

EDUCATION FOR THE FUTURE OF MANUFACTURING

BY LARA LITCHFIELD-KIMBER, EXECUTIVE DIRECTOR, MID-HUDSON CHILDREN'S MUSEUM

Expanding a Museum's Role in Advancing STEM Education

Imagine a museum campus that ignites and inspires the next generation of critical thinkers, problem solvers and innovators – a place where young engineers are nurtured, where citizen scientists are activated and where learners of all ages are catalyzed to take action. Imagine a world-leading “Crucible” – a space where complex conversations and thorny problems are tackled by collaborations between industry, community and academics – inspiring action and igniting passions in young people for pursuing careers in STEM.



**IMAGINE ALL THIS ON
THE POUGHKEEPSIE
WATERFRONT.**

A MUSEUM ON THE RISE

The Mid-Hudson Children's Museum is the only children's museum between New York City and Albany. Since 2012, attendance at the Mid-Hudson Children's Museum (MHCM) has grown significantly from 20,000 to 76,000+ visitors per year. We now welcome families from all eleven counties in the Hudson Valley, western Connecticut, 46 other states and 11 countries.

Attendance at MHCM now far exceeds industry benchmarks for interactive children's museums in terms of expected visitors per square foot, and we are now literally busting at the seams and needing to expand.

But, rather than simply expanding the existing space and cater to our current audience of families with young children ages 0-6, we see a strategic opportunity to significantly expand and diversify our content offerings to encourage families to stay engaged with us longer as their children grow.

AN UNPRECEDENTED OPPORTUNITY

MHCM was recently approved to assume ownership of a piece of property adjacent to our current location on the Poughkeepsie waterfront known as Upper Landing. The property includes two historically significant but vacant buildings. That this property is



New programmatic space will include a classroom with an instructional demonstration kitchen to host family cooking programs, and an exhibits gallery, which will feature exhibits on all aspects of food, local agriculture, nutrition and food-related STEM careers. This space will also host an expanded year-round farmers market. (Target Audiences: families with children ages 4+; seniors; elementary and middle school groups.)

The Science Center at Upper Landing. Hoffman House in Upper Landing is one of Poughkeepsie’s oldest buildings with a section of it dating back to 1717. In this adaptive reuse project, this building will become an interactive science center, housing exhibits anchored

being made available to us – at this very time – creates a rare and exciting opportunity as we consider our expansion possibilities. Together with the two buildings and our own site, we have the opportunity to develop a whole new museum campus to benefit our region.

A CONCEPT EMERGES: “THE MUSEUMS AT UPPER LANDING”

MHCM is looking to connect our need to expand our physical space with a growing regional need to advance STEM education. Early visioning sessions with community stake-holder groups inspired us to “think big” with respect to the possibilities, and as a result we are developing an innovative concept to create a vibrant, regionally-focused museum campus featuring four separate small museums nestled into a beautiful riverfront park. Each museum will feature its own unique content and will be developed for a particular audience, but all will be grounded in science, technology, engineering and math education.

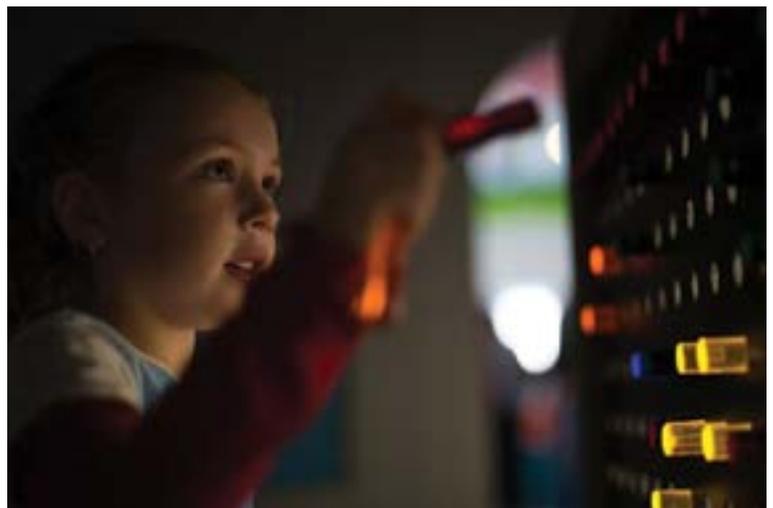
in the exploration of natural phenomena, with the educational philosophy of the constructivist science centers, which feature open-ended, self-directed, inquiry-based experiences with prolonged engagement as outcomes. The unique floor plan of Hoffman House provides opportunity to create mini-galleries, allowing for a wide range of hands-on experiences and discovery across a range of STEM topics. (Target Audiences: families with children ages 5-12; elementary school groups.)

The Crucible. Reynolds Building in Upper Landing will be transformed into a vibrant “community curated museum” (The Crucible), offering exhibitions and programs that are determined and created by, and tightly connected and relevant to, our regional community. Loosely modeled after the MAH (Museum of Art & History in Santa Cruz, CA), where different constituents from within the community come together and co-create exhibitions and programs about complex topics and/or controversial issues. The Crucible will serve as an innovative convening space where new partnerships and connections are formed among middle and

OVERVIEW OF PROPOSED MUSEUMS CAMPUS

Mid-Hudson Children’s Museum. MHCM’s main building will continue to serve as the Children’s Museum and as the administrative hub of the Museum Campus. We look to build an addition to accommodate a new exhibit fabrication shop, expanded classroom space and exhibit gallery. MHCM will also develop a new enclosed outdoor early STEM exhibit park. (Target Audience: families with children ages 0-6.)

Waterfront Food Works. The existing pavilion at MHCM will become a museum dedicated to food – its production, consumption, artistry, technologies, careers and social issues. The pavilion will be enhanced with the installation of a commercial kitchen facility to support a new waterfront café and expanded catering and banquet service.





high-school aged youth, academia, industry, the arts, and the community at large. Content will be produced locally to inspire critical thinking, and will reflect multiple viewpoints, interests and interpretations of emerging science and advances in technology and

their intersection with social and/or ethical considerations (e.g. big data and privacy; food systems and social justice; media and mental health). (Target Audiences: middle and high school aged youth, college students, adults, seniors.)

Upper Landing Park. The Park will continue to be made available for both private and public events, with management by MHCM. With interpretive signage already in place on science topics including water power, transportation, bridge engineering and glass eel migration, it is almost as if this Park was destined to be a gateway to memorable STEM experiences, such as those proposed by the creation of this Museum Campus. (Target audience: general public.)

NEXT STEPS

We are now actively evaluating the property for suitability for development and exploring how the buildings can be restored and re-purposed for maximum impact. Specifically, we are looking to develop plans for separate and distinct “museums” that would provide families age-appropriate experiences designed to grow with their children and families.

Our next round of visioning sessions will be in fall 2018 and winter 2019 as we look to map out museum content and to develop plans that depict each of these new learning spaces.

GETTING INVOLVED

We invite your participation! An exciting and ambitious project such as this will require:

Leadership. We are continuing to strategically grow our board and our planning committees so that we are positioned for success in our museum expansion efforts.

Partnerships. We are also looking to build relationships and key funding partnerships with local industries, colleges and universities that have an interest in advancing STEM education and in preparing tomorrow’s STEM career workforce.

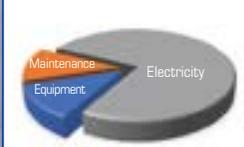


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For more information on this project, I invite you to contact me directly at (845) 471-0589 ext. 19 or LLKimber@mhcm.org.

Lara Litchfield-Kimber earned her B.A. magna cum laude from Amherst College in Biology and her M.S. from Cornell University. Formally trained in the agricultural sciences as a plant pathologist, she left research and teaching to become an entrepreneur, starting Fertile Minds, Inc., an informal science education consulting group. She made the leap to higher education fundraising at Cornell University before joining the science center field in 2004 at the Sciencenter in Ithaca, NY. Ms. Litchfield-Kimber is a distinguished leader in the international science museum field, with a proven track record of transforming and growing museums and programs. She was named a Noyce Leadership Fellow in 2010 at the recommendation of the Association of Science-Technology Centers, and in 2015 was the Athena Leadership Award Recipient for the Hudson Valley. She became the Executive Director of MHCM in September 2012 and has just been elected to the board of the Association of Children's Museums in Washington, DC.



Support. By making a charitable contribution to MHCM now, you will support our critical upfront planning and design efforts upon which this whole project will be built.



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