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# Contemporary Painting Based on The Philosophical Meaning of Surakarta Classical Batik

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## ABSTRACT

This article is a result of a study to create contemporary paintings that have a local identity and character. The ideas of paintings creation are based on the philosophical meaning of Surakarta classical batiks, such as Sidoasih, Sidomukti and Sidoluhur which teach noble guidance about the life expectancy, existence, establishment, behavior and glory. Material related to forms and philosophical meanings is developed and linked to life today. The method of painting creation uses development research with steps that are namely: (1) information collecting, (2) development of the preliminary product, (3) preliminary product testing, (4) main product revision and (5) main field testing. The results of the study are contemporary paintings with a symbolic approach created using block, brushstroke and drip techniques on mixed media. The ideas behind paintings produced are representatives of the philosophical meanings of classical batik of Surakarta that are adapted to current life.

**Keywords:** *Philosophical Meaning, Classical Batik, Painting, Contemporary*

## INTRODUCTION

Globalization has had an impact on the development of paintings in Surakarta City which has a wealth of Javanese traditional culture. The advancement of information technology has grown the genre of contemporary painting that is not bound by previous rules but has developed according to the present times. Although it is seemingly new, in practice it is difficult to find contemporary paintings with local identity values in them. In this condition, an artist needs good control when determining the direction and developing the creation of his or her artworks. For that, artists in Surakarta need to explore the richness of traditional or classical art to find philosophical meanings in it so that these meanings can be used as a source of ideas for creating contemporary paintings that have strong identities and characters.

The Surakarta classical batik contain values of the philosophy of local wisdom that teach ideals, life expectancy, existence, establishment, behavior, glory and teachings of life. Until now, the existence of classical batik is still preserved by the people of Surakarta, which is actualized as clothing in traditional ceremonies and important events in everyday life.

The area of contemporary art is very open to local ideas, therefore the philosophical meaning in Surakarta classic batik can be used as a source of inspiration and ideas for the creation of contemporary paintings. The philosophical and aesthetic meanings contained therein can be developed and connected with life today. Thus, the values of local wisdom can be implemented into ideas, themes,

forms, technical and painting media that follow the souls of the times. Visual ideas are not only built from personal understanding but involve common understanding through extracting data from current public perceptions. Thus, the new visual idioms generated will be absorbed and understood globally and openly. Based on the thought above, the research problem can be formulated as follows: (1) How is the creation of contemporary paintings whose ideas originate from the philosophical meaning of classical batik? and (2) What is the shape and meaning of the paintings produced?

## LITERATURE REVIEW

### Classical Batik of Surakarta

Batik is a cultural product of intangible which has broad understanding; from technical aspects, processes, implementation, history, cultural influences, the development of visual forms even their symbolic and philosophical meanings. During the heyday of the Surakarta Hadiningrat Palace, several types of batik ornaments were created which were later claimed to be classical batik. Batik, in the beginning, was the term for the type of clothing used by ancient Javanese society. Made with special techniques to display certain ornaments, batik was generally used by royal nobility. Its use is also accompanied by strict rules of tradition based on certain social strata (Wulandari, 2011). The word 'batik' in Javanese is a form of adaptation of the word '*ambatik*', which is a combination of the words '*emba*' (perfecting) and '*taritik*' (dots), which means making or perfecting images of dots on sheets of cloth (Lu, 1984). In semantics, the word 'batik' has the meaning of '*mbabaring atitik*' (self-actualization) and has a philosophical meaning as a process of "embodiment of a will".

Some types of batik are considered classical besides being designed for ceremonies in the palace as well as the meaning and symbols in them having the conception and ideology of Javanese socio-cultural life (Achjadi, 1999). The conceptual form, meaning and function of classical batik cannot be separated from the Javanese minds, especially in understanding the harmonious and balanced context of the universe. This enhances the symbolic expressions in visual forms that tend to be subtle and static but magical in ornamental and color patterns. The aesthetics of Surakarta classical batik are not merely a visual appearance that has a psycho-aesthetic effect but rather a presentation of instinctive expressions of nature that can build a certain image. The essence is not a beautiful value as the highest achievement of a sense of beauty based on the abstraction of beautiful forms, but by majesty *(perbawa)* that can only be felt inwardly based on the process of inspiration about images that emanate from the abstraction of visual forms. As stated by Mangkunegoro IV (1969), *"dadi wruh ya dudu"* which means "the one having form is not the real thing".

Besides having visual beauty, Surakarta's classic batik also contains philosophical meaning from the teachings of life that is still relevant today. The classic batik of Sidoasih, Sidomulyo and Sidodrajat have main ornaments in the form of fruits in a basket and supporting elements namely; large pistil flowers, large petal flowers, houses and thrones that are placed inside the affirming ornament that is the shape of a rope or *dhadhung*. Fruits symbolizes life expectancy (Fraser Lu, 1985). Based on the Karma Yoga teaching (Hindhuism), fruits are the symbol of obedience, in which every action is a responsibility. Meanwhile, construction/temple means a sustainable living place and showered by prosperity (Torwesten, 1991). Fruits and flowers in *'wadah*' mean love based on holiness and filled with prosperity. The crossed and bent lines (*dhadhung*) that border each pattern mean a strong and strengthening formation, interrelated and inseparable, understanding each other yet still flexible (Budi, 2017).

### Contemporary Art in Indonesia

Globalization has made a variety of values, models and western parameter easy to spread, trendy, and tempting. Information technology has also helped artists in eastern to know and understand the latest discourse of western art. Contemporary art discourse and its parameter that is created by western art can easily come into the fabrics of life in Indonesia. Nevertheless, the disappearing borders as the result of global interaction have also brought art toward the multicultural character. Nowadays, the art world is very open to various 'aesthetic' scheme in local culture (Sugiharto, 2016). Due to its

multicultural attribute, art plays a significant role in developing social sensitivity, implementing awareness toward differences and cultural diversity and ability to appreciate so that the values within can be inspirational (Sustiawati, 2009).

By observing the openness of the contemporary art field, it is possible to be used as a 'political' area to bring the rooting local cultural identity. Contemporary art can also be used as 'struggle' and 'emancipation' tools for the local marginalized art group. Therefore, 'identity politics' becomes important in contemporary art discourse or practice to not cause doubt (Naime, 1999).

In the era of globalization, a piece of art is not enough if it only meets international standards, it also needs to have a local character. It will be useful to preserve traditional artworks while developing contemporary artworks that have a strong identity and character that are ready to compete at the international level (Wahida, 2018: 14).

At present, there have been significant developments from the world's art connoisseurs towards the existence of Indonesian artists, which is shown by the increasing enthusiasm of world's stakeholders in exhibiting Indonesian contemporary artworks. The development of information technology that makes the world without borders geography and national, forming fast discourse exchanges so that artworks have a global content that is easily understood universally even though they use traditional symbols (Munaf, 2017).

Looking at some of the thoughts above, the philosophical meanings in Surakarta classical batik are still relevant to today's life thus having the potential to be integrated and developed into the creation of contemporary paintings. Matters relating to philosophical meanings can be used as a basis in determining the idea of painting creation. Meanwhile, matters relating to the aesthetics of symbols, techniques and materials can be used as a basis or integrated into the process of embodying paintings.

## RESEARCH METHODOLOGY

The results from the research with the method of development use steps from Borg and Gall (2003) such as (1) information collecting, (2) development of preliminary product, (3) preliminary product testing, (4) main product revision and (5) main field testing. The collection of information was achieved through: (1) collecting the data consisting of idea, visual form and philosophical meaning of Surakarta classical batik, (2) analyzing documents from classical batik pattern, (3) validating the data through triangulation, peer debriefing, recheck and (4) analyzing the data using interactive model of analysis. The preliminary product development was carried out by testing the sketch into the painting using painting on mixed media approach. After that, the painting was criticized and validated by an expert, senior artist and curator. The main product revision can be done by revising the artwork as proposed by the experts, especially in symbol and idiom visualization that is related to the creative concept. The main field testing was carried out by testing the painting with an open exhibition for the public to get the appreciations, critiques and constructive suggestions from the appreciators, painting commentator or local and international art critics.

## FINDINGS

The process of creating contemporary paintings began with information collecting and studying the subject matter about the philosophical meanings of Surakarta classical batik, namely *Sidoasih, Sidomukti* and *Sidoluhur*. Classical batik type is traced to its aesthetic values, both related to the form of ornament and philosophical meaning. Through the information collecting stage, various ideas, themes, patterns, visual elements, main ornaments, supporting ornaments and reinforcing ornaments in Surakarta classical batik are found. The aspects of form are analyzed and the philosophical meanings are interpreted.

## The Analysis of Batik Pattern of *Sidoasih, Sidomukti, Sidoluhur*
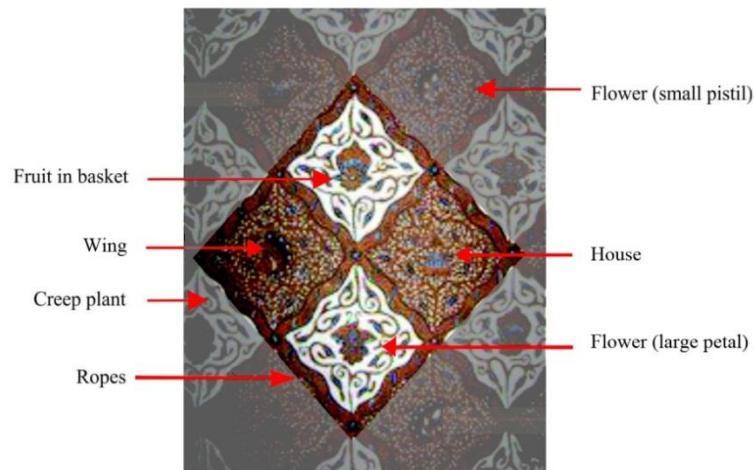


**Figure 1 Ornament identification in *Sidoasih* batik pattern**

Visual elements of *Sidoasih* batik pattern are one big rhombus shape consisting of nine smaller rhombi. Each rhombus pattern is filled with different ornaments; those are fruits in a basket, flower petal, flower pistil, bird's wing and construction or house. In the bigger rhombus pattern, there is one main pattern, four supporting patterns, four proponent patterns and one confirming ornament.

The main pattern is filled with fruits in a basket with a white background and *'isen-isen'* or filler of *'lung-lungan'* or creep plant. The supporting patterns are filled with different ornaments, such as flower with the small pistil, single wing, the flower with large petals and construction or house. Each of those ornaments is placed in the middle of the rhombus with brown-soil background and full of *"kembang pari"* or rice flower ornament. The four-proponent patterns have the ornaments in the form of a flower with large petals and fruits in a basket inside the rhombus with a white background and filled with creeping plants (ornament). The confirming ornament in the form of *'dhadhung'* or twisted rope in brown color acts as the border that forms the rhombus.

*Sidomukti* batik pattern has several main ornaments, namely: butterflies, butterfly wings, throne building, *meru* or mountain and flowers. While supporting ornaments, namely: *sawut* or soft lines, *cecekan* or small dots, *ukel* or spiral circle, *cecek pitu* or small dots totaling seven that form a circle.
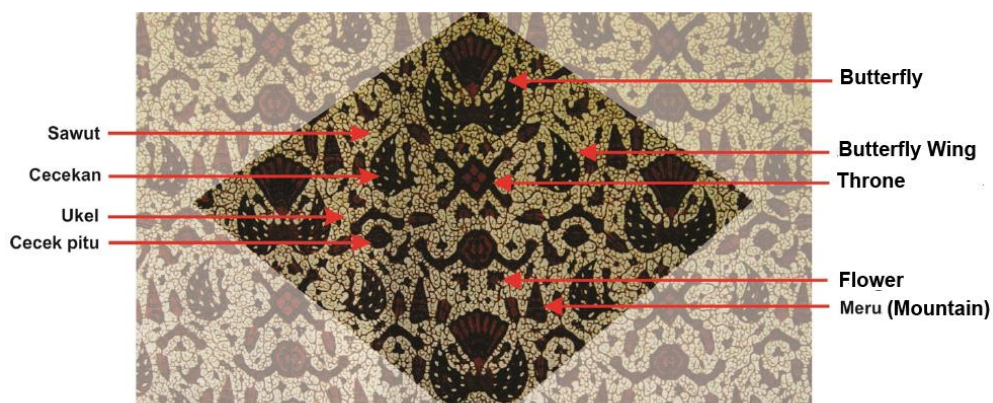


**Figure 2  Ornament identification in *Sidomukti* batik pattern**

The main ornament of a butterfly is a symbol of beautiful and high hope. Butterflies are animals that are beautiful in shape and color and can fly high as a symbol of hope. The main ornament in the form of butterfly wings has the meaning of flying high which represents the world above and wind. In the teaching of the four elements of life, the wind is a symbol of a just and compassionate nature

represented by white color. A throne ornament depicts a position and high degree. The throne is a symbol of hope for status and high degree, noble and respected by many people as well as a leader or king. The main ornamentation of *meru* or mountain is a symbol of grandeur, majesty like a big mountain and manly even though it looks from a distance. Derived from the teachings of the four elements of life called "*sangkan paraning dumadi*" or the origin of life, besides fire, water and air. In the Javanese Hindu culture, *meru* is used to describe a high mountain peak where the gods live. *Meru* that is represented by the black color has the meaning that if uncontrolled it will bring out anger, but if controlled it becomes the nature of eternal prosperity. The main ornament is in the form of a flower as a symbol of beauty. The form of flowers is found in almost every element used in traditional ceremonies because it has good meaning. Flowers are plants that stick in the ground or the earth as a foothold; can be interpreted as something beautiful, has a strong foundation and is capable of handling his or her life just as well as flowers, remains beautiful and strong because the roots stick tightly, even though they are exposed to the wind or other forces that can destroy.

The definition of *Sidomukti* comes from the Javanese words *Sido* which means to be or continuously, and *Mukti* which means noble and prosperous. Thus, the meaning of *Sidomukti* batik is to be noble and prosperous; hoping to achieve physical and spiritual happiness.

The visual elements contained in this *Sidoluhur* batik are the main ornaments of the throne building, *Garuda/Lar* or eagle wing, birds, *Baito* or ship, flowers, butterflies and plants. On the other hand, the supporting ornaments are *Dadhung* or rope and *Cecek* or small dots. Ornamentation of the throne depicts a high position and degree. The throne is a symbol of hope for high status and rank, noble and respected by many people. Ornament of *Garuda/Lar* is depicted in the form of a one-wing eagle as a picture from the side, with a closed wing shape which symbolizes the character of *Surya Brata*, namely the nature of fortitude. Ornaments of bird are depicted in a simple peacock shape. This ornamentation symbolizes the world above or air, symbolizing the nature of *Bayu Brata* or *Anila Brata*, which is a noble character that is not protruded.
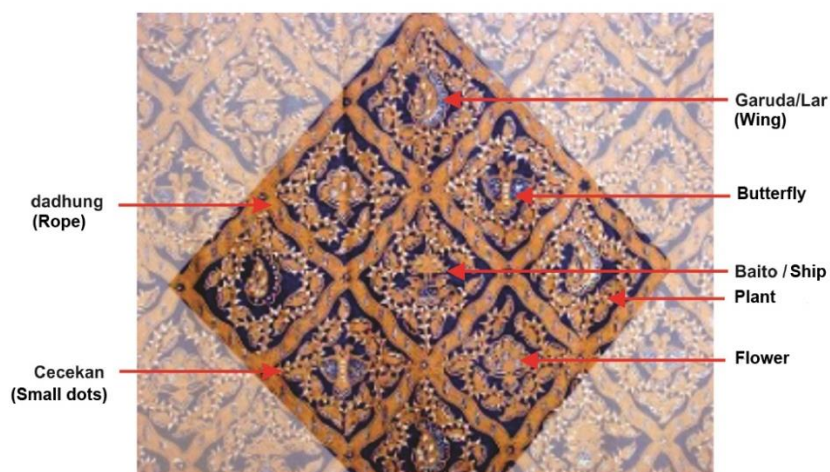


**Figure 3 Ornament identification in *Sidoluhur* batik pattern**

Ornaments of *Baito* or ship are items that move in the sea, are considered as a symbol of water or *Banyu* which has a meaning of spaciousness and calmness. The main ornament has a butterfly as a symbol of beautiful and high hope. Butterflies are animals that are beautifully shaped and beautifully colored and can fly high as a symbol of hope that flies high. Butterflies, like birds, can fly high representing the upper world and the wind, in the teachings of the four elements of life, the wind is a symbol of the just and human nature represented by white.

Plant ornaments are described as a form of *Lung-Lungan* that fills the rhombus field and surrounds main ornaments. Supporting ornaments in the form of *Dadhung* or ropes cross that forming a rhombus that limits each main ornament. *Cecekan* is small dots of meeting and gap that fill the main ornament field.

In general, batik of *Sidoluhur* has a philosophical meaning about nobleness. For Javanese people, living life is a process of looking for material and non-material nobility. The nobleness of material means fulfilling all physical needs by working hard following the position, rank, degree and profession. Whereas nobility, speech and actions are forms of non-material nobility. The Javanese people hope that their lives will be able to achieve a life filled with noble values. *Sidoluhur* batik pattern also means hoping to achieve a high position and can be a role model for the community. Besides, there is also a deeper philosophical meaning, namely perfecting yourself into a virtuous human being who always prays, remembers and thanks God.

**The Process of Realizing The Painting**

After collecting information about the philosophical meanings of classical batik of *Sidoasih, Sidomukti* and *Sidoluhur*, preliminary form of product' activity was then carried out by developing contemporary painting creation ideas through sketch experiments and visual symbol selection based on its creative ideas. Some netted ideas began to be concrete by sketching, determining the type of technique, material and the format of the painting to be created. Here are some of the sketches chosen to be developed into paintings.



**Figure 4 Several sketches whose ideas come from the philosophical meaning of classical batik**

Preliminary Product Testing is carried out by testing sketches to be developed in a painting on mix media. In general, the creation of this painting is made with a symbolic approach using the main object, namely human figures. The visual embodiment is made by utilizing optical illusions such as perspective, light darkness and chiaroscuro. The perspective intends to describe an object or space in a real way on a flat plane of the painting. Through perspective, an object will carry volume and spatial impression. The use of chiaroscuro intends to clarify the objects in the painting to make them more dramatic. Chiaroscuro is also characterized in the application of light to a painting object which gives a three-dimensional impression due to the highlights and shadows. The application of illusions through dark-light aims to distinguish the form of an object from other objects in a painting. In applying brushstrokes with dark-light colors, it is necessary to consider intrinsic values on the surface of the object. The intrinsic values intended are related to the darkness or brightness of the actual surface color of the object. However, the values of dark and light on the object are affected by the effects of light; parts of the object that are not exposed to light, and shadow. The contrasting intensity of dark-light colors implies the way light and shadow form objects. The effects of light on an object cannot occur without the intensity of contrast between the parts affected by light and the shadow produced by the object. Light reflected by parts of the object can give rise to bright fields, shade and shadow and provide the three-dimensional quality.

The techniques used in the process of creating this painting include; techniques of block, brushstroke, blur and drip. Block technique is used to make flat colors flat on objects with three levels, namely: tint, tone, and shade. The tint for the brightest part of the object's color or that exposed to direct

light made with colored paint mixed using white paint. The tone for the object color that is not exposed to direct light made with the original color of the object mixed with gray. The shade is used for parts of objects that are not exposed to light; made with the object colors mixed with black. The brushstroke technique is used to make basic color blocks or give the impression of darkness and light on a wide field. The blurring technique is used to blur colors, lines or shapes that are too firm. In the condition that the paint is still wet, the white pigment is applied to the part exposed to direct light and blended with a sweep of the object's color. This blurring technique is directed to the brightest part by adding white pigment. Gradation of color in this blurring technique if done carefully will produce a tone or level or color transfer that is very smooth. Meanwhile, the drip technique that utilizes the dilution of paint is used in certain parts to give an expressive impression.

After going through a series of formation processes by applying various techniques and optical illusions, the next stage is the Main Product Revision, namely the process of revising artwork based on suggestions from experts to fit the concept of creation. The painting was criticized and validated by experts, senior painters and curators. In this case, some criticisms or suggestions from experts and curators, especially those relating to the visualization aspects of symbols and idioms are needed to achieve maximum quality. The Main Field Testing is done to test the quality of the painting produced widely through paintings exhibition at the *Taman Budaya Jawa Tengah* or Central Java Cultural Park Gallery and the Shah Alam Gallery, Malaysia. The results of the exhibition show that viewers can appreciate the artworks well and provide constructive suggestions for further progress.

**The Appreciation**

The idea of a painting titled *'Kadung Janji'* is based on the philosophical meaning of *Sidoasih* batik pattern. The visual form consists of two main figures, namely male and female, as well as complementary objects, namely a vase containing two white roses. The composition of the two main figures is arranged standing and back to each other. The male figure carries a flower vase in his left hand, and his right hand is clenched, while the position of the female figure is displayed with her right hand lifting the cloth of the dress and the scarf that is hanging on her hand.



**Figure 5 Painting titled 'Kadung Janji', 140 x 120 cm, Acrylic on Canvas, 2018**

The visualization of the male and female as the main object represents a pair of lovers who are committed to having a love affair despite the distance separating them. The position of these subjects means that the distance of space and time that seems to separate can actually be brought closer through openness and mutual commitment. The position of the subject of the male figure with his right hand

clenched and the left hand carrying a vase implies determination and enthusiasm to fulfill his responsibilities in maintaining love, wherever he is. On the other hand, the position of the female object who lifts a cloth and draws a scarf in her right hand implies the attitude of willingness and loyalty to her lover in various circumstances.

Based on the formal description and interpretation of the visual icons in the painting, it can be concluded that the hope of growing love throughout time will be a necessity if a couple has a strong commitment to looking after each other. Thus it can be concluded that the *Sidoasih* batik pattern which means hope about love can conceptually be used as a life guide because it is still relevant to the conditions of present-day development.

The idea of creating a painting titled *"Be on One's Guard"* is based on the *Sidoluhur* batik pattern. The form of this painting consists of the main object of a female figure holding a *keris* weapon in a ready position. The position of the main object becomes a symbol of the importance of alertness, guarding, restraining and protecting oneself from various passions which can harm a human life. On the background, there are complementary objects namely leaves and a bunch of bananas that looks as if it is being carried. The object of the banana is a symbol of prosperity, as a symbol of fruit in general. In addition to the main objects and complementary objects, there are also other visual elements, namely the embodiment of gradations in red, pink, brown and gray and dark brown blocks. The embodiment of gradations of red and brown becomes a symbol of the atmosphere of the morning or evening, which has a meaning as a cycle of the journey of human life from birth to growing up and maturing.



**Figure 6 Painting Titled '*Be on One's Guard*" 140 x 120 cm, Acrylic on Canvas, 2018**

Based on formal analysis of visual elements and interpretation of symbols from the main object, it can be interpreted that this painting contains a message of teaching behavior that must be done and how to do it to become a human who has a respectable degree in his or her social environment. For this reason, the ability to manage all goodness in the community is needed. Through work, a person can protect and raise his or her children with a good place to live.

**Figure 7 Painting Titled '*Secret Agent*', 140 x 120 cm, Acrylic on Canvas, 2018**

This painting titled 'Secret Agent' is based on the *Sidomukti* batik pattern. The main object in this painting is a woman in a standing position while holding a fan made of fur. The position of her face is slightly lowered with sharp eyes as if she is staring at something important. On the back of the hair are two large white roses. A flower-shaped object is a symbol of beauty that is firm and strong as the foundation and handle of her life, just as flowers remain beautiful and strong because their roots stick tightly, even if they are exposed to wind or other forces that can destroy.

Another complementary object can be seen in the background which is an old European-style house with the doors and windows being visible. The object of the house describes a high position as a symbol of hope for a high degree, glory and being respected by many people.

## CONCLUSION

Based on the findings of the process of paintings creation mentioned above, it can be concluded that the philosophical meaning of the *Surakarta* classical batik has a very high potential to be used as a source of ideas for the creation of contemporary paintings. In general, the meaning contained in the batik pattern of *Sidoasih, Sidomukti* and *Sidoluhur* is still relevant to the current situation. Thus, the new visual idioms that developed still have local characters and identity that can be adapted in today's context.

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# The Development of Youth Creativity based on Local Wisdom in Surakarta

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## ABSTRACT

This paper is based on the mapping of the youngsters and environment potential at Joyoraharjan, Surakarta. These traditional art-based potentials are developed in the participatory design to gain new perspective on interpreting the local wisdom. The method used is under research and development (R&D) design with the following stages: 1) research and information collecting, 2) planning, 3) preliminary product development, 4) preliminary field testing, 5) main product revision, 6) main field testing, 7) operational product revision, 8) operational field testing, 9) final product revision and 10) dissemination and implementation. The data was collected through in-depth interview, participatory observation, document analysis and focus group discussion. The data is displayed in qualitative descriptive and the correlation among the variables will be analyzed using the interactive model of analysis.

**Keywords:** *Development, Youth, Creativity*

## INTRODUCTION

Surakarta is considered as one of the centers of Javanese culture. For that reason, various exemplary cultural heritages can be found there. The people in Surakarta are also close to these cultural heritages as part of their daily lives. These include *batik*, traditional dances, traditional music, *keris*, *wayang* (shadow puppet show) and literatures.

As the time passes, the fact that Surakarta is a city bound for globalization affects these cultural heritage positions along with the people's mindset which grows along the globalization that the information media and technology facilitate. In this situation, the local cultures are in a crucial position. They are about to be neglected, but on the other side they can be the basic source of the people's identity in the global era.

Meanwhile, youngsters are part of the strained situation in the community. They are the generation that lives in the local culture heritage as well as absorbing other various cultures in the global society. The young generation has to look for and find out their identity. This case must be realized by many parties. In order to keep these new identities seeking process away from the strained situation because of the conservative nature of the older generation and to keep them from being removed from their main culture.

Nevertheless, the anxiety of this condition should not be responded excessively as for each generation they have their own ways in responding to their environment and building their identity. The continuation of the old culture is in the youth's hands. What needs to be done is how to provide them with critical thinking skills and to be open minded as well as creative in interpreting the old culture into their age.

The ideas on character and identity building of a nation cannot be separated from the youth's role. They are the agents of change, having strategic roles in the exertion of national development. They will be the subjects of cultural change and development. Therefore, an understanding toward their world needs to be deepened to get them an appropriate point of view of the future without holding back their creativity and freedom.

In general, when we talk about culture, especially in Indonesia, we will be dragged into the cultural products which are essentially art expressions. This is something we cannot avoid. In fact, that understanding reduces the cultural concept. On the other hand, we can accept that in traditional arts, the values contained are part of the cultural value system in general. It means that the existence of traditional art expression is the interpretation of cultural values.

## LITERATURE REVIEW

### Art, Youth, and Globalization

Art is a field that provides a wide space for creativity. Therefore, art brings a great opportunity to get the youth closer to their cultural values. Through art, the youth are hoped to be able to know the inherited local wisdom. The local wisdom contained in the traditional art expression is a good provision in facing global challenges as well as to support cultural identity that is commonly questioned in the global era. Globalization indeed contains paradox, at one side there is cultural fusion, while on the other side people or community try to find and hold authentic identity not to be carried out in this global era. Modernization and development have caused people to lose old realities and the wisdoms attached, which are supposed to be more valuable for the self-development, such as togetherness, beauty, spirituality, morality and community (Piliang, 1999: 29).

The exact same thing happens when we talk about art itself. Primadi Tabrani (1999: 1-4) states that in the global era, an art product is not enough to only fulfill the international standard, it must contain local features. It will be beneficial in preserving traditional arts and will also develop the tradition-based art in competing at the global market. It implies that art needs to strengthen the local feature in this era. Thus, local wisdom needs to be utilized as the spirit to give power and enhancement to the art itself.

Joyoraharjan, one of the regions in Surakarta, has similarities to the nearby regions. This implies that it equally inherits the Javanese tradition as the other regions do. However, Joyoraharjan has several specific potentials to be developed. The geographical location, history and sociological aspect of this region make it possible to be the model of creative *kampung* (region) in Surakarta. Therefore, an investigation was carried out in mapping out the potentials of this region. The elder generation was the resource person for the historical information, while the youth were to convert the values of the traditional wisdom in the region into a new form.

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*The Development of Youth Creativity on Local Wisdom in Surakarta*

## RESEARCH METHODOLOGY

This study was carried out in Surakarta. Specifically, the art creation process during the study took place in Joyoraharjan. Participatory observation and document analysis were used to gain deeper information on the creative potentials of the youth and the local culture values in Surakarta, especially those that are connected to various traditional arts. The results of the investigation become the source for creating a model on youth creativity development. The design of this study is a research-based development that applies the following steps: 1) infromation collecting, 2) preliminary form of product development, 3) preliminary product testing, 4) main product revision, 5) main field testing, and 6) dissemination (Borg and Gall, 2003: 775).

## FINDINGS

### The Dynamic Development of the Community in Surakarta

A city consists of housing area (*kampung* or village), working area (industry, market and service), cultural social activity area (education, health, worship place and government) and recreational area, which are connected one to another through roads, rivers and other public spaces. Those areas with their locality can be explored and empowered to be a generator in running a city's development (Priyatmono, 2013: 69).

The Surakarta City Government has accommodated the creative potential of the community by holding various festivals such as the *Jenang* Solo Festival, *Gethek* Festival, Cultural *Kirab*, Solo *Menari* (dancing festival) and others. However, if the exploration of creative potential does not touch the creative potential of the grassroots community, then the activities have less impact on increasing the creativity of the community. The majority of the population will only become spectators.

The orientation towards the form of festival becomes the main foundation for the community involvement. These efforts are mainly based on the branding interests of Surakarta. Although the organizers have made efforts to empower the community by holding workshops to the community (Rizqino, 2015: 10), while from the aspect of branding and tourism these workshops may be an effective approach, from the point of view of empowering people's creativity, the approach is unidirectional and does not make the community the initiator of their own artistic activities. The community wants to participate in mapping out their own potential and needs. In this way, the efforts to build the characteristics of the city are not only oriented towards imaging problems but also touch the root of the problems that exist in the society.

Efforts to develop creativity in the village of Joyoraharjan were carried out collaboratively by villagers who were dominated by teenagers and a research team consisting of students. The team of researchers in this case acts as facilitators. The concepts and ideas for developing creativity are entirely left to the results of joint discussions conducted with the community members. This approach aims to make citizens aware and active subjects in developing their own creativity so that the results achieved are in accordance with their abilities and needs. The results of the collaboration resulted in several activities that have been carried out as part of efforts to develop creativity.

**The *Kampung* History in Mural Project**

Joyoraharjan village is located adjacent to Ledoksari and Jebres Station. The majority of the people work as traders in the market. The location of the village is very strategic because it is located not far from the city center, therefore from time to time people arrive and bring colors to the village.

The location of the settlement in Joyoraharjan is quite dense with alleys as a flow of traffic for its inhabitants. In the discussions that existed between the researcher and the villagers, the possibility of working on a mural project to change the image of the village visually was discussed. This idea was agreed upon and the area to be worked on was the walls along the alley, both from the west side close to the Ledoksari market and from the south side.

After a mural technical workshop for village youth, interviews were conducted with village elders to explore the history of the village. The process was accompanied by several students who were also street artists in Surakarta. The process resulted in an agreement that at one point of the wall, at the entrance to the south, a mural would be made depicting K.R.H. Kusuma Tanoyo who is a central figure in the history of Joyoraharjan village.

This history begins with K.R.M.A. Purwodiningrat who was an advocate at the Surakarta Hadiningrat palace palace government office had great power and influence in the reign of Sri Susuhunan Pakubuwana X which in Javanese was called Sampeyandalem Ingkang Sinuhun Kangjeng Susuhunan Pakubuwana X (Raja Kasunanan Surakarta Hadiningrat who ruled between 1893 – 1939). Despite having a tough task from the palace, he always paid attention to the lower class people around him. The village he led is called Purwodiningratan, which is now the name of a village which covers ten RWs (groups). In order to improve the welfare of his citizens he also moved Kawedanan from the old place to the new place which is now located at Jalan Suryo No. 55 (Nur Fathoni, 2017: 28).

During his reign there were community leaders and servants of the charismatic Surakarta Hadiningrat Sunanate who became the role models of the people named Mbah Joyoraharjo so that his name was made into the name of a village in RW X (Kampung Joyoraharjan). The name has the intention or hope that his descendants and the entire population will be prosperous forever. Tracing the history to a figure named K.R.H. Kusuma Tanoyo as someone who is still relatively well known by the older generation living in Joyoraharjan village, his figure and role for the Joyoraharjan community made the residents agree to make it part of the village history mural.

The historical mural painted on the entrance wall to the southern village besides portraying the character K.R.H. Kusuma Tanoyono, it also describes the art of *lesung*, the atmosphere of the market and the village environment. Not only murals of village history, teenagers also made murals with other themes such as education and tolerance. They also cleaned the shoulders and rivers that flow in their village.

The joint mural activity drastically changed the face of Joyoraharjan village. The walls of people's homes look full of various interesting images. The mural opened a new dialogue space among the residents. It is not only the communication space that is opened, but also the physical space. Cleaning the river and decorating it with murals and parks makes the previously dirty riverbanks an attractive and comfortable place as a shared space for leisure time.

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**Figure 1 The mural project**

### *Kampung* Tradition Heritage as the Inspiration

Joyoraharjan has an art called *Gejluk Lesung*. The history of the Gejluk Lesung art in Joyoraharjan village was initiated by K.R.H (Kanjeng Raden Haryo) Kusuma Tanoyo. He is a pioneer and activist of Gejluk Lesung music in his village (now Joyoraharjan RW X). He often holds *Ruwatan* events to get rid of *sukerta* (problems). Ruwatan version K.R.H. Kusuma Tanoyo did not play *wayang kulit* like a *ruwatan* known to the general public, but the *wayang kulit* play with the play 'Murkala' was replaced with dances of the same title accompanied by the music of Gejlug Lesung. He invited young people and local residents to preserve the art of Gejluk lesung music so that it would not disappear in the Joyoraharjan village. Their enthusiasm was shown during the practices led directly by K.R.H. Kusuma Tanoyo. This in itself becomes the pride of Joyoraharjan residents who have potentials that need to be passed on to the next generation so that this heritage will be preserved.

Gejluk Lesung is music that is played by hitting *lesung* (mortar) with *alu* (pestle). *Lesung* is a traditional tool for separating rice from its skin. *Lesung* is made of solid wood with varying lengths. Usually *lesung* measures between two to three meters. The wood that is often used as a material for making it is tamarind wood, jackfruit and sapodilla wood. On the other hand, *alu* or the pounder is made of hard wooden sticks, resilient so as not to break easily. Wood that is often used for *alu* is tamarind wood, sapodilla, *lamtoro* (Chinese *petai*) and teak. Stick-shaped *alu* is one and a half to two meters with approximately 8-10 cm diameter and a dented part so it is easy to handle. The strains of *alu* and *lesung* collisions are very harmonious when combined with *dolanan* songs sung by teenagers.

To this day, Gejluk Lesung is still preserved by village youth. In general they do not know the organology of *lesung* itself. Based on their habits they found out the differences in the sounds produced by *lesung*. They also learn how to produce certain sounds with special *alu* blows and all of them are self-taught.

This music is always played in various joint activities such as independence commemoration, welcoming guests and *Karangtaruna* activities. It is indeed an unusual sight to see a musical performance with *alu* and *lesung* that is a typical culture of the farmers in the central city village that does not have any fields. However, with this simple music still being played, residents of Joyoraharjan village always feel connected to the history of their village in the past.

The efforts of adolescents to preserve the tradition of *gejluk* were also developed by looking at the visual aspects of *lesung*. The results of discussions with researchers made a group of teenagers want to make a miniature *lesung* with fiberglass. In order to achieve this goal, a workshop for making miniature *lesung* statues with fiberglass was held. This miniature is projected as one of the leading souvenirs produced by the community as a result of the development of craft-making.

### *Kampung* Festival: Local Wisdom in Youth Creativity

Seeing the various potentials that exist in Joyoraharjan village, the direction of the development of creativity based on local wisdom that has been carried out by conducting workshops to villagers continues to be improved. The workshop participants consisted of various ages. The workshop was held based on the results of discussions between villagers and researchers in mapping out the village's potential. Finally, a number of discussions and workshops were held in the Joyoraharjan village. Among the workshops held were screen printing workshops, sculpture-making with fiberglass workshop, painting and mural workshops, as well as workshops to build parks in the village environment. All workshops held in the village besides aiming to improve the technical abilities of the villagers also aim to increase the aesthetic sensitivity of the villagers in seeing the potential of their environment. All activities are carried out in a participatory manner by giving space to the village community to convey their ideas.

The result of the workshop was an increase in the ability of residents to produce art products. For this reason, an idea was mooted in the direction of holding a village festival, namely the *Kampung* Festival. This was described as a village festival that was held mainly aimed to strengthen solidarity among the villagers. This festival also aimed to open a network in order to add strength to get the target to be addressed. Social relations are the driving factors needed for joint activities to take place.

The movement to build social relations in community-based communities began to emerge as a result of the needs of the community itself. One way is to hold an event both in collaboration or to hold an event in an independent manner. In this initial activity, residents of Joyoraharjan village held an internal event. The main purpose of the movement of Joyoraharjan villagers is not to achieve an existence recognized by the outside world. They consider this merely an effect as the most important thing for them is the development of new social relations between villagers through various artistic activities. At the same time they have tried to unite a common idea whose expression can be read as part of their community's identity.

This village festival involved almost all residents by displaying works of art made by residents such as paintings, murals, musical performances as well as several handicraft products which are the results of several workshops held. In addition to the products in the form of arts and crafts, the festival also intended to show that the village has opened a new public space that focuses on the interests of community learning in the form of public libraries, art workshops and environmental improvement by cleaning up the river and building parks along the river banks. The festival targeted visitors from surrounding villages and also from government and educational institutions. This is expected to be the beginning of a mutually supportive relationship for the continuation of the community empowerment process at the grassroots level so that it can continue and develop well and sustainably.

**Figure 2 Kids playing traditional games at the festival**



**Figure 3 The art exhibition during the festival**

## CONCLUSION

In the global association and looking for cultural boundaries, the community effort through improving local wisdom-based creativity which took place in Joyoraharjan has become a challenging choice. Putting the traditional art which is full of the locality as the base for creativity is the right choice. It will all connect the community with their own history and the important values to preserve which are togetherness and mutual cooperation.

Adopting the local wisdom as the guidelines in working does not mean to stay conservative and closed. Instead, it is more expressive in a different way and it is also be able to prove that despite the fast development of information and technology, local wisdom does not lose its relevance as long as it is studied and understood as a dynamic matter. With creativity, the local wisdom that has been embedded within the community can be the source of the way of life and the way people conserve it is rather a unique thing.

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# The Dilemma of the Malaysian Bumiputera Furniture Industry Association (PETRA) in the Context of Design and Product Quality

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## ABSTRACT

Malaysia furniture exports performance show growth recently. The country's furniture exports increased to RM4.14 billion in the first five months of 2019 versus RM3.77 billion a year earlier. The furniture industry especially on exports market contributes largest number of values for Malaysia gross income through primary industries which is RM20.4 billion in 2018. However, the contributions of Bumiputera entrepreneurs towards the total value of Malaysia's timber and furniture exports is still low at RM6.63 million or less than one percent. This scenario is becoming worst where majority of Bumiputera furniture entrepreneur still depending on government market without initiate on design innovation to expend their market globally. There are several factors that contributes to this small numbers which discusses previously in the others researcher findings based on several of Bumiputera Furniture Manufacturer responds. In this case, design and quality factors are the highest influences that contributes to the decline of export values and percentage on Bumiputera Furniture industry. Therefore, this purpose of the study is to discuss why PETRA lacked in the context of design and product quality. The significance of the study is to enhance design process in PETRA to make sure they can serve a better product in the market. In this regard, this paper discusses the preliminary findings of issues revealed from sample of case study. The findings are very important for future research direction to improve the capabilities in the context of design innovation for the association.

## INTRODUCTION

Malaysia furniture industry ranked amongst the top 10 largest exporters of furniture in the world, Malaysia exports around 80% of its production. With large markets in US, Japan and Australia where Malaysia has a strong position in the global furniture industry. With tremendous growth in exports to UK, UAE, Saudi Arabia, the Philippines and Russia, Malaysia is now eyeing countries like Algeria, Greece, Puerto Rico and Libya. (MIFF, 2019).

**Table 1 Exports of Major Timber Products (MTIB 2018)**
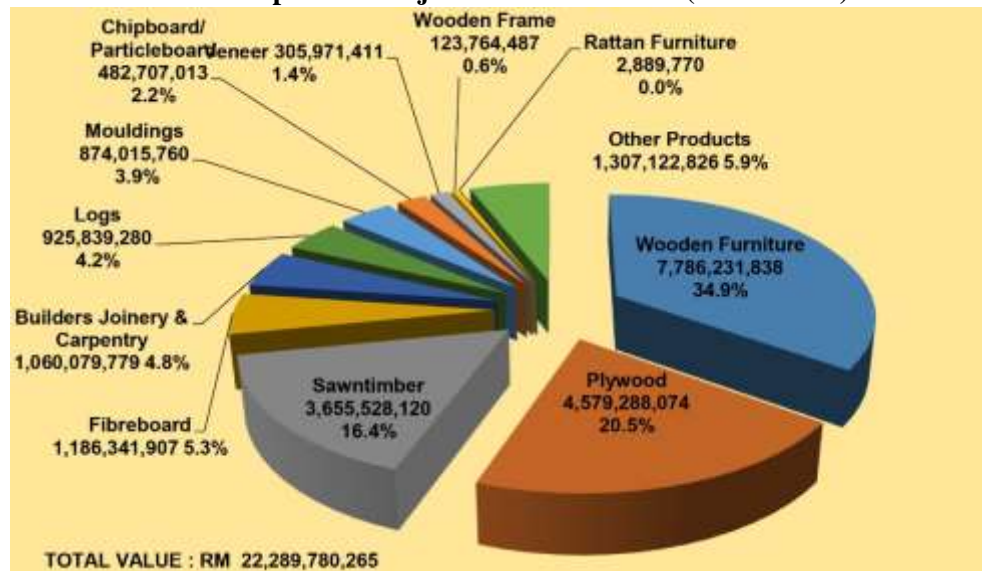


According to Malaysia Timber Industry Board (MTIB), as per showed at Table 1 the total export value for Malaysian wood products and furniture in 2018 stood at RM22.3 billion, contributing 1.6% to the country's gross domestic product and 2.2% to total exports. Malaysia's top ten export markets for wooden furniture include the USA (RM2,871.99mil), Japan (RM602.09mil), Australia (RM531.22mil), Singapore (RM456.02mil), the UK (RM398.99mil), Canada (RM270.07mil), China (RM254.28mil), India (RM239.87mil), Philippines (RM207.08mil) and the United Arab Emirates (RM134.45mil). (MTIB, 2019) According to Minister of Primary Industry, Teresa Kok (2019) said the contributions of Bumiputera entrepreneurs towards the total value of Malaysia's timber exports is still low at RM6.63 million or less than one percent. She also advised Bumiputera entrepreneurs to be more creative and innovative as well as to persevere in overcoming challenges in the timber industry. (Borneo Post Online, 2019) MITB directorgeneral Mohd Kheiruddin Mohd Rani said to date, we have 370 Bumiputera-owned companies registered with MTIB and this figure is still small compared to the total of about 3,500 companies in Peninsular
Malaysia and Sabah. (Bernama Online, 2019)

According to MATRADE's Chief Executive Officer YBhg. Dato' Wan Latiff Wan Musa (2019), Malaysia has a strong pool of exporters in the furniture industry with a niche in manufacturing. They however must explore the possibilities of transitioning from Original Equipment Manufacturing to Original Design Manufacturing or Original Brand Manufacturing. (MATRADE, 2019) Therefore, the Malaysia furniture industry especially Bumiputera`s cannot stay as OEM producers only as the rising of cost of labor and shortage raw material is affecting the total cost of production compared to Vietnam or China which labor cost and material are more accessible to their manufacturing needs. (Nur Syazana Osman, p. 447)

## LITERATURE REVIEW

According to Oxford Dictionary Bumiputera is a referring to a Malaysian of indigenous Malay origin. In other definition it can be a term to describe the Malay race and other indigenous peoples of Southeast Asia, and used particularly in Malaysia. The term comes from the Sanskrit word "bhumiputra", which can be translated literally as "son of the land" or "son of the soil".

According to David Linley (2009), Furniture is the backdrop against which we live our lives. Its support our body and daily activities. We sleep on it, sit on it, eat from it and work at it. In form, it is the man-made objects closest to us. Furniture is a barometer of social status, not just the past but of today as well. It is also can be a part of interior decoration. Malaysia Furniture industry generally was started in Muar, Johor. Currently has been ranked as eight top producing country and the largest exporter of wooden in the world. According to Jegatheswaran (2017), the Malaysian furniture industry has come a long way since its humble beginnings in the mid-1980s. From a cottage-based industry, the industry has been transformed into a multi-billion-ringgit export-oriented industry, which outshines all other sub-sectors within the larger Malaysian timber industry.

The Malaysian Bumiputera Furniture Industry Association (1989) was established on 7 October 1989 with the original name of the Malaysian Society for the Bumiputra Furniture Entrepreneur Association (the umbrella concept). By the Government in the field of manufacturing and supply of furniture to the government of Malaysia. The ' concept of umbrella ' was established under the conduct of Guthrie Malaysia Trading Corporation (GMTC) and subsequently under Guthrie Furniture Sdn BHD (GFSB) and his remains was named GFSB's integrated marketing programmed. PETRA's target are to the government procurement (Central Panel Contracts) Ministry of Finance Malaysia (MOF) and the contract for the Ministry of Education, Malaysia (MOE) Government procurement policy. Currently, PETRA already have 87 Bumiputera Manufacturer as registered member`s in Malaysia to supply a furniture for government institution. (PETRA Malaysia, 2019)

Most of manufacturing are referring and implement an OEM, ODM and OBM as their benchmark or concept. An original equipment manufacturing (OEM) company is responsible for designing and building a product according to their own specifications, and then selling the product to another company or firm, which is responsible for its distribution. An original design manufacturing (ODM) company or firm is responsible for designing and building a product as per another company's specifications. An original brand manufacturer, or OBM, is typically a company that sells an entire product made by a second company or including a component from a second company sources as its own branded product.

## METHODOLOGY

In this section researcher choose a qualitative research which is case study by using a sampling had done by others researcher. According Berg (1989) - Qualitative research therefore refers to the meaning, concept, definition, characters, metaphors, symbols and description of things. This process involved analysis data on factors of decreasing numbers by Buminputera Manufacturer. Researcher used a survey as an instrument to observe and get data. In other hand, get an experience from the issue in a real field. Observation had done at primary school and Lecturer office at University Technology Mara, Campus Alor Gajah Melaka (Government Agency) which is focusing on furniture design supplied by PETRA. Secondary data was collected from literature review where others researcher previous findings on decline factors of Bumiputera

Furniture Manufacturer. All the data has been compiled and analyze on preliminary findings section. The Malaysian Bumiputera Furniture Industry Association (PETRA) as a sample for the case study. The preliminary finding and result important to help and improve PETRA development in future.

## PRELIMINARY FINDINGS AND DISCUSSION

This section discuses on preliminary finding in the context of design and quality on furniture through The Malaysian Bumiputera Furniture Industry Association (PETRA). Based on the previous research findings, there are several factors that contributed to the decline of percentage contribution to economy gross income by Bumiputera Furniture industry in Malaysia. (Nur Syazana Osman, p. 448) The highest factors are quality and design faced by almost Bumiputera Furniture Entrepreneur or Manufacturer showed on Figure 1 below.
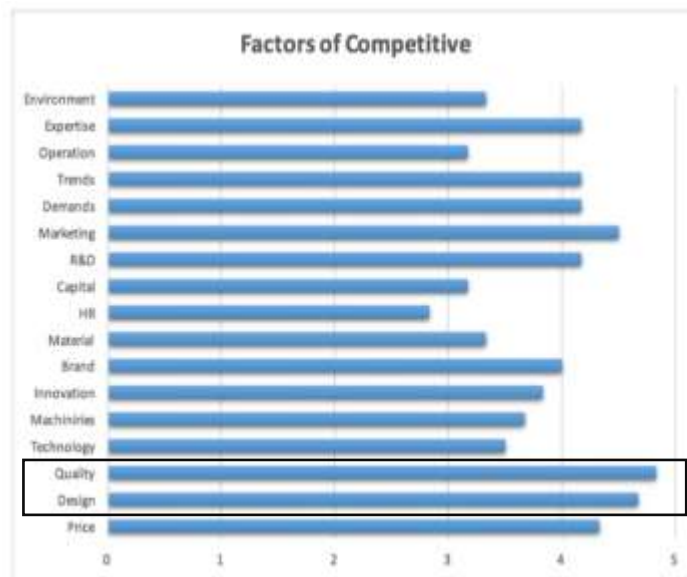


**Figure 1 Factors of competitive among Bumiputera Furniture Manufacturer (Nur Syazana Osman, 2018)**

Bumiputera Furniture Entrepreneur are more interested to market their product through the "umbrella scheme" or government contracts as per PETRA was engaged almost three decades. There are play safe on the guaranteed market which cause of them anxious to involve in open market globally. The market is ready for them to supply their product. That is one of the main reasons why they lacked in the context of their design process and product quality. Factors of competitive that should PETRA give more attention is design and product quality as per discussed in this section.

### Design

Why design is so important? It can be seen that design is critical for our future. Without designs, we cannot hope to achieve any of the OEM, ODM nor OBN stages. Without designs, manufacturer or production cannot proceed beyond the current type of OEM. Without designs, we would not be able to create nor identity a niche for us. Design without technology is also not possible. This is because today's furniture design and production technology are so far advanced that one must possess the necessary skills in order to survive and succeed. Technological knowledge will enable us to keep abreast with the latest techniques which are mainly aimed at increasing productivity, improving quality and incorporating product innovation and thereby creating changes in trends and tastes. As such, design and technology are

complementary of one another in order for the industry to move into the medium and higher market segments. Bumiputera Furniture Entrepreneur must realize of this issue and need to change away from their present position and practice. Today, buyers are going elsewhere and they as entrepreneur are now the ones who need to chase after them. Even if they can manage to catch them, if our entrepreneur doesn't have new designs nor the technology, what they are going to sell to market.

The Malaysian Bumiputera Furniture Industry Association was established almost 30 years. Within these 30 years PETRA was supported by government as the government procurement (Central Panel Contracts) Ministry of Finance Malaysia (MOF) and the contract for the Ministry of Education, Malaysia (MOE) Government procurement policy. This decade of engagement supposedly showed an improvement in terms of quality of design. Referring to the PETRA`S product catalogue through their official website there are some of design need to be improve. Generally, they are sense of typical Bumiputera mentality on design where they are using the same template without doing some innovation on design especially for primary and secondary students chair and table (BDR1, BDR2, BDM3, BDM4) showed in Table 1 below. Nowadays, in higher education institution are moving to Education 5.0 where flexible learning are happen outside classroom support with high technology system such as virtual reality (VR), augmented reality (AR), hologram, live video and so on which can be one of the tools for teaching and learning activities. Devices such as smart phone, smart tv become a one of the needs for flexible education. Most of the Bumiputera Furniture Entrepreneur doesn't consider on main function and additional function of the product. The function on the furniture needs to be consider first where it will change the overall design. Used less of material or mix material in order to change the perspective of aesthetical value to make the appearance of the product look beauty. Design need to be sparked with an identity such as referring to partial style or design era to showed that designer or furniture entrepreneur have a sense of taste. The aesthetical value of the product will appear when the function of the product meets and fulfil needs of the user. Below comparison table showed sample furniture design for class room space in the global market compared to furniture design in Malaysia public school.

**Quality**

Consideration in terms of safety, material, structure, jointing, finishing and ergonomic need to be look into, in order to produce a good quality of furniture design. In this case, they are several issues need to be taken seriously in order to accommodate and fulfill user needs. USA and Korean are more concerned in healthy working environment where considered on ergonomic chair with spinal back support. This office solution system will arrange and manage the user based on working task that involved on that furniture instead of the function of the table for everything. Different working task, will have different office solution (furniture) based on function of the design. Table 2 below showed most of the office table provided in Malaysia government office doesn't follow on design consideration such as material selection based on working task. In this case, some of the table are not durable and long lasting in terms of jointing, material and finishing due to the missed of appropriate function that cannot suit to the working task or activity happen. Quality of materials also need to be look into where manufacturer produce using a low-quality chipboard to control and reduce the cost price, but in the other way they actually create a new problem where the material cannot sustain in certain period of time and temperature. In this case, structure of the furniture easy to collapse.

| Types of Furniture | Malaysia | USA | South Korea | Scandinavian |
|---|---|---|---|---|
| Student Chair | | | | |
| Student Table | | | | |



**Table 1 Comparison on furniture design provided for Education space for public school between
Malaysia Market and global**

| Types of Furniture | Malaysia Market | Global Market |
|---|---|---|
| Office Chair | | |
| Office Table | | |



**Table 2 Comparison on furniture design provided for Government office space between
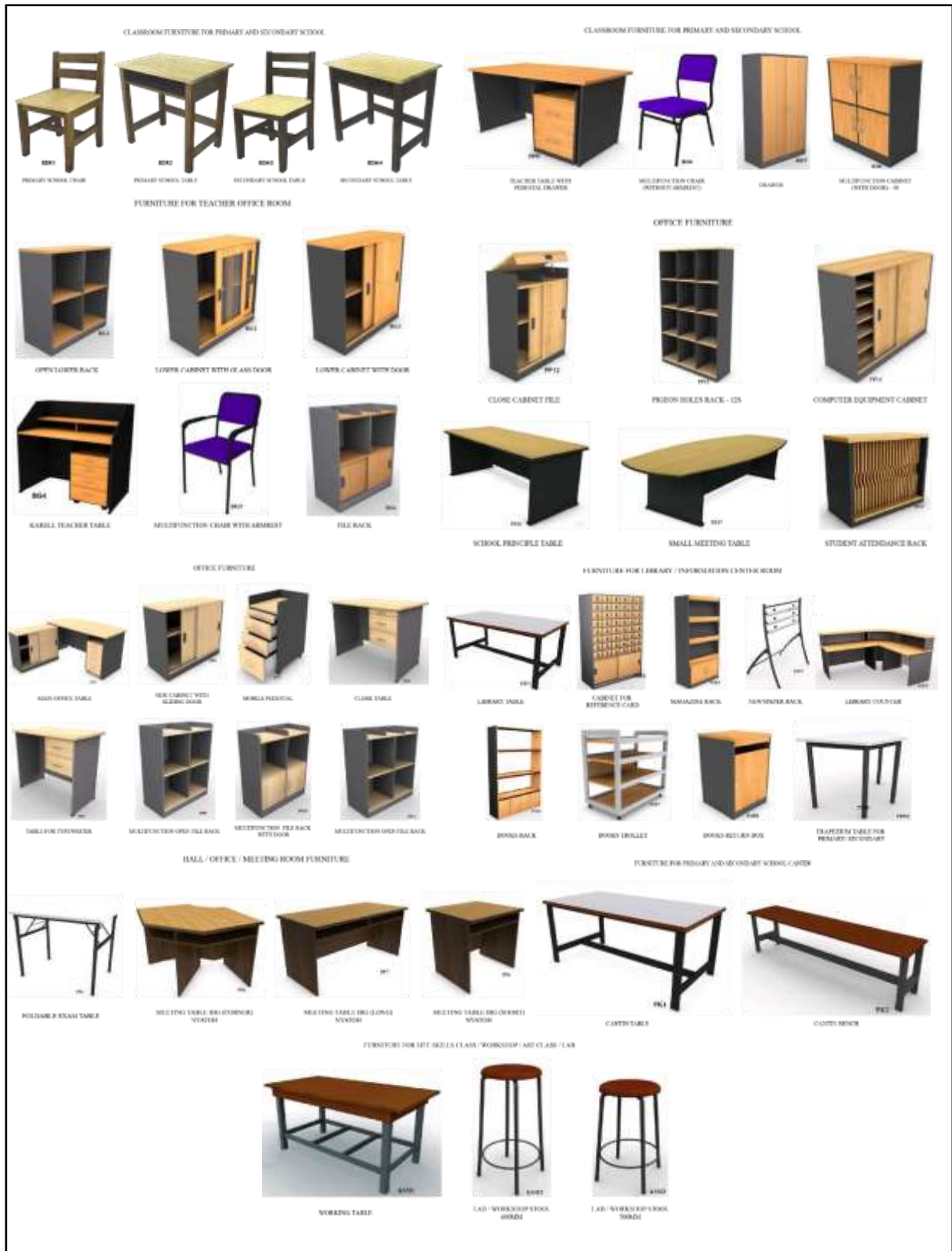Malaysia Market and global**

**Table 3 PETRA Furniture / Product on website catalogue**

**CONCLUSION**

In conclusion PETRA should grab and take an opportunity through a lot of initiative that provided by Government to support especially for Bumiputera in order to make Bumiputera Furniture Industry still reliable in Malaysia. Design process should implement by PETRA in collaboration or industry partnership with Highest Institution of Learning that have expertise and niche especially on furniture or product design such as UiTM as the pioneer on industrial design and also one and only Bumiputera University in Malaysia. In this matter, MOE should involve university with the industry to support Bumiputera Furniture industry especially on quality of design to make sure the numbers of contribution from this association increase in the future.

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# Interpreting the Batik Motif and Pattern in Mohd Nor Mahmud's Painting:
## *Pakai Semutar Kain Lepas*

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## ABSTRACT

This study discusses the visual characteristic illustrated in a painting inspired from the traditional Malay batik design, called "Pakai Semutar Kain Lepas" created by Mohd Nor Mahmud. Visual analysis approach was chosen and highlighted through the application of line, shape, texture, balance, repetition and space. Indeed, the analysis discovered that the artwork expended with varieties of motifs design, which harmonized a unique pattern. The results also stated about seventeen motifs that were formed from the floral and pucuk rebung (bamboo shoots) motif. In fact, the composition was significantly composed based on five vertical panels within the landscape format. This painting was one of the artworks that was created through batik methods. This approach is actually an option in how batik was explored into fine art practice and was displayed in a gallery.

**Keywords***: Motif, Pattern, Painting Batik*

## INTRODUCTION

Batik is always synonym with a technique or medium using wax and coloured dye. On the other hand, batik is significantly recognized as an object of study in certain particular purpose (Legino, 2012). Therefore, painting batik was defined as a painting that applied the visual appearances or images from batik motif and pattern, however the medium and technique was different from conventional technique batik painting (Harozila, 2007). For instance, several artworks that created by Hashim Hassan, Mohd Najib Mohd Dawa and Mohd Noor Mahmud were considered as painting with batik as it resembled this method of style. However, the arrangement of the motifs in Mohd Noor Mahmud was scattered as compared with batik painting, which was more structured oriented.

The *Pakai Semutar Kain Lepas* (wearing traditional head-dress) by Mohd Nor Mahmud is a painting batik that illustrates the aesthetic values of the Malay traditional batik design. This artwork was presented in 150cm x 170cm format through acrylic medium (refer Fig.1). Thus, the artwork is also defined as *pakai* (to wear). In this sense, the word *Semutar* (traditional head- dress), refers to a cloth that is worn as a head-dress and *kain lepas* (long-cloth of sarong) is a long cloth usually made from batik technique. The composition consists of five similar vertical panels with repeated motif and pattern as a broader design. The *pucuk rebung* (bamboo shoot) *motif* was been applied on the fourth panel and each panel was dissimilar in design while the other studies also identified two main categories of motif in

batik and in *songket* (traditional weaving) that was the traditional motif and modern motif, and which this artist has explored both types in his artwork (Haziyah, 2006). The assimilation of sarong is also enhanced and the order is similar with the layout of the batik sarong's panels in the *kepala kain* (main central panel), the *badan kain* (larger left and right panel), the *apit kain* (the framing border) and the *tepi kain* (upper and lower edges) character (Legino & Forrest, 2015).



**Figure 1 *Pakai Semutar Kain Lepas* (2007) by Mohd Nor Mahmud from the Permanent Collection of National Visual Art Gallery, Kuala Lumpur, Malaysia**

## RESEARCH METHODOLOGY

This study employed a Visual Analysis method which encompasis four-step procedures in art criticism (Ragan, 2000) and also Stylistic Analysis that emphasized on line, shape, texture, balance, repetition and space (Sporre, 2015). An investigation about the material and techniques that applied by the artist was recognized through observation. Then, the tracing was applied as significant tool in recognized the motif and pattern and also the composition of the artwork within context.

## ANALYSIS

### Motifs and Pattern

Motif and pattern are frequently used to discuss repetition in art. According to Ocvirk (2001) "rhythm is also present when regulated units are repeated" (p. 36). Ragan (2000) states "rhythm results from repetition" (p. 202). In this study, seventeen (17) motifs were repeatedly utilized in this painting. The fourth panel consists of a pucuk *rebung* (bamboo shoots) motif that is known through its triangular shapes. This motif was also identified as *pucuk rebung kendong* which means a bamboo shoot that carries something and this type of triangular motif resembles the pointed ends of bamboo shoots (Md. Nawawi, 2007). This character has different motifs on both sides and usually positioned at *kepala kain* (main central panel) used in long cloth or shawls (refer Figure 2).
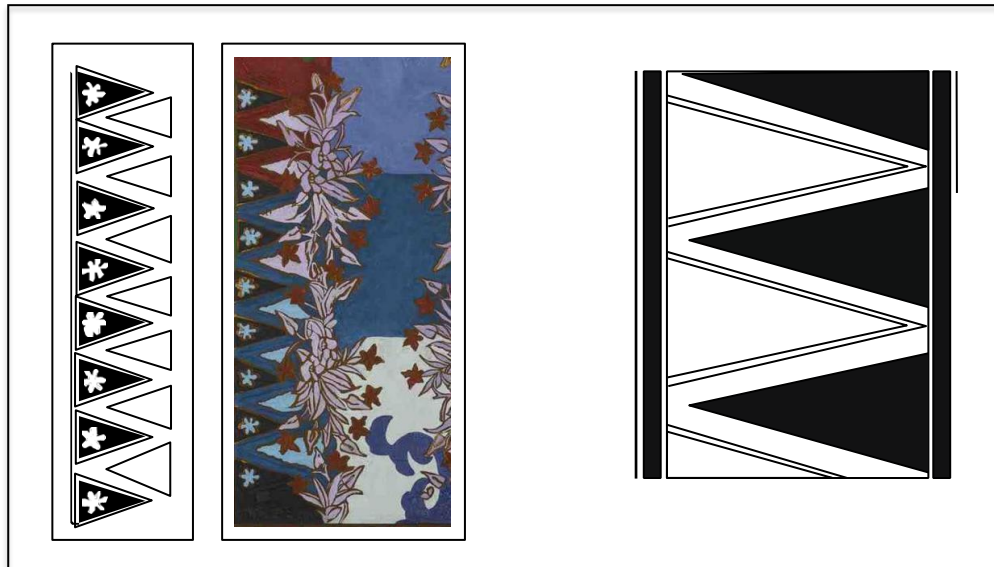
**Figure 2** *Pucuk rebung kendong* (*kendong* **bamboo shoots) motif that applied in the artwork**

The Motif *sulur bayung* (tendril) is located at the frame or border design in this artwork. Literally, the motif called *sulur* (tendril) is indicated from the branch of a locally found creeping plant, the root that grows from the main trunk of a tree or a piece of metal wire. The *sulur* (tendril) means the shoots of ivy like plants while *bayung* is a kind of decoration representing the long beans type of plant (Abdul Rahman, 2000). From the observation, the pattern arrangement was not consistent as the sequence of the motif and was altered to fit the picture plane. In fact, Stevens (1981) discussed the structural anatomy of pattern, which begins from the simple symmetries of mirror reflections, rotations, translation, and glide reflections, then develops into "point groups" and "the seven distinct bands" or "linear group" and culminates in the "seventeen full-fledged wallpaper patterns". In Figure 3, the repetition with translation systems was identified and applied for the vegetal motif and created a pattern that enclosed the five panels and functional as a border frame of the artwork.
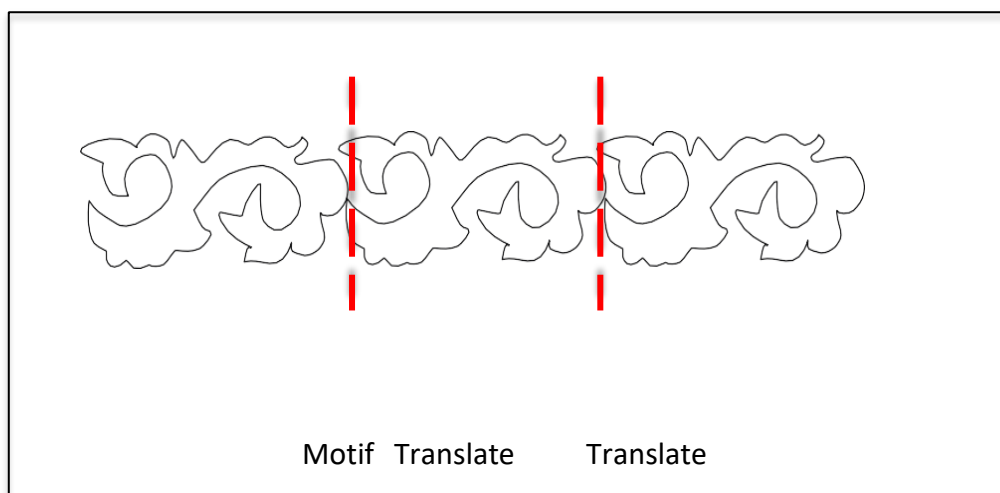


Motif   Translate        Translate

**Figure 3 Translation repetition on motifs** *sulur bayung* **that create as border frame of the work**

**Formalistic Aspects**

This study was emphasized on line, shape, texture, balance, repetition and space in the artwork. Ragan (2002, p. 16) states that, "The basic visual symbols in the language of art are known as the elements of art", Hence with the knowledge to use the language of visual art, it will increase the ability to understand, appreciate, and enjoy art. Ragan also writes that artists used them as visual building blocks to create a work of art and these elements are line, shape, form, space, colour, value and texture. Ocvirk (2001) notes that artists have freedom to control the elements of art either as two dimensional or three-dimensional effects. Each element requires principles of art in order to compliment as well as to form unity. The reason is that if an element has no principles, it would appear characterless and bland. On that note, it is hoped that this method will enable the researchers to develop understanding on the adaptation of Malay ornament design in Modern Malaysian painting. The element of line was applied to justify the boundaries between the motifs and the background, which created a depth of shallow space. The composition was composed in asymmetrical balance with translation and reflection repetition. The process of repeating the motifs and techniques effect gave a visual textured surface throughout the artwork. The arrangement of triangular shape with elongated floral motifs became the focal point in this work. This was the only panel that presented geometrical motifs in the composition, however the background was treated with irregular angular shapes that linked the figure ground aspects. Background area in each five panels was divided into forty-one irregular geometrical shapes with flat colours treatment. Although the arrangement of motif and pattern was infrequent, these decorative elements were enclosed with patterns that functioned as a boarder.
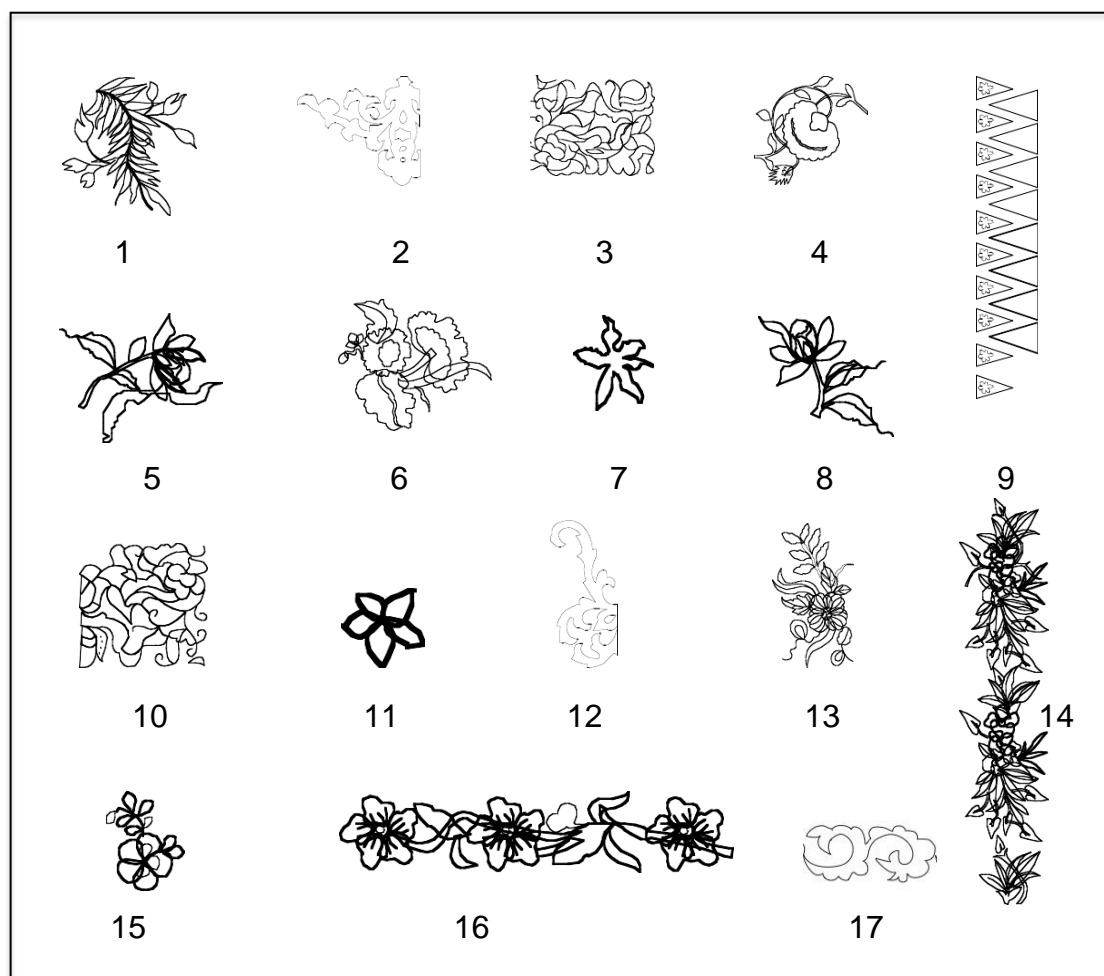


**Figure 4 Seventeen motifs that were identified through tracing methods in the painting batik entitled *Pakai Semutar Kain Lepas***

## CONCLUSION

In this study seventeen motifs with sixteen vegetal motifs and one geometrical motif were discovered in the painting created by Mohd Noor Mahmud. The *sulur bayung* (crocheted) and *pucuk rebung* (bamboo shoots) motifs were identified in the composition together with the entire outline motifs as well as the brown vertical lines set in between the panels. Repetition using the translation process has been recognized, which is emphasized as the border frame of the artwork as shown in Fig. 4. The implementation of vibrant bright colours was associated with batik design from the state of Kelantan and Terengganu that is closely related to the artwork title. Moreover, Malay traditional art form embraces meticulous arrangement of intricate motif and pattern that provides the form its function and meaning. This has become the essence of the Malay artist to incorporate traditional art as subject to their works as to instill national identity in which the artist was able to capture the aesthetic values from batik and transformed this idea into visual art.

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# Video Tutorial As Complement Guide To Comics Creating For Students In The Arts Extracurricular At Sma Negeri 3 Boyolali

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## ABSTRACT

Video tutorial has emerged to have an important role as a medium to deliver knowledge, especially to enhance creativity and skills for students during the learning process. Comic creating session in the arts extracurricular classes at SMA Negeri 3 Boyolali requires the development of new media and methods so students are motivated to learn independently and not depend on face-to-face or conventional classroom with limited amount of creating time. Based on this, we applied the video tutorial media to be used as a guide to comics creating to improve students' learning independence in the arts process. This study aimed to determine the efficacy of video tutorial. The results showed that the video tutorial based learning media that were developed were suitable for use in the learning process supported by students' opinion that the feasibility of the video tutorial media was 82.71% with very decent criteria.

**Keywords:** *Video Tutorial, Comics Creating, Arts Extracurricular*

## INTRODUCTION

Arts extracurricular in SMA Negeri 3 Boyolali are learning class for students who have interests and talents of fine arts. The learning process in this class is held outside of school hours or after the completion of intracurricular learning activities. By separated from formal teaching and learning schedule, arts extracurricular offer students to develop their skills through concrete creating such as drawing and sculpture. Through extracurricular classes, students are expected to develop their talents and skills in creating artworks. Therefore, the teacher facilitates with quite diverse and contextual subject matter, one of them is learning about comics. Learning comics is quite fun and challenging. In comic learning, students feel represented by their souls because through comics, students can express various experiences about daily life or things that are considered contextual. Nevertheless, the fun and challenging learning process of comics actually has obstacles because of the limited time spent studying at school. Arts extracurricular can lead to talented students in creating artworks.

Taking everything into consideration, we conducted a study to determine a solution to overcome the constraints of learning time at school. The research was done in order to develop a video tutorial based comic learning media. It was expected that students can learn independently anywhere and anytime through video tutorial. Thus, schools remained responsible for providing extracurricular learning services so that students always learn in unlimited time and space unlike during the class. We assumed that it was a positive step to obtain quality education and increase student independence in learning without relying entirely on the teacher so that students could be more independent.

Students would tend to use the media facilities provided or independently try to actively search for information about comics creating that they had not known yet. Students were guided so they could work on comics creating, foster creativity and skills, and develop new knowledge about the potential of comics as a contemporary art product through the video tutorial media.

## LITERATURE REVIEW

We wrapped the previous research with the same problem according to Muin (2017). Teachers should learn and utilize more capabilities in the field of technology as the world of education will also need technology as an important component in supporting the learning process along with technological advancements.

According to Black (2014), voice and background audio in the media play an important role in communicative learning. Communicative sound can trigger attention towards the media and enhance the learning so the material can be conveyed properly. Buchori and Setyawati (2015) stated that educators should use learning media in teaching. It can attract students' interests and facilitate students' learning during the process of teaching and learning. It can be more meaningful.

According to Kustandi (2013), multimedia is a delivery tool that combines two or more elements of media, including text, images, graphics, flowchart, graphics, photos, sound, film and animation in an integrated manner. Whereas interactive multimedia is multimedia that is equipped with a controller that can be operated by the user, so they can choose anything they want. As for Asyhar (2012), basically one of the objectives of learning with interactive multimedia is as far as possible to replace and complete and support the elements of the objectives, materials, methods, and assessment tools that exist in the teaching and learning process in the conventional education system that we usually do respectively.

In carrying out or carrying out an activity it is better to pay attention to the function of the activity. As is the case with extracurricular activities, schools as the organizing institution must realize how big their functions are for students. The function of extracurricular activities according to Noor (2012: 76) is as follows:

1. *Development function,* which is the function of extracurricular activities to develop students' abilities and creativity in accordance with their potential, talents and interests due to stable and balanced progress of enhancement.

2. *Social function,* which is the function of extracurricular activities to develop students' abilities and sense of social responsibility in their act.

3. *Recreational function*, which is the function of extracurricular activities to develop and supplement the development process during the creating process.

4. *Career preparation function,* which is the function of extracurricular activities to develop students' career readiness and to enrich their experience in certain skills.

Correspondingly, Riyana (2007: 147) stated that the tutorial model is learning through computers where students are conditioned to follow the learning path that has been programmed with the presentation of material and practice exercises. The opinion above can be concluded that the video tutorial is a learning medium that conveys messages to students in the form of audio and visuals in which there are interactive learning materials so that students can learn independently which is not limited by certain place and time.

Generally speaking, we added the definition of 'video' terminology. Hanson (1987: 23) expressed the meaning of the video in the following quotation:

*"Video is a unique form of visual communication that has been influenced by historical factors, technical development, and criticism given to other form of media. Defining video is difficult because we have been introduced to the medium through a number of related technologies – most of which grew from the development of other form of media. The term 'video' relates to a process, and can denote either the actual visual image."*

Meanwhile, based on the *Kamus Besar Bahasa Indonesia* or Indonesia Dictionary (2017: 1230), tutorials are: (1) Class guidance held by a teacher or tutor for a student or a small group of students, (2) Additional teaching course through certain tutors. Furthermore, according to Riyana (2007: 2) instructional video media is a medium that presents audio and visuals that contain learning messages both containing concepts, principles, procedures, application theory to help understanding of a material. From some of the expert opinions above, the researcher concludes that the video tutorial is a series of live images displayed by a teacher that contains learning messages to help understanding an instructional material as guidance or additional teaching material to a small group of students at the classroom.

The definition of comics according to McCloud (2008) is a picture arranged sequentially and interconnected. Comics can be made in one or more boxes. Comics that are loaded in more than one box (panel) are called comic strips. There are also those that are made together in many boxes and recorded, called comic books. Thus, if defined simply, comics are an art form that uses immovable images arranged in such a way as to form a tangle of stories.

## RESEARCH METHODOLOGY

The type of research used in this study was research and development (r&d). The subjects in the study were the arts extracurricular students at sma negeri 3 boyolali, specifically was the 12th grade students. Data were obtained through questionnaires and tests. Data analysis technique is done using quantitative descriptive analysis techniques, namely by analyzing quantitative data obtained from questionnaires and field tests.

$$Feasibility\ percentage = \frac{Observed\ score}{Expected\ score} x 100\%$$

**Table 1 Interpretation of Feasibility Percentage Scale**

| Score Scale | Interpretation of Feasibility |
|---|---|
| 76 - 100% | Very feasible |
| 56 - 75% | Feasible |
| 40 - 55% | Fair |
| 0 - 39% | Less feasible |

The percentage scale interpretation of Table 1 was used to determine the feasibility of the product which in this case was the video tutorial. A percentage scale of 1 with a percentage of achievement of 0–39% got a less feasible interpretation. A value scale of 2 with a percentage of achievement of 40–75% got a pretty decent interpretation. A scale of 3 with a percentage of achievement of 56–75% got a decent interpretation. To add up, scale of 4 with 76-100% achievement percentage got a very decent interpretation.
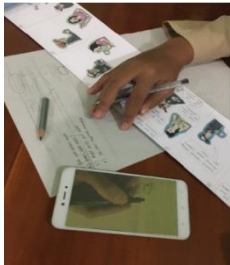
## FINDING

The initial stages in the process of making a video tutorial were arranging the basic concepts in the form of a script from the first frame to the last. The next steps were continuing to record the stages of making comics starting from the story script, storyboarding, sketching, coloring, sound filling and final editing for the merging of the frame during the process of making comics up to presentation.

In the comic tutorial video, there was an explanation of comic strips and collages along with several stages of making comics to determine the characters that will appear. Besides, there were explanations of tools and materials that will be used and finally the presentation of comic strips or collages using kinetic displays.

After a video tutorial based comic learning media was produced, it was then tested in front of the students in the arts extracurricular class. Based on observations during the arts extracurricular course, the implementation of trials through the screening of video tutorials on making comics was very conducive and attractive. It could be seen also from the results of a questionnaires distributed to students that the percentage of video media eligibility, within a total of 12 students as objects study.

The observations and questionnaires showed that the video tutorial had a worthiness to be used as a students' guide. Also, it showed that students enjoyed the process of creating comics easily and without many significant obstacles.

**Table 2 Comparison of Students' Enthusiasm in Learning Comics Creating through Video Tutorial Media**

| No. | Aspect | Students' Responses | | Observation Results | |
|---|---|---|---|---|---|
| | | Without Media | Using Media | Without Media | Using Media |
| 1 | Atmosphere | Students had a tendency to chat with their classmates. | Students focused more on the media and process of comics creating. |  |  |
| 2 | Effectiveness | Students were still confused in technical issues and waiting for the next meeting to ask questions again. | Students could complete the comics creating process quickly and accurately as a whole. |  |  |
| 3 | Interest | A lot of students were absent during the course. | Students had a high interest to attend even though the class was closed. |  |  |

The video tutorial based learning process had taken place from January 24, 2020 to March 13, 2020. The feasibility of multimedia video based learning media tutorials could be obtained through analysis table of validation results and limited testing of student responses. It assessed interactive multimedia based learning media through three components of the eligibility criteria for obtaining grades an average of 82.71% with very feasible criteria.

**Table 3 Students' Responses to the Video Tutorial Media**

| No. | Components | Students' Responses |
|---|---|---|
| 1 | User interface<br>• Interesting layout<br>• Clarity of video, image, text and audio | 81.58% |
| 2 | Usability<br>• Easy to access<br>• Easy to operate | 81.91% |
| 3 | Usage<br>• Enhancing the learning process<br>• Competence-based media<br>• Elevating focus and interest | 84.66% |
| | Total | 248.15% |
| | Mean of Percentage | 82.71% |



**Figure 1 Video Tutorial Presentation**

**Figure 2 Students were Accessing the Media**



**Figure 3 First Students' Comics Display**

**Figure 4 Second Students' Comics Display**

After the video tutorial was considered suitable for use, the video tutorial was sent to each student's smartphone with the aim to be accessible at home and become a guide to work in comics creating without depending on face-to-face learning at school. By utilizing the video tutorial, each student was able to do comics creating according to the correct steps, from making a script and story board, sketching, outline and coloring to comic display.

## CONCLUSION

After the video tutorial was considered suitable for use, the video tutorial was sent to each student's smartphone with the aim to be accessible at home and become a guide to work in comics creating without depending on face-to-face learning at school. By utilizing the video tutorial, each student was able to do comics creating according to the correct steps, from making a script and story board, sketching, outline and coloring to comic display.

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# Animation as Learning Aid in History Subject for Form One Students

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## ABSTRACT

The education system in Malaysia has changed rapidly over the past few years and the method of learning for history subject should reflect these changes. Students will enjoy and comprehend what they learn when they understand the contents and contexts of a topic. History refers to previous events in time that have occurred. In order to understand the past, students must recreate the situation that has occurred; if only they could travel back in time to witness the events first-hand. Through that approach, they are able to absorb and understand historical events but the element of time constraint makes this impossible. Owing to this, animation as a tool will be built in this study. The aim of this study is not to change the current learning system or teaching method, it is just to introduce an alternative method to students for learning the history subject outside of schools. The focus group in this study consists of Form One students. This thesis presents the animation as learning aids to educate students in the history subject and it is not only for entertainment. However, it focuses on the attempt to be effective in the learning process. This research will contribute to the first step of a larger research project in which learning aid tools will be developed from text forms to visualization through the animation medium.

## INTRODUCTION

In Malaysia, the history subject is classified as a core subject that the students must pass (enforced since 2013) as a step-in effort to enhance the knowledge of history. However, this desire requires a new paradigm shift in terms of learning. Since this subject should be studied by every student regardless of social backgrounds, ethnicities as well as academic streams (pure science or literary), the history subject definitely has something special or unique to be explored. With the background of the past events, the historical sources are carefully arranged chronologically based on the interpretations written and recorded by someone who studied the subject to produce a history textbook for student use. Today's students are known as Digital Natives (Prensky, 2001), which illustrates the generation of human beings born and raised after the advent of the digital age. The Digital Natives are very comfortable with technology and computer since their inception. They consider technology to be the most important part of their lives and as such, it becomes a necessity for them. Taking advantage of this situation, the use of animation in the mobile gadget is considered to be able to aid more effective

learning as the multimedia use of the learning processes has dynamic, impressive, realistic and conducive effects. Students today have a variety of technologies available to them at home. Entertainment which derived from the television, iPods, computer games or smartphones are quickly replacing traditional entertainment forms such as reading or outdoor activities. In that sense, a newer learning technique needs to replace the traditional learning techniques in the history subject.

## Research Background

The best age to study the history subject among secondary school students is as early as 13 years old from Form One and is taught continuously until From Five (Dokumen Standard Kurikulum dan Pentaksiran Sejarah Tingkatan Satu, 2012). Students in this group are able to use and understand abstract logic and concepts according to the biologist and psychologist from Switzerland, Jean Piaget (1869-1980). The total amount of students who failed in the Sijil Pelajaran Malaysia (SPM) in a period of six consecutive years is 363,470 students according to a report released by the Malaysian Examination Board (Lembaga Peperiksaan Malaysia, 2014 – 2019). This amount needs to be taken seriously so that this amount can be minimized in the future. If this matter is not taken seriously, it is feared that more students will fail in the SPM examination.

## Problem Statement

The first problem of history textbooks is that they are static and stiff. Static according to Nur Hazidah Awang (2010) is the fact that what is printed on the paper sheets or pages that will be seen and read by readers is not easily altered. Meanwhile, static according to Dewan Bahasa dan Pustaka (DBP) means that everything connected is in a state of silence. This static textbook does not have a fun element for students to learn and this ultimately causes boredom among students when studying and reading about these subjects. According to a study conducted by Abdul Razak Ahmad (2009) on the effectiveness of using static, animated dialogue, he found that the two groups; the experimental group and the control group had no differences in achievement scored by using the text material. On the other hand, there is a difference in achievement scores between the two groups when the dialogical static animation is used for the experimental group. This result showed that there is a strong correlation with the effectiveness of Dialogic Static Animation in the achievement of Form Two subject. Looking at the second problem, the contents of many textbooks are using difficult terms that only complicate the efforts of students to interpret and process the information read. This condition will also interfere with their concentration while reading, as well as reviewing the lesson. According to Badriyah Haji Salleh (1989, p.90), a good history is to use "Good Language". The statement explains that good language is not a language that uses difficult and unusual terms but simple and clear language. A slick or persistent submission can be easily followed. Among the examples of the difficult terms found in history textbook is "Durbar", which means the discussion or conference. The study of Mohamad Johdi Salleh and Ariegusrini Agus (2009a) shows that learning using multimedia tools can provide students with a sense of understanding because all the information they need is easily accessible at the fingertips.

In addition to the above problems, glossary (a brief dictionary) is available in the book to find relevant words and this is time-consuming. This is seen only to cause them to steal or to borrow other subjects' learning time. They have to spend a lot of time reading and understanding the content of each page because of a certain unfamiliar word usage and would need to find the meaning or definition if they do not understand it. However, the position of the glossary is not on the same page. For example, a glossary about the word "GEOLOGI" is found and explained in page 26, while it is not included in page 30 even when the word was used there. This causes students to spend time flipping and turning over the pages which requires them to re-read the paragraph. This statement was also demonstrated by the study of Badriyah Haji Salleh (1989, p.90), 'Pembelajaran Sejarah Di Institusi Pengajian Tinggi', where students in these circles had to take a long time to understand one or two pages. Meanwhile, two pieces of research from Rossafri Mohamad and Wan Ahmad Jaafar Wan Yahaya (2007) are mentioned, where in their study of the impact of multimedia materials on history subject, it is found that the use of multimedia can overcome time constraints.

Another problem statement is that history textbooks also tend to be biased because they employ the one-way learning process (Mat Nor Hussain, 1988). No interaction and two-way communication can be created between the readers and those reading materials when students review such matter at home and at leisure. If students do not understand, they need to wait until they return to school to ask the teacher, in which the teacher does not necessarily have time to provide an answer on the spot. This situation eventually resulted in students losing interest in the history subject. According to Mohamad Johdi Salleh and Ariegusrini (2009a), the learning process should include the usage of animation, making it a two-way learning process between students and gadgets. Further information will be obtained quickly and accurately. In addition, learning materials can be conveyed through images, animations, sounds and videos that will make learning more interesting and enjoyable.

The last problem statement contained in the textual content of the textbook is that it contains many ideas that are abstract (invisible) and concepts that are sometimes difficult to understand (Zahara Aziz & Nurliah Jair, 2009). This will be deemed too complicated by academically weak students, in which they have less ability to interpret and decipher a sentence. Reading and imagining are two different things. However, reading with imagining is one thing to do at the same time. These skills need to be applied while studying the history subject. Students in this group usually cannot explain well because the information obtained from reading sources cannot be digested by their mind. This is a predicament faced by students who are academically weak. Imagination cannot be created if the information they read is not clearly understood. There is a method or tool that can solve problems for academically weak students according to Azalina Abdul Wahab (2013), who uses animation. She found that the method of animation nurtures imagination among students involved because they can understand and recall what was sketched and painted with a friend without looking at the text. This is because, they could understand the content more easily through the usage of animation rather than reading this content in plain texts.

## Research Aim

The overall objective and aim of this study are to enable students to master the subject of history better by enhancing their ability to remember and understand historical facts by making animation as one of the learning aids in the learning process without changing the current learning teaching method. Animations laboratories are meant to supplement, but not replace classroom and traditional laboratory learning. It is to ensure that students can concentrate and not feel tired or lose their interest. The construction of learning using animation is considered a new methodology, and it is important in designing to support Malaysia educational method known as Pembelajaran Alaf Ke-21 (PAK21) used today. This is the first step of a larger research project in which learning aid tools will be developed from text forms to visualization through the animation medium.

## Research Objectives

a. To study how animation is the best application for teaching and learning the history subject for Form One students.

b. To introduce another learning aid for students to easily understand the history subject by using animation.

c. To produce and create a new method by using animation for Form One students in learning the history subject.

## Research Significance

The importance of this study is that such method could be used as a guide to a person with interest such as educators, the government and the private sector in solving the problems that Form 1 students currently face due to the lack of mastery of the history subject. Necessary measures and actions must be taken to reduce the number of students who dislike the history subject. If this situation persists, the number of students who do not like the subject will gradually increase over the years, and they may fail the subject in SPM.

## THE USE OF ANIMATION IN LEARNING

Various studies have been conducted to test the effectiveness and strength of animation in helping students to understand and to increase students' interest in the learning process of several subjects such as Science, Mathematics, English and in particular, the history subject. In education, there are some basic education and learning principles that relevant parties need to understand in order to achieve a standard level in education. They are as follows: readiness, exercise, effects, primacy, recency and intensity. In short, the definition for each principle is namely: readiness means being well prepared to learn; exercise means carry out repetitive tasks; effects mean emotions; primacy means priorities; recency means to carry out summaries; and intensity means the way an individual gains a greater understanding of the subject in question; learning refers to a process resulting in some modification and permanent ways of thinking, feeling, and doing to the learners.

A review of the study conducted by Danton H. O'Day through an article entitled 'The Value of Animation in Biology Teaching: A Study of Long-Term Memory Retention' (2007) states that "animation provides a valuable way to communicate dynamic, complex sequences of a biological event more effectively than text or a static graphic" (O'Day, 2006a).

In another study written by Yigal Rosen (2009), academically weak students who have difficulty understanding the nature of fine particles in chemistry courses have obtained higher test scores when assisted by the use of animation in lectures or as additional tools from individual alternatives to students who were not using animation according to Williamson and Abraham (1995). In line with the study, it has been revealed that students understand the pathway of the more complex signal transduction after seeing the success of animated animation influencing the achievement of weak students (O'Day, 2006a).

The use of animation in mathematical learning can provide information and assist students with the understanding of the dynamic process to build new knowledge (Taylor, 2008). There are five positive values according to Bukova (2004) when students use technology such as animation as auxiliary materials: acquiring knowledge by doing experiments, making mathematical concepts more concrete, building or improving students' conceptual knowledge about mathematics, learning mathematical concepts that are abstract, and motivating them to learn in a more fun and meaningful way.

Animation has great potential in the study of mathematics, and it can be used to improve students' achievement and help develop mathematical concepts (Kurz, 2004). The usage of animation appears to provide a change in learning methods (Kalbin Salim & Dayang Hjh Tiawa, 2015) and allow students to explore different experiences in learning the ideology of mathematics, supporting students in making mathematical connections both inside and outside the hours of math, and allow students to focus in reflection on learning (Niess, 2006).

The implementation of animation is not only limited to the subjects of science, mathematics and English. Animation can also be used in the study of the history subject. According to previous sources, the use of animation can aid in factual learning (Eun-mi Yang & Andre T., 2003). Therefore, it can be posited that the usage of animation is also suitable for use in all subjects, including the history subject.

## METHODOLOGY

With regards to the research design in this study, it utilises a mixed method of quantitative and qualitative as an approach of obtaining as much research data as possible. According to Denzin and Lincoln (1994), research that uses the qualitative method diversifies methods in focus and uses naturalistic approaches to researching objects. Creswell & Poth (2018) defines qualitative research as an inquiry process over the understanding based on common data collection methods when examining social problems.

**Quantitative approach: questionnaire.**

Qualitative approaches in this study are in the forms of interview, observations and analysis of documents that are the main suppliers of research studies. The table below shows the group of respondents.

**Table 1 Group of Respondents**

| Qualitative Approaches | Respondent | Total |
| --- | --- | --- |
| Interview | Teacher | 4 |
| | Student | 20 |
| Observation | Participant | 2 |
| | Non-Participant | 4 |

## Research Instrument

The data analysis was used to find differences in students' understanding of learning using the traditional method and learning using the animation method. The number of student scores in both pre-test and post-test will be aggregated into the data. The scores obtained from both tests were statistically descriptive, using percentages. Percentages of post-test scores were compared to see improvement in overall participants' scores. Most of the data obtained will be presented in the form of a percentage table which will explain the comparison between the data collection.

The data obtained from the questionnaire also uses percentages. Data from the questionnaire is needed to determine the level of interest among students in learning the history subject using animation. The questionnaire will be distributed once the response has been completed by post-test. Eight questions will be asked in the questionnaire form. Likert scale was used, having 5 options for answers, and respondents were only allowed to choose one answer. The total number of respondents involved in this study was 35. Data obtained from 35 respondents were systematically analyzed.

## Research Sample

The group that is selected as sample of the study consists of Form One students. The selection of the study participants for this evaluation phase was marked by their respective teachers. The act of selecting participants involves only history teachers, where these teachers will select the study participants who are Form One students. The teachers must also be the teachers who are teaching in the same class as the study participants. This is because the participants are students who are weak in the history subjects with either a passing grade (E) or a failed grade (G). To identify and determine a student's weakness in history subjects, teachers use the results of the examination as a reference.

## Data Analysis

The data for this study was analysed with a statistical software known as SPSS (version 20). SPSS is a statistical analysis software used to obtain results from a set of questionnaires that were distributed manually in a government-assisted school. SPSS is an open-source software developed by IMB. The software is useful for analysing statistic data. It was released in 1968 and is widely used in statistic programs in social sciences. SPSS is capable of handling large amounts of data and can perform all of the analyses covered in the text, number, and much more. This software was chosen because of its compatibility with most other software packages and its user-friendliness used to collect data analysis (Field, 2009). The following are the steps used by this study to analyze the data.

## DATA ANALYSIS

### Quantitative Data Analysis Result: Questionnaire

A questionnaire form is used to look at the problems that Form One students face in leaning the history subject and how this research can come up with inventions that can support that learning.

### Section A: Students' Attitude toward the History Subject

In this section, there are 5 related questions and the answer are as follows:

**Table 2 Attitude towards the History Subject**

|  |  | STRONGLY DISAGREE | DISAGREE | NOT SURE | AGREE | STRONGLY AGREE |
|---|---|---|---|---|---|---|
|  |  | 1 | 2 | 3 | 4 | 5 |
| 1 | I focus completely on the teacher teaching in the classroom. | 0 | 0 | 10 | 8 | 2 |
| 2 | I always spend time in the library just looking for history books. | 6 | 7 | 6 | 1 | 0 |
| 3 | I do history training even though the teacher doesn't ask me. | 0 | 6 | 10 | 4 | 0 |
| 4 | I prefer to remember historical facts over other subjects. | 2 | 6 | 5 | 7 | 0 |
| 5 | I regularly review and search history books in my spare time. | 1 | 8 | 5 | 6 | 0 |

Among the five questions given, there is one question that focuses on question number 2. The problem that can be said through this section is that students only spend time studying the history subject when with teachers. If they are not with the teacher, they prefer not to learn and would not study the history subject even in groups or individually.

The history subject is not among the subjects they struggle to learn because there is no innovation in learning the history subject besides the traditional method, which is by reading through a textbook. Students are afraid of failure, but there is no other alternative way they can explore.

## Section B: Students' Interest in Animation

In this section, there are 5 related questions and the answers are as follows:

**Table 3 Students' Interest in Animation**

| | | STRONGLY DISAGREE | DISAGREE | NOT SURE | AGREE | STRONGLY AGREE |
|---|---|---|---|---|---|---|
| | | 1 | 2 | 3 | 4 | 5 |
| 1 | I like animation. | 1 | 2 | 1 | 5 | 11 |
| 2 | I'm so happy to be able to learn using animation. | 2 | 0 | 3 | 4 | 11 |
| 3 | I always watch movies / animated stories during my free time using my mobile phone. | 2 | 3 | 4 | 4 | 7 |
| 4 | I remember the facts by drawing on my own imagination. | 1 | 0 | 4 | 7 | 8 |
| 5 | I can summarize the contents from the textbook through animations sketch/ drawn by me. | 2 | 1 | 7 | 5 | 5 |

The answer for number 1 is clearly stated in this group of students who liked the animation as 16 people agreed and strongly agreed. They are also happy to be able to learn using animation where 11 people strongly agreed and 4 people agreed with such statement. There are 11 students who indicated that they always watch movies or animated stories in their spare time using a mobile phone. This is a common phenomenon that is affecting students today. This phenomenon is in line with the existence of a generation dubbed the Native Digital. They can also summarized the contents of the textbook through animation sketch or draw by themselves. It is great to be able to create an easy way for them to understand the subject of history. The above clearly demonstrates that they need to be assisted with animation in learning the subject of history.

## Qualitative Analysis Result: Interview

During the interview with teachers, there were 3 types of questions. All answers received from the teachers would assist in obtaining information related to this study.

a. Do you think learning the history subject using a textbook is enough? Do we need to add a study aid other than the textbook itself?

Students should also be given a variety of materials as long as the learning goals reach them. In conveying knowledge, it is not wrong or a problem if other methods are used. If there is a study tool created specifically for this subject, it can also help and ease the work of the teachers. But it is important to make sure that the study aids are different from the textbook features to provide students with a variety of approaches to learn this subject.

b. What reading materials do teachers give to students when they are at home?

There are two study aids provided by the teachers and given to students for use after school hours in addition to textbooks. As a result of the information obtained in this interview, there are only two types of study aids provided, which are short notes and homework.

c.　　What do you think if history subject exists in the form of animation?

We watch animation, not reading it. Something that is seen is easier to understand than reading because sentences are long and sometimes need to be repeated. Animation allows 3 actions to be performed simultaneously, which are watching, hearing and record. It is something that is highly anticipated and great for student use, especially for Form One students as they prefer something creative.

## DISCUSSION

Based on preliminary findings through the interview and questionnaire conducted, the need to produce animation to study history subject has received a green light from students and teachers. They think this effort is in keeping with the scenario that Form One students face today. Form One students are trained and expected to have high over-thinking and critical thinking skills. Thus, animation is seen to help students manage their time more effectively. This is because learning time can be reduced. It is possible for students to understand in two minutes rather than reading textbooks that may take half an hour to understand the same content. This action should be taken more quickly as it is in line with the goals and time since the Malaysian learning system has experienced a new revolution of student-centered learning and is no longer solely focused on teachers.

## CONCLUSION

In conclusion, this section will address the background of the study which will involve several things as a guideline for this research. Furthermore, the involvement of the problem statement will also explain the problems that arise, which lead to this study. The focus of this study will also state the objectives of the study and the question of the study. This chapter also includes the importance of research to educators, the government, as well as the private sector. There are some limitations faced during the implementation of this study. The contributors to the main problem include the lack of data to support the literature and the difficulty of obtaining a reference statement to be accompany the point in this study. Although there is a lack of literature on the specific topics for this research, the information obtained from studies of other academic subjects has helped to complete this study. The data obtained is extracted from a broader study that is not centered on the history subject alone. When the whole information is gathered together, it is clear that the use of animation can assist students to understand the learning process more effectively. This is because animation has a unique feature that can attract students to follow the lessons, learn and improve their academic performance.

## ACKNOWLEDGEMENTS

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