and mentorship, and to have the school’s faculty, student, and staff composition represent Virginia’s demographics. The plan identifies professional pipeline programming as a useful model seen at other institutions for achieving similar goals. Many schools of architecture and design across the country are implementing local pipeline programs, often in partnership with community entities.
NOMA’s Project Pipeline Camp, established in 2006, allows institutions like UVA to pilot longer-term sustained student pipeline programming. The week-long program model is part of the larger Project Pipeline framework that is “designed to expose underrepresented children to the built environment and architectural profession as early as the third grade and through the twelfth grade. NOMA’s Project Pipeline is one of the few initiatives in the nation connecting children and architecture.”

Project Pipeline is a framework to engage these K-12 students with UVA design students as well as design professionals through programming. The program introduces students to the people, professions, and ideas that makeup the architecture and design professions. High school designers, UVA student facilitators, and local professionals are asked to work collaboratively to address community focused issues through creativity and design.

Pipeline participants were asked to think creatively about spaces that surround them and to investigate how they can best influence those spaces. Each day consisted of various hands on activities, field trips, and learning sessions designed to encourage students to synthesize and interpret new information as they propose new futures for these places. By the end of the two-week program, Pipeline participants created building blocks for a better city that reflects their academic, cultural, and design interests.

The program will be a prototype and starting point for developing approaches necessary for longer-term efforts within the UVA School of Architecture. The Inclusion and Equity Committee’s plan recognizes the gap between our ideals of democracy and the specific structures of inequity that have structured and continue to shape our institution and our broader social worlds.

Shifting these existing dynamics will require sustained, reflexive engagement with past and present failures as we work together to realize our aspirations. Change in our institution is not simply a project of including more people of varied backgrounds, identities, and experiences at the table, but of committing ourselves to the sustained, critical rethinking of our institutional policies, practices, structures, and culture. We aim to move beyond an assimilationist model of inclusion to build the capacity for expanding access and redistributing power through a self-reflexive process of questioning and rethinking systemic inequities, biases, and norms.

Bringing Project Pipeline to the school is one of the first in many steps of a continuous process—one that is aimed at an unfixed horizon, even as we create built-in structures of accountability and ongoing evaluation.
The City of Charlottesville, residents, James River Association, and other partnered agencies/organizations have developed the Pollocks Branch Walkable Watershed Plan. The Watershed Plan includes the installation of a footbridge crossing Pollocks Branch at Rockland Avenue connecting to the South First Street neighborhood.

Neighborhood leaders, Joy Johnson and Audrey Oliver approached officials with the idea of developing a small park near the bridge crossing and repurposing a historic ash tree which will be felled for the bridge project. Ms. Oliver said, “The woods down there are just beautiful, and I always wanted to figure out how we could make it a therapeutic area – somewhere to walk, hike or just relax. The message eventually spread, and [UVA professor] Barbara Brown Wilson got in touch with me, and we talked about getting the youth together.”

Youth designers worked with resident leaders, city officials, University professors and student mentors, wood fabricators, and local professionals during the summer of 2019 to develop design concepts for the park that incorporated reuse of the ash tree.

Citations
https://news.virginia.edu/content/project-pipeline-makes-architecture-more-accessible-encourages-high-school-students
Elgin Cleckley*, Assistant Professor of Architecture & Design Thinking, with appointment in the Curry School of Education and School of Nursing

Elgin Cleckley is a designer, educator, and principal of mpathic design, a Design Thinking initiative and practice focusing on empathic design strategies for race and culture.

After studying architecture at the University of Virginia and Princeton University, he collaborated with DLR Group (Seattle), MRSA Architects (Chicago), and Baird Sampson Neuert Architects (Toronto) on award-winning civic projects. He was a Muschenheim Fellow at the University of Michigan (1998), also teaching undergraduate studios at the University of Illinois, Chicago.

Before joining UVA’s Design Thinking program in 2016, he was the 3D Group Leader and Design Coordinator at the Ontario Science Centre (Toronto), Science Content and Design Department, and Agents of Change Initiative, since 2001. This work produced award-winning exhibitions and public art with international artists David Rokeby, Michael Awad, Steve Mann, and Stacy Levy.

Elgin teaches Design Thinking studios and seminars at the University of Virginia, also directing the School’s Design Thinking program in Ghana.

*Program Director

Barbara Brown Wilson – Assistant Professor, Urban and Environmental Planning; Faculty Director, Democratization of Data Initiative, UVA Equity Center

Barbara Brown Wilson’s research and teaching focus on the history, theory, ethics, and practice of sustainable community design and development, and on the role of urban social movements in the built world. Her research is often change-oriented, meaning she collaborates with community partners to identify opportunities for engaged and integrated sustainable community development that creates knowledge to serve both local and educational communities. In her classes, students grapple with complex socio-environmental problems like climate change and structural inequities, and develop not only technical skills, but also skills of cultural competency and empathy.

Wilson seeks to understand how social values, specifically regarding ecology and equity, are coded into the built world. Her work investigates the role of codes (e.g. building, land use, and societal) and coalitions working in the service of more resilient communities. She is particularly interested in the efficacy of design and development mechanisms employed in vulnerable communities, interrogating how existing disproportionate impacts of environmental injustice have been remedied or exacerbated by development practices.
Jeana Ripple – Associate Professor & Director of the Graduate Architecture Program

Jeana Ripple is an architect, principal and co-founder of the collaborative architecture firm, MIR Collective and research practice, Ripple Architecture Studio. Ripple’s work is recognized through international awards, competitions, and exhibitions for the translation of material manufacturing techniques into innovative architectural systems promoting local economic growth. Her practice and scholarship expand research frameworks for material resilience in architecture. Prior to joining UVA, Ripple practiced at Studio Gang Architects in Chicago, where she led numerous building and landscape projects.

Ripple’s teaching combines design and advanced technology. Her courses include a design-based parametric structures course, graduate foundation design studios, material-prototyping studios, and advanced design computation courses. Ripple has been recognized by two national awards for innovative approaches to teaching building technology through design and performance-simulation. Ripple’s practice, scholarship, and teaching draw upon her combined background as a computer science engineer and architect to frame material resilience through a systems framework with varying scales, inputs, and objectives.

Alissa Ujie Diamond – Landscape Architect and Candidate in the PhD in the Constructed Environment

Alissa is a landscape architect and third year student in the PhD in the Constructed Environment program. Her current work concerns racism, capitalism, landscapes, and racialized histories in Central Virginia. Before returning to UVA, Alissa worked at Nelson Byrd Woltz Landscape Architects, and helped lead the firm’s efforts to explore cultural and environmental history as a basis for design. Alissa’s teaching, scholarship and design approach centers on the importance of historicizing understandings of place and space in contemporary life.

UVA School of Architecture Student Mentors

Lauryn Downing
Brandon Eley
Hunter Berry
Kellen Dunnavant
Jessica Smith
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UVA School of Architecture

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July 8
Learning scale: measure your body, measure/notice scale of body on A-school sculptures
South First Street site visit & talks from Ms. Audrey & Ms. Joy [PHAR and history of activism]
Welcome from Grant Duffield, CRHA Executive Director
Photovoice onsite & in playground/space bingo
  Using a bingo board with categories Body, Inside, Nature, Go play, and Outside designers responded to prompts by taking pictures of themselves on the project site, to begin thinking about the connections between embodied experience, spatial characteristics, and personal and collective meaning in space.

July 9
Tour of Academical Village and Mapping exhibition, Tour of Memorial to Enslaved Laborers
  Students experienced an African American narrative tour of the Academical Village and surrounding landscape. Learning the true history of Jefferson’s design allowed for students to reflect on the South First Street ecological landscape in response to their sense of community and belonging. The tour continued with an empathic explanation of the Mapping exhibition in the West Oval Room
Unscripted space lecture on Isamu Noguchi
  Isamu Noguchi, a Japanese American artist and landscape architect pioneered the way for unscripted play-spaces — playspaces with enough ambiguity that the children’s mind and imagination lead the way. This concept would lead the conversation regarding the play space built at South First Street.
July 10  Site Visit to Wildrock with Ms. Joy and Ms. Oliver

Ms. Joy and Ms. Oliver, the community partners, led a trip to Wildrock, a playspace in Crozet, VA. The experience at Wildrock was a foundation for the designers understanding playspace potential. This trip also provided the designers an experience to first-hand interact with stakeholders in the community and the project.

July 11  Identifying themes that are important (collage)
Making abstractly

Students experienced the spatial practices of collage, following the inspiration work of Romare Bearden. Bearden's work connected the students with African American traditions of representing social and cultural connections with space.

Landscape Logics - models, drawings, waterflows and representing land
Students engaged different modes of representation including model, plan, section, elevation, through imaginative role-playing to explore the spatial logics of landform, soils, water and social use.
July 12  

Deconstructing the National Museum of African American History and Culture Corona  
Students used pipe cleaners to “build” the filigree seen on the corona of the NMAAHC. This exercise connected students with the artistic and creative talents of their ancestors, as implied in David Adjaye’s design.

Visit of Court House Square, Equal Justice Initiative Lynching Memorial Dedication  
Students took part in the dedication for the Charlottesville Memorial for Peace and Justice, 121 years to the day John Henry James was lynched just west of Charlottesville. Students had the unique experience of learning about the design in advance of the dedication from the designer.

Tour of the Downtown mall with Nathan Foley of NBW and Alissa Ujie Diamond  
Seen/Unseen: Halprin’s Downtown Mall and Hidden Black Histories | Nathan Foley, an associate with Nelson Byrd Woltz Landscape Architects, and Alissa Diamond, a landscape architect, led a tour from Court Square to the Omni Hotel along the Downtown Mall. Nathan spoke to Lawrence Halprin’s process in designing the downtown mall, and connections between Halprin’s ideas and the larger environment of Charlottesville. At the same time, Alissa spoke to episodes of black history and residence in the spaces downtown, which are largely hidden from view in the space as it exists now.
Field Trip to Washington, D.C.

Student designers traveled to Washington, D.C. with the mentor team to experience several of the museums commemorating history through art and design, including the National Building Museum, National Gallery of Art, and the National Museum of African American History and Culture. They also visited the National Wharf to interact with deliberately designed spaces and uses. This trip began the conversation around history and design.
schedule + curriculum

July 15
Design Development
Charlottesville Mapping Exercise
Conversations about Ecology and Play: visit and lecture from Devin Floyd (Center for Urban Habitats)
The information presented by Devin included the ecological history into the narrative of the South First Street neighborhood and combined natural alterations with document history of place. This information was then incorporated into the designs.

July 16
Tour of the Jefferson School African American Heritage Center, 233 4th Street NW
Dr. Andrea Douglas, Director of the Jefferson School African American Heritage Center, hosted the team on a tour of the Center and then a walk through the surrounding neighborhood so that the young designers could 1) understand the incredible local resource that the JSAAHC can be for their educational journey, 2) appreciate the history of strength in post-emancipation Charlottesville, and 3) grapple with the complex history of design injustice that still permeates the built world in central Charlottesville.
Visit and Tour of Gaston and Wyatt for feedback
Gaston and Wyatt are a partner to this project and will assist with the manufacturing of the wood that is garnered from the site. The tour with Gaston and Wyatt put into context the parameters of what is feasible from design to fabrication.
Define project groups: “Chill Spot” “Porch/Generations” and “Play”
July 17  
Design review and refine  
Collage and Model  
Students worked on collages and models to further their design  
concepts ahead of afternoon presentations  
Presentation to Bruce Wardell for feedback  
Bruce Wardell, a local architect, allowed the designers the  
experience of presenting their designs ahead of the final  
presentation to the partners. He provided valuable feedback  
that influenced the final designs. This was a valuable experience  
for the designers to practice public speaking and understand the  
format of a review in an architectural setting.

July 18  
Design production and refining  
Students worked for the majority of the day on their ideas within  
their teams. After the review from the previous day, students  
learned how to take the critique, compliments and suggestions to  
alter their ideas and refine their concepts for their play-spaces.

July 19  
Final presentation of designs at the South First Street Community Center  
Students shared, in teams, final designs with Ms. Audrey and  
invested community partners. South First Street is undergoing  
redevelopment and members from the community and design  
teams were present to learn about the ideas presented.
To collaborate with one another, the designers were divided into different groups to develop their final proposals and consider different portions of the site. Inspired by the activities completed during the program, the designers reviewed projects by architects such as Isamu Noguchi as well as emphasized the unique design features at the field trip sites of Wildrock park and the Smithsonian National Museum of African American History and Culture in order to inform their final design proposals for the park. Overall, three design proposals were developed: Generations/Porch, Play, and Chill Spot. All groups synthesized input from resident leaders and elders, site histories, site observations, use of wood from an ash tree and ideas developed in the earlier exploratory exercises to propose a set of three connected spatial concepts for portions of the site. The “Porch” group elaborated the entrance to the site, where a path will connect the future housing redevelopment and the wooded stream corridor below. The “Play” group took advantage of a relatively flat area next to the stream to develop an active playscape featuring naturalistic designs. The “Chill Spot” group proposed a plan for the area closest to the creek which would incorporate other usability features on the newly constructed bridge.
The team of designers poised a deliberate intention to connect the past to the present as well as provide a space for multi-generational interaction. Their design incorporated building a “porch” like structure near the hilltop which would allow community elders to sit and watch over the youth playing in the park spaces below; functioning as “the overlook” for the community to observe this space. Designing for generational accessibility, the porch would be level with the topography at the highest point of access to the park and encourage leisurely activities there with rocking chairs or other sedentary structures for individuals to “find their peace.” This height would also provide a space to experience winds, breezes, and sunlight during the day, which Ms. Joy told the designers in their initial interactions would be a wonderful component of the new park. The public rocking chairs and seating would be created by the wood collected from the ash tree and provide freedom to stay in the space while interacting with each other. Additionally, inscriptions detailing the site’s rich history and local community leaders or members would be engraved into the rocking chairs and other built features in order to further connect history into their design.
The designers intentionally took advantage of the relatively flat area near the stream to develop an active design encouraging a space to “play” and relax. Their design features playscapes for children that would be built utilizing the wood harvested from the ash tree. Envisioning multiple dynamics within the space, the designers incorporated hiding places such as a wood-carved tunnel, slides, climbing elements and swings within their proposal. The designed playscape would include directive and non-directive designs of play allowing for the growth of the creativity and imagination of the user. These features would encourage nearby residents of families and youth to play and relax within the park as well as spaces for the nearby churches and schools to visit. Providing a natural landscape opposing the built infrastructure was intentional; the designers spent much time researching and learning the histories of Black residents and wanted to create a space to “be your own boss” and “work for nobody.” Individuality within the landscape of the park as well as spaces for interaction by way of the play structures and features convey this position for “play.”

“play”

designed by Zymir Faulkner, Tiana Gonzales and Izaiah Richardson
A “chill” spot or area would be located near the water body to enable a peaceful oasis near the sound of water and natural elements. The designers emphasized Ms. Audrey and Ms. Joy’s feelings about the space: “I feel peaceful” and “I like [the variety of] colors” to lead their design proposal. Their design intention was to evoke spaces for daydreaming and/or mediation – while also providing a resting space near the newly built bridge. Additional shade features would allow leisurely activities to be encouraged and find peace within the space as well as enable people to enjoy the colors of the water body and landscape. Utilizing the wood harvested from the ash tree, wooden path-markers and/or steppingstones would be crafted to create a trail navigating within the park. The designers additionally proposed constructing a “written wall” along the newly constructed bridge for the community to interact with and write-on using chalk as a public artwork feature that would be empowering to the public and utilize every aspect of the new park. Nicknamed “The Creek” by the designers, this space would allow the community to inhabit the space for longer periods of time and interact with each other within a natural environment in order to find peace and chill.
“First off, I would like to thank UVA and the Professors for this amazing design camp. An experience like this is something I could not have had if I had to pay out of pocket. It truly helped me discover a talent I did not know I had. I love how the collages we did made us think of a story to tell. Just like how the site showed us that there was a story to tell within itself. I learned so much visually, historically and mentally. Thank you.”

- Patricia, Pipeline Designer

“I learned more about Charlottesville and its history that I did not know, and I also learned how much work goes into designing something, how much thought... I wanted to try something different this summer, instead of sitting around the house for two weeks. I think this is great experience.”

- Zymir, Pipeline Designer

“They did an excellent job, and most of them had never done anything like this before. I was just so happy for them, so proud of them and just thankful for them. I can’t wait to see what happens.”

- Audrey Oliver, Community Partner
The high school students were able to expand and develop their design thinking skills to empathize, define, ideate, and prototype their small park proposals - which were reviewed by city officials and neighborhood residents at the conclusion of the two weeks. In reflection, many of the young designers valued their opportunity to learn more about Charlottesville’s unique history and working through the processes of designing a community space for everyone to enjoy.

The two weeks in the summer were a fantastic launching point into this project. There are four high school designers and members of the mentor team that will continue in the oversight and design of this project through the remainder of the year as the site is cleared, the wood is harvested, and the playspace is manufactured and installed.

The work completed during UVA Project Pipeline 2019 was converted into an exhibition that was open from September-October in the gallery at the University of Virginia School of Architecture. Across the school and the University, the model of Project Pipeline has been highly revered, discussed, and is eager to be replicated. The school, the designers, and the mentors are excited for the potential this has to become!