2017-2018 Creative Achievement

Prof. Mark Keane and Prof. Linda Keane, Candidates for Creative Achievement Award, nominated by Dean Robert Greenstreet
32096
Architecture and the NEXT.cc Informal E-Learning DESIGNOpedia

Mark and Linda Keane, AIA
University of Wisconsin-Milwaukee and
The School of the Art Institute of Chicago
Architecture serves the diverse population of the world. It is the second skin of the earth, with our past, present, and future written in its DNA. It is everything to human prospect and well-being.

It is an essential civic right of every K-12 student to become engaged in place making and proposing improvements to their community. The architecture foundation programs in the US, the design education programs of museums, and the emerging design council programs worldwide all serve this goal. Our mission is to reach the other 99%. We started with animated films about architecture shown on TV and moved to digital publication of films and interactive text with slide resources. Using Blackboard, Go To Meeting, Infrastracture, and Desire2Learn, we led on-line learning at our respective universities and presented virtually internationally at global conferences spreading the necessity of design thinking to move humanity faster toward more sustainable practices of living. We developed free curricular blocks on the internet, or journeys, with links to virtual field trips, museum interactives, apps, and contemporary art, science, design, architecture and environmental practices as a powerful medium for students to grapple with current issues through the mind of the architect.

Our efforts work to share the resourceful, purposeful, creative, and innovative research of systems thinking with every K-12 student when their imaginations are emerging as the next generation of leaders. Today the internet offers life-long learning and students who access digital media for research and exploration purposes have a greater chance to discover design and architecture if it exists in a friendly, accessible, searchable, and interactive platform.

NEXT.cc creates E-Learning activities for teachers, students, and communities with students and educators that nurture creativity and compassion with purposeful engagement in improving conditions, situations, needs and life. As academics and practicing architects/environmental designers, we make use of everyday technologies to reconnect people and cultivate communities of inquiry into consilience of thinking, or the making of new relationships between people, the nature of the location, place, and prospect. E-Learning easily integrates research and methodologies of technologies, systems, material research, behavioral sciences, and cultural heritages, sharing the pleasures and purpose of construction of ideas. We work to build value in the importance of design of the built environment. We submit this application based on our story leading to the development of the NEXT.cc Designopedia. We share, as architects and educators, our preparatory exploration of film, animation, and digital instruction as research of the neautoscience of learning to enhance and expand the design literate populations.

We are grateful for the continued support from the University of Wisconsin-Milwaukee School of Architecture and Urban Planning Community Design Solutions, the School of the Art Institute of Chicago, and the Peterson Family Foundation and the over one hundred students and dozens of professionals and K-12 teachers who contribute to urban stewardship through the development of experience and connections to community. We change the world best through learning from each other learning from each other and collaborating on improving conditions.

"I looked over your work on NEXT and I offer my congratulations on a great project.

— Bruce MAU, DESIGN WITHOUT BOUNDARIES, MASSIVE CHANGE

Consider www.NEXT.cc as exploration, creation, and activation of imagination.
Our Story

Mark and Linda Keane, AIA, are innovators in Architecture education, leading in animation, digital publications, on-line instruction, and creation of the global e-learning NEXT.cc DESIGNopedia that reaches students, teachers, and school communities with connected activities across nine scales of human experience and impact-nano, pattern, object, space, architecture, neighborhood, urban, region and world.

1st Architectural ANIMATION on PBS

Animatit Architecture, the Keanes capture creative imagination in the interpolative process. Producing two hours of animated shorts, the Keanes experimented with techniques to introduce structural, cultural, typological, and spatial understandings of architecture and design on the silver screen. Starting with hand drawn animated films, the Keanes choreographed design ideas in stimulating, entertaining and educational shorts shown at international film festivals, galleries, museums, and conferences. Originally created as 'kickstarters' to classes they were teaching, requests to show the films at NIAE National Institute for Architecture Education High School Career Days and by schools of architecture across the United States placed their films in the collection of the Metropolitan Museum of Art/ J. Paul Getty Program for Art on Film. Published in Architecture On Screen and A+A Architecture Animation 2001 along with Diller & Scofidio’s EyeBeam Competition Entry and other international shorts.

• A retrospective of the Animated Architecture Work of Mark and Linda Keane received a PBS Emmy and the Chicago Film served as the PBS Image Union trailer.

• Before TED Talks and Khan Academy lectures, at the dawn of the digital age, the Keanes’ films open the interpolative scale-shifting experimentation of the compositional creative process of designing objects, space, architecture and cities. Shown repeatedly on Chicago PBS Image Union, the Keanes reach tens of thousands of viewers over a five year period.

1st CD-ROM for Architecture Education

As lead authors and web managers of ARCHITECTURE: An Interactive Introduction, published by McGraw Hill, Inc. in 1996, their impact is felt worldwide. This first CD-ROM about Architecture, pre-internet, included short narrations, hyperlinked text and interactive, resources moving between video, drawings, diagrams, glossaries and content. Available at museums, in bookstores and eventually on Amazon, AAII served as a friendly, easy to use introduction to the breadth of Architecture education.

• Translated into Spanish, AAII serves diverse populations around the world. AAII is in libraries in Australia, the Middle East, Asia, Europe and North America and is an acquisition in dozens of universities diversifying interest in architecture education and practice around the world.

1st On-Line Instruction in Architecture at 3 Midwest Universities

Mark and Linda are leaders in online teaching. Linda, at The School of the Art Institute of Chicago, and Mark at the University of Wisconsin-Milwaukee and University of Wisconsin-Madison, use multi-media combining videos and digital tools seamlessly with physical drawing and modeling building student focus and developing metacognitive skills.

• The Keanes reach thousands of architecture students and non-majors at the university level and hundreds of students at over 50 regional high schools to date. The dual options courses in high schools provide both high school and college credit while introducing Architecture to the K-12 audience. Their instructional videos on Vimeo are public access to individuals internationally.
Mark and Linda Keane, AIA, are co-founders of the global e-learning NEXT.cc DESIGNopedia reaching imaginations in 50 states and 200 countries. The Keanes work with diverse communities to socially construct landscapes of possibilities sharing sustainable practices and greening imaginations. Mark and Linda’s projects and workshops help thousands of schools, teachers, students, and communities explore standards-aligned curricular blocks of built environment activity.

1st Global E-Learning Network in Built Environment Education
The Keanes champion the right of children of all ages to be included in design processes imagining change in communities. With design education basically non-existent in K12 and in K12 teacher education, their development of the free, E-Learning Resource, NEXT.cc, for place-based project learning, prepares students as engaged citizens and urban stewards.
Our Story

Our story starts with the hand drawn moving image animation..... Demystifying the complexities of Architecture and making the interpolative process a contagious desire, the Keanes reveal the open-ended process of design visually.

- **Animating Architecture**
  The Keanes create two hours of hand drawn shorts introducing structural, cultural, typological, creative processes of architecture and design in the built environment for the screen. Used as ‘kickstarters’ to classes they teach, requests from the NIAE National Institute for Architecture Education High School Career Days and by schools of architecture across the United States place their films in the collection of the Metropolitan Museum of Art/ J. Paul Getty Program for Art on Film now at Columbia University. Before TED Talks and Khan Academy lectures, at the dawn of the digital age, the Keanes’ film, PROCESS, unfolds the interpolative scale shifting experimentation of the compositional creative process of designing objects, space, architecture and cities.

- **ACSA Regional and National Conferences**
  Animators, Authors and Presentors | The Keanes deliver Animating Architecture at regional and national ACSA Conferences publishing papers on the methodology of storyboarding and choreographing communication raising agility in visual communication with the experimental exploratory process of composition.

- **ACSA Faculty Conference 1994**
  Teacher Inspiration and Professional Development | The Keanes deliver an invited workshop at an ACSA Teachers’ Seminar, Cranbrook, Bloomfield Hills, MI, Preceptor, “Drawing Towards Architecture”. Sharing animation tools communicating ideas and choreographing experiences, the Keanes led teachers in creating a process animation.

- **PBS Image Union**
  Animators | The Keanes share their work on PBS Chicago reaching thousand of viewers. A Retrospective of Animated Architecture of the Animated Architecture Work of Mark and Linda Keane receives a PBS Emmy and for years their Chicago film served as the trailer for Image Union.

- **Select Publications**
  Dissemination | UWM’s 25th Year publication of the Keanes’ Studio 1032 Architecture and Environmental Design Activism Work, Joy of Design at All Scales; the EU’s A+AArchetcturanimacion (2002), and Architecture on Screen (1994).

- **Student Legacy**
  Student Inspiration | Spirit of Space, a film company, established by two of their students, Mike Marianek and Adam Goss, is successfully recording the work of Frank Gehry, Jeanne Gang, Steven Holl and other architects and designers visualizing the poetry, function, and essential excellences in the built environment | KidMob, a maker space middle school workshop started by NEXT.rr Kadi Franson and graduate Students from CCAC.
Our Pedagogy

We experiment with delivery of content, in person and online, researching emerging skillsets, encouraging language, speaking, writing and critical thinking, challenging divergent and convergent thinking, and motivating desire to learn more.

1997

ARCHITECTURE: An Interactive Introduction
Lead Authors and Web Developers with William Kardasz, BSAS UWM | AAII is the first text with an accompanying CD-ROM introducing the art and science of designing the built environment. Its interactive chapters hyperlink glossaries, slide sets, short video clips, activating traditional information and images with interactive diagrams with links to slide series, animations, and rollovers. Translated into Spanish, AAII spreads to hispanic countries in the EU and South and Central America.

2000

1st SAIC Interior Architecture Website
Lead Author and Early Web Developer | Shifting the study of Interior Architecture from form, function and aesthetics, this website explores the contemporary examination of where the inside begins and where it ends in relationships between people, objects, systems and environments.

2002

1st Immersive Art Institute of Chicago
Lead Researcher and Director with Jesse Robinson and SAIC students
Linda receives an Argonne Faculty Fellowship to develop the digital frame of the Art Institute of Chicago in an immersive Cave. Pushing known delineation to interactive experience, her pioneer work proceeds virtual interactivity.

2004

1st 4th Grade Social Studies Geometry of Wright Poster
Advocates of Architecture as State Heritage | Linking an animated film on the Natural House, the Keanes design a poster for distribution to WI 4th grade social studies teachers. Students connect math, language arts, geometry, proportion, word searches, period matching, orthogonal drawing and modeling all in one poster!

2006

1st Chicago Green Roof Website
Lead Researcher and Website Director with Nell Westerlund, MFA ’06 | Urban areas are intensifying commitment to water quality, stormwater management and biodiversity. Green Roofs are a social and economical investment in an improved relationship with nature. Researching sustainable websites, Linda directs the friendly interactive web interface sharing best practices, types, case studies, videos, and plants.

2007

1st WRIGHTScape Math and Architecture book published for 4th graders in Wisconsin Geometry of Wright
Co- Authors of Architecture in High School w/Tim Kennedy, Math Instructor, now Principal | Collaborating with local high school math teachers, the Keanes introduce Geometry through Architecture raising awareness of and engagement with the abstract and the physical world. Distributed to high school math teachers, Wrightscape, was actively used in the 90’s in WI.

2008

AAll Website
3000+ Co-Authors working with Web Developer, Ted Kimble, UWM Arch
The Keanes regain copyright of AAII and build a new website as a deeper and updated resource for on-line classes in Architecture at UWM and SAIC reaching over three thousand students.
We work with our respective universities to implement college level design and architecture instruction online in classes for high school students and teachers; these preliminary courses opened the portal for the creation of a truly free design network easily accessed by any level and applied in any place 24/7.

2017 - UW-Madison Certificate of Architecture (pending)
**Author and Developer** | In 2017, Mark developed a UW-Milwaukee-SARUP partnership with the College of Engineering at UW-Madison to create a Certificate in Architecture. Students in partnering programs in Urban Planning, Interior Design, Landscape Architecture, Civil, Environmental and Mechanical Engineering will be able to take an introductory courses in Architecture.

2017 - Wrightscape-On-line Seminar in the Geometry of Frank Lloyd Wright
**Co-Author and Developer** | Wrightscape, the online class, introduces students to the design language of Frank Lloyd Wright. Students gain a beginning understanding of the architectural design process, methods, tools and processes in building design and construction. Each session students draw along in a Wright journal and complete a ‘Gift Box’ as a final project.

2016 - Draw to Build I
**Co-Author and Developer** | Mark developed a draw-along skill building course introducing history, structures, technology of architecture through vocabulary. This course combines short online tutorials, a student journal and text, and design projects and is the first on-line course in architecture offered to high school students for college credit.

2016 - Draw to Build II
**Co-Authors and Developer** | With the success of Draw to Build and the combination of short online tutorials, a student journal, text, and short design projects, a second course was designed on request of high school teachers building on the skills developed by Draw to Build I and expanding the design exercises. Both courses are available as Wisconsin High School Youth Options as dual enrollment.

2014 - UW-Madison Courses on Architecture
**Author and Developer** | In 2014 Mark created the UWM/SARUP online course in Architecture for the University of Wisconsin in Madison. This course is the first providing access to Architectural content to a 60,000 student body.

2007 - Wisconsin High School Youth Options courses
**Advocate and Instructor** | In 2007, Mark as Professor at UWM-SARUP embarked on an outreach program for public high schools throughout Wisconsin through the state’s Youth Option’s program by offering Arch 100 and Arch 103. Now in its 10th year, SARUP works with over 50 regional high schools as the course expands to private and out of state schools.

**EU's Internet of Things for Children, Global STEMx, OxLive Australia, Dubai International Teacher Education, Designing Design Education India, Scale, Read Write, Act, National, Chicago After Schools Matters**
Linda delivers virtual workshops to educators all over the world online through a variety of venues introducing the necessity of design education in K12 schools. Sharing pathways through NEXT.cc's TOOLS, LANGUAGES, DISCOVER and DESIGN Journeys, she reaches educators in the EU, Asia, South America and Africa.
Our Beginnings

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| 2002 | NEXT.cc 16 Journeys  
Co-Founders and Director | NEXT.cc published a book of the first 16 journeys. These design primers sold out in the first spring. Piloted in Racine County inner city schools, teachers said students ‘loved’ the projects and asked for more. |
| 2006 | NEXT.cc Website 1.0  
Co Founders and Director with Andrew J Manto | The first NEXT.cc website was a study in an interactive E-Learning book with 64 topics. Topics were introduced as Tools, Languages, Discovery and Design opportunities. Each journey had an intro, three activities, and then the beginning of the linked virtual field trips, museum interactives, and contemporary art, science design and environmental practices. |
| 2016 | www.NEXT.cc, Inc. becomes a 501 c 3 Educational Non-Profit  
Non Profit Entrepreneurs | Established as Not for Stock corporation in the state of Wisconsin, the Keanes created a board of directors and set a mission to nurture creativity and compassion in building wonder of the built and natural worlds. NEXT.cc registers with the leading national Non-Profit Database, Guidestar in 2016. |
| 2016 | NECESSITY of DESIGN EDUCATION  
Instructor | Linda starts the first Architecture and design social justice education course based on cultivating new relationships between the built and natural worlds at The Art Institute of Chicago. Now renamed Eco Design, it reaches higher level undergrad and grad students in art education, design and architecture, historic preservation and fine arts. |
| 2016 | NEXT.cc Website 2.0  
Co Founders and Director Andrew Manto and Bob Tjiede | The second NEXT.cc website improves with teacher feedback and introduces online badge icons and pages to turn to explore activities. The NEXT.cc team expands to include artists, designers, educators and architecture students and science, math, art, and social students teachers. |
| 2016 | NEXT.cc Design 101 What Design is What Design Does and Why Design is Important  
Lead Author and Graphic Designer, with Bob Tiede and Kevin Hinz | This book established the necessity of design education in K12 as a scaffolded set of self select journeys connecting informal interests with in-class activities. |

“My kids LOVE it. They are 12-14 yrs. old and are finding so many great journeys to go on. We are using it as a way to teach independent projects in a more guided way before they leap off in designing their own journeys. I have never seen a group of 7th and 8th grade students so engaged for an hour working independently on their computers... wow.”

— Victoria Rydberg, Teacher of the Year, DPI Environmental Education Consultant
The necessity of valuing design is not only a local or political agenda. It is clearly a global initiative. With Sir Ken Robinson reporting that ‘Schools Kill Creativity’ and US Pisa scores in science and math falling, it opened the obvious need to create new learning methodologies to connect student interests with motivation and potential.

NEXT.cc introduces Systems Thinking and Consilience of Scales
Non Profit Design Education Entrepreneurs

NEXT.cc is a collaborative effort of over one hundred principals, teachers, architects, artists and college art, art education, design and architecture students (MIT, Harvard, NYIT, CCAC, Parsons, SAIC, UWM). Founded as an educational non-profit in 2007, NEXT.cc staff and advisory boards research and create trans-disciplinary journeys that engage local ideas with global practices. Integrated project based learning connects activities across nine scales—nano, pattern, object, space, architecture, neighborhood, urban, region and world.

Journeys have a short online review testing key vocabulary and principles. Assessment games are currently in development. Journey activities align with Art & Design, North American Association for Environmental Education, and Next Generation Science Standards offering integrated project based curricular blocks. Participants move from the computer into the community and learn about themselves, their neighbors, and their friends as they engage history and culture of place and explore sustainable design possibilities. Students take virtual field trips, play online games, visit museums, use digital modeling tools, and meet artists, researchers, scientists, designers and contemporary practitioners from all around the world.

NEXT.cc Introduces What Design is, What Design Does, and Why Design is Important

As corporations seek innovation and teach user centered research and design thinking, young people, too, can access opportunities to develop critical thinking, communication, and collaboration in seeking to improve conditions. NEXT.cc Design Thinking, Design Research, Design Process and Design Making challenge third graders, college students, and community groups with analyzing sites, researching context, looking at short, medium and long range goals with changes over time, and conceptualizing new programs and uses.
How we experience mother earth has changed more in the last 100 years than in our entire existence. Most of us now spend 90% of our lives in designed environments.

**TOOLS**

NEXT.cc’s Eco Web shares tools used by scientists, artists, environmentalists and designers and most people to investigate, interact and learn from the world.

Tools develop design skills through thinking, observation, seeing, writing, speaking, diagramming, communicating, visualizing, evaluating, documenting and fabricating.

**LANGUAGES**

NEXT.cc invites everyone to be explorers and to see the world by looking closely from wherever they are. Language Journeys introduce vocabulary and sets of ideas that look at taxonomies of relationships inspiring wonder of the built and natural world.

Journeys are developed by a multi disciplinary team of students, professionals and educators. Students develop graphics. Editors check the writing. Teachers test the activities with students. Standards are aligned by professionals.
Design mediates our experience with objects, nature and each other and connects us to the past, the present and the future.

**DISCOVERY**

*Discovery Journeys* invite everyone to consider human impact in the world and how technology, culture, economy, and location shape design responses.

*Discovery Journeys* build on the research from diverse sets of knowledge that come together in the context of issues, conditions, and situations.

**DESIGN OPPORTUNITIES**

NEXT.cc offers bold design opportunities enhancing learning experiences imagining new relationships. Participants write, sketch, paint, draw, photograph, animate, model and build online inside, and become world activists outside.

Critical thinking, cultural literacy, sensibility, spatial awareness, imagination, responsible citizenship and environmental stewardship are addressed through the study of Architecture and design.
Art, Architecture, Education, Design and Architecture Students work with K-12 Children to reimagine asphalt play yards, 21st century classrooms, makerspaces, and more!

NEXT.cc hits the 21st Century learning sweet spot! It is a brilliant scaffolding for design-based learning. NEXT.cc delivers content in context embedded in templates and tools. It is at the right level between abstract concept and concrete instantiation. It builds both subject matter mastery and meta-cognitive skills. It reifies domain knowledge transparently as generative engagement. It speaks epistemological authority with a light, non-pedantic voice. Beyond all that, NEXT.cc is intrinsically motivating - which is the fancy term for FUN!

— Arnold Wasserman, The Idea Factory, Singapore
Remote Design Learning

Students and teachers in remote classrooms can hear from designers talk about why they design. Teachers and students who use NEXT.cc share why they think design is important for project based learning.

2012

MEET DESIGNERS
Design Asks! Design Thinks! Design Imagines! Design Creates! Design Answers! Design Lives!
Architecture and Design students talk about what they dream of designing and how design is all around us. They ask, “What would you like to design?” Carlos, Ceyda, Sonya, Maureen

2014

ARCHITECTURE is our LANDSCAPE FOR LIVING
Architecture is our landscape for living. It clothes us in a second skin. It protects us and gives us prospect. It connects Interiors with exteriors, buildings with streets, streets with places... the earth with the sky, night with day, and me with you!

2014

DESIGN is Our World
Some people ask, “what is design?” I ask, “what is not design?” Everything around us has been designed by someone, somewhere, sometime. We live in a DESIGNED WORLD!

2013

ACSA K-12 Session I New Constellations New Ecologies
The Keanes revive and moderate the ACSA panel:
- VITRUVIUS Program Eugene and Katherine Kuppers’, ACSA Creative Achievement Awardee
- ACE MENTOR Program Andrew Frankel, Western Director
- Architecture Explorations, UDream Programs, Carnegie Mellon University, Kelly Lyons Adj. Asst. Prof., Coordinator of K12 Outreach
- University of Minnesota Design Summer Camps, Prof. John Comazzi
- Build San Francisco High School Program, Will Fowler
- UWM AIAS Melissa Schulteis, President
- KidMOB Kadi Franson (NEXT.cc Researcher 2009) and NEXT.cc.

2012-2016

ARCHITECT and DESIGNER INTERVIEWS
SAIC and UWM students interview architects and designers asking, “What interested you in a design career?” “What sets your career apart from other architects and designers.”

- Interviewees include Brian Vitale, Gensler; Mark Sexton, Krueck&Sexton; Jeannne Gang; Terry Guen; Jeff Bone, LBB; Katherine Baker, LBB; Patricia Nadlcke; Peter Exley; Cindy Coleman; Sam MArts; Tristan Sterck; Paul Tebben; John Ronan; Amos Rappoport; Paul Preissner; Christine Carlyle; William Worn; Carlos Martinez; Eric Martin; John Hopkins; Sean Lally; Mark Peters; John Syvertsen; Wrap Architects and others.
**NEXT.cc Workshops**

**2017**
- Chicago Bridge Museum
  - Eco Design Riverworks: Water is Essential For Life
- Balance/Unbalance Sense of Space Symposium Virtual Panel with Scientists & Artists, Plymouth, UK
- Milwaukee Green School Symposium, June, Milwaukee, WI (100+ Teachers)
- Folding, Fanning, Forming & Flying, FUND! Chicago, IL (60 CPS 6th Grade Girls & 10 Mentors)
- Assessing Makerspaces, Collab Lab 9 Ward 4, Milwaukee, WI
- K-12 Expert Panel, Association of Collegiate Schools of Architecture, Detroit, MI
- Escuela Verde, Milwaukee, WI
- WTEC Wisconsin Technology Education Conference, March, Wisconsin Dells, WI
- Wisconsin Education Conference, WI Green & Healthy Schools, Milwaukee, WI
- Digital Learning Day, Houston, TX

**2016**
- Illinois Technology Education Conference, October 27-29, Normal, IL
- North American Association of Environmental Education National, October 21, Madison, WI
- Scientists for Tomorrow STEAM Workshop: Paper Folding, Fanning and Flying!, 14 May, Northern Illinois University
- Innovative School Network, April 29, Draw to Build
- Innovative School Network, April 29, Design This Place
- Illinois Green School Symposium, Sustainability Hack, Chicago You Media, April 8, Chicago, IL
- NAEA Chicago, March 17-19 Nature Play Project Super Session
- NAEA STEAM by Design Workshop
- NAEA Design This Place Workshop
- NAEA Creativity in the Classroom w/Marie Gylstrom & Dr. Robin Vande Zande
- OZeLive, STEAM, Math & Modelling w/Melissa Silk, Head STEM Instructor, Sydney Australia
- OZeLIVE, Creativity in the Classroom, February 26, Sydney, Australia
- LUMIFOLD & NEXT.cc & GLELab School, SAIC, Jan. 7, Chicago, IL

**2015**
- HIVE Chicago Public Library Energy Hack w/ CPL YOULmedia Teens & CAF Design Discover, Fall Workshops
- Chicago Artist Coalition & CAIA & SAIC & LBL Green Schools Green Cities
- A Tapestry of Sustainability Forum, Alverno College, Milwaukee, WI
- UWM Science Fair, Milwaukee, WI
- RoofTAP, Global Water Institute, Milwaukee, WI
- SAIC & CCAIA & Chicago Public Schools Workshop Chicago, IL
- LEARNxDESIGN, Creativity in the Classroom, IL
- LEARNxDESIGN, Nature Play Project Chicago, IL
- LEARNxDESIGN, STEAM by Design Chicago, IL
- LEARNxDESIGN, Design THIS Place Built Environment Education Chicago, IL
- LEARNxDESIGN, Green Schools Green Cities Chicago, IL
- ISN Innovative Schools Network Wisconsin Dells, WI
- Design As Nature Tailiesin West TPD K12 Educators, Scottsdale, AZ
- BALANCE/EauBalance: Water, Climate & Place: Reimagining Environments Arizona State, Tempe, AZ
- Youth Teen Overnight Art Institute of Chicago, Chicago, IL
- OzLife Australia
- Scientists for Tomorrow Chicago, IL

**2014**
- Space Planning Workshop, Escuela Verde Charter, Milwaukee, WI
- Nature Play Workshop, Notre Dame Elementary School, Milwaukee, WI
- Arts@Large Meet&Greet, Wisconsin, WI
- Wisconsin Environmental Education Conference 40th Anniversary, Stevens Point, WI
- A+DEN Symposium, Cranbrook, MI
- Chicago AIA Convention Pecha Kucha, Chicago, IL
- ENERGY & Global Environment: Science, History, Politics University of Chicago Teacher Institute, Chicago, IL
- ACE MENTOR Rosemont, IL
- Milwaukee Water Commons Town Hall, Milwaukee, WI
- National Art Education Association San Diego, CA
- International Teacher Education Conference Dubai, UAE
- Golden Apple: Reimagining School: Why Creativity and Innovation Matter Chicago, IL

**2013**
- Escuela Verde Milwaukee, WI
- After School Matters Digital Workshop, Chicago, IL
- Froebel USA Ann Arbor, MI
- The School of the Art Institute of Chicago, Chicago, IL
- The Internet of Things London, England
- GLOBAL STEMx International Conference: GREEN Imagination Virtual After School Matters, Chicago, IL
- German Bavarian Chamber of Architects, Munich, Germany
- The Art of Play AIA Webinar w/ Susan G. Solomon, Author of American Playgrounds: Revitalizing Community Space
- TED x STEAM by Design, Milwaukee, WI
- VISIONEER DESIGN CHALLENGE Milwaukee, WI
- Peck School of the Arts, UWM
- Designing Design Education India, Designing Design Education Virtual, Pune, India
- ACSA National Conference San Francisco, CA
- Wisconsin Innovative Schools Network Appleton, WI
- AIA Transforming Outdoor Learning Environments Webinar w/ Sharon Gamson Danks and RoyDiblik, Garden Designer and Educator

**2012**
- ARTS@Large Meet & Greet, Milwaukee, WI
- IDSA K12 Design Education Symposium Cultivating Creative Learners
- Video from Henry Ford Academy, Dearborn, MI
- SCALE: Read/Write/Act Virtual
- Wisconsin Art Education Association Common Ground: Challenges of the 21st Century * Sheboygan, WI
- Outdoor Classrooms Webinar
- Art and Design Hand in Hand: Chicago After School Matters, Chicago, IL
- Arts Alive: Columbia College, Chicago, IL
- Green Cities, Green Schools: MRAE ENERGY FAIR, Custer, WI
- Design As Nature Teacher Workshop, Monona Terrace, Madison, WI
- partnered with National Environmental Education Foundation, Earth Day Network and supported in part by the Wisconsin Arts Board
- VISIONEER Design Challenge, Peck School of the Arts, UWM, Milwaukee, WI
- NAEA National Art Education Association Linda Keane, AIADO, joined Wyland & Friends Harvey Selifter, Art of Science Learning, Paul L. King, Ex. Director of the Arts & Special Projects (OASP), and cartoonist Jim Toomey to discuss innovative ways educators can stimulate public interest in the arts. New York City, NY
- Design Overflow The School of the Art Institute of Chicago, Chicago, IL
- Story of NEXT.cc, The Chicago Designers Accord Town Hall Meeting. The event also included presentations and discussion by James Goggin (MCA Chicago), George Aye (Greater Good Studio), Jerry O'Leary (IDEO), Michael Renaud and Zach Dodson (Show ‘N Tell). Arts@Large, Milwaukee, WI
- Arts Educators Exchange, Chicago, IL
- LaCrosse Design Institute, LaCrosse, WI
- Nelson Institute Earth Day Celebration, Madison WI
- Wisconsin Arts Educator Exchange, Milwaukee, WI
- Wisconsin Charter Schools, Grand Geneva, WI

**2011**
- AAO A+DEN Association of Community Designers, Philadelphia, PA
- AIM Elegant FIT, Columbia College, Chicago, IL
- Art Institute of Chicago Art Curriculum Fair
- AGA Moving Design, School of the Art Institute of Chicago, Chicago, IL
- Creativity Education Alliance, Milwaukee, WI
- Illinois Art Education Association, Normal, IL
- Jane Goodall Institute Chicago IL Roots + Shoots High School Program
- Glazer Children's Museum, Hillsborough School District, Tampa, FL
- LaCrosse Design Institute, LaCrosse, WI
- Milwaukee Public Schools, Milwaukee, WI
- Nelson Institute Earth Day Celebration, Madison, WI
- UJA Design 2050 World Congress, Tokyo, Japan
- Visioneer Art and Design Day as part of National Environmental Education Week
- Woodson Art Museum, GOOD Design Stories From Herman Miller Traveling Exhibit, Wausau, WI
Teacher Education in the US does not include Design. The need for teachers across several K12 subjects to include Design and its related fields because of its impact on the environment, its impact on the economy, and its impact on human prospect, demands that K12 education offer students opportunities to research, conceptualize and propose solutions during their K12 years. The Keanes work tirelessly to share opportunities with diverse underserved school districts.

**Chicago Public School Educators | 70**
*K-6 & 75 6-12 Educators | 2010*

**Facilitators |** In support of declining investment in the arts in Chicago Public Schools, the Keanes share free E-Learning Workshops with Art Educators at The School of the Art Institute of Chicago; one year later CPS refunded art education in CPS starting Ingenuity Arts Outlook to track art programs in schools. NEXT.cc reached over 75 schools in Chicago in 2013.

**SAIC Art Educators Toolkit |**
*2013 | 175 Art educators*

**Keynote Presenter |** Linda presented curricular blocks of STEAM activities initiated on the computer, in the art room, around the school building, and out in the school community as new arenas for artists to connect students to their neighborhoods and to design careers. Participants left with free access to NEXT.cc’s Designopedia.

**Milwaukee TEDx STEAM by Design |**
*I 2013 | 100+ - 2000+

**Keynote Presenters |** Linda shared NEXT.cc’s E-Learning activities as instigators of integrated systems thinking project learning while Mark demonstrated Virtual Notetaking or Doodling with a Purpose!

**Golden Apple Reimagining School**

**Why Creativity and Innovation Matter w/ Dr. Yang Zhao and WBEZ Allison Cuddy | 2015 |

**100+ and Twitter trend! (100 Educators; 1400 video views; Tweets)**

Linda was termed a national education leader by the Chicago Golden Apple and spoke about creativity as the generator of human sustainability. Zhao professed the school projects were pointless and that student led inquiry based projects more successful.

**University of Chicago Summer Teacher Institute | 2015 | 75+ Educators**

**Keynote Presenter & Online Presenter |** Linda reinforced that human creativity and ingenuity is the most critical source of untapped energy on earth. She shared NEXT.cc’s Water/Energy/Food NEXUS systems approach to looking at human production, consumption and impact on OXFAM’s environmental breaches and social justice rights for all people.

**NAEA Super Session Chicago, IL | 2016**
*I 200 Educators + online access

**Keynote Address: NATURE PLAY: ASPHALT as the ARTIST’s CANVAS |** Play is one of the most important rights of childhood, yet it has been overlooked and undervalued in K12 education. Play is the departure from the routine that arouses curiosity, delight, and a feeling of fun. We play with thoughts, things and each other. We learn through active play that is structured (with rules and outcomes) and unstructured (open-ended exploration). To design a play environment for children is to design cities, buildings, parks, roads and utilities from the point of view of children. (Senda, p. ix).
Every workshop is assessed before and after understandings about the role of design, the many connections to careers, and efficacy of E-Learning for priming and extension.

**Design As Nature**
Design as Nature introduces the inherent nature of people to design objects, media, spaces, buildings, and cities. Students study nature patterns for aesthetic and performative structures designing objects, spaces, buildings and cities. Architecture students serve as mentor in this fast and furious round robin shift of scales application of ‘Ask Nature’ then proceed to iterate and discuss solutions.

**Nature Play**
NEXT.cc staff work with school districts to return asphalt playgrounds into site specific playscapes. 4th grade students expand their ideas about structured, imaginative, creative, active, makerspace and nature play mixing word maps of who, what, when and where, with site planning exercises of sun, shade, water and noisy areas. In teams students realize their dreams in model form.

**Creativity in the Classroom**
As part of a design lab demonstration for the 3rd Intl LEARNxDesign Conference, Keanes led a re-design of a typical classroom with 3rd grade students. Students worked with mentors designing places where they felt creative then applying those ideas in teams to transform the floor, walls and ceiling of their classroom. The results were amazing with flexible/ wearable desks and cloud rooms for breaks, interactive walls, and an art ceiling to keep them awake and focused!

**Sustainability Design Hack 9-12 CPS**
YouMedia Students & 4 NEXT.cc Mentors
With Support from Hive Chicago and The Chicago Community Trust, NEXT.cc led 14 afterschool workshops with CPS 9-12 students testing E-Learning support for changes in energy use, energy best practices in projects learning about the smart grid. A great way to show the importance and option to live within our means. I know about the electrical grid. I know about careers in energy. I know about renewable and fossil fuel energy types. I know about design research and design making to explore ideas.

**Folding, Fanning, Forming and Flying 60 CPS 6th Grade Girls & 10 Mentors**
Crumples paper and make a building. Fold mountain and valleys to raise its flatness and encircle it into a freestanding column. Change the geometry from orthogonal to diagonal and transform quarter, half and three-quarter rounds into a fan, a tall cone, and circular pavilions. Look for patterns in nature to find geometric forms and design with paper across scales. Capture nature’s verbs and transform their gesture into spatial configurations. Make progressive folds, add thrust and lift to fly planes of different technical abilities. In the final fold magic make binary bug lamps!

**Green Cities Workshop 60 CPS 6th Grad Girls & 10 Mentors w/CCAIA**
Girls create self sufficient agrarian communities with 'green homes', expand to Main Street towns, and add population taking roles of Mayors, Well Being Directors, Civil Engineers, Education, Housing, Business Directors, Energy, water and food supervisors. Girls report learning a lot about careers in a city, how to be more sustainable in their homes, schools and neighborhoods. Most of all they have fun collaborating!
Social Media

NEXT.cc DESIGNOPEDIA is socially linked on Facebook, Twitter, LinkedIn, Pinterest, YouTube, Vimeo, and Instagram reaching diverse audiences around the world.

NEXT.cc YouTube Channel
Site Administrator
NEXT.cc shares videos of workshops with teachers and students on YouTube. Over 15,000 viewers watch workshop videos.

NEXT.cc FLKR Channel
Site Administrator
NEXT.cc has a FLKR Album Channel that features photo albums with teachers and students in the workshop process. Presentations share NEXT.cc journey sequencing and student and teacher mentor interaction.

NEXT.cc LinkedIn
Site Administrator
NEXT.cc has started a LinkedIn following sharing best art, science, and design practices moving seamlessly between practitioners, start ups, think tanks, researchers and educators.

NEXT.cc Twitter
Communications Manager
NEXT.cc has a Twitter following sharing best art, science, and design practices moving seamlessly between practitioners, start ups, think tanks, researchers and educators.

Mark and Linda Keane, AIA, NCARB on Vimeo
Site Administrators
The Keanes combine online learning with NEXT.cc videos on the professional Vimeo site. With over 900 videos, the Keanes are leaders in simplifying ideas about architecture and deepening their understanding with students of all ages.

Professional Architecture Connections to NEXT.cc
Linda, as past co-chair of the Committee of education Architecture Alternative Learning Environments leads and develops several national AIA webinars with invited participants, John Dale, FAIA, HEDV; Sharon Gamson Danks, author of From Asphalt to Eco-Systems; Eric Nelson, author of Cultivating Outdoor Classrooms; and Susan G. Solomon Author of The Science of Play. Each webinar linked with key NEXT.cc Journeys for professionals to share with school communities. - Dr. Kirk E. Harris, Faculty, UWM School of Architecture and Urban Planning & Founder, School for Urban Planning and Architecture
E-Learning Adoption

Art Instructors are adopting NEXT.cc’s E-Learning Journeys

Standards Alignment
NEXT.cc set to WI Art & Design standards implements design projects in the school, on the school grounds, and out in school communities. NEXT.cc is a Super Session (Chicago), Super Save the Arts with Wyland Panel, (NYC,) and Design Interest Group Presenter at several NAEA and NAAEE Conferences reaching 20,000+ art educators.

Environmental Educators are adopting NEXT.cc’s E-Learning Journeys

Environmental Curriculum Developers
NEXT.cc is a brilliant concept encouraging our students to be active in their communities as architects and educators. It introduces environmental issues and inspires design and education as ethical practices. Sean S. Miller Director of Education Earth Day Network

National Technology Teachers are using NEXT.cc’s Journeys

Technology Curriculum Developers
Technology Instructors are adopting NEXT.cc’s E-Learning Journeys to introduce free and fun ways to raise digital literacy and develop digital fluency.

STEM to STEAM Instructors

STEAM Curriculum Creators
STEM to STEAM instructors are accessing NEXT.cc’s science, technology, engineering, art and math activities to integrate design thinking and the iterative process of researching, conceptualizing, testing and presenting to prepare students for careers that do not already exist.

88.7%
Strongly agree or agree that “The Ejourney content was arranged in a clear, logical and orderly manner”.

85.9%
Strongly agree or agree that “The Ejourney game helped you understand the answers to the questions”.

85.9%
Strongly agree or agree that “The Ejourney helped you to learn”.

—HIVE Chicago Mozilla Foundation
Global Dissemination Partnerships

NEXT.cc is an Educator Resource of the Salvadori Center NYC
Partner
NEXT.cc is a listed resource with Salvadori Center, New York, alongside the ACE Mentor Program, Architecture for Humanity, Association of Architecture Organizations, Engineers Without Borders, TED, and William McDonough.

NEXT.cc Burnham 100 Educator Resource Partner
NEXT.cc is featured as one Chicago's Burnham 100 Educator’s Resource for using the city as a Learning Lab alongside The Art Institute of Chicago, Chicago Public Library, Field Museum of Chicago, Adler Planetarium, Chicago Botanic Garden, and Chicago Children's Museum.

NEXT.cc is an Educator Resource of The Smithsonian’s Cooper Hewitt Design Museum, NYC
Partner
NEXT.cc is a listed educators’ resource with the Cooper Hewitt, National Design Museum supporting design programming with standards aligned activities.

NEXT.cc and ACE MENTOR National Student Resource
NEXT.cc is a student resource of the ACE MENTOR Program alongside Autodesk, Bentley Institute, Tekla Campus, Engineering Encounters Bridge Design, and Harness Hero. ACE is an after school program that introduces high school students to careers in architecture, construction management, engineering and other disciplines.

Awards and Grants

• CHICAGO HIVE Mozilla Foundation w/SIT Efficacy of Smart Grid E-Learning 2017
• CHICAGO HIVE Mozilla Foundation w/CPL YOUmedia & Chicago Architecture Foundation 2016
• National Environmental Education Green STEM Innovator 2012
• Union of International Architects Architecture + Children Golden Cubes 2011
• AAO A+DEN Association of Architecture Organizations National Media Education Award 2011
• Wisconsin Arts Board Creative Communities Grant 2011
• USGBC Excellence in Green Building Education Award 2009
• SAIC Presidential Urban Engagement Award 2009
• American Architectural Foundation Merit Award 2006
• PBS Image Union EMMY 2006
• AIA National Teaching Award 2005
• UWM Alumni Service Award 2004
• Frank Lloyd Wright Foundation Award
• ACSA Young Faculty Teaching Award 2000
• AIA/ACSA Design Education Honor Award Lunchline 1990
NEXT.cc DESIGNopedia is awarded a national media education by AAO/A+DEN and “The four Nominees stand high atop what was a very competitive field of applicants,” says Ted Landsmark, President of the Boston Architectural College, Chair of the U.S. Jury

“The importance of their work cannot be understated. Such efforts prepare students, whether they choose to pursue architecture or not, to become active citizens engaged in public discourse, and with minds opened to the needs and uses for quality architecture. Speaking for the entire jury, we were delighted by each Nominees’ highly creative approaches, quality output, and labors to ensure their activities be sustained over time. These are honors well deserved.”

NEXT.cc DESIGNopedia awarded a Union of International Architecture Golden Cubes Award, Japan, Tokyo I 2011

How to learn, reason, think creatively, make decisions, problem solve and see the mind’s eye are 21st century skills developed and assessed using NEXT.cc’s Eco Web. Gallery work demonstrates organization and spatial interdependence of people, places and environments. Children architects engage their environment and change from passive consumers to active creators of better places.

NEXT.cc awarded Chicago HIVE Mozilla Foundation Grants to study efficacy of E-Learning to Motivate STEM learning, ‘prime and extend’ learning time, and broaden understanding of careers I 2016 I 2017

It is a fact that our youth are not attracted by hard STEM careers. It is our intention to generate in the participants a feeling that will enable them to cross the threshold of the fear to the unknown and empower them to explore STEM content and subject, igniting the inner spark for learning STEM. This project is only a first step to generate a sustainable path for teens to explore STEM subjects and careers in the built environment in a friendly and motivational way.

Global Dissemination of the Value of Design of the Built Environment

NEXT.cc is a brilliant concept encouraging our students to be active in their communities as architects and educators. It introduces environmental issues and inspires design and education as ethical practices.

―Sean S. Miller Director of Education Earth Day Network

―Richard D. O’Connor Ph.D. Executive Director, Oregon Building Congress

Your presentation was great and the NEXT.cc web site is fabulous. What a great gift to the rest of us.