



Instructors:
Teaching Assistant:
Community Partner:

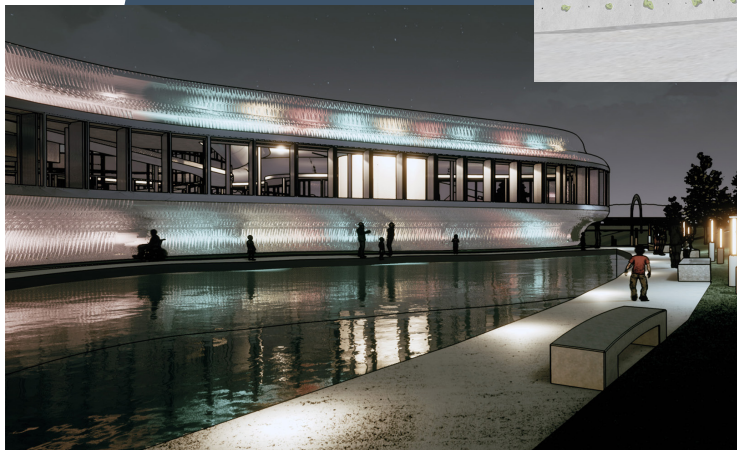
Nathaniel Q. Belcher, Yasmine Abbas
Li Cai
Pottstown Area Health & Wellness Foundation (PAHWF)

During the fall 2019 semester, the Hamer Center for Community Design at Penn State partnered with the Pottstown Area Health and Wellness Foundation (PAHWF) to explore the design of the Pottstown Children's Discovery Center with fourth-year architecture students. SPACE • PLAY • LEARN! The underlying design research question of the fall 2019 studio was: How can architecture contribute to child development? Additionally, how can spatial design, geometry, building atmosphere, and ambiance contribute to "learning for fun" and the health and well-being of the Pottstown community?

ARCHITECTURE AS PLAY

Shiyu Tong

In this project, site and architecture work together to create an "architecture of play." Popped-up concrete forms help reshape the landscape for children. The architecture blends into the site topography by organizing three independently programmed volumes next to the north-south park connection, which also function as drainage (for flood remediation), and by using accessible green roofs. Skylights are added to the accessible green roof, bringing natural light into the space below and becoming sculptures with which children can interact: Children can watch what is happening inside through the skylights. The open amphitheater's stage is also a concrete tube carved in the roof structure so audiences above and below can experience the performance.



A STEP TOWARDS REVITALIZATION

Paul Panassow, Thamer Alsalem, Benjamin Nahumz

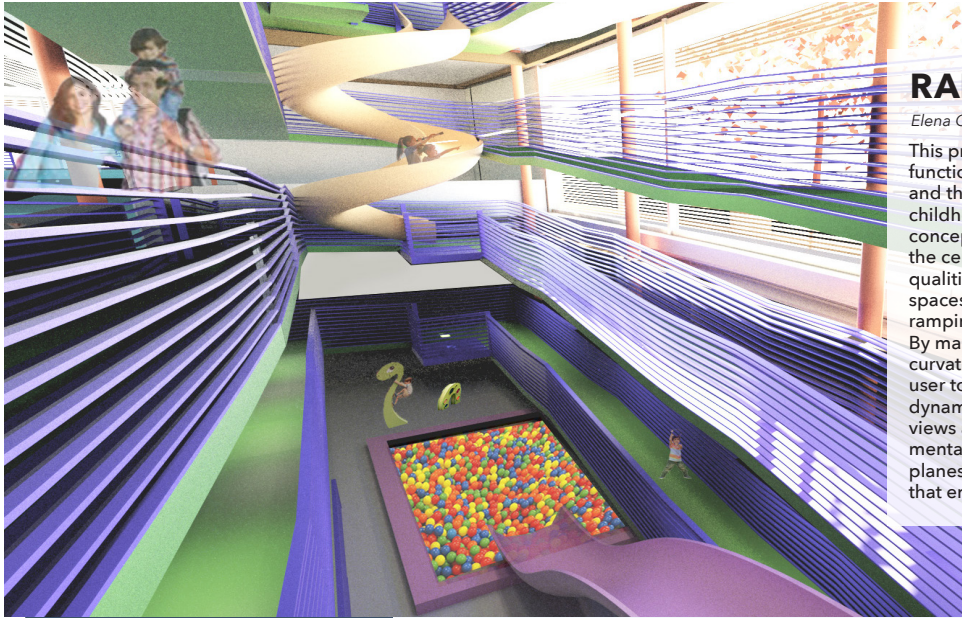
The brown field site is developed to become a regenerative landscape, benefiting the immediate ecosystem and, in combination with the other discovery center spaces, to facilitate learning through interactive play in the built environment. The design is one part in a string of new potential developments in Pottstown that could greatly improve the local economy of the town and the way of life of its inhabitants. Some of these developments include additional plots of land for the "mosaic" community land trust garden network, reopening the New York Plaza Hotel as a stopping point along the Schuylkill River Trail, a seasonal café/beer garden, bike lanes and electric vehicle charging stations, and walking tours of historic downtown Pottstown.

FOSTERING EXPLORATION

Danielle Vickers, Hauwa Mahmoud

The playful forms of the Pottstown Children's Discovery Center constitute a forest of vessels and a sculpture in the landscape, thus extending the park to the other side of the road. The goal of this project is to foster curiosity, exploration, play, and well-being through architecture that inspires discovery. Universal design is utilized to accommodate for a wide range of spectrum disorders. Engagement of multiple senses facilitates discovery while carved-out spaces/rooms create refuge areas to avoid "over stimulating."





RAMPING PLAYSCAPES

Elena Chodkowski, Thomas Dimick

This project began with understanding the function of a Children's Discovery Center and the qualities it should have to promote childhood development. Through a series of conceptual exercises, it was concluded that the center should have flexible and dynamic qualities as well as flexible and dynamic spaces. This concept was achieved through ramping and morphing building elements. By manipulating floor levels and building curvature, spaces were designed to allow a user to experience the building in a fluid and dynamic way while emphasizing important views and axis. Ramped planes physically and mentally engage the body more than linear planes. This notion led to creating playscapes that engage children and adults alike.

JENGA

Danielle Oriol, James Damus

Development in children comes from their willingness to take risks. In order to enable child development while incorporating an aspect of playfulness, we took inspiration from a game, Jenga, that is all about taking risks. The fun and learning in Jenga comes from the ability to push the tower to its limits, and conceptually through architecture, by pushing children's curiosity through the excitement that comes from not knowing what happens next in space. We aimed to create an architecture that stimulates the minds of children while encouraging them to explore, play, and learn.



DISCOVERY

Katelyn Mckenna, Victoria Castano

The Pottstown Children's Discovery Center will be an educational resource for regional school districts by bolstering their curriculum and bringing them to life. The center will also provide underprivileged children who do not have access to Philadelphia-based cultural and educational offerings with a special place to call their own – right in their backyard. We started with the idea of having a series of straight lines that when put together in a certain pattern form a series of curves. With a form like this, children would be able to explore their surroundings. They would feel like they're viewing something brand new at every unique angle. Additionally, parents could safely view their children from a distance, making the parents feel in control and comfortable.

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