

Research on the Application of Rock Painting in the City Public Art

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Abstract:

At present, Chinese cities are actively promoting the construction of humanistic cities, implementing various urban renewal actions, including optimizing city structure, improving city quality, highlighting cultural grade, etc., and paying more attention to the enhancement of characteristic charm, spatial value added, design creativity enabling. Public art is an important part of urban construction and the inner driving force of urban sustainable development. This paper aims to deeply explore the concept and practice of the integration of rock paintings and public art in Juci Mountain, in order to protect and inherit this valuable traditional cultural heritage, and creatively combine it with public artistic expression in modern society.

Keywords:

Rock Paintings in Juci Mountain, Traditional Culture, Public Art, Innovate

1. Introduction

Rock is also the earliest canvas in the world. Ancient people carved and painted on the rock to depict human life, as well as their imagination and aspirations. This is rock painting. Rock paintings of Mount Kuci, discovered in the early 21st century. Xuchang folk photography enthusiasts Liu Junjie found in Zhengzhou City, Henan Province, China, after the initial sorting, and in the spring of 2004, invited some experts in batches up the mountain. The rock paintings of Mount Gusi are widely distributed, scattered on the 400-600 square meters of Mount Gusi. There are a large number of rock paintings found in Xinzheng, Xinmi, Dengfeng, Yuzhou, Gongyi, Changge and other counties and cities. There are 13 rock paintings in Tai Tiansui, Tai Zongci, Taibai Ling, Yantan Nest, Xiaojianshan, Xuanluo Ling, Fenghou Ling, Zhangjia, Xiaojianshan East, Shuangui, Shuangui East, Fengkou, and Boshi Ecological Forest. Each petroglyphs point is distributed in several to dozens of petroglyphs, each petroglyphs has one to several petroglyphs, and each petroglyphs is distributed in different numbers of petroglyphs combinations or single petroglyphs. These discovered rock paintings, large in number and complex in craft, have brought great shock and thought to people. Li Xueqin, a professor at Tsinghua University, described the rock paintings as "an epoch-making discovery". Since then, the rock paintings have become an important object of research in art and history circles.

These unique forms of artistic expression not only let us have a deeper understanding of the life and thought of ancient people, but also let us have a richer understanding of the historical development of Zhengzhou region.

2. The Historical and Cultural Value of the Rock Paintings in Mount Juci

The rock paintings of Mount Gusi can be divided into two categories. One is the rock paintings that represent specific images, which are rare; The other is the rock paintings that represent abstract thinking, which account for an absolute majority. The rock paintings of Jucishan Mountain, these precious cultural heritages, have unique artistic characteristics and rich and diverse subject matter content. At the same time, the content of the rock paintings in Juci Mountain is also very colorful. In terms of character image, hunting scene, dance posture, life scene and so on occupy the dominant position. For example, there is a painting of two women and a man with exaggerated genitals carved on a 5-square-meter rock mass, which is obviously a rock painting that expresses the worship of reproduction. These images are vividly depicted, as if they can let people experience the way of life and activities of prehistoric people. Animal images are also important elements in the rock paintings, including various beasts, birds and aquatic animals, which not only reflect the natural environment of human beings at that time, but also reveal their ecological knowledge and hunting life. In addition, there are more rock paintings that represent abstract thinking, which can be divided into a variety of sub-categories such as round cave, square cave, grid, line and irregular (that is, second-level classification), among which round cave subcategory accounts for the majority, grid subcategory follows, and square cave subcategory and line subcategory are rare. The appearance of these elements clearly shows the development of human creativity and abstract thinking. These symbols may be used to express a certain meaning, or they may be used to record or convey information, which indicates the excellence of human art and expression. These patterns and symbols not only show the wisdom and artistic talent of ancient people, but also reveal the life style, social organization structure and religious beliefs of prehistoric people. Through the study of the rock paintings in Juci Mountain, we can have a deeper understanding of the origin and development of human civilization, which is of immeasurable value for enriching the treasure house of human culture and promoting cultural inheritance.

3. The Concept and form of Public Art

Public art, or art in public space, is a form of art created in an open, unrestricted public space. It covers a wide range of art categories, including visual arts, painting, sculpture and installation, as well as performing arts such as music, dance and theatre. Public art emphasizes direct communication and interaction with the public, which liberates art from closed Spaces such as museums and galleries, so that more people can appreciate and understand it. Public art plays an important role in enhancing the image of a city. It can expose the history, culture and character of the city to the public, thereby enhancing the cohesion and pride of the city. At the same time, public art is also the embodiment of social collective wisdom and creativity, which reflects the public's understanding and pursuit of art. Public art is not only a kind of art style, in fact, public art can be realized by a variety of art forms, such as architecture, sculpture, painting, photography, calligraphy, water bodies, garden landscape pieces, public facilities; It can also be landscape art, installation art, video art, high-tech art,

performance art, performance art and so on; For public art, the important thing is not the form of expression, but the values. [7] These sculptures, murals, installations, performances and videos are often conceived, designed and created by professional artists or art groups who incorporate artistic inspiration into everyday life and add a strong cultural flavor to the urban landscape. Sometimes, in order to better show the humanistic care and community spirit of public art, the public is invited to participate in the creation process, so that the art works are closer to the public life.

At the same time, public art can also be a time-sensitive activity, such as a street concert, temporary installation or performance. These activities usually attract a large number of citizens to participate in, not only enriching the cultural life of the city, but also bringing a unique atmosphere and vitality to the city. These activities often require artists to have keen observation and innovation ability, in order to better combine art with real life, so that the audience can enjoy the art at the same time can also feel the temperature of society and cultural connotation. Therefore, public art can not only beautify the urban environment, but also improve the cultural literacy and aesthetic level of citizens, and promote the development and prosperity of social culture.

4. The Integration of the Rock Paintings in Zhengzhou City Public Art

4.1. Digital display

Digital display is a way to present the rock paintings in the form of high-definition images or videos in public places. It uses modern technology to bring the details and colors of the rock paintings to life through facilities such as large screens, projection equipment or LED displays. This form of digital display is often set up in museums, parks, squares and other public places to attract the eye of the audience. By employing advanced interactive technologies, such as touch screens, gesture recognition or virtual reality technology, viewers can interact with the rock paintings and explore the details, stories and cultural significance behind the paintings. This interactive digital display form not only allows the audience to understand and experience the rock painting culture at close range, but also enhances the sense of participation and interaction. Interactive technology driven by digital innovation can not only realize the interoperability between design and people, but also obtain a broader development space by changing the relationship between design and the public. For example, we can use the following ways to achieve: (1) Virtual reality (VR) exhibition: With the help of virtual reality technology, you can create a virtual exhibition of the rock paintings of Kuci Mountain. By wearing VR devices, citizens and visitors can enjoy the details and artistic charm of rock paintings in a virtual space. This kind of display not only enriches the viewing experience, but also integrates the traditional elements of rock painting with modern technology. (2) Augmented Reality (AR) experience: By setting up AR markers in urban public Spaces and using AR applications on mobile phones or tablet devices, citizens and tourists can watch the digital presentation of the rock paintings in real environment in real time. AR technology can make the elements of rock painting appear on paper, and complement the surrounding architectural landscape, adding a layer of digital cultural heritage to the city. (3) Interactive digital display wall: In specific places in the city, interactive digital display walls can be set up. Citizens and visitors can browse the digital display of rock paintings through devices such as touch screens and learn about their history and

cultural connotations. In addition, you can also design some interactive elements, such as triggering sound effects, light and shadow changes, so that the audience is more involved. (4) Digital art projection: Through the digital art projection on the building, the pattern of the rock painting of Kuzi Mountain is projected on the architectural surface of the city. This way of display can create a unique urban landscape at night or at a specific point in time, making the rock painting elements part of the night life of the city. (5) Online digital exhibition: Establish an online digital platform to display high-definition images, digital models and related literature of the rock paintings of Mount Gusi. Such a platform can cross geographical restrictions, allowing more people to enjoy the artistic beauty of rock paintings remotely, and also provide convenience for academic research and cultural inheritance.

In the digital age, the public has a deeper understanding of urban culture. Digital display provides a new way for the inheritance and development of urban culture, which not only allows more people to understand and appreciate urban culture, but also promotes the exchange and inheritance of urban culture. Through digital display, people can more intuitively understand the historical origin, development context and practical significance of urban culture, so as to better understand and inherit urban culture.

4.2. Interactive device application

In the field of daily life, the integration of art and technology has become an important proposition in contemporary design. The life of art is an important driving force for the future of contemporary design. In the process of integrating the rock paintings of Mount Gusi with the public art of Zhengzhou city, we can also use the application of interactive devices. The technology used in the interactive device is not whether the technology is the most advanced, but whether the creativity is excellent and whether the implementation is appropriate, which is the key to making the device produce the best interactive effect. Here are some possible ways and ideas having come up with:

(1) Interactive projection device: Use advanced projection technology to project the patterns of the rock paintings on urban buildings or the ground, and combine interactive technology. Pedestrians can interact with the projected petroglyphs by gesture, sound or touch. (2) Intelligent sensing devices: Intelligent sensing devices are set up around the rock paintings in Jutsi Mountain to sense changes in the urban environment through parameters such as flow of people and light. These devices feed back to the rock art display in real time, allowing it to make interactive adjustments to changes in the environment. For example, depending on the day and night, the color and brightness of the rock paintings can change, presenting a variety of artistic effects. (3) Interactive touch screen: Set up interactive touch screen near the rock painting to display high-definition images of the rock painting and related cultural information. Citizens and visitors can browse by touching the screen and get more information about the story behind the rock paintings. In addition, some interactive small games can also be designed on the screen to increase participation and fun. (4) Sound and light interaction: Combining sound and light effects to create an artistic experience of sound and light interaction. By setting up sound equipment, the rock painting elements can produce specific sound effects when pedestrians approach. (5) Holographic projection technology: Using holographic projection technology, the image of the rock painting is presented in the air in a three-dimensional manner. This technique can create a dreamlike effect where the rock painting elements appear to be

suspended in the urban space. Citizens and tourists can enjoy the beauty of the rock paintings in 360 degrees around the holographic projection. (6) Cloud interactive services: combined with cloud computing technology, set up cloud interactive services. Through mobile apps or other terminals, citizens and tourists can obtain virtual tour services of rock paintings in the cloud, including detailed explanations and artists' creation stories. This kind of service can provide a personalized cultural experience, so that each participant can gain an in-depth understanding of the cultural connotation behind the rock paintings.

Through the application of the above interactive installations, the integration of Jucishan rock painting and Zhengzhou urban public art will be more creative and dynamic. This interactive display not only makes the rock paintings a highlight in the city, but also inspires the strong interest of citizens and tourists in traditional culture, injecting new vitality into urban culture.

5. The Application Path of Jucishan Rock Painting in Zhengzhou City Public Art

5.1. Public art creation on the theme of rock paintings in Mount Kui

In the bustling urban public space, you can choose a monotonous wall, with the pattern and style of the mountain rock painting for unique artistic creation, to create a unique art wall. This art wall seems to bring people into the ancient and mysterious world of rock paintings, and has become a popular place for the public to stop to admire the art and socialize.

Artists can take elements such as magical patterns and far-reaching symbols in rock paintings as inspiration and skillfully integrate them into the language of modern art to create works of art that are both ancient and modern and complement the urban environment. These works not only show the cultural heritage of the city, but also give new artistic vitality to the public space.

Under the guidance of the rock painting patterns of Juci Mountain, the creation of art walls can choose traditional painting techniques, such as delicate sketches, colorful oil paintings, three-dimensional relief, etc., but also can use modern technology such as jet painting technology, the rock painting elements in a new and unique way to show, so that the ancient and modern perfect integration. The birth of this art wall not only brings visual enjoyment to the public, but also becomes a beautiful landscape of the city. It attracts more people to stop and appreciate, thus promoting the artistic atmosphere of public space to a certain extent, enhancing the connection and interaction between community residents, and uniting the joint force of the community.

5.2. Juci mountain rock painting theme park construction

A unique theme park can be created in the location of the rock paintings in Juci Mountain, which will integrate the ancient rock paintings with modern art and present a comprehensive scenic spot full of cultural flavor for tourists. This theme park can become a highlight of Kutsi Mountain, not only to enhance the local cultural image, will also become a new engine of economic growth. The Jucishan Rock painting theme Park will include various functional areas such as exhibition hall, outdoor display area, art creation area and leisure and entertainment area, which are independent and closely connected with each other, and jointly constitute a diversified

cultural experience space. In the exhibition hall, advanced digital technology and interactive screens can be used to vividly display all angles and details of Jutsi Mountain rock paintings, so that the audience can feel the unique charm and beauty of rock paintings at close range.

The outdoor exhibition area is another highlight of the theme park, and the establishment of real-size rock painting replicas or simulated rock walls will make visitors feel immersive, as if they are in the creative environment of ancient ancestors. These outdoor displays of replica or simulated rock walls blend perfectly with the natural environment, providing visitors with an immersive cultural experience. The establishment of the art creation zone is a continuation and innovation of the ancient rock painting culture, inviting artists to create modern art works inspired by rock paintings, integrating two completely different art forms and showing a different artistic charm. This will not only enhance the artistic value of the theme park, but also provide a new viewing experience for visitors. The establishment of leisure and entertainment areas is to meet the diverse needs of tourists, providing a variety of entertainment and leisure facilities. Such as cafes, shopping areas, children's play facilities, etc., the establishment of these facilities will enable tourists to enjoy cultural experience at the same time, but also enjoy comfortable leisure time. At the same time, these facilities can also increase the length of visitors' stay and improve the visitor stickiness of the theme park.

The construction of Juci Mountain rock painting theme park is not only the inheritance and protection of the precious cultural heritage of Juci Mountain rock painting, but also the innovation and development of cultural tourism. This theme park will become an important attraction and economic pillar of local cultural tourism, attracting more tourists to come here and learn about and fall in love with the rock painting culture of Kuci Mountain. At the same time, it can also drive the economic development of the surrounding areas and enhance the overall image and popularity of the Utsi Mountain area.

6. Conclusions

As an important cultural heritage in early China, the rock paintings in Gusishan Mountain have unique artistic value and historical significance. These rock paintings not only provide us with precious pictures of the life, beliefs and culture of ancient human society, but also an important basis for us to understand history and study art. As Mr. Li Xueqin pointed out: "The discovery of rock paintings in Juti Mountain can be promoted to the level of Juti Mountain culture, which is an important discovery of epoch-making significance, which relates to the understanding and exploration of the germination and origin of ancient Chinese civilization, and also relates to the role played by the Central Plains in the origin of Chinese civilization." It will change our understanding of issues such as the origin of Chinese characters. The integration of rock paintings and public art is an innovative attempt, which is not only conducive to the protection and inheritance of traditional culture, but also can bring more artistic colors to modern society. We hope that through in-depth discussion of the concept and practice of this integration, we can provide more ideas and inspiration for the future development of rock paintings in Jutsi Mountain.

Conflicts of Interest

The author declares that there is no conflict of interest regarding the publication of this article.

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