

AI Art and Human Creativity: An Interactive Gallery for a DAO

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Abstract. This project explores the power of art creators in the age of AI by designing an Interactive Gallery as an element for an envisaged DAO that discusses the boundaries between AI and human creativity. The design provides users with an enhanced interactive experience that reveals the origins of the artwork through interaction, with AI-generated artwork disintegrating into particles and human-created artwork changing styles over the course of the interaction. As a gallery component of DAOs, it emphasizes the fluid and deconstructive nature of AI-generated art, rethinking the role of the art creator in the creation of art and focusing on the role of the viewer. In this case, it is the collective audience in DAOs.

Keywords: Authorship; Originality; Authenticity; AI Art; Audience Engagement; DAOs; Interactive Design.

1. Background

The integration of Artificial Intelligence (AI) into the arts has sparked both excitement and concern. AI models like DALL-E 2 are pushing the boundaries of what can be considered art, creating pieces that sometimes are indistinguishable from those made by humans [1]. Now it's even updated to the more powerful DALL-E 3. This technological leap forward has ignited a debate about the ethical implications for the originality of AI-generated art and its impact on the role of artists, setting the stage for a broader discussion on the value and ownership of creative work.

The conversation around AI in art gained significant attention when an AI-generated portrait sold at Christie's for a sum typically reserved for traditional art, prompting a reconsideration of how we value art and define the creative process [2]. This landmark sale brought to the forefront the question of who — or what — should be credited for AI-created art, challenging the very foundations of copyright law and our understanding of authorship. The implications of this debate extend beyond the art itself, touching on the rights and recognition of those involved in the creative process.

As generative AI continues to evolve, it brings with it a host of legal and ethical challenges, particularly with the potential for creating 'deepfakes' and other convincing simulations [3]. The rapid development of these technologies necessitates a thoughtful approach to the creative process, one that incorporates ethical considerations and human values as much as it does technological advancements [4]. This evolving landscape calls for innovative governance structures that can adapt to the unique challenges posed by AI-generated art.

Amid these challenges, Decentralized Autonomous Organizations (DAOs) are being explored as a potential solution for the collective governance of creative work. DAOs operate on principles of blockchain technology, offering a transparent and democratic platform for decision-making. This could be particularly beneficial in managing the complexities of AI-generated art, where questions of authorship and copyright are increasingly complex [5].

The implications of AI's role in art are significant and real, affecting artists and the art market. As AI-generated art becomes more common, it raises concerns about the future of human artists and the potential devaluation of their work [6]. The convergence of AI with ethical and political issues in the creative industries is a pivotal moment that calls for responsible governance. It is vital to ensure that the incorporation of AI into the art world maintains a balance that respects both the innovation AI brings and the enduring value of human creativity and artists' rights [7]. There may be great potential for DAOs to achieve this balance.

2. Project Overview

This project focuses on creating an Interactive Gallery for a planned DAO. The Interactive Gallery's main goal is to provoke thought in the audience by showcasing digital interactive art that allows DAO members to share their insights on AI art by means of artistic interventions. A key aspect of this project is to explore how AI intersects with art creation. We expect that designing this Interactive Gallery will help guide the ethical use of AI in generating art. The research approach is Practice as Research, where we concentrate on how the audience interacts with digital artworks. This will help us understand the differences between AI-generated art and art created by humans. Additionally, we will use the Think Aloud Protocol to gather user feedback during their interaction with the artworks.

The Interactive Gallery is envisioned as a mechanism with a dual purpose: first, as a critical artistic intervention that engages the audience in a dialogue about the nature of creativity in the age of artificial intelligence; and second, as a platform for artists who wish to explore the boundaries between AI and human creativity in the age of AI. This project will serve as a prototype for this design concept to be demonstrated in the form of an interactive design. The first part is a few poems created by AI and humans, narrated to the audience by digital characters. After this leading discussion comes the second part of the interactive digital artwork. By dynamically responding to the user's gestures, the displayed artwork is altered in a way that reveals its origin (AI or human). When a participant interacts with a work generated entirely by AI, it disintegrates into particles, symbolizing the fluid and deconstructive nature of AI creativity. Conversely, when the artwork is created with human participation, the interaction transforms it into different artistic styles, which represents the diversity and constant evolution of human artistic expression.

It is important to note that, this project does not involve creating a DAO, but only with the DAO as a community anchor for this design concept. This project briefly outlines the mechanisms and purpose of the interactive gallery in the DAO. It operates on the premise that human subjectivity and critical thinking are important when evaluating the role of AI in art creation.

3. Literature Review

The history of AI in artistic creation is marked by the merging of technology and creativity, with concepts such as 'Artificial Life Art' originating as early as the 1960s and 1970s, which predicted the intertwining of human and machine intelligence and its impact on art [8]. Contemporary AI models, particularly Generative Adversarial Networks (GANs), have significantly contributed to the development of visual art, enabling the creation of works indistinguishable from those made by human hands [9]. Despite AI's capabilities, concerns have been raised about its potential to devalue traditional artistic labor, though such fears may be mitigated by the art market's appreciation for the unique qualities of human-created art [10]. The debate over whether AI-generated art constitutes 'real' art continues, with some in the artistic community viewing AI as a collaborative tool rather than a replacement for human creativity [11]. AI's mimicry of literary and performative art forms has yet to capture the depth of human experience and emotional subtlety, suggesting that certain qualities of human artistry remain beyond its current reach [11]. Nonetheless, AI has the potential to democratize art, making it more accessible and inclusive, especially for those with disabilities or limited access to traditional art resources [11].

The escalation of AI in art has prompted vital discussions on intellectual property, with AI's potential to assume traditionally human roles leading to legal quandaries over copyright and authorship [12]. Issues of data consent, the potential for misuse, and the challenges of accountability are at the forefront of the ethical debate surrounding AI art. The opaque nature of AI systems, such as the biases and stereotypes they can perpetuate, underscores the need for scrutiny and regulation of the data that feeds these systems [13]. In response, governments have begun to

introduce regulatory frameworks, such as the French Council presidency's amendment to the draft AI Act EP Version and China's new rules for AI generation, to address these concerns [14,15]. The U.S. Copyright Office's initiatives to revise policies considering AI's impact suggest a movement towards legal reform, acknowledging the unique challenges AI presents to traditional copyright frameworks [16]. International treaties like the Berne Convention do not currently encompass AI-generated works, prompting a call for global harmonization of copyright laws [17].

In this context, DAOs are emerging as a novel approach to the collective governance of creative work. A DAO is essentially an internet community with a common purpose running on blockchain software and maybe a legally unincorporated organization run directly by "contributors" or "members" [18]. This form of organization uses a smart contract on the blockchain network to manage its trustless environment and make corporate, management or governance decisions [19]. Smart contracts are a set of predetermined rules and logic coded into machine or computer software which can be automatically executed to make decisions and perform actions [20,21]. On this basis, each community member receives tokens for voting when they are included in the DAOs [22] or tokens are purchased for membership rights. "Token-weighted voting" is the most common method of establishing decision rules in DAOs. Since tokens are valuable, people vote in economically maximizing ways [23]. This operating principle and mechanism give DAOs the advantages of "Autonomous Structure", "Equal Stakes", "Neutrality", and "Accountability" [22]. And these features give DAO the potential to provide a democratic and decentralized framework for the evaluation and regulation of AI art generators. Just as artists were among the first to make visible the impact of blockchain on the environment, they are in a unique position to explore what the DAO could do beyond the art world [24]. DAOs give artists, institutions, and audiences new tools with which to think about the kinds of futures they want to see [24]. These suggest that DAOs can have a significant impact on artistic identity by providing artists with new tools and platforms for expression and collaboration, making abstract concepts more tangible and visible, and enabling artists to have a greater say in the governance and operation of the platforms they use.

DAOs harness the power of collective intelligence to facilitate democratic decision-making processes, essential for the ethical governance of AI art generators. DAOs operate without central control, employing the entire P2P community to propose, vote, and decide, thereby cultivating a non-hierarchical and egalitarian decision-making environment [25]. Chotkan, Decouchant, and Pouwelse [26] demonstrate the practical application of these principles through their Web3 experiment, which enables direct investment into artists, bypassing traditional intermediaries. This democratized investment approach within DAOs, supported by collective intelligence, exemplifies a shift towards transparent, fair, and resilient governance systems in the creative industries, aligning with the ethical evaluation demands of AI-generated art.

4. Related Works

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This project will be facilitated by an understanding of some of the past innovative practices in the field of ethics of art and technology, particularly the application of artificial intelligence in this field. These landmark projects not only demonstrate the capacity of AI as a creative and critical tool, but also reveal the blurring of the boundaries between human and machine creativity. At the same time, AI has had a profound impact on the transformation of artistic creation and its critical reception.

Artistic interventions in the realm of technology ethics, particularly AI, have prompted pivotal discussions on authorship, originality, and the valuation of art. "The Next Rembrandt" project challenged perceptions of creativity by using AI to synthesize a new artwork from a deceased artist's style, questioning the delineation between human and machine creativity [27].



Fig. 1 The Next Rembrandt

“Living Archive” [28] employs AI to create an interactive choreographic experience, where an algorithm, trained on McGregor’s extensive body of work, suggests movements to dancers in real-time, thereby extending the choreographic vocabulary and showcasing AI’s role as a collaborative tool in dance innovation.

“Manifesto” [29] harnesses AI to deepen the connection between speech and movement, illustrating the potential of AI in enriching narrative and emotive elements in dance.

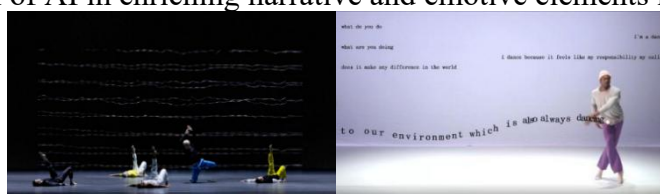


Fig. 2 Living Archive / Fig. 3 Still from Manifesto performance

Ahmed Elgammal’s “AICAN” [30], on the other hand, represents a groundbreaking approach in visual arts, where AI not only generates artwork but also critically evaluates it. This dual-function AI challenges traditional conceptions of artistry and curation, underscoring the transformative influence of AI in both the creation and critical reception of art.



Fig. 4 “CAN: Creative Adversarial Networks Generating “Art” by Learning About Styles and Deviating from Style Norms.”

While there has been much research on how AI can change the arts, there is a gap in the exploration of combining the collective decision-making mechanisms of DAOs with intervention art and public engagement. This project aims to fill this gap by exploring the boundaries between AI and human creativity by exploring the addition of intervention art to DAO.

5. Research Methodology

The research methodology for this project is structured around Practice as Research (PaR), emphasizing the role of artistic practice as a form of inquiry, where knowledge is generated through and within the practice of art [31].

5.1 Interactive Gallery design and Iterative Testing

The initial phase of the project was centered on the development of an Interactive Gallery. This gallery functioned as an intervention artwork, with its primary objective being to facilitate user interaction in discerning between AI-generated and human-created art. The artwork used in this project was exclusively my own creation, a decision made to streamline the testing process. Key to

this phase was the iterative development methodology, which hinges on continuous improvement through user feedback. User feedback is not merely a measure of engagement or satisfaction, but a critical tool for refining the gallery’s design and functionality. Each iteration aimed to enhance the interactive experience, focusing on the technical and usability aspects of the gallery. The emphasis throughout was on refining the interactivity of the gallery, drawing on lessons learned from each iteration to improve its effectiveness as an intervention artwork [32]. The user's role in this process was less about their emotional engagement with the artwork, and more about their interaction with the gallery's interface, providing insights that inform technical adjustments and enhancements.

5.2 Think Aloud Protocol

It is a research method used to gather data on what a person is thinking and feeling while performing a task. In this protocol, participants are asked to verbalize their thoughts, feelings, and opinions aloud as they interact with a product or system [33]. This method is useful for understanding the user’s thought processes, decision-making strategies, and the overall user experience.

In this project, this method involves a convenience sample where participants interact with the design and provide feedback. Participants are positioned in front of a laptop, verbalizing their thoughts as they engage with the interactive digital artworks.

6. Design Process

The Interactive Gallery is divided into two parts: a guided discussion and some interactive digital artworks.

6.1 Guided Discussion Part

The concept for the guided discussion part originated in the movie Blade Runner, which explored the impact of technological advances in human genetic engineering on moral and spiritual philosophies. This has parallels with the issues raised by current developments in AI technology.



Fig. 5 Blade Runner poster

In the movie, a large company genetically engineers an organic robot known as an Android. Stemming from this inspiration, the first part of my design was to visualize the artificial intelligence to give the appearance of a digital human. I created a human model through 3D modeling software and later imported it into Touch Designer to convert it into a point cloud model for particularization.

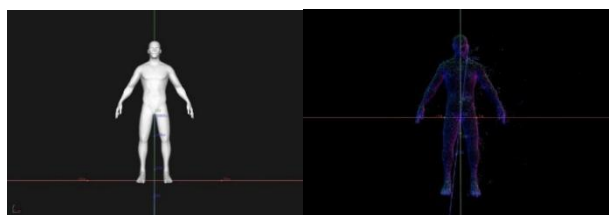


Fig. 6 Convert 3D models into point cloud model

The purpose of the conversion to a point cloud model is to produce the artistic effect of particle dissipation. This effect is intended to convey the instability and uncertainty of the current state of AI art.

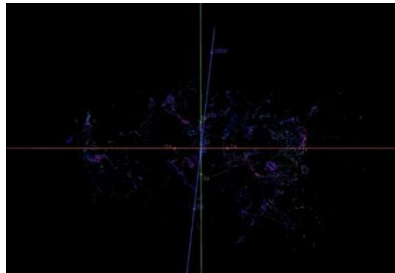


Fig. 7 Particle dissipation

In order to convey to the audience, the principle logic behind the AI generated art, I use the metaphorical expression technique to add the point cloud model image of two digital characters, red and blue, within the colorful digital person. The meaning of this metaphor is that the colorful digital figure is formed by the fusion of one red and one blue original image, insinuating that the AI-generated art is based on existing graphics and evolved through computation. The artistic identity of the designer needs to be realized by the audience here.

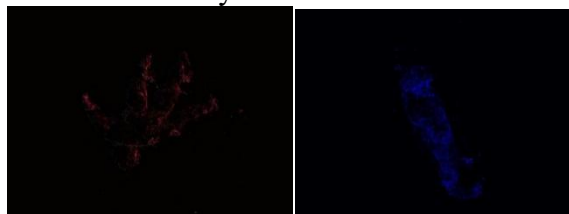


Fig. 8 Red and blue digital characters

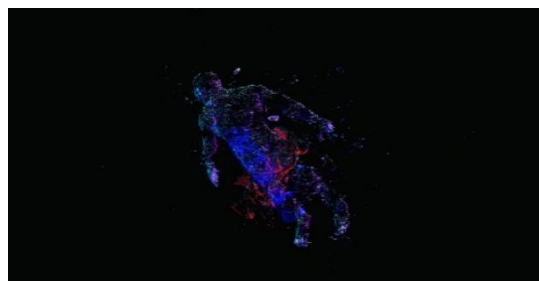


Fig. 9 3 digital characters

Another borrowing from Blade Runner in this design section is its sound section. In terms of sound characteristics, Blade Runner makes extensive use of Chandleresque narration, a style of narration that adds a melancholy, reflective atmosphere to the movie. This speech is characterized by dry, cold language that tells the story and one's reflections. In terms of written language, the movie draws on the poetry of William Blake. Combining these two points, I used ChatGPT to generate textual content that blends the poetry with AI artistic ethics, and then utilized text-to-speech technology and post-sonic processing to make a soundscape more attuned to a cold, mechanical feel but retaining human vocal characteristics. In this way, it creates an atmosphere of introspection as the digital human figure delivers its message to the audience.

For the audience to visualize the atmosphere in which the digital characters are telling their lines, a visual effect was needed where the digital characters appear to vibrate in response to changes in sound. This was achieved by converting the fluctuating frequencies of the produced audio files into specific data. After debugging, these data were applied to the “rotation” and “scaling” values of the digital characters, thus realizing the necessary visual kinetic effects.

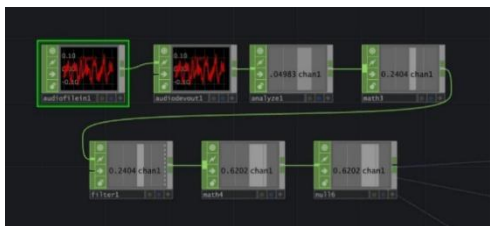


Fig. 10 Fluctuation frequencies converted to data

6.2 First iteration of the test

After the visualization of the section has been completed, a first audience test is required to determine the form of interaction in the section. Design testing involving interaction, engagement and immersion can be achieved through an iterative, user-centered approach that includes prototyping and testing. This process allows for early identification of functional requirements and performance issues that can greatly improve the final design [34]. The ten audience members who participated in the test, after experiencing the guided discussion without the interactive elements, would provide their own expectations of the interactive experience, which helped in the iterative work of the section.

The ten test audiences were invited to watch the Guidance Discussion video and to talk about their feelings about the non-interactive version in the form of interviews. Summarizing the results of their interviews, it can be seen that ten audiences agreed that a natural and convenient interactive experience was what they were looking for. Therefore, I focused the design of the interactive experience on simulating the non-verbal communication style of human daily life and giving more metaphors to the interaction.

6.3 Gesture

Gesture operation is preferred because of its convenience and immersive experience. Gesture interaction excels in terms of entertainment experience compared to the traditional form of interaction with a point-and-click interface. This means that gesture interactions can provide a more enjoyable and engaging user experience, which is critical to the interaction experience [35]. However, gesture-based interactions are more complex to implement and test than traditional point-and-click interactions, requiring adapted sensors and application environments [36].

Gesture interactions are often considered more accessible and intuitive because they usually require less body amplitude and can be performed with simple movements [37]. They are particularly beneficial for users with mobility impairments, as they do not need to use their entire body to interact with the technology.

Compared to full-body tracking systems, gesture interaction systems typically require less complex technology. This is because they can often be implemented using standard cameras and sensors that are cheaper and easier to set up than the more advanced equipment required for accurate full-body tracking [38]. This makes gesture interaction systems more feasible and cost-effective for a wide range of applications.

Since the project was based on Touch Designer, the Leap Motion camera, which has gesture capture capabilities and can be connected to Touch Designer, was the optimal design solution. By capturing the audience's hand movements with the Leap Motion camera and converting them into concrete dynamic data to be used in the attribute values that need to be changed, the audience can interact with the digital characters through gestures in space.

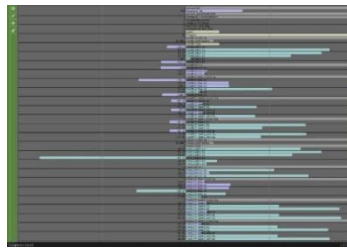


Fig. 11 Leap Motion display interface in Touch Designer

6.4 Second iteration of the test

To select the gestures that best fit the project and the audience experience, a second round of iterative testing was required. By debugging the interaction experience with different gesture versions, including waving, clenching the fist, clicking in the air, and finger movements, four different gesture interactions were made available to ten participating audience members to experience.

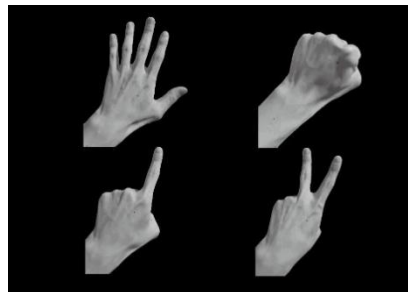


Fig. 12 waving, clenching the fist, clicking in the air, and finger movements

The results of the second iteration of the test showed that the action of waving was the most natural and in line with everyday behavior as perceived by the audience participating in the test. Hand waving is a universally recognized gesture, transcending language, and cultural barriers. It is intuitive and can be easily understood and performed by a wide range of users, regardless of their age, technical expertise, or cultural background. This makes it an inclusive form of interaction. From the perspective of effect realization, the action of waving the hand is compared to the other three actions because it has the largest range of actions that can be captured by the camera, which also improves the recognition and accuracy of the action.

6.5 Metaphors

After identifying the specific gesture action, it is necessary to determine how the digital character will react to this interaction, which requires thinking about the metaphorical part of the design. Metaphors can transform abstract or unfamiliar concepts into more concrete and understandable terms. By linking complex ideas to familiar objects or concepts, metaphors help users quickly grasp the intended meaning. This is particularly useful in digital environments.

The first is AI activation and human participation. The fact that the audience activates the digital characters to move and vocalize through gestural interaction can highlight the fact that the activation of AI relies on direct human participation and interaction. Here, gesture is not only a simple form of control, but also a symbol of human guidance and influence over the AI's behavior. This form of interaction mirrors the real-world use of AI technologies, which often rely on human input and control. The second is the blurring of the boundaries between AI artistry and human creativity. By reflecting this blurred boundary in the way of interaction, the audience becomes part of the artwork while controlling the digital characters. This duality of roles can highlight the complex relationship between humans and AI, reflecting the ever-shifting boundaries between humans and AI in an era of high technological development.

The specific interactive behavior is represented by a panoramic (x,y,z axis) movement of the digital character in the direction of the viewer's hand wave, with a phantom effect as it moves. The voice of the digital character will only sound when the audience waves their hands and will vary in intensity with the spatial distance travelled.

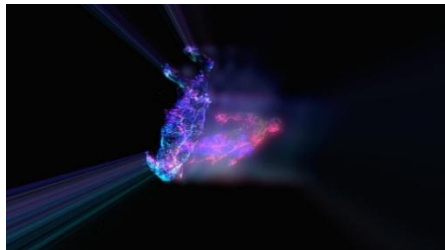


Fig. 13 Phantom effect from movement triggered by a waving hand

This interactive behavior contains metaphors like mirrors and shadows. Both emphasize the close connection between human behavior and technological development, as the shadow changes as the object moves, and the audience's gestures manipulate the digital characters, symbolizing how human behavior and decision-making shapes and influences the response and development of AI technology. It also represents the reflection of the digital figure's response to the gesture, symbolizing how the technology mirrors human behavior and emotions. This demonstrates the interplay between humans and AI, and how technology mirrors us while also being influenced by us.

6.6 Test of audience interaction with digital artworks

In the test of audience interaction with digital artworks, all ten audience members continued their participation. This phase aimed to observe and analyze how their interactions with digital artworks reflect the principles of DAOs, as well as the themes of artificial intelligence and human creativity. This part of the test mimicked a participatory exhibition, where each interaction with the artwork symbolically contributed to the DAO, showcasing a focus on collaborative and dynamic art-making. The participants' actions were similar to DAO members influencing outcomes through joint decision-making. This process highlights the importance of audience participation in art as an active, creative form of engagement, aligning with DAO's inclusive and collaborative art ethos.

During the test, audience reactions varied when interacting with the artworks. Some were surprised and curious when AI-generated artworks transformed into particles, challenging their perceptions of AI's role in art. This change reflected the fluid and ever-evolving nature of digital creativity. Conversely, when engaging with human-created art, some initially mistook it for AI-generated, underscoring the diversity and innovation in human artistry.

Participants felt empowered and engaged, likening their interactions to having a "voice" in the artwork's evolution. This aligns with the concept of DAO membership, where every action can influence outcomes. This feedback highlights the project's success in involving the audience not just as observers, but as active participants in the creative process. Moving from passive viewing to active interaction exemplifies the DAO's temporary membership goal, embodying its principles and helping viewers understand collaboration possibilities in digital art. By influencing the art, participants did more than alter its appearance; they engaged in a dialogue about creativity's evolving nature, emphasizing the project's aim to stimulate discussion on technology's role and collective input in artistic expression in the AI era.

6.7 Experimental interactive digital artworks and DAO

Due to the limitations of the current project, the envisioned model of collaborative art creation by DAO members could not be fully realized. Instead, the digital artwork for this project was created by me alone. This deviation from the original plan, while a limitation, provided an

opportunity for experimental artistic development and an exploratory step towards understanding the envisioned collaborative process.

In this case, my role was to represent the collective voice of DAO members. I chose the theme ‘Humans, Animals, Nature’ to reflect this collaborative vision. This theme provides a rich canvas for exploring the intricate relationships between these entities and depicting them through the eyes of AI and humans. The process of creating these artefacts was to explore more deeply how these relationships are perceived and represented in the digital environment. The goal is not just to produce aesthetically pleasing works, but to stimulate thoughtful discussion about the interactions between humans, animals, and nature in our increasingly digital world.

While the connection of the interactive gallery to the envisioned DAO remains an integral part of the project, the current approach highlights a key limitation: the lack of real-time collaborative input from DAO members. In the envisioned DAO, a token-based voting system is central to democratic decision-making, emphasizing collective intelligence and member participation. By regularly inviting members to vote on creative themes for upcoming projects, the DAO aims to ensure that artefacts reflect the collective vision of the community, particularly with regard to AI and human creativity.

However, at this experimental stage, the decision-making process is centralized in my hands as an initial exploration of the themes. Future iterations of the project aim to incorporate a token-based voting system to enable a more dynamic and collaborative art environment, as initially anticipated. This will allow the artwork to truly reflect the collective creativity and shared interests of the DAO community, reinforcing the principles of inclusivity and democratic artistic exploration [39].

6.8 Making experimental interactive digital artworks

As the most important part of the Interactive Gallery, interactive digital artworks are mainly divided into two parts: creation and display.

In the creation part, I use Rhino to design a wide range of models, from easily recognizable representations of reality to more abstract, convergent creations. In doing so, I aim to demonstrate the diversity of human creativity: on the one hand, realistic models demonstrate a commitment to replicating the complexity of the natural or physical world, with an emphasis on precision and detail. On the other hand, more abstract and integrated models are born from a creative artistic vision, blending elements of reality with imagination to create something truly unique and expressive.

AI-generated models created with tools like Stable Diffusion and Wonder 3D take on different states. Some of these models retain visible traces of the AI process, where the AI's fusion of images and ideas is clearly recognizable. Other models undergo post-processing and human tweaking, highlighting the role of human intervention in refining or redirecting the AI output. The significance of this tweaking process is that this can fuse the efficiency of the AI with human aesthetic judgement to create another hybrid art form. It can also allow viewers to think about where the line between AI originality and human originality lies, and how AI-generated art should be defined in terms of its copyright attribution after human post-production involvement?

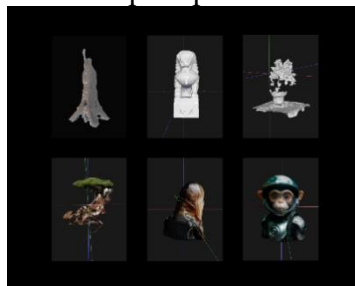


Fig. 14 Original models generated by humans and AI

While models made entirely by humans reflect the traditional skills and imagination inherent in the artist, AI-generated models reflect the emerging role of AI technology as a co-creator in the

artistic process. This comparative relationship can raise important questions for viewers about the nature of creativity and authorship in the age of AI. I expect to use it to challenge viewers to consider what constitutes "real" art and to assess the role of technology in shaping artistic expression.

To allow the viewer to think about these creations more objectively, beyond the initial impression of origins, rather than being brought forward with preconceived values of whether the creator's identity is AI or human. I went on to modify the stylistic image of the AI-generated and human-created models with the same artistic presentation, transforming them both into point cloud models as a way of further blurring the distinction between AI-generated models and human-created models.

It is worth noting that the conversion to point cloud modelling does not change the basic form or structure of the model, only their representation. Point cloud modelling uses densely placed points along the surface of an object to create a representation of the 3D object. This approach accurately captures the features of complex objects, but it differs from traditional models that define surfaces through mathematical formulas or are constructed from basic shapes such as triangles [40]. Applying point cloud modelling to AI-generated and human-created models changes their visual presentation, texture and how they are perceived, rather than their basic form. This approach can effectively add a layer of abstraction to models that makes them less immediately recognizable as AI or human-created models, thus stimulating deeper audience engagement and analysis.



Fig. 15 Converting a model into a point cloud model in Touch Designer

By converting all models to point clouds, artificial intelligence and human creativity can be placed on an equal visual platform. This conversion removes the inherent bias in representation and allows viewers to appreciate both art forms without preconceived notions of their origins. Metaphorically, the point cloud represents a basic, process-oriented view of objects, focusing on their structure rather than their final appearance. This shift in representation emphasizes the creative process itself, whether AI or human-driven, rather than the product. On the other hand, this emphasizes the data-driven nature of modern art. The point cloud is essentially centered on the data of the model and consists of discrete points that represent a greater whole. This demonstrates the increasingly data-driven nature of modern art and creativity, where data and digital tools have become an integral part of the design production process [40]. And the act of converting AI- and human-created artefacts into point cloud models can itself be seen as a commentary on authorship - the original form of AI or human creation is altered to provoke questions from the viewer about who has authorship in this new, transformed state.

Considering the form of the viewer's interaction with these digital artworks, I set up two different kinds of interactive feedback: along the same waving motion as in the Guided Discussion part, the AI-generated artwork disintegrates into the form of particles when the viewer waves, while the entirely human-created artwork shows a shift in artistic style.

Art created by AI breaks down into particles during interaction, symbolizing the inherently dynamic and transformative nature of AI art. It reflects how AI processes and reconfigures data, representing an evolving form of creativity [41]. This effect is a metaphor for the procedural nature of AI art. It also hopes to convey to the viewer that AI's creativity is not static but is constantly reinvented and redefined through its algorithms and data input. The transformation of entirely human-created art into another, more brightly colored style of art as it interacts represents the

diverse and ever-evolving nature of human creativity. It demonstrates the human capacity to adapt, reinterpret and reshape artistic expression. This transformation of artistic styles also demonstrates to the viewer the richness and depth of human art. As such, it reflects the historical processes and cultural influences that have shaped human creativity and highlights its ability to change and adapt over time.

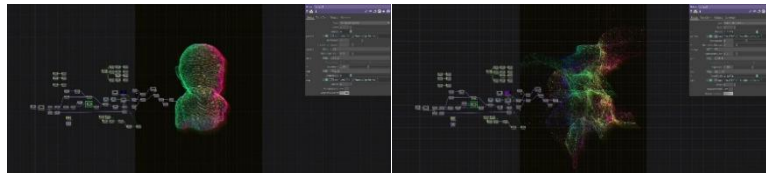


Fig. 16 AI-generated digital artwork / Fig. 17 Particle effects

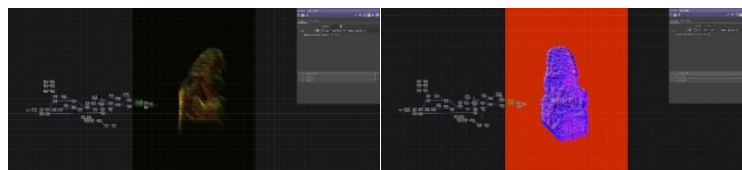


Fig. 18 Digital artworks created by human / Fig. 19 Transformation of artistic styles

7. Conclusions

In conclusion, the project is a fresh exploration of AI, human creativity and decentralized art management. By creating an interactive gallery that exists as a component of DAOs, it presents the audience with an interactive form of dialogue between AI-generated art and human-created art. This exploration not only enriches our understanding of modern art forms, particularly intervention art, but also highlights the transformative potential of technology in artistic expression.

Key insights from the project include the dynamic character of AI-generated art and its interaction with human creativity, underlining the evolving nature of art creation in the digital era. Nonetheless, the project recognizes its limitations, such as the need for greater audience diversity and the complexity of achieving synergy among multidisciplinary teams to build a DAO-based community. These challenges are not endpoints, but rather catalysts for ongoing research and development.

Looking forward, the project establishes a foundation for further studies in several critical domains. It urges a detailed examination of the ethical aspects of AI in art, particularly concerning authorship and originality. Moreover, it points to the necessity of advancing AI tools that can more effectively collaborate with human creativity. Most crucially, the project underscores the importance of practical research into implementing DAOs in creative management, advocating for this groundbreaking approach to democratizing the arts.

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