

## THE ENDLESS POSSIBILITIES OF PAPER ART: DESIGNING THE PERAK TRADITIONAL COSTUME (PUTERI PERAK)

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### Abstract

Paper art has existed since the paper was first invented in China around 105 A.D. Ever since, various types of paper art and craft has been established around the world. The research discovered that paper art has an enormous potential to merge with the Malaysian culture and heritage. Therefore, the research replicated and expanded the paper art concept by creating a hybrid art invention, which highlights the kirigami art and Malaysian traditional costume. Literally, there are several established artwork utilizing the kirigami concept in the art scene nowadays. Eventually, there are minimal study that has been done concerning the Malaysian traditional costume. Therefore, the research primary aim is to design a hybrid art by integrating the Japanese art; kirigami with Malaysian traditional costume; Puteri Perak and to discover its potential. In relation, the paper has employed a qualitative case study within the pragmatic paradigm, which involves a studio-based design and documentation on the literature review instruments. The research has intentionally focused on designing the artwork which involves several studio-based methods such as sketches, drawing, material experimenting, origami folding technique exploration, prototype and artwork fabrication and finally the artwork finishing process. The studio-based chronology is an essential phase in the research towards producing a delicate hybrid artwork that is enriched with aesthetic values. The paper has presented the result achieved from the analysis found. The research outcome has an immense potentiality to contribute new knowledge towards modern art scene, Malaysian culture and heritage and as a reference in the academic studies.

**Keywords**—Kirigami Art, Origami Art, Folding technique & Puteri Perak Costume

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### INTRODUCTION

Paper art is a unique artwork as it is enriched with numerous aesthetic values. The uniqueness characteristically emphasizes on the material itself as it is capable to construct an exquisite artwork. Paper art preliminary is associated with Japanese culture which is usually referring to the art of origami and kirigami, yet the paper has highlighted the combination of paper art as the main concept. Kirigami which is known as the art of paper cutting and folding engages numerous of cutting and folding technique in constructing a delicate artwork. The art represents an exquisite two-dimensional or three-dimensional paper artwork that is constructed by a geometrical form. (Hiroshi Hayakawa, 2009). Yet the art of origami is also known as paper folding. Origami is an exclusive art as it visualizes the Japanese philosophy, culture and heritage. (<http://thepapercraneorigami.com/animal-symbolism>). The art presents a delicate three-dimensional construction of a geometrical form from a single square paper that requires multiple intricate folding techniques (Bolitho (2014), Mitchell (2010), Hiroshi Hayakawa (2009) & Gardiner (2008). Therefore, the research found that the combination of origami and kirigami art has an enormous potential to developed into hybrid art. The uniqueness of the characteristic elements enables it to be capable to create a delicate Malay traditional costume. Therefore, the paper intention is to design a hybrid artwork that is integrated with the art of kirigami and Malaysian costume; Puteri Perak.

The paper anatomy has engaged a qualitative case study within the pragmatic paradigm, which involves documentation on both the literature review and studio-based design as the main instrument. Both instruments are essential to create a delicate hybrid artwork.

A documentation on the literature review is derived from various sources for instance journals, book, articles, and internet sources. Only the precise and accurate data has been developed into a hybrid artwork notion. The research has given full engrossment on the artwork fabrication which involves a studio-based design. The phase consists of several processes such as sketches, drawing, material experimenting, origami folding technique exploration, kirigami cutting technique, prototype and artwork fabrication and finally the artwork finishing process. The process has utilized the elements and principles of art and design model as a guideline to ensure that it is enriched with aesthetical value.

The hybrid product is a new art invention; therefore, it has immense potentiality to contribute a new knowledge towards modern art and as a reference in the academic studies. The artwork also has a positive potential to market as one of the educational souvenir items. The uniqueness of the product is that it is enriching with abroad functionality as it is not only focusing on the ordinary art purposes (artwork) as the primary function, yet it is awash of education aspect. As mentioned earlier, the idea derived from a combination of Japanese art and Malaysian culture, therefore it is competent to deliver knowledge and information towards enhancing the society knowledge, particularly on the Malaysian and Japanese heritage and culture. Moreover, the artwork is a handmade product that is engaged with aesthetic value, which is suitable as a collectable item.

### RESEARCH METHODOLOGY

The research performs a comprehensive method using the qualitative research design throughout the pragmatic paradigm. In order to manage a depth study, the research has implemented a documentation on the literature review and studio-based

design as the primary research mechanism. The figure (figure:1) below displays the research design anatomy that has been utilized in the research.

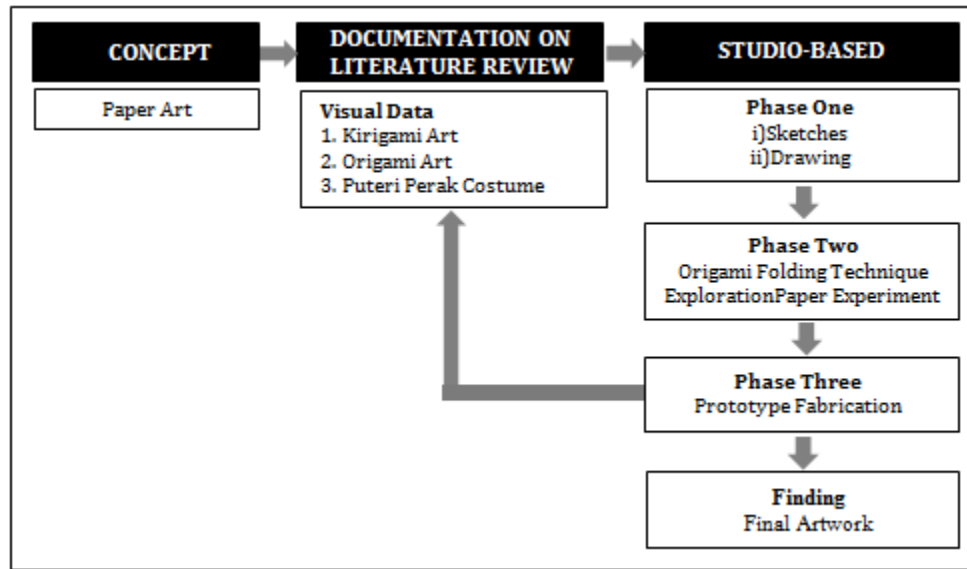


Figure 1. Research Design Anatomy

**Documentation on the Literature Review**

Concerning to the research intention, the study has utilized a documentation on the literature review as an essential phase. The research data has been obtained from various perspectives including visual and description instruments which have been derived from different materials including journals, articles, books and internet sources. The research has emphasized on the Perak traditional costume concept though paper art construction, therefore the study has begun to collect a description data concerning to the research intention. The phase has focused on the Puteri Perak costume, kirigami art and origami art. The figure (figure:2) below displays the study on the literature review that has been utilized in the research.

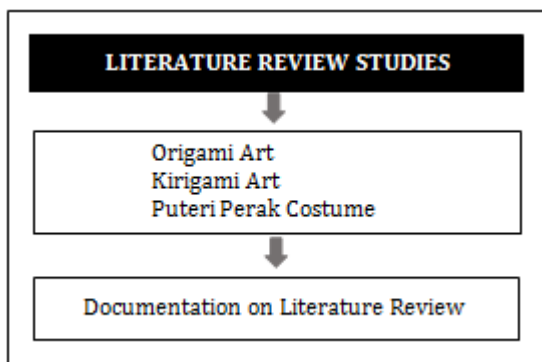


Figure 2. Research Design Anatomy

**Origami Art**

In order to create the hybrid artwork, the research has utilized origami art as one of the main concepts. Origami is a unique Japanese art as it is enriched of aesthetic value that visualizes the Japanese philosophy, culture and heritage. The art is not only converging on the delicate artwork, yet it is also capable of educating the societies in a diversity perspectives. (Abdul Jamil, 2019).

The Origami terminology is derived from two combination of Japanese words which are *ori* and *gami*. (Bolitho (2014), Mitchell (2010) Hiroshi Hayakawa (2009) & Gardiner (2008). The term *ori* mean to fold, which it is representing the art method while the term *gami* or *kami* mean paper which it is representing the art medium. (Bolitho (2014), Mitchell (2010) Hiroshi Hayakawa (2009) & Gardiner (2008). Origami can be defined as a three-dimensional (3D) paper art that focus on the paper folding technique to construct a delicate artwork (Abdul Jamil, 2019).

The research has discovered that the origin subject for origami were based on animals including *tsuru* (crane), *neko* (cat), *usage* (rabbit), *sakana* (fish), *chocho* (butterfly), *tatsu* (dragon), *kame* (turtle) and *kaeru* (frog). Literally, the Japanese culture has displayed that the animal subject have played a crucial role in the origami art. Every single subject has its cryptogram that represents Japanese ethnicity (<http://thepapercraneorigami.com/animal-symbolism>). In art nowadays, the origami subject has been developed into various living things and non-living things. (Lang, 2011).

The uniqueness of origami art is the constructed method. Origami has been specifically designed by emphasizing a singular method which is a folding technique in a single squared paper to create an exquisite artwork that is enriched with aesthetic value, depth and dimension (Bolitho (2014) and Abdul Jamil (2019). Therefore, the precise folding technique is the most essential element to construct the perfect origami artwork. According to *Mauvement Francais des Plieurs de Papies (MFPP)*, there are five basic origami folding techniques including the valley fold, mountain fold, pleat fold, inside reverse fold and outside reverse fold. Jean-Claude Correia, the founder of the MFPP origami club, held the international origami conference (Trebbi, 2012).

Bolitho (2014) affirmed that there were several origami folding techniques and base to form a flawless origami artwork. The folding techniques are basic fold including the mountain and valley fold, reverse fold, crimp fold and sink fold. Besides, there are three origami basic bases such as preliminary base, bird base and waterbomb base. Hiroshi Hayakawa (2009) affirms that there are two types of folding techniques such as the mountain

and valley fold. Gardiner (2008), affirm that there are fifteen types of origami folding technique including the book fold, cubbord fold, blintz fold, pleat fold, biset fold, inside reverse fold, outside reverse fold, double reverse fold, inside crimp fold, petal fold, squash fold, open sink fold, rabbit ear fold, double rabbit ear fold and swivel-fold. The research has determined that only the exact folding technique is capable to create the perfect structure for the artwork construction. On the hand, the origami art refuses any modern devices and process such as cutting, tapping and strapping rather then folding techniques as to preserve the purity of the originality.

**Kirigami Art**

*Kirigami* is a two dimension (2D) Japanese paper art which the terminology has derived from two combination of Japanese words, which are *kiri* (cutting) and *gami* (paper). Kirigami is an amazing paper artwork that requires various fabrication processes such as a precise cutting technique, a multiple folding technique as well as a specific shaping process. In order to construct a delicate artwork, there are several essential tools that are required such as paper, scissor, design template, awl, craft knife and metal ruler. (Hiroshi Hayakawa 2009). Thus, the research has discovered that only accurate cutting and folding techniques using specific craft tools is the most important key in order to construct a perfect and astonishing Kirigami artwork.

To conclude the phase, the research found that the origami and kirigami is a unique paper art that is enriched od Japanese philosophy and aesthetic value. The philosophy and technical involve in artwork creation are proficient in providing the positive significance in various perspective of life.

**Puteri Perak Costume**

Every country has their own unique culture, heritage and traditions that are just as interesting as the next. Apparently, Malaysia is no exception. A country of many races which include the Malays, Chinese and Indians are bound to have a variety of food, especially costumes. The Puteri Perak costume is a Malaysian traditional costume for the designed for princess of Perak. The original outfit consists of several layers of fabric including a top and a pair of pants that are matched with a songket wrap. The top of the Puteriperak outfit is known as baju cekakmusang. This research has highlighted the costume as the subject matter using a paper art context using the folding origami technique along with the kirigami cutting technique. (<http://www.couponbelanja.com/blog/2014/09/check-traditional-malaysian-outfits/>)

**Art Theory**

Literally, there are many art philosophy and theory regarding the visual art discipline. The research discovered, that the art theory is essential to the study as the main guideline in academic research is especially for the sociology research as its expressive extensive explanation of the research study is capable to develop the research potential (Creswell, 2009). Therefore, the research has utilized the elements and principles of art and designs as the research guidelines as it is relevant to the study. the research found that the model is essential to ensure that the research outcome is achieved.

The Elements and Principles of Art and Design is the foundation theory in the visual art field. The model plays an imperative role in the process of artwork creation. The combination of elements and principle variables can produce an exquisite artwork that envelopes the aesthetic value. The model includes two components such as the elements of art and the principles of design. The element is the main art components that is used to create an exquisite artwork, while the principles describe how the artist utilizes the art elements in the artwork. The elements of art variables contain line, shape, form, value, color, texture and space, while the principles of design variables including proportion, rhythm, repetition, unity, variety, contrast, balance and pattern (Frank, 2013 & Ocvirk, Stinson, Wig, Bone & Cayton, 1998). Both components are essential towards enhancing the artwork aesthetic value. Therefore, the research has utilized the component of art and design theory in creating the hybrid art. in relation, the research has also utilized the model for content analysis.

**STUDIO PROJECT**

In order to design the traditional paper costume (Puteri Perak), the fundamental of studio-based research mechanism is used to determine the research aim. The studio-based method has been developed from the Baharom (2014) methodology framework, as to align with the research project. The mechanism comprises four phases which involves several processes. For instance, idea development including sketching and drawing, experimenting processes which involved material, cutting and folding technique, prototype fabrication and finally the final artwork fabrication. Every process has been delicately applied to preserve the uniqueness of the paper art and the beauty of the Perak traditional costume. The figure (figure:3) below visualizes the chronology of the studio-based process that has been implemented in the study.

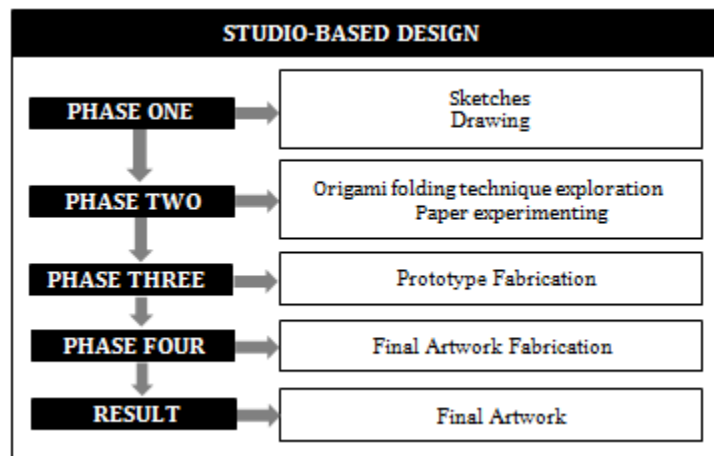


Figure 3. Studio-based design framework

The project has been carried out through the first phase of the studio-based design; an idea development which has involved

two procedures, including sketching and drawing. Several sketches and drawings using dry medium has been done to

visualize the main idea. Throughout the process, the research has identified the artwork form and the accurate folding structures to construct the traditional costume using paper as the main material. Next, the experimenting phases are concentrated. Based on the drawing analysis, the research begins to explore the established origami and Kirigami technique to ascertain the suitable technique that are capable to merge with the Puteri Perak costume structure. Therefore, multiple folding techniques including the valley fold, mountain fold, pleat fold, inside reverse fold and outside reverse fold that has been introduced by Mauvement Francais des Plieurs de Papies (MFPP), (Trebbi, 2012) has been delicately explored and analyzed. Only the precise origami folding technique applied as one of the essential methods. Also, the research has explored the kirigami cutting technique, such as horizontal, vertical, diagonal, curvy and wavy. Only the accurate kirigami cutting technique that is appropriate for the costume structure has been applied in the design. After finalizing the technique, the research has begun to experiment with the material. Several types of paper such as tree-free-paper, handmade paper, copy paper, textured paper, gloss paper, metallic paper and cardboard has been experimenting with the enfolding technique. The research has chosen several types of paper that are flexible and suitable for the artwork folding technique to form the intended structure.

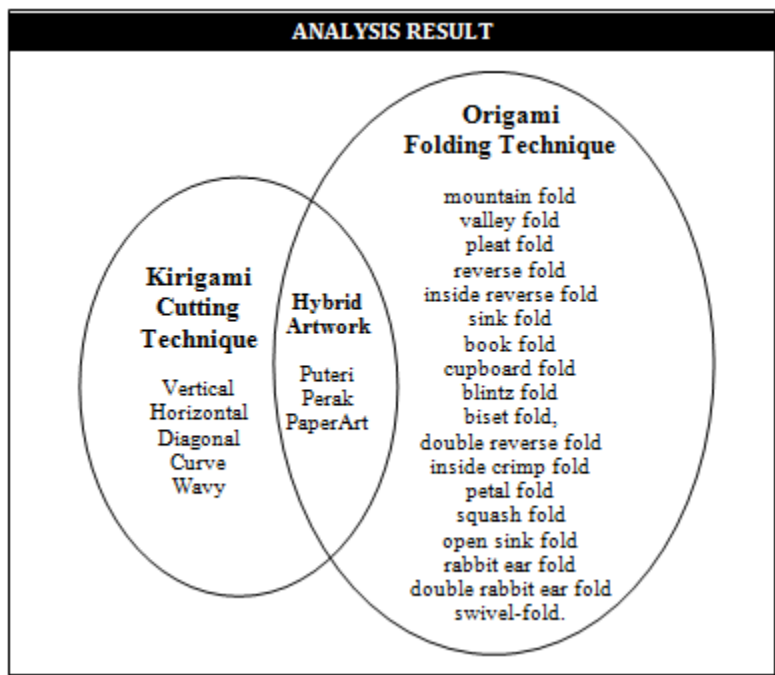
After completing the phase, the research has begun to fabricate the Puteri Perak traditional costume prototype by utilizing the precise origami folding technique and kirigami cutting technique based on the analysis found in the previous studies. Every single element such as color combination, durability, size and proportion has been finalized based on element and principles of art and design theory. Every element is essential to ensure that the artwork is enriched of aesthetic value. Next, the research proceeds to the last process of the studio-based design, which is

fabricating the final artwork.

**RESULT AND DISCUSSION**

The studio project has displayed a positive result. Concerning the project, the research has found that paper is one of the exclusive art materials that have an endless possibility to create an exquisite artwork. The uniqueness of the physical characteristic is that it makes it eligible to merge with a variable field of art. Therefore, the research has celebrated the uniqueness by utilizing it as the primary material in designing the studio project. The flexibility character of the paper surface makes it easy to fold in order to construct a delicate artwork. Therefore, the research has developed the material by integrating with the origami and Kirigami technique. The combination of these elements has successfully created the Perak traditional costume which has been purposely focused on the Puteri Perak.

Regarding the data achieved from the literature study, the researchers have discovered multiple types of origami folding techniques that has established nowadays. The techniques including the mountain fold, valley fold, pleat fold, reverse fold, inside reverse fold and sink fold, book fold, cupboard fold, blintz fold, biset fold, double reverse fold, inside crimp fold, petal fold, squash fold, open sink fold, rabbit ear fold, double rabbit ear fold and swivel-fold. The techniques have been widely applied in constructing an exquisite origami artwork. Eventually, concerning the studio-based analysis, the research has identified that every folding technique has its own characteristic and significance. Each technique will give a different impact on the artwork structure. Regarding the kirigami paper art, although there are several cutting techniques that has been established, yet every technique has its own purposes based on the artwork creation, form and design. Figure (figure:4) below has visualized the research result regarding to the studio-based analysis.



**Figure 4.** Studio-based analysis

Through the studies, the researchers have discovered only several origami folding techniques and kirigami cutting techniques that are suitable to be applied into the Perak traditional costume, Puteri Perak. Referring to the analysis result, the research has found that the costume has been enriched of various subtle structural forms due to the unique design.

Therefore, in order to construct an exquisite Perak traditional costume, a specific origami folding technique and kirigami technique is required. Only several techniques have the capability to merge with the design. As the circumstance, the researchers have determined four origami folding techniques and three kirigami cutting techniques that are suitable to

construct the traditional costume. The origami folding techniques including the mountain fold or book fold, valley fold, bisect fold and cupboard fold while the kirigami folding technique consists of horizontal, vertical and diagonal. These techniques are classified as the fundamental folding techniques in designing the Puteri Perak costume art as it has flawlessly been fitted with the structural design.

As a result, the research is capable to define that it is possible to design the Perak traditional costume; Puteri Perak through the paper art concept. The combination of multiple origami folding techniques and kirigami cutting techniques has made the idea flourishing. Therefore, the research finding have an immense potential to implement the designing paper artwork in local context. Ultimately, the research has invented a hybrid artwork by integrating two culture in a form of artwork. The combination has created an exquisite paper art. Figure (figure:5) below visualizes the Puteri Perak Costume Paper Art that has been designed.



Figure 5. Puteri Perak Paper Art

### CONCLUSION

Concerning the analysis result, the research aim has been successfully achieved. The result has convinced that the Japanese paper art (kirigami) is capable of merging with the Malaysian culture (the Perak traditional costume; Puteri Perak) through the origami folding techniques and kirigami techniques. The combination within these unique cultures have effectively invented a new hybrid art. In terms of the Malaysian art scene, the research finding has the potential to expand new ideas and techniques in creating an exquisite artwork. The usage of paper as the main material has determined the capability of the material.

On the other hand, the finding is also capable to educate the younger generation towards Malaysian culture and heritage of which the research has given full emphasis on the Malaysian traditional costume; Puteri Perak. Besides, the research outcome is also capable to introduce Japanese Art which refers to the kirigami and origami art in the Malaysian art scene. Therefore, the research has been intensely convinced that the idea of combining Japanese art with Malay culture have an immense potential to be implemented in nowadays art.

In relation, the hybrid artwork also has an immense commercial potentiality as it is competent to enhance society's knowledge towards Malaysian culture and heritage. The invented product is capable to be commercialized as a unique hybrid artwork,

education art instrument and as a tourist souvenir item. The artwork physical form is a friendly user as it is eligible for all human stages including children, adolescents and elderly. The uniqueness of the product makes it easy to market, as it is enriched with aesthetic value.

### FUTURE DIRECTIONS

The research has only emphasized on the Perak traditional costume which have highlighted the Puteri Perak costume. Future research may need to expand the study on various Malaysian traditional costume such as Malay, Chinese, Indian, Baba Nyonya, Iban, Kadazan, Indigenous and other ethnics to attain a full phase of the Malaysian traditional costume, and a comprehensive perspective in the local context as there is only a limited study that has been conducted in Malaysia.

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