Chapter 8 The Future of Museums: The Post-Pandemic Transformation of Experiences and Expectations



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Abstract This chapter examines how the COVID pandemic has transformed art experiences and expectations in museums. While the vast majority of museums remained shuttered for what seemed like an interminable amount of time, many closed not just until the risk of COVID diminished but also forever. Also discussed is how COVID impacted the art world outside of institutions in art fairs, art centers, and festivals. Experiential art centers and their new role in art viewing are highlighted in this chapter. The enormous impact that NFTs are having on how artwork is collected and sold is discussed. It is concluded that museums need to pursue and incorporate the pervasive digital imperative punctuated and reinforced by nascent technologies to remain relevant to an increasingly disengaged and sophisticated audience that is the mainstay of their existence even if only virtually.

8.1 Introduction

No aspect of our lives has remained unscathed by the coronavirus pandemic, and the dramatic impact on museums and other cultural institutions has been transformative. Not only has the extent of change been remarkable but also the alacrity. While the vast majority of museums remained shuttered for what seemed like an interminable amount of time, many closed not just until the risk of COVID diminished but also forever. On April 27, 2020, in a blog posted by the Center for the Future of Museums of the American Alliance of Museums, Scott Stulen, CEO and President of Philbrook Museum of Art, proclaimed: "The museum we closed will not be the museum we reopen" (Stulen, 2020). Stulen's statement was equally applicable to most museums that survived. An unprecedented reliance on virtual visitation and programming as well as increased dependence on digital components for education, entertainment, reaching, and maintaining audiences is central to the metamorphosis

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digital museum platforms experienced since spring 2020 and is also pivotal to digital developments in our post-COVID world.

Numerous museum professionals warily embraced the new digital technology at first both as a means of recording and making their collections accessible to the public in unprecedented ways and also as a tool with a role in the art-making process. Unlike other art historical milestones, the first time that a computer was used to make art is difficult to pinpoint (Goodman, 1987). However recent research by Alvy Ray Smith, published in his 2021 book A Biography of the Pixel, attributes the first digital picture to an array of pixels that British engineer Tom Kilburn created on the face of a cathode ray tube in 1947 that Smith calls "first light" (Smith, 2021). However, it is widely recognized that in 1959 when the Calcomp digital plotter, the first commercial plotter, became available, the era of computer graphics was ushered in. Most early computer graphics were made by scientists and engineers using the tools for functional applications. However, both their graphic designs and those of the limited number of artists, who had access to the requisite digital tools, were grouped under the misleading misnomer "computer graphics." The confusion was intensified, because the military quickly grasped the potential of the computer as a graphics tool, and most early research was supported by the Defense Department. Major research facilities like Bell Labs and Xerox Parc were also hotbeds of computer graphics experimentation. A. Michael Noll, a scientist at Bell Labs, who had a predisposition for experimenting with the capabilities of huge computer graphics systems to mimic artworks by modern art masters like Mondrian, wrote software that made it difficult even for art scholars to discern between a drawing of the master and the computer-driven plotter output his programs generated, when both were presented as black and white copies printed the same size, on plain paper (Fig. 8.1).

8.2 COVID Impacts the Museum World

Today digital technology is as omnipresent in the art world as in the rest of our lives, and digital engagement has been imperative for museums during the COVID crisis. Analogous to the ramifications in many other sectors of our society, the long-term impact of this digitalization will be irreversible. This exponential shift is exemplified through the increasingly widespread embrace of virtual tours, live streams of museum events, and other online options concerning information about works in the collections as well as museum programs.

The endorsement of the art world establishment is patently evidenced by their embrace of Google Arts and Culture (artsandculture.google.com). With the collaboration of the respective institutions, Google has made more than 2000 virtual tours of cultural organizations and more than 10,000 locations and 100,000 artworks accessible to audiences 24 hours a day without an entrance fee. Google's online Museum Explorer simply asks visitors to their Arts and Culture site, "where do you want to visit today," and then, once a destination is selected, effortlessly takes them



Fig. 8.1 A. Michael Noll. Computer Composition with Lines, 1964. (© AMN 1965)

there. At a time when museums are closed and travel is restricted or prohibited entirely, museum visitation is available at our fingertips on Google's site. Google has also assisted museums with image and data capture, recorded selected artworks in high definition for close inspection, recorded stunning visits to cultural sites in 360 degrees, and even provided a coloring book and a visual crossword puzzle, to entertain and captivate visitors of all ages on their website. In addition to the numerous applications available on the Google Arts and Culture site, Google's commitment to the arts goes even further. They have also established the Artists + Machine Intelligence (AMI) program, which brings artists, engineers, and academics together into the world of artificial intelligence to open new perspectives and to challenge accepted ways of thinking about AI. According to Kenric McDowell, co-lead of AMI with Eva Kozanecka, AMI lets the artists "lead the way and provide legitimacy" to the program where "artists get it in a way scientists don't" (McDowell, 2021).

Google's sponsorship has provided critical support for a number of artists including Refik Anadol, Casey Reas, and Tom White. Reas, whose work exemplifies how generative concepts can be incorporated into artistic language, co-created Processing with Ben Fry, an open-source programming language and environment for creating images and animation which has become a central tool for many generative artists. *Compressed Cinema*, which was shown at the Walker Art Center in 2020, was an outgrowth of the work that Reas accomplished under his Google grant (Fig. 8.2).



Fig. 8.2 Casey Reas and Jan St. Werner. Untitled 3 (I Withdraw). 2020. HD and 4K video. Frame from Compressed Cinema

Funding on the scale that corporations like Google can offer is essential to create AI-based systems which require the skills of a wide range of disciplines to implement in addition to the artist including math, linguistics, neuroscience, robotics, and machine learning.

Prior to the COVID pandemic, a new immersive art form had begun to proliferate that necessitated teamwork on a similarly grand scale as well as significant funding. Also notable is that most of these works, which are attracting considerable global interest, are not shown in traditional museum centers but in startup EACs (experiential art centers) that are springing up around the world: Superblue in Miami, FI; the Artechouse venue in New York's Chelsea Market as well as in Miami Beach and Washington, DC; teamLab's spaces in Japan, China, and South Korea; and Meow Wolf in Santa Fe, Las Vegas, and most recently in Denver.

Hopefully, many of those for whom an in-person visit to a museum was intrinsic to their cultural lives and education will return to their former pattern of behavior. And this return is critical because of the irreplaceable role that museums play by preserving works of art for posterity. Yet a growing number especially from today's youth, who still seek direct contact with art, may well eschew traditional visitation to cultural institutions large and small, to visits to one of the many experiential art centers, where they cannot only view but also engage in the art experience by buying a ticket for a specific entrance time. Visitors to the new breed of dedicated EACs as well as museums that tend to have smaller-scale immersive exhibits either incorporated in a larger exhibition or else shown as a solo display will share and experience the installations on view that surround and immerse them in an unforgettable, multi-sensory digital extravaganza.

Media artist and director, as well as researcher in UCLA's Department of Design Media Arts, Refik Anadol first garnered widespread attention in 2019 when he won the Lumen Prize Gold Award for Art and Technology for a data-driven sculpture. Anadol produced *Machine Hallucination* in 2020, as the inaugural exhibition in the Artechouse space in New York's Chelsea district (Fig. 8.3). According to Anadol, this large-scale spectacle, which incorporated AI and machine learning in its composition, demonstrates "...how as an artist I can take my brush and put it in the mind of a machine and paint with machine consciousness" (Anadol). Artechouse also has founded venues in Washington, DC, and Miami Beach, FL, and plans to exhibit works at the intersection of art, science, and technology in all three locations.

The power of experiences was described in an article in *The Harvard Business Review*, by B. Joseph Pine and James H. Gilmore, co-authors of the influential *The Experience Economy*, published in 1998. They wrote: "Experiences have always been at the heart of the entertainment business....But today the concept of selling an entertainment experience is taking root in businesses far removed from theaters and amusement parks. New technologies, in particular, encourage whole new genres of experience, such as interactive games, Internet chat rooms and multi-player games, motion-based simulators, and virtual reality. The growing processing power required to render ever-more immersive experiences now drives demand for the goods and services of the computer industry" (Pine & Gilmore, 1998). Apparently the powerful enticement of immersion permeates numerous sectors.

Despite their inalienable appeal, virtual worlds encompass a plethora of challenges that are intimidating. VR headsets as well as the software that runs them often have technical issues that make ease of use challenging. Augmented reality (AR), on the other hand, is appealing because it requires only a smartphone or iPad as well as a downloadable app to run the AR encounter. The user simply holds up

Fig. 8.3 Refik Anadol. Machine Hallucination. Artechouse, NY. Copyright Refik Anadol



their tablet or smartphone in front of the subject and additional information or a related work, for example, come into view. Users quickly adapt to using AR and are adeptly and enjoyingly engaged within minutes. In the future, as the cost of headsets decreases, and the number of people who own and are familiar with headsets increases, in all probability users will bring their own headsets to exhibits that require them or else be able to initiate the experience wherever their headsets are located.

Judging by its appeal to museum visitors, gamification of museum experiences with Minecraft as well as other popular gaming software will become an entrenched museum pattern post-COVID. According to Manuel Charr, who wrote an article about how museums are using Minecraft, the Tate Gallery in London was among the earliest institutions to incorporate Minecraft into their education program (Charr, 2021). Similarly, when the Victoria and Albert Museum in London was opening a new entrance in 2017, it also lured gamers with a Minecraft version of the V&A's architecture so that players could design their own new entrance to the museum in a virtual workshop setting.

Throughout the COVID crisis, social media has also been an especially powerful tool for museums and other cultural institutions to engage with their audiences. One of the most captivating applications was developed by the John G. Shedd Aquarium in Chicago. The Shedd's staff was still going into the aquarium to care for the animals even though the institution was closed to the public. They decided to allow some penguins including the popular Wellington, two macaws, and a porcupine to roam freely about the museum, while their adventures were captured via video and then posted on Twitter. Both children and adults followed and were fascinated by their adventures, and millions of views were generated by this novel opportunity to view these creatures' unrestricted antics. Interestingly, just as we missed cultural outings and human interaction, the animals were missing socialization with aquarium visitors.

Amid the often overwhelming, depressing, and cataclysmic societal COVID changes, museum visitation is just one component of the art world that has been shattered as doors were shut, countries closed, and travel banned. Galleries, auctions, art fairs, and festivals as well as the very mechanisms whereby art is sold and collected have also been forcibly impacted.

Just as most museums have made their collections accessible online and art fairs have also developed virtual counterparts, a new breed of collectors is no longer opening their homes as a showcase for the work they have collected or building namesake museums to house them. Instead, Paris collectors Sylvain and Dominique Levy, for example, display their extensive collection of contemporary Chinese art, entirely online in a VR installation, launched in 2016 and known as the DSL Collection Virtual Reality Museum. The gallery's striking computer-generated contemporary installation was the first private virtual reality museum in the world. Stunning contemporary galleries, some of which offer views of the artworks through glass walls, showcase their extensive contemporary Chinese painting collection (Fig. 8.3).

Attendees who excitedly anticipate their annual visits to Art Basel in Europe, Tokyo, as well as Miami, FL; Ars Electronica, a major festival of art, science, and technology, that was initiated in Linz, Austria, in 1979; and Burning Man in the Nevada desert, were disappointed by their cancellation because of COVID restrictions and eager to find alternative ways to participate in 2020 and 2021. A frequent solution was to move much of what was planned and make it accessible online. Consequently, 2020 materialized as the year of endless Zoom meetings with art world participants, virtual art lectures, and virtual art tours.

Burning Man was among the major festivals that took a hiatus in 2020 and 2021, instead authorizing an online event, BRCvr2020 and then BRCvr2021. Attracting devotees each year since 1986, the first events were held at Baker Beach in San Francisco. Central to the festival, and one of many artistic contributions is the actual burning of a wooden sculpture of a man. In 1990, fearful that the 40-foot-tall burning sculpture might ignite something else, the San Francisco police put an end to the activity, and Burning Man relocated to the Black Rock Desert in Nevada. Although nothing can replace the atmosphere at the dust-soaked drug-amplified Burning Festival that takes place annually in Black Rock, for the second year in a row, in 2021, organizers cancelled the in-person event in favor of a virtual happening. Capturing the spirit of this somewhat radicalized festival, the Burning Man website proclaimed: "Whether you're a first-time Burner or veteran, right now you can dive into all the radically inclusive magic of the Virtual Worlds of 2021 Virtual Burn (created by the community for the community). Now through Sept. 7, 2021, YOU can connect, create, and immerse yourself in all the dusty VR experiences with virtual Burners from all over the world!" (www.Burningman.org).

Visitors could attend either on their computers and iPads or else via Oculus Quest headgear that transported them to the festival's activities including the art displays. The participating artists included Darcy Gerbarg, who has long been established as one of the leading pioneers in the digital art field. Her interactive and immersive BRCvr2020 and 2021 art worlds, accessible on AltspaceVR, include a selection of her brightly colored, lyrical, abstract, digital paintings and sculptures, painted in a virtual world and installed in a vast 3DVR space. Her exuberant sculptures, which are constructed of swathes of paint, invite visitors to fly around and through them while experiencing their own unique musical compositions. To complete her virtual artworld atmosphere, Gerbarg stages lectures and events in her space attended by avatars (Figs. 8.4 and 8.5).

8.3 Museum Adjustments to COVID

Once again in 2021, museums opened their doors for in-person visitation, and art events were planned including gallery exhibitions and festivals. For safety precautions, masking is a frequent requirement for admission, and proof of vaccination will inevitably become more common. As an example, Future Fair, held in New York's Chelsea district in fall 2021, is a new art fair, whose planned debut in



Fig. 8.4 DSL Collection VR Museum. (Courtesy: Dominique and Sylvain Levy)



Fig. 8.5 Darcy Gerbarg. Painting and Sculpture Garden. BRCvr event on AltspaceVR, 2021

2020 was postponed because of the pandemic and held online. Whereas the opening celebration was virtual in 2020, in 2021, the fair had a physical presence and opened successfully just after Labor Day.

Post-pandemic, museum professionals are utilizing all available analytical tools, to maintain and grow their audience. According to a study ironically commissioned by the Knight Foundation pre-pandemic in 2020 to understand "digital readiness

and innovation readiness in the museum sector," several hurdles to adoption need to be recognized:

- "dedicated digital staffing is severely limited...
- digital strategies are still emergent...
- digital projects are mostly siloed, and outcomes poorly tracked..." (Knight Foundation, 2020).

Despite the intentions of senior staff and audience eagerness, the Knight survey demonstrates just how much of a challenge adopting digital may be for most museums. Furthermore, the degree to which museums successfully implement digital programming is largely related to their size and budgets. As the Knight Foundation also found in their study, smaller museums may only have one person dedicated to digital programming, whereas larger museums often have entire departments dedicated to the development and installation of new digital approaches. There are also vast differences whether a digital component is designed specific to one artwork or exhibition or whether the digital infrastructure informs the entire institution as I anticipate will be the future direction in as many museums as have the funds and staff to do so.

Although augmented reality (AR) was already in use by museums prior to the COVID pandemic, clever applications by an increasing number of institutions have insured that the technology will be a staple of future art museum resources. In 2019, for example, Apple invited the New Museum in New York to develop a joint AR initiative that would be free to the public in select Apple stores around the world. That the New Museum had already demonstrated its support of digital artist initiatives made the museum particularly attractive to Apple as a partner. The group of artists invited to participate included Nick Cave, Nathalie Djurberg and Hans Berg, Cao Fei, John Giorno, and Pipilotti Rist. When they looked through their iPhone or tablet, shoppers in select Apple stores encountered artworks by these artists that appeared to be installed in the aisles and suspended in the air around the Apple products. This program fostered a humorous dialogue between those customers who were unaware of the presence of the AR artworks and were trying to focus on the products they had come to purchase and those who came to the store specifically for the AR experience.

The Los Angeles County Museum of Art has promoted programming since the 1960s that encourages collaborations between art, science, and technology. The impetus for founding the museum's current art + technology lab was the spirit of LACMA's original art and technology program (1967–1971) founded by the museum's first curator of modern art Maurice Tuchman, who matched artists interested in participating with technology companies located in Southern California. The current lab is part of The Hyundai Project: Art + Technology at LACMA, a joint initiative exploring the convergence of art and technology. In fall 2021, the Art + Tech featured project explores AR by bringing together a group of artists and scientists to create a series of virtual monuments so that some of the histories of LA communities can be explored both by visitors who can experience the augmented reality

monuments at site-specific locations across Los Angeles including LACMA's Wilshire Boulevard campus, MacArthur Park, Earvin "Magic" Johnson Park, and Los Angeles Memorial Coliseum and visitors located anywhere. Widespread acceptance of remote participation is undeniably one of the key after-effects of the COVID pandemic.

During the COVID crisis and ensuing closures, many museums came up with similar hybrid technology solutions as a way of keeping virtual doors open even though their physical doors were shut. Another corporate-museum partnership was fostered between the Metropolitan Museum of Art in New York and Verizon to showcase its new 5G network capabilities. Through their joint efforts, an AR application was produced that let visitors walk through 30,000 sq ft. of exhibits and tour 13 newly constructed galleries composed of thousands of high-resolution scans. Guests could also bring home selections from the Met's collections of masterpieces and install them on their own walls via their smartphones. This AR program effectively engaged those conversant with technology and longing for a museum experience. Although AR is far less elitist than VR, the only shortfall is that whereas the Met's doors are open to everyone regardless of the technology they own and their proficiency with it, the AR application still limits participation to those willing and capable of making a virtual visit.

8.4 The NFT Revolution

In the art world, digital technology has not only changed museums, but it has also impacted how digital artworks are collected and sold. Since their inception, digital artworks have never fetched prices commensurate with their counterparts in traditional mediums, and auction houses and galleries have resisted selling them. Recently, the fear of collectors, galleries, auction houses, and museums about buying digital art dissipated in tandem with the growth of sales. The medium that made the difference was the strong emergence of non-fungible tokens or NFTs. Initially the art form was difficult to grasp since the concept of a non-fungible token is foreign to most people. NFTs are unique works identified by strings of Ethereum blockchain code that store additional information about the work which determines its ownership and authenticity. Thus, although the works can be copied, ownership can be traced and distinguished by this code, and the provenance critical in assigning value to a work of art can be irrefutably identified. There was something reassuring to even the most skeptical about the fact that the provenance could be so well established through the blockchain.

The NFT craze is partially attributable to the COVID lockdown. Collectors who previously went to galleries and art fairs to purchase art were homebound. NFTs were easily accessible on their computer screens and so was purchasing them. Also, the appeal of NFTs for a new generation of collectors was that the art was created and traded following a contemporary artistic and monetary system with which they were familiar. Consequently, many artists are experimenting with the new art form,

galleries are also incorporating NFTs as part of their stable to offer collectors, and museums have begun minting and collecting NFTs.

Prior to the pandemic, NFTs were a new art form and not the subject of articles in major art magazines and daily press, covered on major television networks, and the focus of auctions and symposia at major auction houses (Chayka, 2021). Often what has captured the attention of non-art-world insiders and made art world activities so attractive to them is its allure of exclusivity. Knowledgeable insiders seem to know which galleries to visit on trips to New York and other art capitals, which booths are "must-sees" at large art fairs, and significantly for collectors – which artists to buy. What catapulted the NFT into prominence was the sale in March 2021 of an NFT by a relatively unknown artist, Beeple (pseudonym for Mike Winkelmann), at Christie's for an astonishing price of \$69,346,250. Beeple's work consisted of a collage of miniature versions of the digital artworks he had been making – one every day – over the course of 500 days.

Within 1 month following the Beeple sale at Christie's, Sotheby felt compelled to enter the NFT world and announced a sale of "The Fungible" Collection by anonymous digital artist Pak on April 6, 2021. In a novel format, the collection was released over a 3-day period exclusively on Nifty Gateway, a website that focuses on selling, minting, buying, and showcasing NFTs. Nifty had already sold more than \$100 million of unique digital artworks since its launch in March 2020 by April 2021, when the Fungible sale took place.

8.5 Conclusion

The focus of this chapter has been the technological evolution exerted on the museum world by the pandemic. Equally profound changes have occurred with a new awareness of the extensive need for social justice issues to be addressed in our museums not only thematically but also via equitable career opportunities and societal acceptance. Coincident with the Black Lives Matter movement, an awakening has occurred about racial justice and how museums have a critical role to play in making their collections equitably accessible to all sectors of the population. Reexamination and reflection on the museum experience are not unique to a post-COVID world and our current societal upheaval. The practice of questioning reinvention and how it pertains to museums has been intrinsic to the museum environment for over 100 years.

The world eagerly anticipates a time again in a much-coveted post-COVID world, when visits to museums and other cultural institutions, social interaction with friends, professional colleagues and relatives, the freedom to work and travel without excessive regulations and fear, and attend academic education at all levels will no longer be encumbered by masks and other designated safe protocols. Throughout the cultural sector, the wheel of digitalization has started to revolve with escalating alacrity to keep pace with societal transformations. An increasingly large digital footprint is making its mark, and the coincident impact on museums is

not surprising. After all, museums and other cultural attractions are a fairly accurate reflection of their external worlds. Yet somewhat paradoxically, the COVID pandemic and the many restrictions which it has exerted on our daily lives and our inexplicable adaptation to them have made the distance afforded by remote digital interaction more welcome than before. The museum of the future desperately needs to pursue and incorporate the pervasive digital imperative punctuated and reinforced by nascent technologies to remain relevant to an increasingly disengaged and sophisticated audience that is the mainstay of their existence even if only virtually.

References

Anadol, R. https://www.youtube.com/watch?v=1MJCohk3-04

Chayka, K. (2021, March 5). http://www.artnews.com/art-news/news/nft-art-practice-scarcity-1234585720/, pp. 1–5, and Martel, J. (2021, September). Crushing on crypto: How NFTs are taking the art world by storm – And how to wrap your head around it. *Palm Beach Illustrated*, pp. 70–75.

For more extensive discussion on Minecraft and museums, please refer to Charr, Manuel. How museums are using Minecraft to gamify learning experiences. *Museum Next*, July 17, 2021, pp. 1–21.

Goodman, C. (1987). Digital visions: Computers and art (pp. 10-28). Harry N. Abrams.

Knight Foundation. (2020). Digital readiness and innovation in museums: A baseline study.

McDowell, K. (2021, September 24). Conversation with the author.

Pine, J. B., & Gilmore, J. H. (1998, July–August). Welcome to the experience economy. *Harvard Business Review*.

Smith, A. R. (2021). The history of the pixel. MIT Press.

Stulen, S. (2020, April 27). Center for the Future of Museums of the American Alliance of Museums Blog. https://www.aam-us.org/2020/04/27/the

www.Burningman.org

Cynthia Goodman, PhD, as museum director and curator, multimedia director and producer, educator and community art leader, has had a varied career in the arts level.

Dr. Goodman pioneered the implementation of new technologies in both corporate and museum exhibits. Former director of the IBM Gallery of Science and Art, NY, she organized the landmark *Computers and Art* exhibition. Her accompanying publication, *Digital Visions: Computers and Art*, served as a textbook in the field. Dr. Goodman has also advised corporations including IBM, Polaroid, and Time Warner and curated exhibitions for all of them. Dr. Goodman earned her undergraduate and doctoral degrees in art history from the University of Pennsylvania, and she was an appointed fellow at the Center for Advanced Visual Studies, Massachusetts Institute of Technology. She also received the prestigious Chester Dale Fellowship at the Metropolitan Museum of Art for 2 consecutive years.



A pioneer in museum automation, Dr. Goodman was a John Paul Getty Trust Fellow at the Guggenheim Museum in New York for 2 years. Dr. Goodman's numerous other appointments include serving on the Advisory Committee for Women and the Art of Multimedia, an international conference at the National Museum of Women in the Arts, Washington, D.C.; elected Member of the World Technology Network; National Nominating Committee 2000 Rockefeller Foundation Film/Video/Multimedia Fellowships; Founding Juror, The International Academy of Digital Arts and Sciences Webby Awards; National Endowment for the Arts Museum Program panelist 1993; International Critics Association board member, Art Table, beginning 1989; Channel 13 (New York City PBS station) Art Advisory Committee and the Committee for the Visual Environment, University of Pennsylvania.

As creative director of the Millennium Monument Company, Newport KY, she oversaw the development of a proposal for all the creative components of this proposed 110 ft. tall monument and 60,000 sq. ft. interactive exhibit. She also edited and wrote *The World Peace Bell and Peace Building: A K-12 Educator's Guide*, which was compliant with KY and OH curriculum standards and adopted by the Cincinnati Public Schools.

Dr. Goodman has organized and installed exhibitions for numerous other major institutions including The Metropolitan Museum of Art; the Whitney Museum of American Art; the IBM Gallery of Science and Art; the National Building Museum, Washington, D.C.; the National Underground Railroad Freedom Center, Cincinnati, OH; the Centre Georges Pompidou, Paris, France; and the Contemporary Arts Center, Cincinnati, where she served as chief curator and acting director. She was the first guest curator at the National Underground Railroad Freedom Center, where she organized their first traveling exhibition, *Unchained Memories: Readings from the Slave Narratives*, as well as jointly edited with Dr. Spencer Crew, Museum Director, the book that accompanied it. In addition, she has lectured throughout the United States at many other museums, universities, and conferences and has authored numerous books, exhibition catalogs, and magazine articles. She has also lectured internationally at venues including the Louvre, Paris, and the Artec Biennale, Nagoya, Japan, where she served on the advisory committee. She was also co-director with legendary video artist Nam June Paik of the InfoArt Pavilion at the Kwangju Biennale in Korea. In addition, she co-authored the accompanying catalog.

Her publications and exhibitions have been widely reviewed and heralded in publications including Art in America, The New York Times, Wired, New York Magazine, The New Yorker, Newsweek, The Village Voice, Vogue, and The Wall Street Journal. The Art of Caring: A Look at Life Through Photography, a nationally traveling exhibition which she organized, opened July 2010, at the New Orleans Museum of Art. The book that accompanies this exhibition was selected by Oprah Winfrey as a book of the month.