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Immersive Art, Nature, and Afrofuturism: Cultivating Wellness and Cultural Awareness

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ABSTRACT

IMMERSIVE ART, NATURE, AND AFROFUTURISM: CULTIVATING WELLNESS AND CULTURAL AWARENESS

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This research demonstrates how Afrofuturistic art, combined with nature and scent, enables powerful methods to transform African Diaspora perceptions and support holistic wellness through sensory-emotional engagement. The project introduces *The Next Narrative: An Immersive Journey Through Black Time* as a multisensory immersive exhibition that combines Afrofuturistic aesthetics with Harlem Renaissance cultural elements. The exhibition presents salons as a sequence that allows visitors to experience time through visual, sonic, and atmospheric transitions. The three senses of touch, scent, and sound operate as fundamental tools for grounding and transformation, which disable analytical thinking while using bodily experiences to perform decolonial memory work. Nature is a metaphor representing Black time because it operates seasonally while connecting everything and regenerating itself. Olfactory experience serves as a method to activate the body's existing knowledge through sensory memory. Through its installation design, this project establishes a living archive that challenges traditional linear historical frameworks of colonialism. It presents an alternative approach to immersive Black storytelling, focusing on embodied reception and cultural healing.

Background Information

Immersive art can stimulate emotions in people and generate a feeling of involvement. A vast amount of the body of research shows the relationship between art and emotions. This research will show how the combination of immersive art, nature, and Afrofuturism can cultivate wellness and cultural awareness. The research includes the impact of the creative arts on health outcomes that will be expanded on in the literature review. It can potentiate the mood, feeling, and psychological state of an observer of art or a creator of art. It also has a positive impact on other physiological parameters, including stress and anxiety, which are the leading causes of chronic diseases. These therapies help enhance people's quality of life and psychological well-being by fostering personal development, emotional growth, and interpersonal relationships. The World Health Organization defined health as "a state of complete physical, mental, and social well-being; and not merely the absence of disease."[1] Consequently, immersive art experiences can also enhance the process of healing and wellness.

The research presented shows how nature serves as a sanctuary for humans, providing numerous wellness benefits. The "return to work" and digitalization of our world have limited many people's ability to spend time in quality natural environments. Virtual reality (VR) nature simulations, urban immersion art exhibitions, and augmented reality (AR) projects can promote mental clarity, emotional balance, reflective connections, cognitive liberation, and mental exploration. Virtual nature experiences foster a vital connection between the digital and natural

[1] World Health Organization, "Constitution of the World Health Organization," accessed April 24, 2025, https://www.who.int/about/governance/constitution#:~:text=Health%20is%20a%20state%20of%20complete%20physical%2C,religion%2C%20political%20belief%2C%20economic%20or%20social%20condition.

environments, improving personal and community well-being.[2] The theme of Transformative Virtual Environments examines how VR nature simulation creates restorative spaces that evoke tranquility and enhance mental clarity. Reception theory and Hermeneutics will be utilized to critically explore how audiences have historically and continue to engage with immersive art practices.

Afrofuturism in immersive art experiences can be a powerful tool to challenge stereotypes, celebrate cultural heritage, and inspire new ways of thinking about the African diaspora. For this discussion, Afrofuturism is beyond just the African American experience and includes all those within the African diaspora. Within each area, it is necessary to look at it through the lens of the diaspora based on their location. For example, Afrofuturism through the lens of an Afro-Cuban, Afrofuturism through the lens of a South African, and Afrofuturism through the lens of an African American. I appreciate that we could go to even deeper segmentations within each group. The findings of the literature show how engagement and emotional resonance, contextual and visual factors, and awe factors present in virtual reality (VR) with nature can enhance the acceptance of items presented and change perspectives.

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[2] Anderson AP, Mayer MD, Fellows AM, Cowan DR, Hegel MT, Buckey JC. "Relaxation with Immersive Natural Scenes Presented Using Virtual Reality." *Aerospace Medicine and Human Performance.* 2017 Jun 1;88(6):520-526. doi: 10.3357/AMHP.4747.2017. PMID: 28539139.; S.H. Jo, J.S. Park, and P.S. Yeon, "The Effect of Forest Video Using Virtual Reality on the Stress Reduction of University Students Focused on C University in Korea," *International Journal of Environmental Research and Public Health* 18, no. 23 (2021): 12805, published December 4, 2021, https://doi.org/10.3390/ijerph182312805.; A. P. Christensen, E. R. Cardillo, and A. Chatterjee, "Can Art Promote Understanding? A Review of the Psychology and Neuroscience of Aesthetic Cognitivism," *Psychology of Aesthetics, Creativity, and the Arts*, January 12, 2023, advance online publication, https://dx.doi.org/10.1037/aca0000541.

To ground us for the conversation, background information is included on forest-bathing, Afrofuturism, and the Harlem Renaissance Salon. This assists in understanding these concepts before diving deeper into how they may be utilized in immersive art experiences.

Forest- Bathing

The Japanese government launched forest bathing under the name *Shinrin-Yoku* during the 1980s to respond to increasing urbanization-related health problems and stress levels.[3] The Japanese government recognized the need to create a practice to improve physical and mental health while fostering a natural connection. The practice of *Shinrin-Yoku* developed from traditional Shinto and Buddhist beliefs about nature's healing properties to lead people toward forest-based mindfulness experiences. The practice supported conservation activities by showing the worth of natural areas. It spread worldwide to receive recognition for its therapeutic value and cultural importance. Relational forest therapy guides, like me, trained with the Association of Nature and Forest Therapy, led people to become receptive to the healing the forest provides through invitations involving sensory engagement with sight, sound, smell, touch, and taste to create deep connections with nature. Many participants find relaxation and mindfulness, enabling them to escape daily stress and technology. Scientific research shows that forest bathing decreases cortisol levels and blood pressure and strengthens mental health outcomes.[4] Practice helps people

[3] J. Philip Grygny, *Shinrin Yoku as Embodied Ecology*, (Academia.edu, 2019), https://www.academia.edu/43146685/Shinrin_Yok.

[4] Q. Li, "Effects of Forest Environment (Shinrin-yoku/Forest Bathing) on Health Promotion and Disease Prevention: The Establishment of 'Forest Medicine,'" *Environmental Health and Preventive Medicine* 27 (2022): 43, https://doi.org/10.1265/ehpm.22-00160.;B. J. Park, Y. Tsunetsugu, T. Kasetani, T. Kagawa, and Y. Miyazaki, "The Physiological Effects of Shinrin-yoku (Taking in the Forest Atmosphere or Forest Bathing): Evidence from Field Experiments in 24 Forests Across Japan," *Environmental Health and Preventive Medicine* 15, no. 1 (2010): 18–26, https://doi.org/10.1007/s12199-009-0086-9.

develop a deeper bond with nature, which leads to increased ecological mindfulness and appreciation. Forest bathing provides therapeutic benefits of nature through both guided and self-led experiences.

Afrofuturism

Afrofuturism is a cultural practice confronting historical oppression through imaginative reimagining while establishing a critical Black identity.[5] Through Afrofuturism, linear histories and rigid binaries are challenged as the field creates fluid, multidimensional narratives that combine myths with memory and futurity. Afrofuturism resists white supremacist frameworks by creating revolutionary visions of Black life that showcase its complete richness and complexity outside the white liberal tradition. The framework extends beyond theoretical concepts because it connects with various communities while addressing concrete social issues.

Harlem Renaissance Salon

The Harlem Renaissance salon "Dark Tower," hosted by A'Lelia Walker, was a place where artists, writers, and intellectuals would meet.[6] It was a place where visitors could feel at home and engage in cultural discussions. This salon was for the "aesthetes, young writers, sculptors, painters," and it showed the cultural life of Harlem during that time. The salon is an integral part of the Harlem Renaissance, showing the connection between art, culture, and community among African American creatives.

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[5] J. Griffith Rollefson, "The 'Robot Voodoo Power' Thesis: Afrofuturism and Anti-Anti-Essentialism from Sun Ra to Kool Keith," *Black Music Research Journal* 28, no. 1 (2008): 83–109, http://www.jstor.org/stable/25433795.

[6] Gilbert Osofsky, "Symbols of the Jazz Age: The New Negro and Harlem Discovered," *American Quarterly* 17, no. 2 (1965): 236–237, https://doi.org/10.2307/2711356.

The evolution of immersive art as a cultural storytelling medium and emotional engagement tool enables the creation of unique opportunities to promote wellness and transform perceptions among people of African descent. Physical and digital immersive environments activate sensory experiences that go beyond traditional artistic displays to create healing spaces for identity exploration and community connection. The current research demonstrates the benefits of immersive techniques, yet it lacks investigation into their combined effects on cultural awareness and holistic well-being.

Combining immersive art with nature and Afrofuturism creates an active platform to study cultural identity and healing while promoting sensory engagement. The growing evidence shows that immersive experiences effectively trigger emotional responses while transforming historical accounts and creating wellness through sensory engagement. Afrofuturism functions as a framework that transforms traditional African diasporic representations by merging historical facts with mythological elements and futuristic speculations, and nature functions as both a sacred refuge and a symbolic representation of renewal and unity. The current research fails to thoroughly examine how these elements improve cultural awareness and transformative storytelling. The traditional art interpretation methods of hermeneutics and reception theory need modification to study immersive experiences because they focus on bodily engagement, spatial interactions, and multisensory narratives. The FRACH framework represents one of several immersive frameworks that provide new methods for developing and evaluating cultural installations that combine technology with embodiment and narrative immersion.

Future additions to the thesis will be the design, build, and recorded participants feedback of an exhibition leveraging interactivity with the intention of viewers to capitalize on the benefits of the combination of nature, Afrofuturism, and immersive art entitled *The Next*

Narrative: An Immersive Journey Through Black Time. The exhibition will be a traveling hybrid (metaverse and live) exhibition that I will curate and will contain art created by myself, as well as others. I will select art that embodies Black joy over time, nature simulations, and spatial sound. The opening of the exhibition occurs during Newark Arts Week early October, and with later phases premiering in Miami, Florida during Art Basel week.

Thus, this study seeks to address the following research question: "How do immersive art, nature, and Afrofuturism intersect to cultivate wellness, cultural awareness, and transformative storytelling for the African diaspora, and how do historical art methodologies and new immersive frameworks contribute to the design and analysis of culturally significant experiences?"

Literature Review

The following literature reviews position this research by analyzing core theories, interdisciplinary methods, and new methodologies that help explain and implement immersive art for cultural storytelling and wellness.

Evolution of Immersive Art Definition

Mirja Beck explores how immersive, multi-sensorial art exhibitions bring old artworks to life.[7] Using advanced light and video technology, visitors can feel like they are stepping into the paintings in exhibitions and summon strong emotional responses that create lasting memories. Beck highlights the historical context of art reproduction and popularization, comparing early

[7] Mirja Beck, "A Lived Experience—Immersive Multi-Sensorial Art Exhibitions as a New Kind of (Not That) 'Cheap Images'," *Arts* 12, no. 1 (2023): 16, https://doi.org/10.3390/arts12010016.

20th-century photomechanical reproductions with contemporary digital immersive exhibitions. Both methods make high art more approachable and engaging for a broader audience.

Maggie Burnette Stogner categorizes immersive design models into the following five types: Experiential Immersion, Theater Immersion, Interactive Immersion, Virtual Immersion, and Narrative Immersion.[8] Stogner's model presents ways to engage visitors and enhance their museum experience. Stogner describes Experiential Immersion as a purely sensory experience and is excellent at creating that emotional connection that leads to retention of the experience. Experiential exhibits are characterized by multisensory engagement, immersing visitors through sight, sound, touch, and even smell. They are designed to create emotional resonance, provoking empathy, discomfort, or introspection. Through participatory design, visitors are encouraged to interact, respond, and co-create meaning within the exhibit. Narrative coherence ensures that all elements. visuals, media, and layout, work together to support a unified story. Finally, technological integration is leveraged not just for spectacle but to deepen understanding and foster meaningful connections. An example provided by Stogner is the Alcatraz Prison in San Francisco, where visitors are instructed to enter the cell by a former inmate and then shut into darkness. Stogner notes that this is an in-person event and could be replicated by leveraging today's technology. The prison experience becomes a powerful subject for visual culture and art history through immersive storytelling and new media approaches. The exhibit presents incarceration as part of larger social and political systems, which reflects the approach of socially engaged art. The reconstructed prison environments, along with their sound effects and lighting

[8] Maggie Burnette Stogner, "The Immersive Cultural Museum Experience – Creating Context and Story with New Media Technology," *International Journal of the Inclusive Museum* 3, no. 3 (2010): 121, https://doi.org/10.18848/1835-2014/CGP/v03i03/44339.

systems, create installation art that enables visitors to experience emotions through physical engagement. The combination of AR/VR technology with motion-sensitive projection systems enables viewers to actively participate in the experience, rather than simply watching it. The reflective areas in the exhibit space promote both contemplation and civic engagement, which expands its impact from visual appeal to active advocacy work similar to activist art that drives social change through education and community mobilization. Future research for me is to compare whether the experience is the same for a visitor in person as in virtual reality.

A variation of immersion that is often utilized for cultural exhibitions is Interactive Immersion. This includes activities that engage visitors in the exhibit through interactive features like touch screens. Cultural museums have begun to realize that it is crucial to use interactive technologies to cater to the youth and people of diverse backgrounds. For example, the Grammy Museum in Los Angeles, California, offers its visitors pull-down menus with text and music selections. Also, they can go into simulated music studios to play simulated musical instruments; thus, the experience is more realistic. Likewise, the US Holocaust Memorial Museum in Washington, DC, has touch tables that are used with video screens. This setup enables the visitors to view first-person testimonies and first-hand accounts of genocide, which is quite informative and compelling. These elements enhance the visitors' experience, making their visit more memorable and engaging, and enabling them to learn more from the exhibits. The two museums achieve their goal of reaching diverse audiences through their strategic use of textual methods, which support their experiential objectives. The Grammy Museum enables visitors to generate content, while the Holocaust Museum allows them to observe and think about what they see. The two institutions create inclusive visitor experiences through separate methods that stimulate different emotional and intellectual responses.

Virtual Immersion takes it a step further by creating virtual environments that allow people to travel back in time and experience different historical moments. [9] Virtual immersion has benefited from the development of well-funded sectors such as video gaming, animation, and theme parks. An example of a VR model used in Virtual Immersion is a "Virtusphere" in which the user is immersed in the 3D environment using VR goggles and moves in a rolling ball. An example of Virtual Immersion being used for historical moments is "Rome Reborn," first presented in 2007. This project, coordinated by Bernard Frischer, produced a high-level virtual city of Rome in 400 AD. The virtual 3D model was further developed and licensed for a commercial project entitled "Rewind Rome. Museums and galleries can develop full-fledged environments that can be virtual and/or real, thereby enhancing the scope and appeal of cultural exhibitions.

Narrative Immersion is often combined with virtual and augmented reality and includes a story that the visitors can follow. These stories are backed up by items such as sensory stimuli. The idea of "suspension of disbelief" is famously associated with Samuel Taylor Coleridge and is discussed in his work "Biographia Literaria."[10] This refers to visitors' willingness to believe in certain aspects of an exhibit for engagement. I believe this concept is central to creating an immersive storytelling space, so it is necessary to define it. This enables the visitors to engage with the narrative, making them feel part of the exhibition. This takes us to the role of the visitor as a character in the experience since visitors are both consumers and co-creators of experience in immersive spaces.[11] Incorporating context and representational characters aids visitors'

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[9] Stogner, "The Immersive Cultural Museum Experience," 127.

[10] Samuel Taylor Coleridge, *Biographia Literaria*, Chapter XIV, in *Owl Eyes* (accessed September 21, 2025), https://www.owleyes.org/text/biographia-literaria/read/chapter-xiv

[11] Stogner, ""The Immersive Cultural Museum Experience," 120.

participation in the experience. Some museums incorporate archival images and audio to depict historical personalities. Some others employ the latest digital media technologies, like mannequins that look real and audiovisual aids that help visitors navigate the content. This inclusion increases the level of intractability and relatability of the experience. This is because, as visitors move about within the exhibition area, in some cases with VR goggles on, they are absorbed by the story being told.[12] By providing opportunities for people to incorporate their experiences into the narrative, they participate at a personal level of engagement and meaning. The Egyptian culture is a popular setting for narrative immersion, and Stogner shares a couple of them. The story of the afterlives of the pharaohs of the 18th dynasty, especially King Tutankhamun, and the lives of the pharaohs of this dynasty, which contain more than a hundred pieces from the tomb of Tutankhamun and the Valley of the Kings, make the "Tutankhamun and the Golden Age of the Pharaohs" exhibition experience more realistic and enjoyable.[13] Incorporating artifacts like the gold crown and the golden tiled coffin creates a unified story that can also stir emotional reactions from visitors while providing valuable historical and cultural insights. The experience is enriched by holographic projections and audio guides that create an immersive atmosphere, transporting visitors back to the ancient world.

In *Museums in a Digital Culture,* the chapter “Breathing Art: Art as an Encompassing and Participatory Experience,” Christina Grammatikopoulou discusses the evolving relationship between interactive art, the body, and perception.[14] She emphasizes the following topics: The

[12] Experience an excellent example of a guide in a Virtual and Narrative immersion at the "Horizon of Khufu: A Journey in Ancient Egypt in NYC." *Horizon of Khufu*. Accessed December 12, 2024. https://horizonkheopsexperience.com/nyc/

[13] Stogner, “The Immersive Cultural Museum Experience,” 123-124.

[14] Christina Grammatikopoulou, "Breathing Art: Art as an Encompassing and Participatory Experience," in *Museums in a Digital Culture*, ed. Chiel van den Akker and Susan

shift from Traditional Art to Interactive Art, Phenomenology and the Body, the Role of Breathing in Art, Technological Integration, Intimacy and Non-Verbal Communication, and Art as a Laboratory. Grammatikopoulou argues that contemporary art has moved from creating "sanctified art objects" to engaging the public in a participatory experience.[15] Like Stogner's idea of the visitor as a character, Grammatikopoulou points out that a shift requires the audience to become part of the creative process, altering their perception of art and their role. Evidence includes references to critics like Theodor Adorno and Oliver Grau, who express concerns about the diminishing critical distance in immersive art experiences. At the same time, there is an increase in emotional involvement. Grammatikopoulou highlights how integrating technology in art facilitates new forms of communication and interaction. Grammatikopoulou employs a phenomenological approach to explore how interactive art affects perception through bodily engagement. She highlights the importance of viewing the body and mind as an integrated whole, referring to philosophers like Maurice Merleau-Ponty. Breathing is crucial in interactive art as it connects body and mind and Ponty proposes that perception is an active bodily involvement with the environment.[16] Grammatikopoulou discusses various artworks that utilize breathing to enhance the participant's experience. An example is Char Davies's *Osmose,* which allows users to navigate a virtual environment through their breathing rhythm. George Khut's "Cardiomorphologies" uses biofeedback to visually represent participants' emotional states, emphasizing the connection between bodily functions and artistic expression.[17] Grammatikopoulou explains how interactive art pieces like *Mobile Feelings II* generate close

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Legêne (Amsterdam: Amsterdam University Press, 2016), 41–56, http://www.jstor.org/stable/j.ctt1s475tm.6.

[15] Grammatikopoulou, "Breathing Art," 41-42.

[16] Grammatikopoulou, "Breathing Art," 44.

[17] Grammatikopoulou, "Breathing Art," 50.

relationships through non-verbal communication. The concept of visitors being able to share their breathing and heart rates makes participants connect on a personal level.[18] Grammatikopoulou concludes that interactive art transforms museums and spaces into laboratories for experience and exchange, where established boundaries between artist and public are blurred, fostering a culture of participation and contribution.[19]

Building on the evolving role of audience interaction in immersive environments, Xiaoyu Liu, Hongming Zhou, and Junwei Liu explore how illustration design and emotional resonance deepen the viewer's connection to immersive art spaces in their paper "Deep Learning-Based Analysis of the Influence of Illustration Design on Emotions in Immersive Art."[20] The authors provide definitions for Immersive Art. Firstly, "sunk art" is an art movement where the artists establish a link between their ideas presented in art and the real world.[21] Sunk art emphasizes the deep connection between the artist's internal vision and the external expression of their ideas, allowing for a profound exploration of artistic concepts. Secondly, immersive art also refers to an experience created in a particular setting or context, including objects, smells, temperature, the color of light, and the body. Thirdly, for the public, art in an immersive way means that the viewer's body is engaged with the artwork in a way that makes the body not an object but a "phenomenal body." Integration creates a space where people and the environment merge rather than exist as two different things. Transformation allows the audience to become an integral part

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[18] Grammatikopoulou, "Breathing Art," 52.

[19] Grammatikopoulou, "Breathing Art," 56.

[20] Xiaoyu Liu, Hongming Zhou, and Junwei Liu, "Deep Learning-Based Analysis of the Influence of Illustration Design on Emotions in Immersive Art," *Mobile Information Systems*, July 30, 2022, doi:10.1155/2022/3120955.

[21] Xiaoyu Liu, et al "Deep Learning-Based Analysis of the Influence of Illustration Design on Emotions in Immersive Art," 2.

of the artwork, experiencing it in a more personal and immersive way. Fourthly, the art installations should create an immersive space where the illustrations are projected to deal with the distance between art and the public. The method makes the distinction between the real and the artificial more challenging to create and thus provides an immersive and captivating experience for the viewers. Lastly, immersive art is progressive, as it changes the world's trends by mixing the virtual and real world, people, media, and environment.[22] This material experience builds on the previous one by incorporating multimedia and cross-art practices to perform the "presence experience" of virtual interactions within relationships. It breaks down the gap between art and the audience. It allows the audience to participate and engage with art firsthand, thus challenging the conventional art delivery and consumption methods. The initial view of immersive art presents arguments that illustrate how interactive art redefines the relationship between the audience, the artwork, and the experience of perception through bodily engagement and technological integration.

Presenting the Values of the Multi-Sensory Immersive Experience

In her article "The Immersive Cultural Museum Experience," Maggie Burnette Stogner shows the value of sensory immersion in enhancing visitor engagement and creating memorable experiences.[23] Sensory immersion is one of the most effective ways of strengthening emotional and cognitive engagement. Visitors can achieve more meaningful and long-lasting experiences when they engage in more than one sense. This approach also helps develop a stronger

[22] Liu, Hongming Zhou, and Junwei Liu, "Deep Learning-Based Analysis," 3.

[23] Maggie Burnette Stogner, "The Immersive Cultural Museum Experience – Creating Context and Story with New Media Technology," *International Journal of the Inclusive Museum* 3, no. 3 (2010): 117-30, https://doi.org/10.18848/1835-2014/CGP/v03i03/44339.

relationship with the artifacts and exhibits. The use of sensory immersion techniques can lead to longer memory retention. When visitors experience an exhibit through multiple senses, the information is more likely to be embedded in their long-term memory. Sensory immersion draws diverse audiences of younger viewers because it creates interactive experiences that match the modern viewing preferences of younger people and multicultural audiences.

Various studies have established that multi-sensory immersion increases emotional engagement and creates more profound and memorable experiences.[24] Immersive experiences can enrich visitor engagement by making the exhibits more interactive and relatable. This can lead visitors to spend more time at the museum and have a more meaningful experience. The Oakland Museum hosted an exhibition on realism that included a premiere screening of Les Blank's documentary *Garlic Is as Good as Ten Mothers*.[25] During the screening, personnel released the fumes of roasting garlic into the air conditioning, creating a realistic environment. This helped create the right atmosphere for the audience, leaving them with a good memory. High emotional arousal enhanced cognitive function and memory as well. Sensory immersion has been used in cultural rites and religious ceremonies for millennia. In the past century, populist museums have used dioramas, film projections, sound effects, voice tracks, and even smoke and mirrors to contextualize cultural artifacts and historical objects with immersive atmospheres. Sensory immersions create engaging, memorable, and educational experiences that resonate with a wide range of visitors. Immersive storytelling creates a compelling atmosphere that enhances emotional and cognitive connections with cultural artifacts through sound, visuals,

[24] Stogner, "The Immersive Culture Museum Experience," 5-6.
[25] Stogner, ""The Immersive Cultural Museum Experience," 118.

and smells. This approach captivates visitors and helps them create lasting memories and a deeper understanding of the exhibits.

Examining smells in more detail in a multi-sensory environment, Charles Spence looks at how ambient scents can be used in art galleries and museums to create a better visitor experience.[26] Spence notes that there is a rising focus on creating multisensory experiences whereby fragrances are used to sync or extend visual displays.[27] This is done to engage other senses, increasing visitors' participation and ensuring that visually impaired visitors are well involved. Spence analyzes various types of relations between scents and visual displays. Spence recognizes that while ambient odors can influence people's art experiences, the results are not always positive. This is because visitors often expect these spaces to be scent-free, and strong or unfamiliar smells can feel intrusive or overwhelming. Additionally, if the scent does not match the artwork or cultural context, it may distract or even alienate visitors. Scent is also complex to avoid or control, so if it is unpleasant or culturally incongruent, it can result in discomfort and negative feedback from the audience. As a result, the use of ambient scent in exhibitions requires careful consideration to avoid unintended consequences. A practical example of scented exhibits is Indian incense at the Victoria and Albert Museum and olfactory chambers at the Palais de Tokyo. Research has shown that ambient scents can affect visual perception and memory, but the impact varies depending on the congruency between the smell and the visual display. Spence also discusses the challenges of introducing scents in public spaces, such as the potential for scent overload.

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[26] Charles Spence, "Scenting the Anosmic Cube: On the Use of Ambient Scent in the Context of the Art Gallery or Museum," *I-Perception*, November 20, 2020, 1–26, doi:10.1177/2041669520966628.

[27] Spence, "Scenting the Anosmic Cube," 2.

The influence of scents can be described using sensation transference and attentional modulation. "Sensation transference" explains how contextual stimuli, such as olfactory or auditory cues, can influence people's ratings of what they are viewing.[28] If people like or dislike an ambient scent, they will also like or dislike whatever they are rating at the time, even if it is something else. Parsons cautions against using this approach in normally odorless retail settings, emphasizing the need for some connection between the scent and the store type to affect customer responses positively.[29] Gulas and Bloch also highlight that while the scent of flowers may be pleasant, it would be inappropriate for a motorcycle shop.[30] This argument extends to museums, where semantic congruence between the scent and the environment is crucial for determining visitor responses.

Ambient scents, called attentional modulation, are closely linked to particular colors that can influence a viewer's response to art.[31] This is achieved by directing the viewers' attention to regions of the scene that match the scent's color. Research shows that people's eye movements focus on areas whose color corresponds with the scent they are smelling. For example, people are more likely to look at red items when smelling a strawberry scent. This concept was applied in the Tate Sensorium exhibit, where specific scents were chosen to highlight different colors in David Bomberg's painting *In the Hold* (c. 1913–1914). One scent was intended to bring out the blues, while another highlighted the browns and ochers. Additionally, retro nasal olfactory stimuli, such as tasting burnt cocoa nib dark chocolate, can draw attention to associated colors. This was reported by visitors viewing Francis Bacon's *Hyde Park* painting at the Tate Sensorium.

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[28] Spence, "Scenting the Anosmic Cube," 15.
[29] Spence, "Scenting the Anosmic Cube," 3.
[30] Spence, "Scenting the Anosmic Cube," 15.
[31] Spence, "Scenting the Anosmic Cube," 16.

However, when the ambient scent and visual display do not match, the smell can distract or distance the viewer from the artwork. Cirrincione et al. suggest that cross-modal incongruency may increase arousal and alter a viewer's art evaluation. The Surrealists explored this concept and used the incongruent smell of roasting Brazilian coffee at the 1938 International Surrealist Exhibition to create a unique sensory experience. While scents can enhance the visitor experience, they can distract from the visual displays if not appropriately matched.

There is a significant justification as to why multi-sensory exhibitions are compelling, and that is the creation of a memorable and interactive visit. This is because these exhibitions involve five senses, including sight, sound, touch, and sometimes smell, producing powerful emotional reactions that make the audience develop a better relationship with the artwork. The multi-sensory format of the exhibition increases the success and enables visitors to engage with the event more comprehensively when catering to different audiences with different sensory preferences and requirements. In this way, when visitors can participate, they become co-creators of the experience, which enhances their emotional and cognitive connection with art. Immersive art is still an evolving art form. It will significantly impact art exhibitions in the future, creating better and more engaging experiences that will touch the visitors on an emotional and intellectual level.

Museums can enhance visitors' experiences through the five senses, using sight, hearing, smell, and touch to make the visit more engaging and unforgettable.[32] Sensory engagement encourages visitors to participate more in the exhibits, become more involved with the content, and improve their visit experience.[33] Multisensory stimuli can evoke strong reactions, such as

[32] Wang, "Museum as a Sensory Space," 3.
[33] Wang, "Museum as a Sensory Space," 14.

excitement or awe, by directly appealing to the senses.[34] For example, the sound of a roaring dinosaur or the smell of ancient artifacts engages multiple senses, enhancing cognitive processing and learning.[35] It is easier for visitors to recall information and grasp ideas if the information is received in more than one sense. The multisensory approach is used because it makes educational content more compelling. In addition, multisensory experiences can engage many different feelings, including happiness, amazement, sadness, and sympathy. In this way, museums can enhance visitors' emotional experience of the exhibits and encourage a more substantial and more prosperous engagement with the content. Integrating multisensory elements plays a crucial role in improving the overall visitor experience. Multisensory experiences can increase visitor satisfaction, encourage repeat visits, and generate positive word-of-mouth by providing a richer and more engaging environment. Museums that effectively utilize multisensory approaches can differentiate themselves from others and create lasting impressions on their visitors.

Dan Luo, Lieve Doucé, and Karin Nys focus on sensory-rich museum experiences and introduce Howes's concept of sensory museology.[36] Sensory museology advocates transitioning from traditional, vision-centric museum experiences to ones that engage multiple senses, such as sound, smell, and touch. Sensory experiences make museum visits more immersive and memorable.[37] By engaging in various senses, visitors are more likely to retain information and

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[34] Wang, "Museum as a Sensory Space," 3.

[35] Wang, "Museum as a Sensory Space," 14.

[36] Dan Luo, Lieve Doucé, and Karin Nys, "Multisensory Museum Experience: An Integrative View and Future Research Directions," *Museum Management and Curatorship*, May 26, 2024, DOI: 10.1080/09647775.2024.2357071, https://doi.org/10.1080/09647775.2024.235707.

[37] Luo, Lieve Doucé, and Karin Nys, "Multisensory Museum Experience," 2.

develop a deeper understanding of the exhibits. The study highlights contributions from multiple disciplines, including psychology, neuroscience, and anthropology, to understand the interplay between senses, body, mind, and behavior. This interdisciplinary approach provides a more comprehensive understanding of how sensory stimuli influences visitor engagement and interaction. The researchers emphasize the role of embodied cognition, which suggests that sensory experiences are deeply intertwined with our physical interactions and movements within a space.[38] This perspective helps explain how multisensory experiences can enhance visitor engagement by creating more immersive and memorable experiences. The study also explores the role of technology in facilitating multisensory experiences in museums. Technological advancements, such as virtual reality and interactive displays, can enhance sensory engagement and provide new ways for visitors to interact with exhibits.[39] The researchers outline future research directions to develop a more unified theory of multisensory museum experiences and offer practical insights into exhibition design.[40] This includes exploring the impact of different sensory combinations on visitor engagement and understanding the long-term effects of multisensory experiences on memory and learning.

Nature and Immersive Experiences

Research by Anderson et al., Jo et al., and Christensen et al. demonstrates how virtual reality (VR) and natural scenes enable the creation of deeply engaging environments.[41] The core

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[38] Luo, Lieve Doucé, and Karin Nys, "Multisensory Museum Experience," 21.
[39] Luo, Lieve Doucé, and Karin Nys, "Multisensory Museum Experience," 20.
[40] Luo, Lieve Doucé, and Karin Nys, "Multisensory Museum Experience," 22.
[41] Anderson AP, Mayer MD, Fellows AM, Cowan DR, Hegel MT, Buckey JC. "Relaxation with Immersive Natural Scenes Presented Using Virtual Reality." *Aerospace Medicine and Human Performance.* 2017 Jun 1;88(6):520-526. doi: 10.3357/AMHP.4747.2017. PMID: 28539139.; S.H. Jo, J.S. Park, and P.S. Yeon, "The Effect of Forest Video Using Virtual Reality on the Stress Reduction of University Students Focused on C University in Korea,"

findings of these studies demonstrate how immersive environments trigger emotional responses, including relaxation, awe and wonder, and empathy, which deepen user engagement with content and environments. Research shows that VR technologies, including forest videos and virtual natural environments, effectively engage senses to provide stress relief while changing user perspectives. The immersive sensory experience produces mood changes, which makes it an essential tool for maintaining well-being. The affective engagement study demonstrates how sensory and emotional interaction combined to create deep emotional and intellectual connections between people and artistic or virtual representations. The multiple fields of study demonstrate how immersive technologies create significant value through their ability to engage emotions and stimulate sensory experiences.

The scientific literature demonstrates that nature exposure, along with virtual environments, produces well-documented benefits for both physical and mental health, according to Anderson et al., Jo et al., and C. Song et al. study "Physiological Effects of Visual Stimulation with Forest Imagery." [42] The physiological evidence demonstrates that natural and virtual nature experiences lead to measurable positive changes in heart rate variability, brain activity, and electrodermal responses, which indicate stress reduction and increased feelings of calmness. The calming effects of nature are enhanced by phytoncides, which trees release through their sensory

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International Journal of Environmental Research and Public Health 18, no. 23 (2021): 12805, published December 4, 2021, https://doi.org/10.3390/ijerph182312805.; A. P. Christensen, E. R. Cardillo, and A. Chatterjee, "Can Art Promote Understanding? A Review of the Psychology and Neuroscience of Aesthetic Cognitivism," *Psychology of Aesthetics, Creativity, and the Arts*, January 12, 2023, advance online publication, https://dx.doi.org/10.1037/aca0000541.

[42] Anderson AP, et al, "Relaxation with Immersive Natural Scenes."; S.H. Jo, J.S. Park, and P.S. Yeon, "The Effect of Forest Video."; Chun Song, Hiroshi Ikei, and Yoshifumi Miyazaki, "Physiological Effects of Visual Stimulation with Forest Imagery," *International Journal of Environmental Research and Public Health* 15, no. 2 (2018): 213, https://doi.org/10.3390/ijerph15020213.

inputs, thus demonstrating the restorative power of nature in physical settings and advanced VR simulations that include the release of phytoncides. The combination of physical and mental research evidence illustrates how sensory-rich environments deeply affect human wellness.

There are practical applications of VR, and *Shinrin-Yoku* highlights their significant potential for stress relief, therapeutic interventions, and urban well-being. [43] Both approaches offer innovative solutions to address mental health challenges, particularly in isolated or densely populated urban environments where access to nature is limited. VR technology enables the creation of immersive, nature-inspired experiences that replicate the calming effects of real-world environments, while *Shinrin-Yoku* emphasizes mindful, sensory engagement with natural surroundings. Together, these methods provide accessible and effective pathways for reducing stress and enhancing mental health, making them valuable tools for improving quality of life in modern, urbanized societies.

National Museum of African American History and Culture

Recent scholarship positions the National Museum of African American History and Culture as a paradigmatic example of Afrofuturist ethos in institutional design and curatorial practice. Conceived as a "ritual architecture of freedom," the museum's spatial and sensory strategies merge collective memory with speculative imagination, embodying the nonlinear temporality central to Afrofuturist theory.[44] Architect David Adjaye's bronze lattice exterior,

[43] Anderson AP, et al, "Relaxation with Immersive Natural Scenes.";."; S.H. Jo, J.S. Park, and P.S. Yeon, "The Effect of Forest Video." ; J. Philip Grygny, "Shinrin-Yoku: Forest Bathing as Embodied Ecology," accessed April 19, 2025, https://www.academia.edu/43146685/Shinrin_Yoku_as_Embodied_Ecology.

[44] Mabel O. Wilson, *Begin with the Past: Building the National Museum of African American History and Culture* (Smithsonian Books, 2016).

inspired by Yorùbá ironwork and Southern Black craft traditions, establishes a transhistorical dialogue between Africa and its diaspora. Meanwhile, the museum's vertical progression from subterranean galleries to upper floors enacts a metaphorical ascent through layers of trauma toward renewal.[45] Curatorially, the NMAAHC foregrounds affective engagement through multisensory technique, soundscapes, oral histories, and reflective spaces, transforming visitors into active participants in communal remembrance.[46] This approach aligns with Afrofuturist aesthetic philosophy, where emotional resonance and embodied experience become vehicles for cultural reprogramming and futurist speculation.[47]

Ekow Nimako's Modular Afrofuturism

Building on the institutional model of NMAAHC, the work of Ekow Nimako demonstrates how Afrofuturist principles can be operationalized at the level of individual artistic practice, offering further insight into participatory and modular design strategies for immersive exhibitions. Ekow Nimako's sculptural practice offers a compelling model for Afrofuturist exhibition design, foregrounding material modularity, temporal hybridity, and participatory logic. Working exclusively with monochromatic black LEGO bricks, Nimako reconstructs historical narratives of African empires and mythologies through futuristic reimagining, as seen in works such as *Building Black Civilizations: Journey of 2,000 Ships* (2025), *Kumbi Saleh 3020*

[45] David Adjaye, "Form, Memory, and Meaning: The Architecture of the National Museum of African American History and Culture," *Journal of Architectural Education* 71, no. 1 (2017): 8–22; Bridget Cooks, "Curating the National Museum of African American History and Culture," *The Public Historian* 39, no. 2 (2017): 82–89; Michelle M. Wright, *Physics of Blackness: Beyond the Middle Passage Epistemology* (University of Minnesota Press, 2015).

[46] Kimberly Miller, "Exhibiting Memory: Affect and the African American Museum," *American Quarterly* 70, no. 4 (2018): 789–815.

[47] Kodwo Eshun, More Brilliant Than the Sun: Adventures in Sonic Fiction (Quartet Books, 2003).

CE (2020), and *Building Black Mythos: Divinities* (2024).[48] His method merges modular construction with sculptural monumentality, manifesting an Afrofuturist vocabulary that literally builds futures from fragments of the present.[49] The modularity of LEGO echoes Afrofuturism's iterative temporality, each brick representing both continuity and recombination. While Nimako's exclusive use of black bricks functions as both aesthetic restraint and philosophical gesture, symbolizing unity, potentiality, and resistance to fragmentation.[50] By reconstructing mythic narratives and legendary voyages, Nimako transforms historical speculation into tactile futurity, aligning material play with historical reclamation.[51] This participatory logic parallels immersive exhibition strategies, inviting viewers to oscillate between miniature detail and monumental vision, and to engage not only visually but imaginatively in constructing futures from the residual materials of the present. Nimako's work thus exemplifies Afrofuturist hapticity, offering a model for curatorial praxis that privileges sensory engagement, co-creation, and the dissolution of boundaries between observer and participant.

The museum's immersive strategies, coupled with the participatory logic found in Ekow Nimako's modular sculptural practice, offer a compelling framework for designing exhibitions that dissolve boundaries between observer and participant, grounding Afrofuturist narratives in both lived heritage and speculative possibility.

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[48] Colossal, "More than 500,000 black LEGO bricks structure Ekow Nimako's vast Afrofuturistic cityscapes," Colossal Magazine 14, no. 3 (2022): 42–49.

[49] True North Bricks, "I chose to use LEGO—or it chose me: An interview with Ekow Nimako," True North Bricks Journal 5, no. 2 (2023): 33–41.

[50] True North Bricks, "I chose to use LEGO—or it chose me."

[51] Colossal, "More than 500,000 black LEGO bricks," 44.

FRACH Framework

To further advance these participatory and immersive strategies in exhibition design, innovative frameworks such as FRACH offer practical methodologies for integrating educational, social, and technological dimensions into cultural heritage experiences.[52] The FRACH system was developed through collaborative work between different fields to solve major weaknesses in conventional game development methods. These methods fail to consider educational, social, and immersive aspects of serious games for cultural heritage preservation.[53] The framework begins by integrating educational objectives with archaeological evidence, curatorial expertise, virtual reality capabilities, and multiplayer functionality at the start of project development instead of incorporating them during the final stages of development. The FRACH system introduces two new quality attributes to the ISO/IEC 25010 model through its development phases. which focus on creating accurate narratives and interactive gameplay experiences.[54] The framework allows designers to transform archaeological restrictions and educational learning objectives into game elements, team-based exercises, and assessment procedures for student learning evaluation. The system enables developers to use a common terminology for quality management, which improves their ability to exchange artifacts between teams, make essential technical choices about networking systems, immersion technology and adaptive learning platforms. The FRACH evaluation system evaluates game usability while

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[52] Roberto Andreoli, Angela Corolla, Armando Faggiano, Delfina Malandrino, Donato Pirozzi, Mirta Ranaldi, Gianluca Santangelo, and Vittorio Scarano, "A Framework to Design, Develop, and Evaluate Immersive and Collaborative Serious Games in Cultural Heritage," *ACM Journal on Computing and Cultural Heritage* 11, no. 1 (December 2017): 1–22, https://doi.org/10.1145/3064644.

[53] Andreoli et al., "A Framework to Design, Develop, and Evaluate Immersive and Collaborative Serious Games in Cultural Heritage," 2.

[54] Andreoli et al., "A Framework to Design, Develop, and Evaluate Immersive and Collaborative Serious Games in Cultural Heritage," 5.

measuring learning progress, playability, and presence to prove that heritage serious games provide measurable educational value through team-based gameplay.

The FRACH methodology contains four sequential phases which perform multiple development cycles.[55] The Preliminary Phase functions as the initial planning stage. This stage determines the fundamental elements of the serious game, determines its target users, gathers all relevant domain information, sets project boundaries, and defines the main educational targets for the entire experience. The Conceptual Phase operates as a design cycle, which divides the game development process into separate logical levels or scenes. The scene development process includes creating game maps, setting specific learning targets, designing puzzles, challenges to achieve those targets, identifying all playable items, and writing the narrative content. The Development Phase converts design concepts into operational software through expert surveys of structural boundaries, historical data integration, 3D environment creation, core programming development, and testing and bug resolution. The Evaluation Phase confirms project success through user testing. This phase evaluates knowledge acquisition, usability, player satisfaction, and immersivity quality by using pre- and post-questionnaires. The FRACH methodology implements a systematic multi-step process which enables proper planning of immersive cultural heritage experiences and their effective development and thorough assessment of educational value and user interaction.

Methods to Quantify Emotional Experience

[55] Andreoli et al., "A Framework to Design, Develop, and Evaluate Immersive and Collaborative Serious Games in Cultural Heritage," 9 – 12.

There are various methods to quantify emotional experiences. Firstly, research explores the qualities of participants' immersive experiences in physically immersive and interactive environments, seeking to uncover the meanings created by these experiences.[56] Unlike other researchers who focus on different aspects of immersion, this study emphasizes bodily experiences intertwined with culture, society, environment, and history. The analysis centers on constructing an experiential framework based on immersive consciousness, considering temporal aspects.

The concept of immersive consciousness, developed for analyzing Immersive Art experiences, is structured around bodily consciousness, spatial consciousness, and contextual consciousness.[57] This model allows for identifying commonalities in sensory and emotional experiences among participants. For the research performed, consciousness is defined as embodied, as in contemporary cognitive scientists' definitions. Consciousness can be influenced by the presence of the body or somatic and enactive processes. Immersive Consciousness refers to the embodied experience of consciousness as is felt through the body, illustrating how individuals interpret and find significance in an immersive environment. Bodily consciousness explores participants' sensory experiences, including external senses like sight, hearing, and touch, as well as internal sensations like proprioception and kinesthetic awareness. Conversely, spatial consciousness focuses on our perception of space through our whole body, creating the feeling of entering a different world or dimension. Metaphoric spaces and imaginative

[56] Jinsil Hwaryoung Seo, Greg J. Corness, Diane Gromala, and Thecla Schiphorst, "Aesthetics of Immersion in Interactive Immersive Environment: Phenomenological Case Study," *Arts* 12, no. 1 (2023): 5, https://doi.org/10.3390/arts12010016.

[57] Seo, Corness, Gromala, and Schiphorst, "Aesthetics of Immersion in Interactive Immersive Environment," 6.

experiences are evoked. Contextual consciousness ties these experiences to the broader environment, culture, and history, creating a rich, immersive experience deeply connected to the participant's surroundings and personal context.

Sofia Vlachou and Michail Panagopoulos explore how immersive installation of artworks can evoke emotions and contribute to their popularity.[58] The research focuses on three main questions: What emotions inspire people to tweet about their art experiences? How do users' interactions and attributes affect the emotional experience of Yayoi Kusama's immersive artworks? and how do these factors influence the emotional experience of Peter Kogler's immersive artworks? The methodology uses Twitter data to predict visitors' emotions toward immersive installation art based on their activity. Indicators, such as the total number of likes, comments, retweets, followers, followings, average tweets per user, and emotional response, are analyzed. Machine learning algorithms, including the Tree-based Pipeline Optimization Tool (TPOT) and Automated Machine Learning, are employed for this analysis. The findings reveal that the emotion of panic scored the highest among the emotions evaluated.[59] Traditional machine learning algorithms performed slightly better than TPOT Automated Machine Learning.

A notable correlation exists between user interactions (likes, comments, retweets) and the emotional response to the artworks. The study suggests that immersive installation artworks can elicit strong emotional reactions, which may contribute to their popularity on social media. These findings will stimulate future research in data analysis, cultural heritage management, marketing,

[58] Sofia Vlachou and Michail Panagopoulos, "Applying Machine Learning Methods to Quantify Emotional Experience in Installation Art," *Technoetic Arts: A Journal of Speculative Research* 21, no. 1 (January 2023): 53–72, doi:10.1386/tear_00097_1.

[59] Vlachou and Michail Panagopoulos, "Applying Machine Learning Methods," 62.

aesthetics, and cultural analytics. The study provides a comprehensive analysis of how machine learning can be applied to understand the emotional impact of installation art, using social media data as a key resource.

Tangible and embodied interactions with museum objects encourage visitors to engage more deeply with the exhibits. Interactive museum visitor studies, performed by Siyi Wang, addressed the following questions:[60]

- How do multi-senses influence the behaviors of museum visitors?
- What's the effect respectively of multi-senses on the visceral experience, cognitive experience, and emotional experience?
- What role do multi-senses play in the overall experience rate?

Liu, Zhou, and Liu delve into the profound impact of illustration design on emotions within immersive art, utilizing advanced deep learning techniques.[61] The authors emphasize the significance of hand-drawn illustrations in conveying emotions, underscoring their pivotal role in contemporary art. A critical component of immersive art is the projection mechanism, which integrates the artist's and audience's aesthetic orientations. This mechanism is instrumental in enhancing audience engagement and eliciting emotional responses. Several methods were leveraged to determine the effect of illustrations on emotions. They gathered data through questionnaires and interviews with participants to understand their emotional responses to different illustrations. By applying deep learning models, they could recognize and classify these

[60] Siyi Wang, "Museum as a Sensory Space: A Discussion of Communication Effect of Multi-Senses in Taizhou Museum," *Sustainability* 12, no. 7 (2020):6, https://www.mdpi.com/688052.

[61] Liu, Hongming Zhou, and Junwei Liu, "Deep Learning-Based Analysis," 3.

emotional responses based on the visual features of the illustrations. One key approach was emotional semantic analysis, where researchers extracted emotional semantic symbols from the illustrations and compared them with emotional semantic maps of extended materials. The mapping allowed the researchers to identify the emotional impact of various visual elements. Additionally, the study compared the effectiveness of deep learning and shallow learning methods in interpreting the emotional effects of illustrations, providing insights into the advantages of using deep learning for emotional analysis. The research also included cognitive experiments in the form of "healing" illustrations shown to participants, and the data collected from them was analyzed to learn about their emotional state. All the methods are used to identify how the different illustrations' designs impact people's feelings in the view of an art experience. The researchers provide recommendations for future research to improve the teaching material and illustration design strategies. The information provided in this paper, the use of deep learning algorithms, and the analysis of emotional semantics reinforce the key ideas and show how this cross-disciplinary strategy can be effective.

The study by Jumping Xu et al investigates the factors influencing user engagement and immersion in metaverse art exhibition platforms (MeAEP).[62] Researchers used the Information Systems Success Model (ISSM) and the Hedonic Motivation System Adoption Model (HMSAM) to construct a theoretical framework. They conducted an empirical study with 370 users who experienced MeAEP, using online questionnaires and analyzing the data with SPSS 27 and partial least squares structural equation modeling (PLS-SEM). The findings show that

[62] Junping Xu, Sixuan Liu, Wei Yang, Meichen Fang, and Younghwan Pan, "Beyond Reality: Exploring User Experiences in the Metaverse Art Exhibition Platform from an Integrated Perspective," *Electronics* 13, no. 6 (2024): NA, Gale Academic OneFile (accessed October 26, 2024), http://dx.doi.org/10.3390/electronics13061023.

information and system quality affect perceived usefulness, curiosity, joy, and control, positively affecting users' immersion and behavioral intentions. Administrators, developers, and designers can use critical insights to create higher-quality and more immersive art content, enhancing user experiences and ensuring the sustainability of art exhibitions.

There are numerous ways of measuring emotional experiences in the settings of immersive art. This is because emotions are complicated, and the very concept of art is evolving. The data collection methods used are qualitative and quantitative and include surveys, interviews, and state-of-the-art technologies. Researchers employed sophisticated deep learning models and emotional semantic analysis to identify the effects of various elements of immersive art on emotions. By doing so, the researchers can capture both the sensory and cognitive aspects of immersion, which can enrich the experience of art for the participants. Thus, applying such methodologies to my further research of the participants of the immersive art exhibitions will give a comprehensive approach to understanding and improving the experience of Immersive Art.

Cultural and Perception Implications of Immersion

The ethical and cultural implications of immersion, as explored by Ng and Grygny, highlight a delicate balance between virtual and real-world ecological connections.[63] While VR provides innovative ways to engage with nature and foster ecological awareness, it raises concerns about distancing individuals from authentic environmental experiences and

[63] Jenna Ng, "Virtual Reality: Confinement and Engulfment; Replacement and Re-Placement," in *The Post-Screen Through Virtual Reality, Holograms and Light Projections: Where Screen Boundaries Lie*, 107–54 (Amsterdam: Amsterdam University Press, 2021), https://doi.org/10.2307/j.ctv23985t6.7.; Grygny, "Shinrin-Yoku."

responsibilities. Cultural practices like *Shinrin-Yoku* are vital for cultivating ecological mindfulness by encouraging direct, meditative interactions with natural environments. The concept of "re-placing" reality through VR or embodied practices emphasizes the potential for building kinship with the natural world and fostering a sense of ecological responsibility. These considerations underline the importance of integrating immersive technologies with cultural wisdom to ensure meaningful, ethical engagement with our environment.

Art and virtual reality (VR) are powerful tools for fostering empathy, perspective shifts, and deeper understanding.[64] These media provide immersive and affective experiences, allowing individuals to engage with abstract or challenging environments that evoke emotional responses and spark curiosity. By inviting participants to interact with unfamiliar or thought-provoking representations, art and VR promote new pathways for meaning making, encouraging reflection and exploration of diverse perspectives. This transformative potential highlights how creative and immersive platforms can deepen human connections and enhance intellectual and emotional growth.

Theoretical Framework: Afrofuturism as Critical Methodology

Afrofuturism, as theorized by Alondra Nelson and Reynaldo Anderson, is not merely an aesthetic movement but a critical methodology that interrogates and reconfigures historical consciousness through speculative praxis.[65] Central to this approach is the disruption of linear temporality, a refusal to confine Black identity within Western historical progression, instead

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[64] Christensen, E. R. Cardillo, and A. Chatterjee, "Can Art Promote Understanding?"; Ng, "Virtual Reality."

[65] Alondra Nelson, "Afrofuturism and the Reimagining of Black Futures," *Social Text* 37, no. 2 (2019): 91–104; Reynaldo Anderson, *Afrofuturism 3.0 and the Black Speculative Arts Movement* (Lexington Books, 2019).

privileging cyclical, interconnected modes of time that foreground resilience and renewal.[66] Within immersive exhibition design, this methodology manifests as environments that invite visitors to navigate fluid temporalities, where narrative, technology, and embodiment coalesce to provoke empathy, reflection, and transformation.[67] Maggie Stogner's concept of "experiential immersion," mentioned earlier, situates the visitor as an active participant in meaning-making, dissolving the boundaries between observer and artifact.[68] This participatory logic is further enriched by hermeneutic fusion, drawing on Hans-Georg Gadamer's notion of the "fusion of horizons," wherein interpretation arises through embodied dialogue between viewer, object, and space.[69] Within this framework, Afrofuturist exhibition practice serves as a site of epistemological transformation, cultivating new possibilities for cultural understanding and liberation.

Methodologies for Immersive Experiences

Immersive art experiences have changed how viewers receive and comprehend artworks. While traditional art is mainly engaged in a passive way, immersive art, on the other hand, engages the audience and is sensory-based, thus making the viewer a part of the art piece. Therefore, to discuss immersive art, this paper will review two methodologies: hermeneutics and reception theory. This paper will apply the two methodologies to two immersive art experiences selected because of their cultural and Afrofuturism elements: *Ase: Afro Frequencies* and *The Horizon of Khufu*. By analyzing these exhibits through hermeneutics and reception lenses, we

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[66] Wright, Physics of Blackness.
[67] Stogner, "The Immersive Cultural Museum Experience."
[68] Stogner, "The Immersive Cultural Museum Experience," 121.
[69] Hans-Georg Gadamer, *Truth and Method*, 2nd rev. ed., trans. Joel Weinsheimer and Donald G. Marshall (London: Continuum, 2004), PDF file, https://web.mit.edu/kaclark/www/gadamer_truth_and_method.pdf.

will uncover how immersive art transforms the viewer's role, creating a dynamic interplay between the artwork and the audience that reshapes the processes of interpretation and reception. This exploration will highlight the need for a nuanced understanding of immersive art that fully acknowledges its unique ability to engage and impact viewers on multiple levels.

Although Hermeneutics and Reception Theory are helpful approaches to understanding traditional art, they must be modified to analyze immersive art, requiring more sensory and interactive involvement. Immersive art makes the viewer a proactive subject and thus alters the relationship between the artwork and the spectator in a way that affects the very processes of interpretation and reception.

Reception Theory

Christopher Wood analyzes E. H. Gombrich's thoughts on pictorial representation.[70] In the paper titled "Art and Illusion," Gombrich explains the process of painting by artists and the reception of the painting by the viewers. He stated that artists do not copy what they see, but rather, complete it with the help of already existing patterns or schemata[71]. The artists always check their works against real objects and improve them over time, thus participating in the art history, which is developed by each generation based on the previous one. He also discusses the concept of illusion and reality in art, where he discusses how art is an ability to paint life-like images that make one think about the process of seeing. This comprehensive analysis thus underlines the interdependence between production and the interpretation of art.

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[70] Christopher S. Wood, "E.H. Gombrich's 'Art and Illusion: A Study in the Psychology of Pictorial Representation', 1960," *The Burlington Magazine* 151, no. 1281 (2009): 836–39, http://www.jstor.org/stable/40601264.

[71] Wood, "E.H. Gimbrich's," 836.

According to Gombrich, the role of viewers in understanding art is vital and shows the dependence of the artwork on the audience. He notes that interpretation is an essential part of viewing art. Others view a work of art and relate it with other images they have encountered. This interprets art instead as a subjective process, as the unique worldview of an individual will shape it. Gombrich also emphasizes the viewers' comparison with reality when they receive art. This entails the viewer's ability to compare the artwork with his or her perception of reality. Through this interaction, the viewers can understand the artwork and give it meaning, which enhances their experience. He stresses the importance of cognitive engagement when it comes to experiencing art. The viewers not only read paintings; they respond to them, think about them, and reflect on them in the light of their knowledge and world experience. This way, the viewers can engage with art more complexly and purposefully. Their interaction with the art object becomes essential to understanding art. Gombrich's insights show that viewing is as much a process of interpretation and construction as it is a process of viewing the artwork. This perspective indicates that the art viewing process is not a black-and-white one. Rudolf Arnheim explored the perception of visuals, believed vision and thought are one process, and argued that the expression of art is a form of reason.[72]

Another side of the reception theory is the reader response. In literature, "the world of the author" interacts with "the world of the text," which interacts with "the world of the reader," which interacts back to "the world of the author" to complete the circle. For art, replace text with art, author with artist, and reader with viewer. [73] Another aspect of that theory that can be

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[72] Anne D'Alleva, *Methods and Theories of Art History: Second Edition* (London: Laurence King Publishing, 2005), 108-109. https://doi.org/10.2307/j.ctv20pxz5d.8.

[73] D'Alleva, *Methods and Theories,* 110.

applied to art is the "form of address," which translates to the "focalizer" in art. The function is to direct the viewer's attention to a location. [74]

Artworks can have varied receptions, even in their original contexts, and accumulate different meanings over time. Sam Rose highlights this by stating that "artworks may have a greatly mixed reception even in their 'original' context."[75] Scholars often use reception histories to reconstruct how artworks were perceived at the time of their creation, rather than fully exploring their later receptions.[76] Rose notes, "Reception histories are used quite differently from how we tend to think of them." There are three overlapping modes of emphasizing the origin of reception. The first mode is Recorded Reception as Origin, which involves using historical accounts of reception to interpret artworks, as seen in the examples of Manet's *Olympia* and Seurat's *A Sunday on La Grande Jatte*. The second mode is Visual Practices as Origin, which focuses on viewers' perceptual and cognitive habits at the time, as discussed in Baxandall's work. The third mode is Depth Reception as Origin, which treats recorded reception with suspicion and seeks deeper truths about the original work through various interpretations, as illustrated by the analyses of Manet by T.J. Clark and Michael Fried. Proper attention to reception as an afterlife is rare, and artworks transform over time and have numerous histories, and their life crosses several temporal zones.[77] Furthermore, artworks can reflect global connections and cultural encounters.[78] The three overlapping reception modes provide essential tools to study how immersive art and nature and Afrofuturism develop cultural awareness and

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[74] D'Alleva, *Methods and Theories,* 112.

[75] Sam Rose, "Reception," in *Interpreting Art*, 53 (UCL Press, 2022), https://doi.org/10.2307/j.ctv20pxz5d.8.

[76] Rose, "Reception," 55.

[77] Rose, "Reception," 66.

[78] Rose, "Reception," 68.

wellness. These frameworks establish the historical and current audience interactions with immersive artistic experiences that use multisensory and speculative elements.

Exploring the intricate web of global connections and cultural encounters is particularly relevant when delving into Immersive Art, which often traverses various locations and includes collaborations. Artwork reflects the interconnectedness of diverse cultures and societies, emphasizing the significance of these historical ties in fostering new artistic expressions. As they journey through different times and places, the mobility of artworks transforms their meaning and significance for those who engage with them, offering a broader understanding of art history. Additionally, some artworks, termed hybrid objects, are crafted from materials and skills spanning multiple traditions, showcasing a blend of cultural influences. An example is an eighteenth-century St. Michael the Archangel, carved by a Chinese immigrant in Manila using African ivory and Flemish artistic models. Artworks also undergo physical changes over time, being altered or recreated, contributing to their historical narrative and including new originals, such as Roman portrait marbles being ecurved for new subjects. In the context of increasing attention to transnationalism and the global turn, exploring how global connections and cultural encounters shape new artistic forms and practices is crucial. This dynamic interplay between artworks and their cultural contexts underscores the importance of global connections in art history.

Hermeneutics

Hermeneutic explores meaning discovery through experience and insight instead of theoretical frameworks and methods.[79] The approach emphasizes historical context because meanings exist as time-bound entities which change according to historical periods. The approach states that all understanding begins with pre-understanding while interpretation follows a circular dialogical process that involves continuous interaction between the investigator and the subject of investigation. The interpreter works from their personal interpretive "horizon" while interpretation results in a "fusion of horizons" through dialogical encounters. The hermeneutic circle functions as the core concept that explains how interpretation works through the ongoing relationship between individual components and the complete structure.

Gadamer's hermeneutics critiques the idea of objectivity in understanding texts, historical events, or cultural phenomena.[80] Gadamer's approach to hermeneutics emphasizes that understanding is influenced by historical context and prejudgments, suggesting that there is no single correct interpretation of such phenomena.

Postcolonial hermeneutics provides an interpretive framework that studies cultural interactions through historical examination of indigenous peoples while analyzing power dynamics and neocolonial structures that affect cultural understanding and cooperation.[81] The framework emphasizes the ongoing interaction between past and present through cultural memory and identity. The research process requires shared experiences between researchers and subjects for interpretation because it operates through dialogical and intersubjective methods

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[79] Maarten E.R.G.N. Jansen and Gabina Aurora Pérez Jiménez, "Post Colonial Hermeneutics," in *The Mixtec Pictorial Manuscripts: Time, Agency and Memory in Ancient Mexico*, 184 (Brill, 2011), http://www.jstor.org/stable/10.1163/j.ctv2gjwvxj.9.

[80] David Weberman, "A New Defense of Gadamer's Hermeneutics," *Philosophy and Phenomenological Research* 60, no. 1 (2000): 45–65, https://doi.org/10.2307/2653427.

[81] Jansen and Jiménez,"Post Colonial," 215.

instead of objective detachment.[82] The method achieves emancipation and reconciliation by analyzing intercultural relationships and recognizing past traumas and injustices. [83] The approach supports ethical research by promoting indigenous people's interpretation of their own cultures while fighting against outsider dominance of cultural narratives.[84] Postcolonial hermeneutics combines cultural historical analysis with modern social relationships to establish equitable and respectful interactions with historical artifacts.[85]

There has been an increasing awareness that current art historical theory requires alteration to deal with native and Afro-Brazilian art.[86] Art historians often approach non-European art through traditional methodologies focused on finished, stable objects. Many indigenous and Afro-Brazilian cultures create performative, ephemeral, and nonrepresentational art that must fit neatly into conventional frameworks. This inadequacy in existing art historical theory has led to a significant lack of scholarship on these art forms, as they are frequently excluded from mainstream narratives. Additionally, complex interactions between African and European traditions in Brazil have not been thoroughly explored. This neglect perpetuates the invisibility of African descendants' contributions to Brazilian art. The use of chronological framing has further restricted the recognition of Native and Afro-Brazilian art to the past, overlooking their ongoing relevance and contributions in the present. Mattos advocates for developing synchronic models that allow cultural diversity to coexist within art historical narratives, rather than confining them to a linear historical framework. Referring to

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[82] Jansen and Jiménez,"Post Colonial," 201.
[83] Jansen and Jiménez,"Post Colonial," 215.
[84] Jansen and Jiménez,"Post Colonial," 216.
[85] Jansen and Jiménez,"Post Colonial," 215.
[86] Claudia Mattos, "Whither Art History?: Geography, Art Theory, and New Perspectives for an Inclusive Art History," *The Art Bulletin* 96, no. 3 (2014): 261, http://www.jstor.org/stable/43188880.

anthropology and contemporary art, for instance, it is possible to find new ways and strategies of approaching such traditions.[87] In this way, it is possible to break with the conventional articulation of art history to propose new ways of writing art history that can better reflect the plurality of artistic practices. Mattos reflects on the necessity of critically rethinking the role of chronology in art history. This is to move from a linear historical paradigm to a syncretistic model that will consider Native and Afro-Brazilian art as still relevant today. This is important to produce a more correct and comprehensive account of art history that would do justice to the continuity of these traditions.

The traditional emphasis on permanent objects does not capture the performative and ephemeral and multisensory aspects of immersive art and cultural storytelling, which requires a synchronic approach to understand their impact on wellness and cultural awareness. Mattos' theory supports the shift from linear historical framing which aligns with Afrofuturism's opposition to traditional historical narratives. Afrofuturism fights against fixed colonial time interpretations by uniting historical moments with present-day experiences and projected future visions to restore Black identity. The syncretistic model proposed by Mattos matches his approach to view Native and Afro-Brazilian art as an ongoing living tradition instead of static historical artifacts

Mattos's methodological approach, which combines anthropology with contemporary art strategies, provides an appropriate framework for analyzing immersive experiences. The nature of immersive art requires assessment through methods that go beyond traditional historical models because it depends on physical interaction, spatial awareness, and sensory perception.

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[87] Mattos, “Whither Art History?” 262.

Synchronic methodologies enable researchers to study how cultural narratives interact with sensory environments and embodied experiences to form audience reception.

Applying Methodology to Immersive Experiences

Immersive media creates a compelling experience by enveloping viewers in a seamless and continuous space, making them feel as if they are indeed "inside the image."[88] This profound sense of immersion is brought to life through the clever use of color, the illusion of depth, and the integration of multiple sensory inputs, including sound. These elements work together to create environments where spectators intensely engage with their surroundings, often feeling like they are inhabiting another person or place.[89] One of the fascinating aspects of immersive media is how it makes spectators "forget" the boundaries of the screen. This means viewers lose awareness of the physical screen, allowing them to connect more deeply with the content.[90] Immersion has two main aspects: confinement, which limits the visual field, and engulfment, which surrounds the viewer with large screens. Overall, immersive media dramatically transforms how spectators perceive and interact with visual environments, creating a more engaging and emotionally impactful experience.

Virtual immersive experiences, like those created by artists such as Char Davies in her work *Osmose*, make the user feel like they are in a dream or a trance setting.[91] Char Davies

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[88] Jenna Ng, "Virtual Reality: Confinement and Engulfment; Replacement and Re-Placement," in *The Post-Screen Through Virtual Reality, Holograms and Light Projections: Where Screen Boundaries Lie*, 107 (Amsterdam University Press, 2021), https://doi.org/10.2307/j.ctv23985t6.7.

[89] Ng, "Virtual Reality," 115.

[90] Ng, "Virtual Reality," 113.

[91] Stephen Jones, "Towards a Philosophy of Virtual Reality: Issues Implicit in 'Consciousness Reframed,'" *Leonardo* 33, no. 2 (2000): 125, http://www.jstor.org/stable/1576846.

developed experience in 1995 to study the relationship between personal identity and environmental surroundings.[92] The artwork employs 3D computer graphics with interactive sound and real-time motion tracking of breathing and balance through a head-mounted display. The "immersants" explore virtual spaces, which draw inspiration from natural environments, alongside abstract domains like "Code" and "Text." The experience starts in a Cartesian grid, transforming into a forest clearing when the immersant breathes. The visual presentation combines semi-representational elements with translucency to create evocative effects, instead of direct illustrations, and the audio environment adapts to the immersant's physical actions. The majority of participants experience deep emotional reactions which lead them to rediscover their bond with themselves and their environment. The system achieves Davies' objectives by crossing machine-human boundaries and developing awareness of embodied consciousness. This immersion can harmonize the sense of vision with the sense of hearing, thus achieving the unity of the aesthetic and radical experience that opens another world for exploration and reflection.[93] The experience of immersion in Virtual Reality (VR) is described as smooth and multi-faceted, and the user's view is dynamic, which means that the user's actions influence the uncovering of the new aspects of the virtual environment.[94] It also raises some issues as to what constitutes immersion. Using examples from dreaming and shamanism, it suggests that VR can create similar sensations of being out of physical space.[95] In particular, VR art is viewed as creating new meanings for the viewer and transforming passive art consumption into an active one.[96]

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[92] Digital Art Archive, "Osmose by Char Davies," accessed April 24, 2025, https://digitalartarchive.at/database/work/79/.

[93] Jones, "Towards a Philosophy of Virtual Reality," 130.

[94] Jones, "Towards a Philosophy of Virtual Reality," 129.

[95] Jones, "Towards a Philosophy of Virtual Reality," 126.

[96] Jones, "Towards a Philosophy of Virtual Reality," 129.

The initial immersive experience I will leverage to show how to apply methodology is a VR experience *The Horizon of Khufu NYC*, located at 555 West 57th Street, NY, New York 10019. The visitors are taken to ancient Egypt and, more specifically, to the time of Pharaoh Khufu and the Great Pyramid of Giza. This experience was developed by Excursion Immersive Expeditions and Egyptologist Peter Der Manuelian from the Giza Archives Project at Harvard University and is meant to recreate a realistic image of ancient Egyptian culture. The visitors are provided with VR headsets and backpacks, and they are taken to the Giza Plateau, where they experience the Great Pyramid's chambers and tunnels. Some of the activities are witnessing a mummification ceremony, riding on a boat to the funeral, attending the funeral of King Khufu, exploring secret corridors inside the pyramid, and standing outside towards the top. It aims to make a good part of the Giza Plateau easily accessible and open up a treasure trove of history for everyone to discover. I experienced this immersion with my son, and we both went to the physical locations we visited during the immersion, excluding standing outside the pyramid near the top!

"The Horizon of Khufu" provides an engaging and informative experience that takes the participant through architecture, science, and history to provide an insight into the ancient Egyptian world. The concept of the "focalizer" can be applied to this VR immersive art experience. In the traditional narrative theory, a focalizer is the character or the narrator who tells the story. This idea can also be applied to VR immersive art installations, in which the focalizer is not only a viewer but also a part of the piece. In VR, the user is the focalizer. The VR environment is experienced unmediated, that is, through their eyes, which makes a point of view of the former central to the experience. This transition from objective viewing to subjective experiencing changes the role of the consumer into that of the artwork. During the viewing

process in VR, the viewer's actions with the environment construct the plot and the experience. This interactivity enables the viewer to move around and alter the virtual environment and, thus, have a unique and tailored experience. The idea of the focalizer increases the feeling of being immersed in VR as it makes the viewer feel as if they are inside the artwork. Since the viewer is not a focalizer, VR aims to elicit compassion, recreate and or represent better historical understanding of occurrences of or the cultural topic and practices. For instance, the viewer gets an art experience firsthand with art that may result in a stronger emotional and psychological response. In general, the focalizer in VR immersive art shows how VR can generate unique, engaging, and interactive art pieces that can be experienced individually. This moves from viewing the art object to interacting with it, changing the interaction between art and the public.

However, when an avatar guide is included in an immersive experience, as in the *Horizon of Khufu*, the role of the focalizer changes, and the viewer is also engaged directly. Still, on the level of shared vision, an avatar guide provides background information, suggestions, and narrative aspects to improve the experience and thus make the viewer feel more involved in the virtual space. As with *Horizon of Khufu*, the avatar guide makes the narrative more elaborate through explanations, storytelling, and interactions that the viewer may not have been able to capture on his or her own. The guide also shows the visitor where to walk for those sensitive to heights and where to go to catch up with the group. This results in a more coherent and compelling tale, making the experience more vivid and interesting. With an avatar guide, the viewer's examination is more deliberate. The guide takes the viewer to some areas of space, points out pertinent information, and, in doing so, ensures that the viewer has a more purposeful experience within the VR space. This enhances the viewers' understanding of the content. Also, the avatar guide increases the viewers' emotional connection with the experience. With a

relatable and interactive character, the guide elicits feelings such as empathy, curiosity, and companionship, thus making the experience more realistic. The viewer can choose to engage actively and explore on his or her own or follow along passively. Although the viewer can still move around and look at different objects, the avatar guide can step in occasionally to ensure that critical narrative aspects are well captured. This approach makes the experience more effective from an educational standpoint, and therefore, the focalizer's experience is more engaging. Including an avatar guide provides a new level of interactivity to the experience, which increases the focalizer's narrative experience through extended narratives, guided interactions, and emotional arousal. This combination results in a more comprehensive and effective VR experience.

The reception theory provides tools to study audience interpretation and contextual influences which can be used to analyze how viewers experience *The Horizon of Khufu NYC* virtual reality installation. The experience lets visitors discover Ancient Egypt while their backgrounds determine their understanding of historical value and modern technological advancements. The location of New York City affects reception because the city's diverse and technologically advanced cultural environment enhances the relationship between ancient architecture and VR technology, creating a distinctive perspective. The interactive nature of the exhibit lets visitors create their path, which results in unique and personalized engagement for each visitor. The exhibition demonstrates reception theory through its dynamic combination of historical content, technological immersion, and interactive elements.

The relational theory of interactive narrative formation framework seeks to contribute to the understanding of how interactive narratives are composed of episodic events that are

polychronic, turn transcriptive, influenced, and co-evolutionary.[97] The framework identifies three functions of interactivity: the narratives and how this can enhance the knowledge of how narratives are created and received in digital media. The relational theory recognizes the role of different subjects in producing interactive narratives. When using this framework to analyze *The Horizon of Khufu*, episodic events are incorporated into the design of the experience to make the visitor engage with the experience as if they were in the ancient Egyptian era. Polychronic elements enable the users to navigate through different periods of ancient Egypt, while transcriptive elements help the users engage with a narrative sequence in the virtual space. Co-evolutionary elements allow real-time interaction with the environment and other users.

Global connections and cultural encounters were mentioned earlier as an area applicable for Immersive Arts. Immersive art pulls the viewer in and makes them feel like they are a part of the experience, rather than just a distant observer.[98] It's designed to be felt emotionally and is only alive if people engage with it. Think of it as turning galleries into theaters, where the audience plays a central role in bringing the artwork to life, rather than just looking at static pieces on display. This kind of art changes how we experience art, making them more interactive and engaging.

The Ase: Afro Frequencies, an art installation created by Vance Fraser, displayed at ARTECHOUSE, is an example of Afrocentricity and Afrofuturism. It is a case study showing how the exhibition moved and changed based on the location. Starting with background

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[97] Neil C.M. Brown, Timothy S. Barker, and Dennis Del Favero, "Performing Digital Aesthetics: The Framework for a Theory of the Formation of Interactive Narratives," *Leonardo* 44, no. 3 (2011): 212–29, http://www.jstor.org/stable/20869452.

[98] Christina Grammatikopoulou, "Breathing Art: Art as an Encompassing and Participatory Experience," in *Museums in a Digital Culture*, ed. Chiel van den Akker and Susan Legêne (Amsterdam University Press, 2016), 42, http://www.jstor.org/stable/j.ctt1s475tm.6.

information on the venue, the ARTECHOUSE is identified as a creative nonprofit that focuses on the intersection of art and technology.[99] It has physical exhibition spaces in Washington, Miami (now closed), New York, and Houston. In the summer of 2019, ARTECHOUSE converted the basement of New York's Chelsea Market into an art show for its first exhibition. This exhibition included a piece of art titled *Machine Hallucination* by artist Refik Anadol.[100] The projection covered almost an entire room and used artificial intelligence to create images related to specific sounds. Anadol created a multidimensional data universe of New York City, crafted using machine learning algorithms. This intricate creation involves analyzing over 100 million publicly available photographic memories of the city sourced from social networks, resulting in a fascinating representation composed of 1025 latent dimensions.

Some changes were made when the exhibit was moved from Washington, DC, to New York City to suit the new location and audience better. The Washington DC version of the exhibit was based on visuals and poetry that told the Black story with Fraser and the poet Ursula Rucker. The exhibit was based on identity, power, and belonging, where the artist used film, technology, Afro-surrealism, and poetry to create an immersive experience. When the exhibit was transported to New York City, it was re-installed with new videos and digital art to address the cultural setting of the city specifically. The exhibit's main piece was *The Vision of the Black Experience*, which led the visitors through the concepts of strength, pride, and hope for the future. The New York version also used enormous seamless megapixel count projections and Hyperreal Sound to improve immersion. It also had another feature: Philadelphia poet and

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[99] Joel McKim, "Deep Learning the City: The Spatial Imaginaries of AI," in *Seeing the City Digitally: Processing Urban Space and Time*, ed. Gillian Rose (Amsterdam University Press, 2022), 35, https://doi.org/10.2307/j.ctv2j6xrs3.5.

[100] Refik Anadol Studio, "Machine Hallucination," YouTube video, 5:36 minutes, Oct 6, 2020, https://www.youtube.com/watch?v=x1EVhNM-uf4.

musician Ursula Rucker performed live. The poet added another level of meaning and feelings to the exhibit as her words of empowerment, ancestry, and social justice influenced the audience. This one-night-only event included exhibition admission, a live performance by Rucker, and a unique cocktail, which made the event in New York an even more exciting exhibit for the attendees. The exhibit was adjusted in New York to suit the city's audience and the venue's technical potential. The changes made to the exhibit when moving from Washington, DC to New York City demonstrate a key principle of reception theory. A key tenet in reception theory is how the audience's interpretation of art is shaped by its environment and setting. For example, the updates in visuals, digital art, and live performances were designed to fit the specific cultural and social landscape of New York City, recontextualizing the themes of Afrocentricity and Afrofuturism to speak more directly to the new audience. The inclusion of Ursula Rucker's live performance added an extra layer of intensity and emotional impact, showing how different media and formats can change the way we receive and interpret art.

To further analyze the artwork in ARTECHOUSE's Ase: Afro Frequencies, I will use hermeneutics, the theory and practice of interpretation, to understand the work's meaning and the context in which it was produced. Hermeneutics is the theory and interpretation process that aids me in deciphering the deeper meanings behind the exhibit focused on the Afrocentricity and Afrofuturism paradigm through images and poems.

Tapping into the hermeneutic perspective, spectators can examine how the exhibit presents the aspects of identity, power, and belonging. This entails evaluating the relationship between the images, the words, and the story the exhibit tells. According to the principle of the hermeneutic circle, it is understood that the interaction takes place between the reader and the text. Thus, when the viewers watch the exhibit, they come with their historical, cultural, and

personal experience, which allows them to interpret the exhibit in a new way. Also, Hans-Georg Gadamer's idea of the “fusion of horizons” is applicable in this case. This concept can be explained as the process whereby the reader’s understanding of the work is developed further with the help of the work. For instance, in the case of Ase: Afro Frequencies, viewers can appreciate the cultural and historical significance of the exhibit if they pay close attention to it. Thus, engaging with the exhibit’s themes of Afrocentricity and Afrofuturism, one can find several meanings. First, the exhibit represents the achievements of Afro-descendant people. Spectators are aware of a feeling of historical pride in the present day and endeavor to connect with African culture through visuals and sound, making the viewers understand the value of embracing one’s culture. This is because the exhibit is on empowerment and self-affirmation. As such, it will make the viewers think about their experiences of empowerment and the value of self-esteem and freedom in the face of oppression. Thus, including Afrofuturism allows the exhibit to create ideas for the future where black culture and technology combine in innovative ways to provoke discussion on how society may change or create new technologies. When applying hermeneutics to the *Ase: Afro Frequencies* exhibit, the audience can have a purposeful and beneficial experience and understand the multiple levels of the artwork’s significance.

In conclusion, it has been shown in this paper that hermeneutics and reception theory can be effectively used when analyzing immersive art experiences, such as the case of “Ase: Afro Frequencies” and “The Horizon of Khufu.” Applying these methodologies has revealed how immersive art can change the viewer's role and position and the interaction between the artwork and the spectator. Immersive artworks are based on the senses and involve the participant, breaking the conventional reception and interpretation methods. The interaction between the

artwork and the viewer is complex and compelling, underlining the need to develop a new approach to analyzing art.

The Next Narrative: An Immersive Journey Through Black Time

Building on these insights into immersive art and the theoretical frameworks that shape our understanding, it becomes essential to explore how these concepts manifest in contemporary practice. This leads us to examine *The Next Narrative: An Immersive Journey Through Black Time*, a project that synthesizes the research and methodologies discussed in this paper into a lived, multisensory experience.

The immersive art exhibition features multiple salons as a tribute to the Harlem Renaissance salons. The exhibition design will be completed leveraging the FRACH framework and will be included in the thesis in the fall.[101] A preview of the metaverse aspects of the exhibition took place during the Khem Fest in Newark, NJ, on September 27, 2025. The extension of metaverse elements and the introduction of in-person elements were presented during Newark Arts Week in October as part of the Joy Nexus exhibition curated by me.[102] Thanks to an artist fellowship grant from the Catalyst Fund by the City of Newark, the exhibition will include community activations into 2026.

The Next Narrative: An Immersive Journey Through Black Time utilizes visual art, soundscapes, and tactile elements to engage participants while promoting mindfulness, emotional

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[101] Yuxuan Qi and Yixuan Wang, "A Framework for Designing, Developing, and Evaluating Immersive and Collaborative Interactive Exhibitions in Cultural Heritage," *Cognitive Science & Interactive Art Systems* 1, no. 1 (2025): https://doi.org/10.37420/J.csias.2025.002.

[102] Jojo Abenaavi Wright, curator, *The Joy Nexus: Films, Music, Play, & Collective Storytelling*, Newark Arts Festival, Mentor Newark, Newark, NJ, October 9–10, 2025. https://newarkartsfestival.com/event/the-joy-nexus-films-music-play-collective-storytelling-1/

resilience, and deep presence. The Afrofuturist aesthetic and nature-based symbolism create a culturally meaningful healing experience that specifically serves Black communities and the African diaspora. The exhibition design reflects how immersive art therapy works to restore embodiment and serve as an emotional trigger for shared reflection spaces about societal challenges. The experience incorporates traditional African art elements, which traditionally served spiritual and psychological healing purposes, to create a connection with this rich cultural heritage of art-based healing. The wellness sector will benefit from this exhibition as it establishes a pioneering model that combines art with culture and sensory engagement to achieve holistic mental and emotional wellness. The content for the exhibition is created by me as well as other artists in the community.

Joy Nexus **exhibition**

The Joy Nexus exhibition, showcased during the Newark Arts Festival 2025, brought to life the central inquiry of this thesis: how immersive art, nature, and Afrofuturism converge to foster wellness, cultural consciousness, and transformative storytelling for the African diaspora. Notably, Joy Nexus seamlessly integrated key elements from The Next Narrative: An Immersive Journey Through Black Time, including its multisensory approach, use of visual art, soundscapes, and tactile experiences. The exhibition's hybrid design, melding physical installations with virtual reality spaces, enabled participants to engage deeply with the Afrofuturist aesthetic and nature-based symbolism that are foundational to The Next Narrative. In this way, Joy Nexus not only embodied the theoretical frameworks of experiential immersion, reception theory, and postcolonial hermeneutics detailed in this research, but also extended the lived experience and community-focused healing practices pioneered in The Next Narrative, offering a holistic and culturally resonant environment for reflection and joy.

The exhibition was structured as a multi-room experience, with each salon representing a distinct temporal and emotional dimension of Black time. This spatial sequencing reflected the FRACH emphasis on embodied navigation and narrative progression. Visitors moved through curated environments that combined visual art, soundscapes, and tactile elements to evoke memory, joy, and reflection. The integration of nature, through botanical imagery and ambient forest sounds, served both symbolic and therapeutic functions, reinforcing the FRACH model's commitment to cultural healing through sensory immersion.

Virtual Gallery

Spatial modularity was a defining feature, with the gallery organized into distinct zones: the Virtual Gallery, Music and Vinyl, Virtual Reality, Joy Board, Collaboration Area, and Storytelling Room.

Upon entry, participants into *Joy Nexus,* the participants could choose to enter to view the Virtual Gallery in Virtual Reality or on a large flat screen.[103] Upon entering the virtual gallery, participants are immediately immersed in a multisensory environment. As shown in Figure 1, dynamic soundscape, paired with video footage of cascading waterfalls, surrounds visitors,

[103] Jojo Abenaavi Wright, "Abenaavi Arts 3D," *Abenaavi.com*, accessed October 17, 2025, https://abenaavi.com/abenaavi-arts-3d.

setting a tranquil yet energizing tone.

Figure 1 Visitors encounter the waterfall footage in the virtual gallery, curated by the author, upon entering. Video captured by author. https://abenaavi.com/abenaavi-arts-3d

As they move forward, they encounter the Joy Nexus flyer, prominently displayed, and above it, an animation of an Afrofuturist figure adorned with an ankh shown in Figure 2. This figure spins and raises energy, with synchronized sound effects that invite participants to cross the threshold into the heart of the exhibition.

Figure 2 The Joy Nexus flyer and the Afrofuturistic Animation generated with Microsoft Copilot, Pollo.ai, and Adobe Firefly by author. , Virtual gallery curated by the author. https://abenaavi.com/abenaavi-arts-3d

In the next section, visitors engage with one of three interviews, each exploring how the featured artist's work relates to the theme of Power. Progressing further, participants encounter another animation, this time, water elements and ethereal sounds evoke a mythical forest,

deepening the sense of immersion captured in Figure 3.

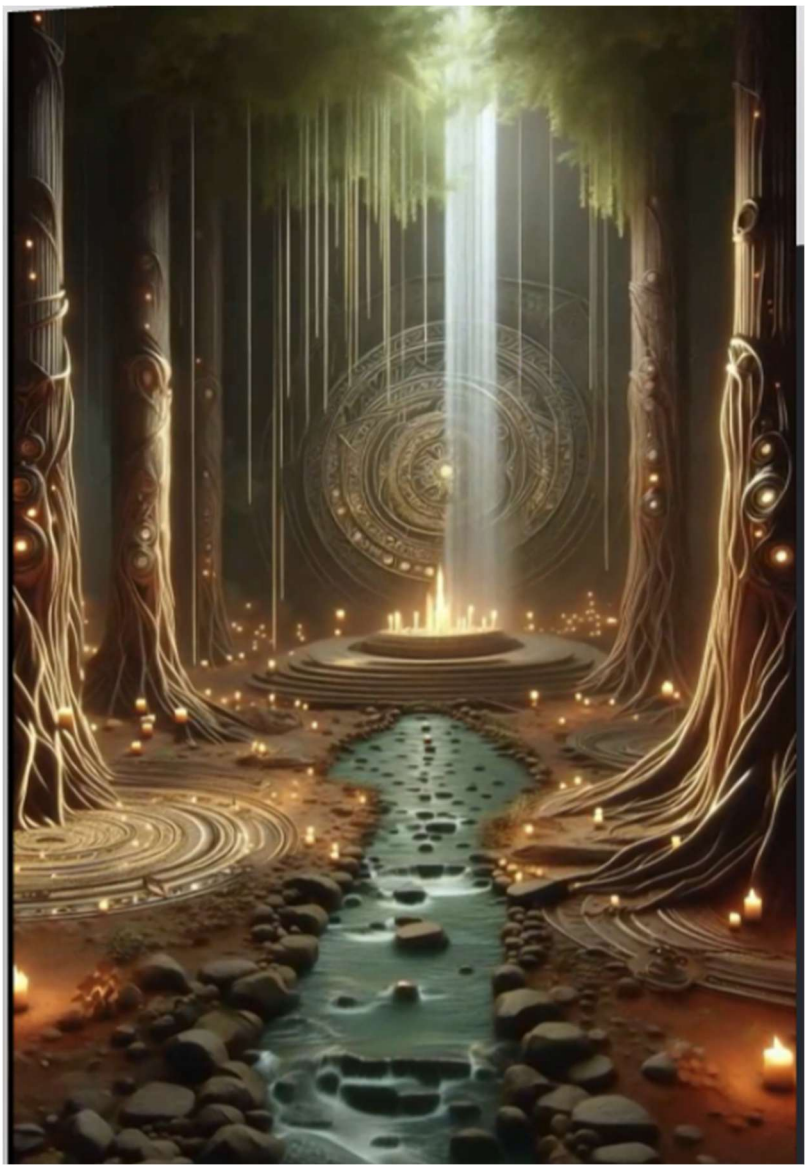

Figure 3 Mystic forest with water flow contained in the virtual gallery curated by the author and generated with Microsoft Copilot, Pollo.ai, and Adobe Firefly by Author.

Adjacent to this are multimedia installations completed by Julia Kito Kirtley, as shown in Figure 4: videos capturing movement, music, and the infusion of these elements into painting, creating a vibrant tapestry of artistic expression. An interview with Kirtley is present that delves further into the concept of Power.

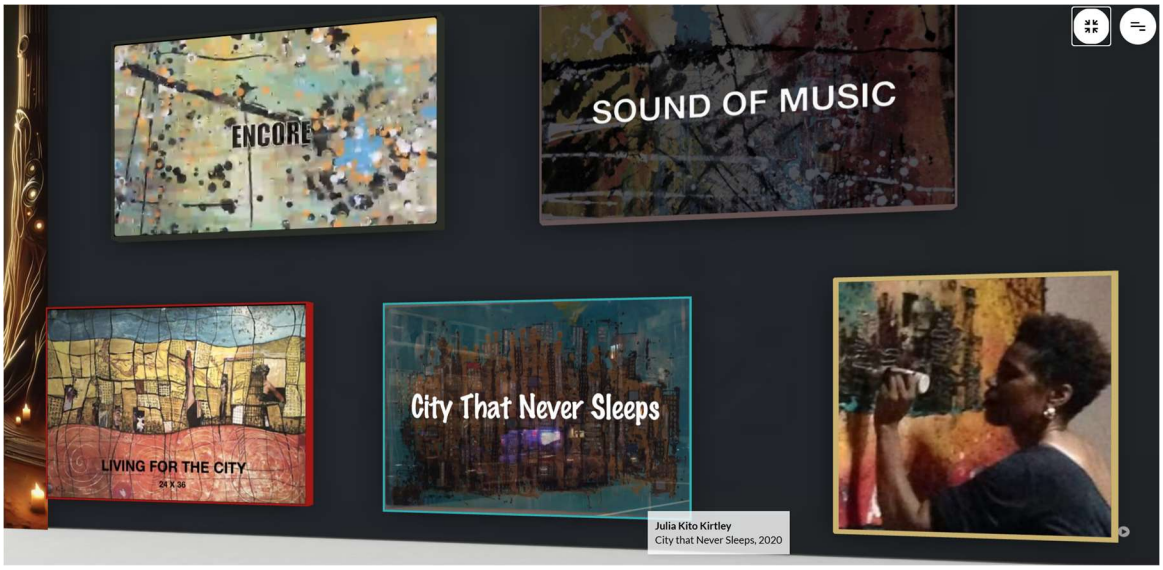

Figure 4 Multiple multimedia art pieces created by Julia Kita Kirtley as well as her interview about power, contained in the virtual gallery, curated by Jojo Abenaavi Wright.

A subsequent animation presents an Afrofuturistic figure with a turning ankh, accompanied by a unique unlocking sound, symbolizing the release of creative power through art and house music. The familiar water animation reappears, guiding visitors into a section dedicated to Newark's underground house culture, with photographs by Angola. These images capture moments of pure joy, participants with open mouths in laughter, eyes closed in ecstasy, and arms reaching skyward during house sessions as shown in Figure 5 and Figure 6.

Figure 5 Angola, Library House Sessions, Newark Public Library, 2019, contained in the virtual gallery, curated by Jojo Abenaavi Wright

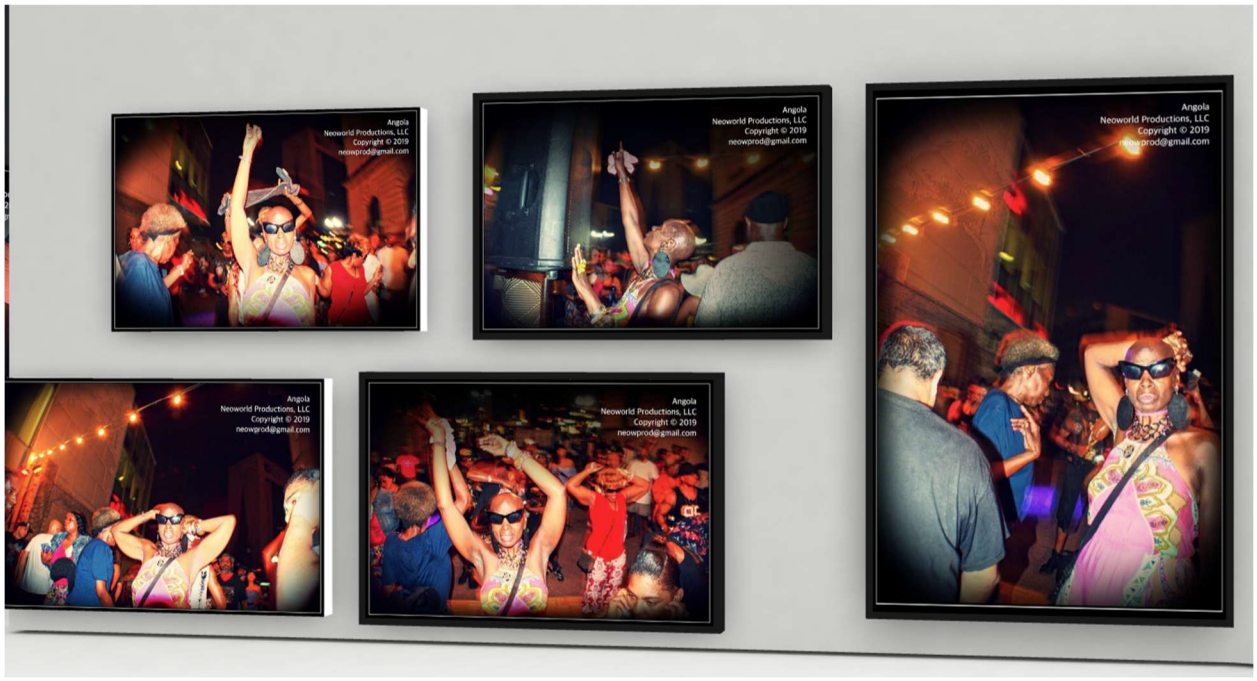

Figure 6 Angola, Library House Sessions, Newark Public Library, 2019, contained in the virtual gallery, curated by Jojo Abenaavi Wright.

Moving to the central area of the virtual gallery, visitors encounter DJ Eddie Sol's logo and a house music mix, alongside a documentary produced by DJ Eddie Sol, Jihad Muhammad, and DJ Beloved. The next section transitions into the world of underground skate culture,

showcasing generations of Black skaters in Newark. Figure 7 and 8 show photos and videos from the gallery that highlight diverse skating styles, trains, trios, partner skating, and figure eight, celebrating community and movement.

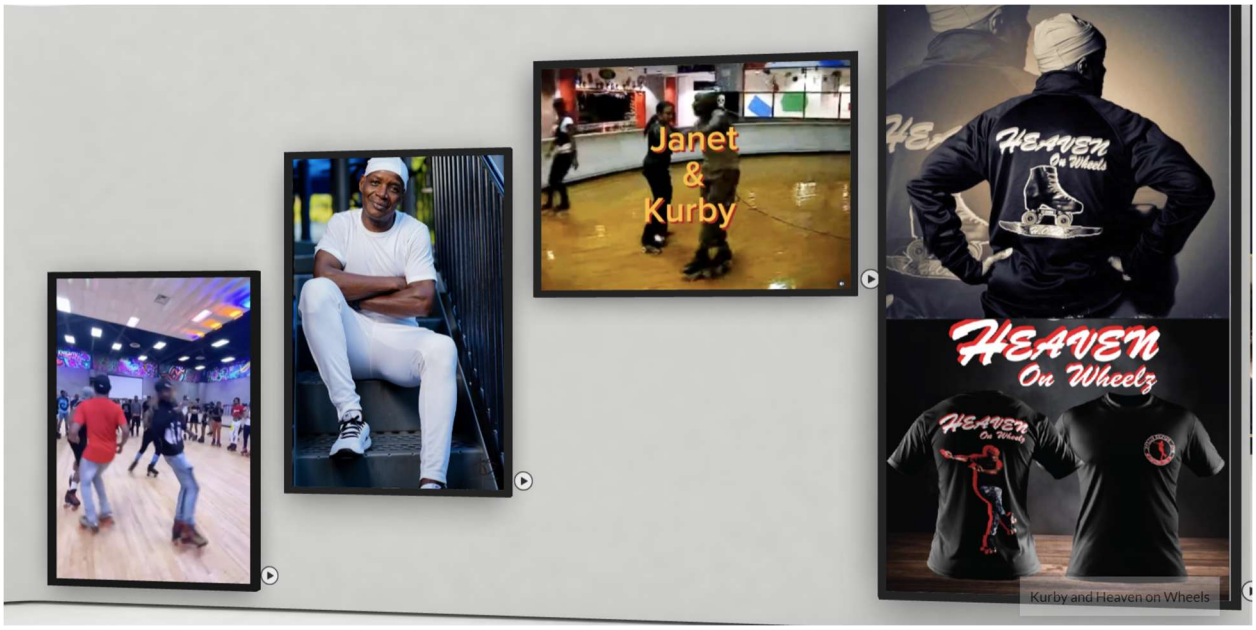

Figure 7 Skate culture video footage provided by Kurby Brown Sr, for the virtual gallery, showcases skaters across ages, contained in the virtual gallery, curated by Jojo Abenaavi Wright.

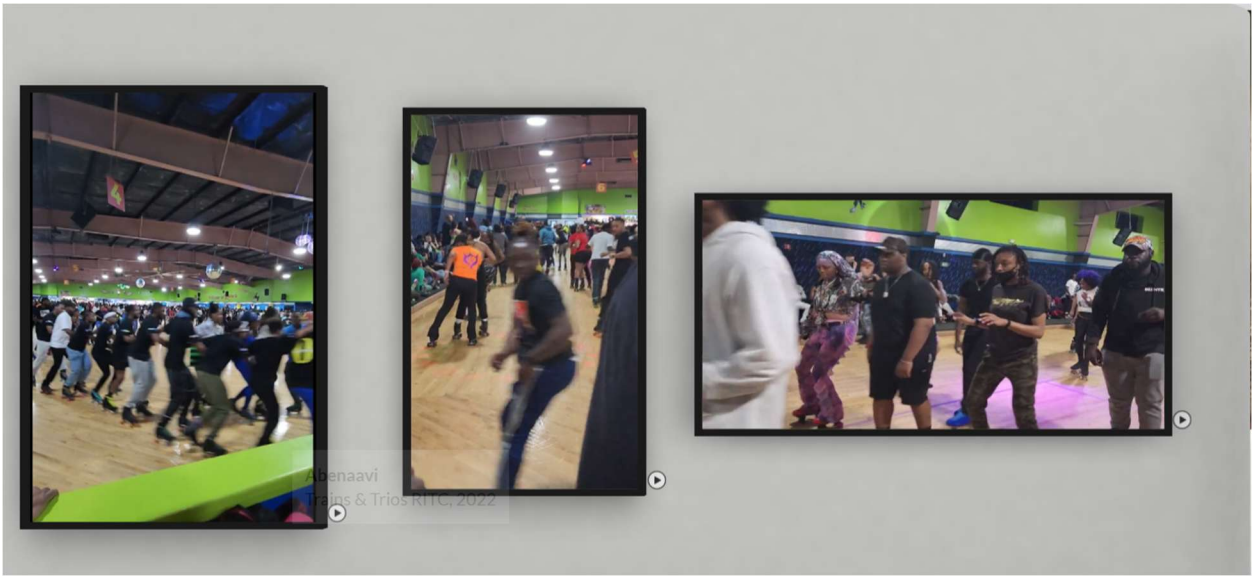

Figure 8 Footage left to right include Trains and Trios, Fast backwards, and Flow in traffic. Footage captured by author at Rolling in the Carolinas (RITC) 2023 and contained in the virtual gallery, curated by Jojo Abenaavi Wright.

In Person Elements of Joy Nexus

Participatory co-creation was central to the Joy Nexus experience. After the visit to the virtual gallery, attendees are invited to contribute to the Joy Board, adding Post-it notes about what brings them joy as shown in Figure 9. These notes were archived and will appear in future exhibits and on the virtual Joy Board as shown in Figure 10.

Figure 9 Joy Nexus participant adding her message about Joy to the Joy Board. Photo by Joy Nexus volunteer.

Figure 10 Joy Nexus Post-it Board contains participants' thoughts on Joy. Post-its are archived digitally for inclusion in future exhibitions. Photo created by author.

The next area contained on the first night ongoing music curation by DJ Fauzi. Spontaneous open mic sessions exemplified Afrofuturist transformation through collective participation and resulted in a form of storytelling across generations (see Figures 11 & 12).

Figure 11 Participants shares impromptu lyrics during Joy Nexus with DJ Fauzi providing the beats. Photo by Joy Nexus volunteer.

Figure 12 Participant takes the mic to share lyrics as DJ Fauzi provides the beats and trumpet sound. Photo by Joy Nexus volunteer.

On day two, participants are invited to select the next vinyl to play from piles of records curated by the author. This fostered communal engagement and discovery. ongoing music while also advancing the conversation of Afrofuturism and African elements referenced in the artwork on record album covers,

A key interactive feature of the *Joy Nexus* was the in-person collage building activity, which invited participants to visually express their visions of joy, healing, and future possibilities. Participants gathered around intentionally arranged tables equipped with diverse art supplies and theme-based books for inspiration.[104] Using these materials, they created both personal and collaborative collages that expressed their lived experiences and future aspirations.

[104] Hycide, ed. Akintola Hanif; Ekow Eshun, *In the Black Fantastic* (London: Hayward Gallery Publishing, 2022); Steven Nelson and Huey Copeland, eds., *Black Modernisms in the Transatlantic World* (Washington, DC: National Gallery of Art, 2021); *Afrofuturism: A History of Black Futures*, National Museum of African American History and Culture (Washington, DC: Smithsonian Institution, 2022); Damian Duffy and John Jennings, *Black Comix Returns* (New York: Magnetic Press, 2019); *Sun Ra: Art on Saturn* (Chicago: Corbett vs. Dempsey, 2022).

This tactile engagement supported FRACH's emphasis on embodiment and co-creation, allowing visitors to physically contribute to the exhibition's evolving narrative. Complementing the physical collage experience was a metaverse-based component that allowed users to build their own dreams with Banter SideQuest AI, blurring the boundaries between creator and observer. Visitors were invited to share directly to an app interface, describing what they would like to make in their ideal joyful world. These spoken inputs were translated into virtual environments within the metaverse, allowing participants to see their dreams rendered in immersive digital form. This feature exemplified FRACH's adaptive and responsive design principles, using technology to extend storytelling into speculative futures shaped by community imagination.

Temporal layering was woven throughout the exhibition, with interviews and storytelling referencing past, present, and future. Multimedia installations, animations, and interviews explored themes of power and joy across generations. Narrative immersion was central to the *Joy Nexus* experience. Storytelling components bring art to life through the impromptu storytelling through rhymes on the mic, localized histories and speculative Afrofuturist vignettes. The storytelling room featured replays of films from the Khem Animation Film Festival and live stories from community elders and artists, such as Dr. James Amemasor and Kurby Brown, Sr. Their narratives spanned decades of Black history and skate culture (Figure13). Signage and narrative cues guided visitors through these temporal dimensions, fostering reflection on power, joy, and transformation.

Figure 13 Kurby Brown, Sr. discussing the Black Skate culture to an engaged audience during Joy Nexus. Photo by author.

By operationalizing these design principles, the *Joy Nexus* exhibition became a dynamic site of healing, empowerment, and cultural continuity, inviting participants not only to experience joy in the moment but to carry it forward beyond the gallery walls. Survey responses from participants confirmed the exhibition's success in deepening their understanding of Afrofuturism, challenging traditional linear narratives of Black history, and fostering emotional engagement. All attendees reported that the experience was emotionally transformative and had a positive impact on their mental well-being. The integration of nature elements, such as botanical imagery and ambient forest sounds, was cited as significantly enhancing wellness, aligning with immersive nature simulations discussed in the thesis. The exhibition's storytelling components, particularly localized narratives such as the New Jersey African story, emerged as the most impactful elements. This validates the thesis's emphasis on embodied reception and narrative immersion as tools for cultural healing. The use of salons as spatial metaphors for Black time enabled visitors to navigate historical and speculative futures in a way that disrupted colonial temporality and invited reflection, connection, and regeneration. Moreover, the positive reception of virtual reality and interactive components, especially among participants unfamiliar

with such technologies, demonstrates the accessibility and emotional resonance of immersive media when thoughtfully designed. These findings support the thesis's call to expand traditional art historical methodologies to include multisensory, participatory, and community-centered frameworks.

Findings

Survey responses from participants confirmed the exhibition's success in deepening their understanding of Afrofuturism, challenging traditional linear narratives of Black history, and fostering emotional engagement.[105] All attendees reported that the experience was emotionally transformative and had a positive impact on their mental well-being. The integration of nature elements was cited as significantly enhancing wellness, aligning with immersive nature simulations discussed in the thesis. The exhibition's storytelling components, particularly localized narratives such as the New Jersey African story, emerged as the most impactful elements. This validates the thesis's emphasis on embodied reception and narrative immersion as tools for cultural healing. The use of salons as spatial metaphors for Black time enabled visitors to navigate historical and speculative futures in a way that disrupted colonial temporality and invited reflection, connection, and regeneration. Moreover, the positive reception of virtual reality and interactive components, especially among participants unfamiliar with such technologies, demonstrates the accessibility and emotional resonance of immersive media when thoughtfully designed. These findings support the thesis's call to expand traditional art historical methodologies to include multisensory, participatory, and community-centered frameworks.

[105] Survey results from *Joy Nexus*, Newark Arts Festival, Mentor Newark, October 9–10, 2025. Data collection ongoing.

To synthesize the exhibition's impact and its implications for future practice, the following table summarizes key survey insights and their relevance to immersive art and curatorial strategies.

Table 1. Key Survey Findings and Implications for Immersive Art and Curatorial Practice

Source: Author's exhibition survey results, Joy Nexus: The Next Narrative, 2025.

Survey Insight	**Implications for Future Immersive Art & Curatorial Strategies**
Deeper Understanding of Afrofuturism	Integrate Afrocentric narratives to educate and engage diverse audiences.
Challenging Historical Narratives	Use immersive storytelling to present alternative histories and decolonize content.
Emotional & Transformative Engagement	Prioritize multi-sensory design to foster empathy and connection.
Wellness and Healing Effects	Include nature-based elements and mindfulness components to support well-being.
Technology Enhancement (VR & Interactive)	Use intuitive, story-driven tech to enhance accessibility and engagement.
Storytelling Resonance	Center exhibitions around community-relevant narratives and personal testimonies.

Desire for Continued Engagement	Extend exhibition timelines and offer follow-up programming to sustain interest.

The *Joy Nexus* exhibition not only reinforced the theoretical propositions of this thesis but also illuminated new pathways for curatorial practice, interdisciplinary collaboration, and community engagement. It stands as a model for how immersive art can catalyze cultural empowerment, historical reimagining, and holistic wellness. Future research should continue to explore these intersections, expanding the scope of immersive art to include diverse diasporic narratives, longitudinal wellness studies, and co-created storytelling practices that honor the lived experiences of Black communities across time and space.

Conclusion

The convergence of immersive art, natural elements, and Afrofuturism in this study has illuminated a powerful new paradigm for cultural storytelling and wellness. By integrating multisensory engagement with Black speculative narratives, the project answered its central question: How do immersive art, nature, and Afrofuturism intersect to cultivate wellness, cultural awareness, and transformative storytelling for the African diaspora? The findings show that Afrofuturistic art combined with nature-driven sensory design can transform perceptions and support holistic wellness through deep sensory-emotional engagement. The immersive exhibition – "The Next Narrative: An Immersive Journey Through Black Time," realized as the Joy Nexus experience – served as a living case study. It demonstrated that when visitors are enveloped in an environment of visual art, ambient sound, tactile and olfactory cues, and Afrocentric futurist storylines, they do more than observe – they actively participate in "decolonial memory work,"

reconnecting with ancestral histories and envisioning empowered futures. This embodied approach proved remarkably effective in grounding participants, evoking emotional resonance, and fostering a sense of communal healing. Visitors reported that the experience was deeply engaging on a personal level – in post-exhibition surveys every attendee described the journey as "extremely engaging/transformative" and noted positive impacts on their mental well-being. Many specifically credited the incorporation of natural motifs (like forest imagery, water, and scent) with enhancing their sense of calm and wellness, affirming this thesis's core premise that nature-oriented immersion can regenerate the spirit even in a virtual or artistic space.

The broader implications of these findings reverberate across art history, wellness practice, and cultural storytelling. In terms of art historical practice, this work exemplifies how an immersive exhibition can function as a "living archive" that challenges traditional linear narratives of history. By collapsing past, present, and future into one interactive storyline, the project disrupted colonial conceptions of time and history, validating Afrofuturism's assertion that Black temporalities are cyclical and regenerative rather than confined to Eurocentric timelines. It also demonstrates a new approach to curatorial design: one that merges scholarship and spectacle. Through strategies drawn from the Harlem Renaissance salon tradition and contemporary museum innovation, the Joy Nexus created communal spaces where art, music, storytelling, and technology converged. The result was not merely an exhibit of static artworks, but an embodied narrative environment in which visitors became co-creators of meaning. This underscores an important shift for art history and visual culture studies: interpretation must extend beyond the analysis of objects to include the reception and experience of multisensory, interactive environments. Traditional methodologies like hermeneutics and reception theory were therefore adapted in this thesis to suit an immersive context – a necessary evolution that

foregrounds the viewer's bodily engagement and subjective journey as integral to understanding the "text" of the art. In practice, this meant embracing Gadamer's idea of a fusion of horizons in a literal sense: allowing visitors and artwork to meet within an experiential horizon shaped by sound, touch, and narrative, not just visual observation. The success of this approach suggests that future art-historical analyses should consider immersive, participatory dimensions (what one scholar calls a "phenomenal body" perspective) as essential to fully grasping contemporary art experiences.

From a wellness and therapy standpoint, the project's outcomes reinforce growing evidence that art can be a direct vehicle for healing. Participants described feelings of stress relief, joy, and empowerment during the Joy Nexus experience, indicating that carefully curated immersive spaces can function akin to communal therapy sessions. The infusion of nature's calming aesthetics – whether through simulated forest environments, ambient water sounds, or mood-enhancing scents – proved to elicit physiological and emotional benefits comparable to real-world nature therapy (forest bathing), but in an accessible, artful setting. This has broad implications: museums and galleries can be reconceived as wellness spaces that attend to visitors' emotional health, not just their intellectual enrichment. Moreover, by centering Black joy and resilience in the content (for example, through archival footage of Newark's skate culture and interactive "joy boards"), the exhibition provided a form of cultural healing, affirming identity and community in the face of historical trauma. In essence, the project shows how immersive Afrofuturist art can serve as a form of cultural therapy, where immersion in empowering narratives and serene natural metaphors helps participants process the past and envision positive futures. This aligns with the thesis's stance that art is not merely to be seen or heard, but felt in a way that can relieve anxiety, strengthen social bonds, and inspire hope.

Equally significant are the advancements in cultural storytelling showcased by this work. The fusion of Afrofuturism with interactive art allowed for storytelling that is not only deeply rooted in African diasporic heritage but also expansively futuristic. By presenting "Black time" as a garden that cycles and renews (a core metaphor in the exhibition), the narrative invited participants to step outside Western linear history and into a story space where African diaspora experiences are past, present, and future all at once. In practical terms, this meant visitors at Joy Nexus could, for example, listen to elders' oral histories one moment and then virtually build their own future worlds the next, linking personal memory to speculative creation. Such an approach empowers marginalized communities to tell their own stories on their own terms. It demonstrates that immersive art can be a potent tool for diasporic storytelling – one that honors tradition and mythology while also embracing technology and imagination to project new narratives forward. The enthusiastic participation by attendees (e.g. filling the Joy Board with reflections, collaborating on collages of "future joy," and contributing their voices to an evolving virtual archive) highlights the hunger for participatory storytelling in cultural institutions. Rather than being passive consumers of history, people became active narrators of a living, communal story. This model holds promise for museums, educators, and artists looking to engage younger, diverse audiences: when given an interactive platform, individuals will invest more deeply in cultural content, finding personal relevance and agency in it. In summary, the exhibition's storytelling strategy bridged generational and geographical divides in the African diaspora, showing how immersive Afrofuturist frameworks can reconnect a scattered community through shared symbols of joy, struggle, and hope.

Methodologically, the thesis also stands as an example of interdisciplinary innovation. It blended art history, technological design, psychology, and critical theory under a postcolonial

framework to both create and evaluate the Joy Nexus experience. By applying hermeneutic analysis to VR simulations and using reception theory to interpret visitor feedback, the research demonstrated that academic rigor and creative experimentation can inform one another. The introduction of the FRACH model into the analysis provided a structured way to design immersive spaces and measure their cultural impact, complementing traditional qualitative methods. This proved crucial in capturing nuances that standard art critiques might miss – such as how "embodied reception" (how a story literally feels to the participant) can be just as important as visual interpretation in understanding an artwork's effect. The collaborative, community-centered ethos in curating Joy Nexus also reflected reception theory's insight that the audience completes the artwork's meaning. In practice, inviting community input at every stage (from concept to final feedback) enriched the content and ensured it genuinely resonated with attendees. This dynamic, reflexive methodology could serve as a blueprint for future projects at the intersection of art and social practice, emphasizing that inclusive, participatory design is key to impactful immersive storytelling.

Looking ahead, this thesis not only validates the transformative potential of immersive, Afrofuturist art but also paves the way for future research in several cutting-edge areas. As immersive experiences gain prominence in museums, therapy, and education, researchers and practitioners are poised to build on the insights gained here. Key directions for future exploration include developing sophisticated tools to measure emotional and cognitive impact in these spaces, creating new models for co-creative curation with audiences, and expanding the content scope to encompass a wider array of diasporic and global stories in immersive form. The interdisciplinary methodologies applied, from deep literary analysis to user experience surveys, should be expanded with emerging techniques (like data analytics and AI) to deepen our

understanding of how such art affects people and how it can be optimized. Below outlines several promising research avenues that have emerged from this work, along with the guiding questions and methodologies that could shape each area:

- Emotional Analytics in Immersive Art

  Explore how biometric and AI-driven tools can measure emotional and physiological responses to immersive experiences, including wellness outcomes.

- Participatory Curation & Co-Creation

  Investigate how community involvement in exhibition design influences authenticity, engagement, and cultural resonance.

- Diasporic & Transnational Storytelling

  Examine how immersive platforms can connect global African diaspora communities through shared narratives and virtual collaboration.

- Wellness and Therapeutic Applications

  Assess the long-term mental health benefits of immersive Afrofuturist art and its potential as a formal therapeutic modality.

- Advanced Multisensory Design & Technology

  Study how emerging technologies (e.g., haptics, scent emitters, adaptive AI) can deepen immersion and personalize storytelling while maintaining cultural integrity.

Through these prospective lines of inquiry, future scholars and practitioners can extend the work begun here, refining how immersive artscapes are conceived and evaluated. Significantly, each of these research directions continues the interdisciplinary ethos of this thesis: they require

collaboration between artists, technologists, historians, psychologists, and community stakeholders to truly unlock the potential of immersive art. Just as this study drew on hermeneutics, postcolonial theory, and human-computer interaction research, so too, future efforts must maintain a hybrid methodological approach.

In closing, "Immersive Art, Nature, and Afrofuturism: Cultivating Wellness and Cultural Awareness" has demonstrated that art installations can transcend aesthetic experience to become transformative communal journeys. By marrying the ancient (ancestral narratives, natural rhythms) with the futuristic (virtual reality, Afrofuturist imagination), we can create spaces that heal even as they educate and inspire even as they remember. The Joy Nexus exhibition stands as a microcosm of what is possible: a multisensory narrative environment where a historically marginalized culture authored its own story of joy, endurance, and renewal in real time with its audience. The broader implication is that immersive art, when guided by inclusive storytelling and rigorous theory, can be a catalyst for both personal well-being and collective cultural growth. As museums and creative institutions adopt these findings, we may witness a new era in art history – one in which wellness, empathy, and active cultural participation are as fundamental as visual spectacle. This thesis thus concludes not with an end, but with a hopeful beginning: an affirmation that by embracing immersive, Afrofuturist artistry and interdisciplinary methods, we can continue to cultivate wellness and cultural awareness for communities in ever more profound ways. The next narrative is already unfolding.

Bibliography

Adjaye, David. “Form, Memory, and Meaning: The Architecture of the National Museum of African American History and Culture.” *Journal of Architectural Education* 71, no. 1 (2017): 8–22.

Beck, Mirja. "A Lived Experience—Immersive Multi-Sensorial Art Exhibitions as a New Kind of (Not That) ‘Cheap Images.’" *Arts* 12, no. 1 (2023): NA. Gale Academic OneFile (accessed October 25, 2024). http://dx.doi.org/10.3390/arts12010016.

Brown, Neil C.M., Timothy S. Barker, and Dennis Del Favero. “Performing Digital Aesthetics: The Framework for a Theory of the Formation of Interactive Narratives.” *Leonardo* 44, no. 3 (2011): 212–29. http://www.jstor.org/stable/20869452.

Christensen, A. P., E. R. Cardillo, and A. Chatterjee. "Can Art Promote Understanding? A Review of the Psychology and Neuroscience of Aesthetic Cognitivism." *Psychology of Aesthetics, Creativity, and the Arts*, January 12, 2023. Advance online publication. https://dx.doi.org/10.1037/aca0000541.

Coleridge, Samuel Taylor. Biographia Literaria. Chapter XIV. Owl Eyes. Accessed September 21, 2025. https://www.owleyes.org/text/biographia-literaria/read/chapter-xiv.

Colossal. “More than 500,000 Black LEGO Bricks Structure Ekow Nimako’s Vast Afrofuturistic Cityscapes.” *Colossal Magazine* 14, no. 3 (2022): 42–49.

Cooks, Bridget. “Curating the National Museum of African American History and Culture.” *The Public Historian* 39, no. 2 (2017): 82–89.

D'Alleva, Anne. *Methods and Theories of Art History: Second Edition*. London: Laurence King Publishing, 2005. https://doi.org/10.2307/j.ctv20pxz5d.8.

Digital Art Archive. "Osmose by Char Davies." Accessed April 24, 2025. https://digitalartarchive.at/database/work/79/.

Duffy, Damian, and John Jennings. *Black Comix Returns*. New York: Magnetic Press, 2019.

Eshun, Ekow. *In the Black Fantastic*. London: Hayward Gallery Publishing, 2022.

Eshun, Kodwo. *More Brilliant Than the Sun: Adventures in Sonic Fiction*. London: Quartet Books, 2003.

Grygny, J. Philip. *Shinrin-Yoku: Forest Bathing as Embodied Ecology*. [Accessed April 19, 2025]. https://www.academia.edu/43146685/Shinrin_Yoku_as_Embodied_Ecology.

Grammatikopoulou, Christina. “Breathing Art: Art as an Encompassing and Participatory Experience.” In *Museums in a Digital Culture*, edited by Chiel van den Akker and Susan Legêne, 41–56. Amsterdam University Press, 2016. http://www.jstor.org/stable/j.ctt1s475tm.6.

Hanif, Akintola, ed. *Hycide*. Newark, NJ: Hycide Magazine, n.d.

Horizon of Khufu. “Horizon of Khufu: A Journey in Ancient Egypt in NYC.” Accessed December 12, 2024. https://horizonkheopsexperience.com/nyc/

Jansen, Maarten E.R.G.N., and Gabina Aurora Pérez Jiménez. “POST COLONIAL HERMENEUTICS.” In *The Mixtec Pictorial Manuscripts: Time, Agency and Memory in Ancient Mexico*, 181–216. Brill, 2011. http://www.jstor.org/stable/10.1163/j.ctv2gjwvxj.9.

Jones, Stephen. “Towards a Philosophy of Virtual Reality: Issues Implicit in ‘Consciousness Reframed.’” *Leonardo* 33, no. 2 (2000): 125–32. http://www.jstor.org/stable/1576846.

Joy Nexus. Newark Arts Festival. Mentor Newark, Newark, NJ. October 9–10, 2025.

Joy Nexus. Newark Arts Festival. Survey data collected at Mentor Newark, Newark, NJ. October 9–10, 2025–present. Unpublished data.

Li, Q. "Effects of Forest Environment (Shinrin-yoku/Forest Bathing) on Health Promotion and Disease Prevention: The Establishment of 'Forest Medicine.'" *Environmental Health and Preventive Medicine* 27 (2022): 43. https://doi.org/10.1265/ehpm.22-00160.

Liu, Xiaoyu, Hongming Zhou, and Junwei Liu. "Deep Learning-Based Analysis of the Influence of Illustration Design on Emotions in Immersive Art." *Mobile Information Systems*, July 30, 2022. https://doi.org/10.1155/2022/3120955.

Luo, Dan, Lieve Doucé, and Karin Nys. "Multisensory Museum Experience: An Integrative View and Future Research Directions." Museum Management and Curatorship, May 26, 2024. DOI: 10.1080/09647775.2024.2357071. https://doi.org/10.1080/09647775.2024.235707.

Mattos, Claudia. “Whither Art History?: Geography, Art Theory, and New Perspectives for an Inclusive Art History.” *The Art Bulletin* 96, no. 3 (2014): 259–64. http://www.jstor.org/stable/43188880.

McKim, Joel. “Deep Learning the City: The Spatial Imaginaries of AI.” In *Seeing the City Digitally: Processing Urban Space and Time*, Gillian Rose edited, 35–56. Amsterdam University Press, 2022. https://doi.org/10.2307/j.ctv2j6xrs3.5.

Miller, Kimberly. “Exhibiting Memory: Affect and the African American Museum.” *American Quarterly* 70, no. 4 (2018): 789–815.

Mondloch, Kate. "The Influencers: Van Gogh Immersive Experiences and the Attention-Experience Economy." Arts 11, no. 5 (2022): NA. Gale Academic OneFile (accessed October 25, 2024). http://dx.doi.org/10.3390/arts11050090.

National Museum of African American History and Culture. *Afrofuturism: A History of Black Futures*. Washington, DC: Smithsonian Institution, 2022.

Nelson, Steven, and Huey Copeland, eds. *Black Modernisms in the Transatlantic World*. Washington, DC: National Gallery of Art, 2021.

Ng, Jenna. “Virtual Reality: Confinement and Engulfment; Replacement and Re-Placement.” In *The Post-Screen Through Virtual Reality, Holograms and Light Projections: Where Screen Boundaries Lie*, 107–54. Amsterdam University Press, 2021. https://doi.org/10.2307/j.ctv23985t6.7.

Osofsky, Gilbert. “Symbols of the Jazz Age: The New Negro and Harlem Discovered.” *American Quarterly* 17, no. 2 (1965): 236–237. https://doi.org/10.2307/2711356.

Park, B. J., Tsunetsugu, Y., Kasetani, T., Kagawa, T., and Miyazaki, Y. "The Physiological Effects of Shinrin-yoku (Taking in the Forest Atmosphere or Forest Bathing): Evidence from Field Experiments in 24 Forests Across Japan." *Environmental Health and Preventive Medicine* 15, no. 1 (2010): 18–26. https://doi.org/10.1007/s12199-009-0086-9.

Qi, Yuxuan, and Yixuan Wang. "A Framework for Designing, Developing, and Evaluating Immersive and Collaborative Interactive Exhibitions in Cultural Heritage." *Cognitive Science & Interactive Art Systems* 1, no. 1 (2025). https://doi.org/10.37420/J.csias.2025.002..

Refik Anadol Studios. "Machine Hallucination." YouTube video. 5:36. Oct 6,2020..https://www.youtube.com/watch?v=x1EVhNM-uf4.

Rollefson, J. Griffith. “The ‘Robot Voodoo Power’ Thesis: Afrofuturism and Anti-Anti-Essentialism from Sun Ra to Kool Keith.” *Black Music Research Journal* 28, no. 1 (2008): 83–109. http://www.jstor.org/stable/25433795.

Seo, J., Corness, G., Gromala, D., and T. Schiphorst. "Aesthetics of Immersion in Interactive Immersive Environments: A Phenomenological Case Study of Light Strings." In *Proceedings of the 21st International Symposium on Electronic Art*, 8. Retrieved from http://isea2015.org/proceeding/submissions/ISEA2015_submission_237.pdf.

Spence, Charles. “Scenting the Anosmic Cube: On the Use of Ambient Scent in the Context of the Art Gallery or Museum.” *I-Perception*, November 20, 2020, 1–26. doi:10.1177/2041669520966628.

Stogner, Maggie B. "The Immersive Cultural Museum Experience - Creating Context and Story with New Media Technology." *International Journal of the Inclusive Museum*, no. 3 (2010): 117-30. https://doi.org/10.18848/1835-2014/CGP/v03i03/44339.

Stuckey, H.L., and J. Nobel. "The Connection Between Art, Healing, and Public Health: A Review of Current Literature." *American Journal of Public Health* 100, no. 2 (2010): 254-263.

Sun Ra: Art on Saturn. Chicago: Corbett vs. Dempsey, 2022.

True North Bricks. “I Chose to Use LEGO—or It Chose Me: An Interview with Ekow Nimako.” *True North Bricks Journal* 5, no. 2 (2023): 33–41.

Vlachou, Sofia, and Michail Panagopoulos. “Applying Machine Learning Methods to Quantify Emotional Experience in Installation Art.” *Technoetic Arts: A Journal of Speculative Research* 21, no. 1 (2023): 53–72. doi:10.1386/tear_00097_1.

Wang, Siyi. 2020. "Museum as a Sensory Space: A Discussion of Communication Effect of Multi-Senses in Taizhou Museum" *Sustainability* 12, no. 7: 3061. https://doi.org/10.3390/su12073061.

Weberman, David. “A New Defense of Gadamer’s Hermeneutics.” Philosophy and Phenomenological Research 60, no. 1 (2000): 45–65. https://doi.org/10.2307/2653427.

Wilson, Mabel O. *Begin with the Past: Building the National Museum of African American History and Culture*. Washington, DC: Smithsonian Books, 2016.

Wood, Christopher S. “E.H. Gombrich’s ‘Art and Illusion: A Study in the Psychology of Pictorial Representation’, 1960.” *The Burlington Magazine* 151, no. 1281 (2009): 836–39. http://www.jstor.org/stable/40601264.

World Health Organization. "Constitution of the World Health Organization." Accessed April 24, 2025. https://www.who.int/about/governance/constitution#:~:text=Health%20is%20a%20state%20of%20complete%20physical%2C,religion%2C%20political%20belief%2C%20economic%20or%20social%20condition.

Wright, Jojo Abenaavi. “Abenaavi Arts 3D.” *Abenaavi.com*. Accessed October 17, 2025. https://abenaavi.com/abenaavi-arts-3d.

Wright, Jojo Abenaavi, curator. *The Joy Nexus: Films, Music, Play, & Collective Storytelling*. Newark Arts Festival, Mentor Newark, Newark, NJ. October 9–10, 2025. The Joy Nexus: Films, Music, Play, & Collective Storytelling - Newark Arts Festival

Wright, Michelle M. *Physics of Blackness: Beyond the Middle Passage Epistemology*. Minneapolis: University of Minnesota Press, 2015.

Xu, Junping, Sixuan Liu, Wei Yang, Meichen Fang, and Younghwan Pan. "Beyond Reality: Exploring User Experiences in the Metaverse Art Exhibition Platform from an Integrated Perspective." *Electronics* [Basel] 13, no. 6 (2024): NA. *Gale Academic OneFile* (accessed October 26, 2024). http://dx.doi.org/10.3390/electronics13061023.