

Augmented Reality in Abstract Paintings

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Abstract: In this article, the concept of augmented reality is working on the mechanisms and applications in abstract paintings as augmented reality has a fundamental role in reviving the idea of abstract painting, which enables art lovers to enjoy painting more and accordingly changes the aesthetic standards. In addition, to utilize augmented reality, we can move abstract paintings from the stagnation of reality to a voluntary imagination. As well as augmented reality enables interior designers in displaying their designed projects before applying them in the real world. Thus, this assists art lovers to display an abstract painting in their houses, offices, hotels or every place before purchasing it which saves more money for the art lovers due to this application will help them imagine the decoration of interior design and select the most suitable to what they want and desire. In addition to assisting fine arts students to express their artistic ideas through augmented reality.

Keywords: augmented reality, abstract art painting

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Introduction:

In these studies on the effect of augmented reality on abstract art paintings, an augmented reality application that aims to enable art lovers to interact with the works in the gallery environment. For instance, augmented reality in mobile applications which is an Art Placer application, where paintings on the walls and art galleries are displayed on a real scale. In this way, abstract painting buyers can be helped to visualize artworks at home using augmented reality technology. In addition, designers can beautifully coordinate interior design elements through color consistency and vocabulary.

What is Augmented Reality?

The definition of AR, where this term comes from, its relations and differences with other environments and technologies are included. The approach that AR is not a technology, but an environment, which is mentioned from time to time throughout the book, is frequently mentioned in this section as well. In this section, it is emphasized that what is meant as a medium means a mediating exchange of interactions between human-computer, human-human and computer-human. In particular, unlike other definitions, AR is a real-time and interactive environment created by adding virtual/artificial information to the physical world; It is stated that it takes place in both spatial and temporal contexts. It is stated that AG has the potential to reach experiences that we cannot experience in daily life with the interactions it provides; AG, which can be used in many different ways, from GPS mapping systems to barcode technologies; It is emphasized that it can be used in various ways from mobile applications to smart glasses. The different and important point mentioned in this section is that the virtual information added to the physical world can be visual and auditory, as well as covering the senses of smell, taste and touch. The author frequently draws attention to the use of other senses other than sight and hearing, which are not mentioned in many sources, in AR. [1]

Augmented Reality Applications

What are the factors that make an augmented reality app good?" In this section, which starts by asking the question, the application areas such as magic books, mirrors and lenses are examined. In response to the question of what makes an AR application good, it is mentioned that it should have a structure that enriches the sensory qualities of the user. It is emphasized that the applications performed mostly for visual and auditory senses today can be used for other senses in the future as well. In this section, the factors that make AR applications interesting, how to evaluate AR applications, the types of AR applications, how AR can be applied to a problem, collaborative AR applications and case studies about applications using different technologies are included. The main idea to be given in the chapter is to emphasize that an AR application cannot go beyond a technological innovation and tool unless it is for problem solving. Also , some certain applications (ColAR , T.rex , Anatomy) with visuals by supporting in detail is shown . [2]

Augmented Reality models

Art Placer application is considered one of the most important applications that is used in the field of art to display artworks in general as illustrated in image 1. This application assists interior designers in displaying artworks by using augmented reality to display the artworks before applying them to their projects in the real world. Software companies have produced several augmented reality applications due to this application being applicable in many fields such as science, sports, and art.



(Image 1.) Art placer AR app within the AR environment of the image to experience (Art placer AR ,2020)

Abstract Art

Towards the end of the 19th century, the place of artists in society had changed considerably compared to traditional art. Abstract painting, which we can consider the product of impressionism and cubism, was born as a new world view in the art environment of the 20th century. Art historians who try to put a starting point in abstract painting point to a work done by Kandinsky in 1910. Kupka, Malevich, Mondraian, Klee, Delaunay with Kandinsky started abstract art executive the one which other artist's aspects can be displayed. However, at that time A lot artists this New World from the point of view were influenced by abstract countable studies they have done. For example, futurist artist Giacomo Balla 'Mercury of the sun from the front' passing 'table with speed item from your picture pulling geometric to compositions oriented. Abstract official other from your pictures separating -most important feature objects evoke it does not evoke. with Kandinsky together society, human creativity in terms of that day until not seen And of the known outside One with the artwork had met.



(Image 2): Giacomo Balla, Mercury of the sun from the front Passing, 1914

Abstract painting other from your pictures separating -most important feature objects evoke it does not evoke . with Kandinsky together society, human creativity in terms of that day until not seen And of the known outside One with the artwork had met. Kandinsky, it abstract picture directing personal your observation Like this say it has brought : “ yet starting One group time was . with my pallet without working I've just come home , yet I was pensive And finished i am my work I was thinking ; at work This next in line suddenly inexplicable much Beautiful And One drink glare with shining One table i saw . first with astonishment stop and I stayed later immediately form , color Another One thing i have not seen And content incomprehensible the one which... This enigmatic picture I'm close . Immediately the enigma will solve switch I found : This is mine made i am And laterally to Wall based on standing One table was . Next day , this from the picture Yesterday i got impression day in the light of to receive I've tried But this however half in half I succeeded , albeit sideways , in the table objects I always noticed And Now Now your group thin The shine is also missing . Now definite aspect that I know : Object , to my pictures becomes harmful .”1 Kandinsky 's expression that he like of the object formal your presence picture damage to give abstract art for One principle nature carries

. your form sought after place Now objects world not man's drink is the world . Like this your art world external from the world man's drink to the world slipped happens . “ But her drink World said the romantics emotional their world is not . On the contrary, it is fear , joy , sadness , etc. feelings rough stove feelings aspect qualifies . From these feelings ' inner purified by necessity , _ exceeding ' high level to the truths opens And to freedom gets it . freedom , color And format like external of factors ' spiritual ' is to 'hear' the vibrations .”² With the application of augmented reality to abstract paintings, it gave the artist the ability to use it to showcase suitable paintings that fit his idea. [3]

Illustrated in (**Image 3**)



(**Image 3**) Artivive app with in the AR environment of the image experience (Artivive , 2023)

Conclusion

Art has become a part of daily life and the art lovers become looking for a beautiful paintings which appropriate to their art tastes. From AR the art lovers could coordinate the paintings with the decorations of houses, offices and everywhere.

The steps that should be followed to apply the augmented reality in abstract arts as follow:

- Concentrate on clarifying the idea of artist that wants to convey to the audience.
- Selection the suitable technique to display the artist idea
- Its necessary selection the art paintings that attract and eye-catching of the audience
- The colors and symbols should be clarified in order to be applied in the augmented reality.
- Abstract painting should be attractive to the audience
- Augmented reality emphasizes that artists use it in their artworks and innovate new ideas.
- Architects and interior designers should utilize a technique that is suitable to display their abstract paintings in their projects.

- I recommend teaching augmented reality to fine arts students and most important choosing a suitable technique in teaching.

References

- [1] <https://dergipark.org.tr/tr/download/article-file/402534>
- [2] <https://dergipark.org.tr/tr/download/article-file/402534>
- [3] 20. yüzyıl soyutlama sürecinde geometrik biçimlemenin Türk resim sanatına yansıması (trakya.edu.tr)

Image 1 . <https://clarkhulingsfoundation.org/artist-story/showcase-your-art-in-virtual-spaces-with-artplacer/>

Image 2 . Mercurio che passa davanti al sole (Mercury Passing before the Sun) (philamuseum.org)

Image 3. <https://www.pinterest.com/pin/459085755780079670/>