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# **Conceptualizing Touch Aesthetic Communication as A Model Pictorial Art Appreciation**

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### **Abstract**

Haptic communication through pictorial art remains an argumentative subject of aesthetic experience, with many unresolved issues until today that question the how and why reactions of various people. Throughout this framework of research, a conceptual examination of experiencing a pictorial work of art (its duration, intensity, and individual art expression) for a congenitally blind person by applying the Verbal Protocol Analysis (VPA) approach model was designed to enhance the experience from the blind and visually impaired group of people. This study provides an observation procedure within the influence of 'time of experience' and 'art expression' mediated by 3D printed tactile flashcard within the parameter of the basic language of art and design through the elements of art and the principles of design that is being incorporated in the 3D printed tactile flashcards. The findings of this research will be the key to knowing how blind and visually impaired people can experience and value the work of art through a mediator to explore their basic understanding of art and design.

**Keywords:** Art; Touch; Communication; Visual Art Experience; Tactile

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### **1.0 Introduction**

Communication is essential in our daily life. It is a critical factor in sending messages to people around us. However, through art, one of the main reasons why art is being produced in the first place is basically to send a message to the audience. But, most art being made is meant for sighted people to value and enjoy its piece work. The one group of audience that is being neglected in our society is disabled people. To this, the researcher is just focusing on the primary target audience is blind people and visually impaired people. The researcher sees it as a challenge and an opportunity to explore this sight of communication for the blind and visually impaired to value and appreciate art in its best state. To support this statement David Sless (1981) stated that visual communications, if only we understood how it, could exploit it with the richness of using the potentially valuable tools in education.

One of the central issues in going to a gallery worldwide is that it is not for anyone to touch or feel with their hands. The reason is to preserve the artwork for the life expectancy of the artwork. It's alright for people who can see with their eyes to appreciate and value the artwork in the galleries (Coates, 2019). However, the blind and the visually impaired (audience) cannot see with their eyes. Seeing to them is by smelling and touching, using other senses of their body to replace the seeing with both eyes. And haptic perception is essential for

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our daily activities, and it should never be underrated in anyways. And this is a challenge for towards world for us to overcome this issue. (Jones, 2018)

While looking at other parts of the world at how they have evolved in the art industry for the blind and visually impaired, museums and art galleries have been made meant for the blind to appreciate and value art. They have taken it to the next level of art aesthetics. However, in this country, it is an opportunity for the researcher to step in and help the artist and the blind bridge the idea of how the blind can communicate with the artwork. Mohamad, N. et al. (2017) stated that Malaysia's Design Industry in Malaysia is changing for the past three years towards recent years compared to other developed countries such as the United Kingdom, which has already well-developed and operate globally. Hence, to achieve that, Kaspin, S. (2021). Mentioned that a proper system or model must be proposed to improve, control, and sustain the industry. The researchers would like to highlight how to bridge the artistic impression by valuing the artwork. The communication through the artist will be a prototype that can be appreciated through the principles and elements of arts, which can be evaluated by our target audience, which in this case would be the blind people. Unfortunately, the blind audience cannot celebrate that aesthetic value through art, and this is because the blind audience is more sensitive by touching smelling without seeing.

## 2.0 The Visual Art Experience and Visual Art Expression

Not many researchers have been discussed the idea of touch as an aesthetic experience. This subject can further the discussions to be investigated and more profound in terms of the incident in art. This has been explained and discussed by Davis (2019) that looking into the diverse nature of tactile experience could emphasize the visual perception of art by disrupting our common sense understanding of aesthetic experience and norma 'the normative sensory subject.' But it seems that (Lauwrens 2019) mentioned that there should be more discussion and opportunities to highlight this research to go deeper where blind and sighted audiences can share and negotiate their art experiences.

Furthermore, she had explained that this research topic and issues should be given the attention and awareness that is needed not only on the aesthetic for the blind but also ways of which touch can enrich the aesthetic experience for everyone. The study also highlighted that further research could be done to explicitly discuss the nature of contact as an aesthetic experience. Another investigation by Riitta Lahtinen (2017) mentioned that haptic art experience could be described as vocal sound and written words for the deafblind to value artwork by using sculpture in haptic exploration to how this will lead to sound descriptions and inner experience. The haptic exploration (mental image of sculpture) then was re-interpreted by their voice and body sounds, sometimes combined with sounds made by touching the artwork. To support the argument of whether technology could also play an essential role for the blind, Hayhoe, S. (2008) stated that both studies have shown that forms of blindness can provide physical and technological advantages in specific educational contexts.



Fig. 1: Image on top showing how visually impaired can read by touching Quranic Braille to recite the Quran.

(Source: *Blind Malaysian Muslims memorizing Quran using Braille*, *The Straits Times*, June 8, 2017, <https://www.straitstimes.com/asia/se-asia/blind-malaysian-muslims-memorising-quran-using-braille>)

## 3.0 Vision and Tactile Perception In The Context of Pictorial Experience In A Congenitally Blind Person

The question of the meaning of tactility remains imprecise. It is always confounded with haptic and kinesthesia, which gives us the results of ambiguity. (Mădălina Diaconu, 2006) The researcher also explains that no ordinary subject can experience purely tactile works of art because we tend to visualize everything we see. Hence, the elements of the haptic system, through the sense of touch, pain, force, and

temperature, are actively engaged in our everyday aesthetic experience of fine art. This research aims to study the Blind and Visually Impaired people in understanding the aesthetics in art through haptic art experience.

The research explores the aesthetic in the art within the parameter of haptic art, which is to identify a detailed description of underlying knowledge associating the Visually Impaired Audience's reflection with tangible aesthetic value. Furthermore, this research is to associate artists' interaction with Blind and Visually Impaired Audiences' knowledge valuing aesthetic content through haptic. And also to discover emerging communication language as the fundamental theory of Visually Impaired experience through appreciating aesthetic value. This research fills the gap between the artist in producing artwork and sending the message through the painting to a specific group of the audience, also known as blind people and visually impaired people. The study will provide a 3D printed tactile flashcard prototype using the basic language of art through the elements of art and principles of design to highlight the understanding of the message through this form of artwork. Hence, the accessibility can reach the audience and visually disabled people because they understand art using other senses such as smell and hearing. The most common is by touching. Vermol et al. (2018) explained that further knowledge is required on the involvement, how users describe a product, and how they are related. A function of a product is according to each practice and experience. There have been so many studies using technology and the sense of touch in communication, and the tactile mode uses a big part of the skin to give information, and the results of the tactile simulation can be shown, and to utilize the potential of this means of communication (Jones, 2008)

#### 4.0 Methodology

This study will look at the blind and visually impaired group as the primary target audience, thinking aloud in evaluating their experience on touch responses through artwork form and texture to provide Haptic Art Experience to complement and enhance the creativity of artists through this group. This is to justify and clarify the tangible aesthetic value of the Blind and Visually Impaired group reflecting upon the basic understanding of the principle and elements of art.

The artwork of a 3D printed tactile prototype will be used as a mediator for the blind and visually impaired groups to touch and analyze. This research plans to develop a systematic experiment by adapting Verbal Protocol Analysis to identify Human Haptic Art Experience. This experiment would take place in a lab test. The Verbal Protocol Analysis is basically to generate study research activity in investigating the haptic art experience by the Blind and Visually Impaired Group in the context of reasoning.

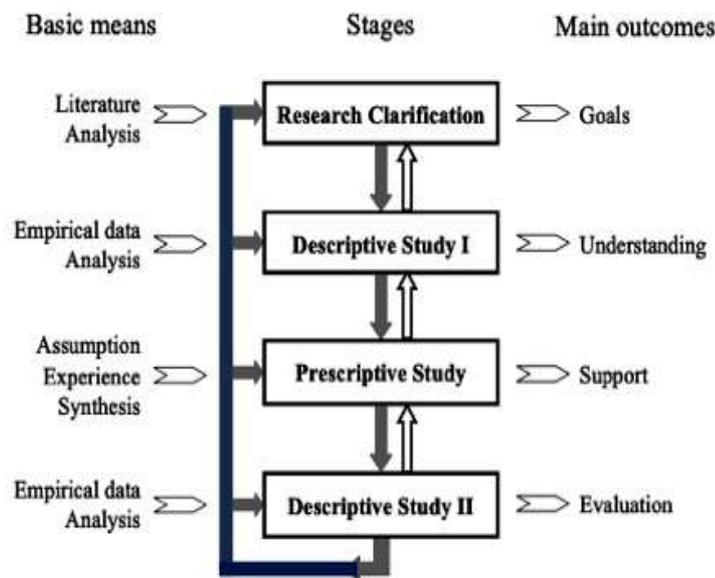


Fig. 2: Design Research Methodology framework based upon Blessing and Chakrabarti (2009) to investigate the Haptic Art Experience.

The Design Research Methodology framework of Blessing and Chakrabarti (2009) has been used widely in the research field. Nevertheless, they have explained that the increased understanding of the existing situation is for the researchers to correct and improve the actual situation. This design framework will be the key in finding the critical factor of human behavior development towards this research.

The research design framework is being put together to investigate the Human Haptic Art Experience and answer the main objectives of this research by looking at and understand the aesthetic value of the BVIG context. This was done based on the research design framework of Vermol et al. 2015.

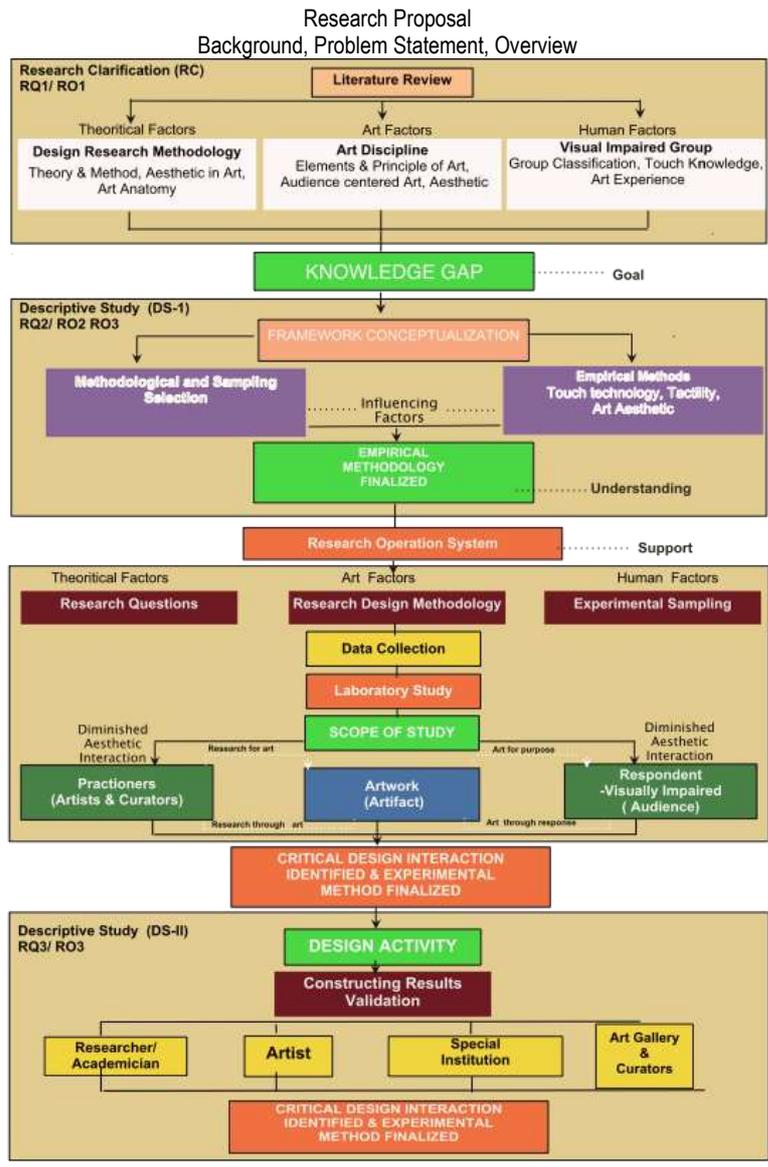


Fig. 3: An expanded framework for design as a communication process for the aesthetic experience in art for the Blind and Visually Impaired group.

4.1 Research Questions

Research questions were put together for the research findings to help evaluate and analyze the data gathered. The main idea of this research is to underlie the roles of the touched knowledge associating with identifying a rich description of knowledge associating with the Visually Impaired Audience' to tangible aesthetic value. The author will also be looking at the Blind User- Designer procedural experiences affecting associating artist's interaction towards Visually Impaired Audience experience in valuing aesthetic content through haptic art. The discovery of emerging commutation language will be the fundamental theory of Visually Impaired experience through appreciating the value of art.

4.2 Verbal Protocol Analysis

The use of this method is very vital and important to discover and analyze the importance of the blind user group human behavior. 'verbal protocol' has been labeled in such a way to explained and describe the data that has been gathered from an individual under special conditions, where to person is asked to 'talk aloud' or 'think aloud' (Alison Green, 1998). Furthermore, the protocol can also contain utterances made as one's will be carried out a single study or a series of tasks. A set of protocols can be collected to constitute a body of qualitative data. Verbal protocol analysis was designed for this research to provide both the testing on the prototype and also developing the theories for this research.

4.3 Sampling

The researcher will use a qualitative research method with a phenomenological approach. This approach examines how the understanding of elements of art and principles of design can be a form of a tool for blind people and visually impaired people to understand and appreciate

the value of art. The phenomenological study will look at how blind people and visually impaired people behave, react, interact, interpret and reflect based on their understanding and how this could be a tool for the blind towards the appreciation of art.

<b>B4 - 20/200 to 20/400</b>	They are considered a severe visual impairment or severe low vision.
<b>B3 - 20/500 to 20/1,000</b>	They are considered profound visual impairment or profound low vision.
<b>B2 - More than 20/1,000</b>	They are considered a near-total visual impairment or near-total blindness.
<b>B1 - No Light Perception</b>	They are considered total visual impairment or total blindness.

Fig. 4: Sample group cluster of the blind and visually impaired group based on visual impairment in Paralympic Sports

Samples from this study will be focusing on the group with severe blindness off class B4. 30 blind-audience will be put to the test on this pilot study and another 30 to confirm the resulting outcome. The researcher will give out questions to measure the effect based on the questionnaire and sequence of activities.

- i. *Data Collection* (Blind and Visually Impaired Group experience)
  - Haptic Input – Form and Touch responses
  - Thinking aloud input – Appearance, assistive and aesthetic responses
  - Element and Principle Dimension and Haptic Properties Input –Adjective responses

#### A. Stage 1

It calibrates the data of 30 respondents, including lecturers of art and design, students of art and design school, and a fine artist involved professionally in the industry. This is to establish the selected candidates to identify the importance of art's elements and principles theory. Once this has been done, an excellent image can be transferred to an excellent image based upon the results questionnaire. The process of calibrating dimension, by the visually impaired to perceived and interpret the information based upon the mediator (artwork) that will be given out to the respondents (visually impaired).

#### B. Stage 2

A 3D printed tactile flashcard prototype, also known as a mediator, will be given to the respondent at this stage. Discussion on the prototype is to be finalized in terms of the respondent understanding the message and the meaning from the prototype given to the respondent in analyzing the understanding of art for the blind and visually impaired. Constituting influence, at this stage, the five selected respondent (blind audience) is to be given the mediator to respond based upon the artist Impression of aesthetic value. Data collection from this experiment will be recorded based on the description of Blind and Visually Impaired Group perceived experiences by touching the artwork in front of them.

#### C. Stage 3

Preconfiguring issues Looking over an activity that can compare the haptic influence from another mediator between mediator A and mediator B. These stages will be conducted in a lab using the verbal protocol analysis with the blind and visually impaired group. Detailed evidence of the oral report will be distinguished by the validity and reliability of the coded data of verbal protocol data. Data collection from this experiment will be recorded based on the description of Blind and Visually Impaired Group perceived experiences and only explain their experience in terms of adjectives. This is to justify the understanding of elements of art and principles of design for the reasoning of aesthetic pleasure and value.

#### 4.4 Participants Analysis of The Quantitative Change Intensity of The Pictorial Art Experience

Crilly, Moultrie & Clarkson (2004) highlighted the idea of aesthetic principles and theories that could also provide a helpful foundation. These ideas will then be transferred into the research in looking at how the elements and principles of art could be the aesthetic principles and the foundation of looking into the haptic art experience for the blind and visually impaired group. The experiment that has been done through art (mediator) works that have been given verbal responses by the participants that went through the art experience will be characterized and categorized accordingly into each reaction of the classification system.

## 5.0 Findings and Discussion

Based on Fig. 3, the researcher will be looking at how to gap between an artist in creating artwork can be produced and looking into creating an artwork that can transcend to the visually impaired as a receiver in the evaluation and value of an artwork. How far can an artist put their thought and creativity in creating the artwork into consideration? Hence, they can experience art like everyone else. To further discuss this matter, (Classen, 1998) explained that touch could simulate vision. Furthermore, touch has a sensory dynamic and aesthetic potential that we could investigate and explore more. Based on this research, once all data has been collected from the experiment of the blind and visually impaired people through a prototype, this is to measure the possibilities for the unsighted audience, through the fundamental of art and design, to capture the essence through these basic understanding.

We can say that this research would benefit not just the sighted group audience, but it could also be enjoyed by the unsighted group of audience to value art at its best state. It is also meant for the artist to produce artwork and for the designers to design products that can open doors for the blind and visually impaired to enjoy a work of art. In other words, it could open to both worlds with their best interest at state. This is also the opportunity for artists and designers to explore more works of art that could also benefit the blind and visually impaired in creating their artwork and means of communication.

## 6.0 Conclusion and Future Recommendation

How can visual representation convey meaning, and based on this, how can we construct meaning in our social context? In general, the experiment will be taking place at Malaysia Association for the Blind (MAB) in Kuala Lumpur to stimulate and observe the researcher to understand aesthetics in art through the sense of touching. This research will highlight how they can explore art within the parameter of haptic that stands upon the central part of art and design, using art fundamentals through the elements of art and the principle of design. Based on this principle, art and design can evolve within haptic art's context. The 3D printed tactile flashcard prototype will be used and created to ensure that the tactile and technology are incorporated in highlighting the sensation of touch senses for this study. The results of this research will be valuable to artists and designers as fundamental guidelines to produce more artwork and symbols to aid the blind and visually impaired group.

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