

Design Analysis of Dining Facility in Jatigede Reservoir with Consideration of Psychological Aspects

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Abstract. Today's in modern life that tends to be occupied, communication usually more by using each gadget. This is due to the increasingly dense routine work between individuals so that the time to meet is felt less. Therefore, the holiday is a day long awaited by people, especially people who live in urban areas. Various ways are done by the community in spending spare time, one of which is to eat together. With food can foster relationships that are the key to great social relationships. Because in the eating together is able to bring social bonds among individuals with each other. Besides gathering meals together while traveling can also bring memories for each individual. One of today's tourist attractions is Jatigede Reservoir located on Sumedang Regency. In this study, researchers used qualitative research methods with data collection techniques through observation, interview and literature study. The purpose of this design is to design a dining facility as well as a place to relax based on psychological studies that can bring the impression of protection, warmth, kinship, and togetherness.

Keywords: Society, holidays, psychology, Jatigede Reservoir, tourism, eating together, social relationships.

1 Introduction

Jatigede Reservoir is the second largest reservoir in Indonesia located in Sumedang Regency, West Java Province. At first, Jatigede Reservoir development has been planned by the previous government since 1963. Water that fills this reservoir comes from a dam, which built at Cimanuk-Cisanggarung River. Dammed region includes the watershed Garut, Sumedang, Majalengka, Cirebon, Indramayu, Kuningan, until Brebes located in Central Java Province. The construction of this reservoir includes the sinking of 5 (five) subdistricts.

In the end, after the area flooded, residents who have difficulty adapting to the territorial waters of seeking alternative employment, one of which is to open a dining facility that provides a simple menu. Because it was built just to survive the affected residents, the dining facility is still far from ideal dining facilities for visitors. This is very unfortunate

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considering Jatigede Reservoir has a view that can be used as a tourist attraction and can be more profitable for the manager or affected residents and the government.

Problems caused to the visitor, especially in the study of psychology is the condition of the room at the dining facilities are designed potluck a poor impression of the psychological side of visitors since the first look at it. The second is the existing lighting system. At Jatigede Reservoir, it still uses natural light, has not used the aid of artificial lighting, so the light intensity is only determined by the existing sunlight source. So if there is a decrease in the intensity of sunlight that comes in when rain or cloudy, then the atmosphere of the dining room becomes dim. Then the arrangement of space at the existing dining facilities has not considered any activities that are likely to be made visitors.

Based on these problems, the development of dining facilities that applies psychological aspects in order to deliver improved customer rated atmosphere needs to be done. Where in applying the psychological side of the space and elements of the dining facility will lead to a design that can make visitors who come to feel comfortable and calm, in the meal together while enjoying the available panorama in Jatigede Reservoir which includes a vast expanse of waters and small islands around it.

2 Theory

2.1. Jatigede Reservoir

Reservoir can be defined as a stagnant water created by stemming the river, generally shaped elongated following the shape of the river bed. The reservoir can be functioned as irrigation, as well as clean water needs of local people [1]. One of the reservoirs in Indonesia is Jatigede Reservoir. Until now, according to the Directorate General of Water Resources of the Ministry of Public Works and People's Housing, Jatigede Reservoir located in Sumedang Regency, West Java Province is the second largest reservoir after Jatiluhur Reservoir, on Purwakarta (sda.pu.go.id, 2015).

According to the Directorate General of SDA, the Jatigede Reservoir is one of the strategies and efforts undertaken by the Government to improve the productivity of the community, especially in the field of food and the availability of clean water with a capacity of 3500 L / dt, covering about 90,000 ha of paddy fields of Sumedang Regency, Majalengka Regency, Indramayu Regency, Balongan Region, and Cirebon City. As well as the additional supply of electricity supply for the West Java Province area of approximately 110 MegaWatt (MW), flood control, and new tourism object Sumedang (sda.pu.go.id, 2015). In addition Jatigede is also used as a new tourism objects in Sumedang, West Java. Due to the position of the Jatigede Reservoir region itself which was once a highland area, then due to the sinking came beautiful islands formed from the sinking hill.

2.2. Tourism

Tourism included into the development process that has a dynamic nature, the meaning is any development that will or has been done by the government will bring forth a sustainable change in various fields with the output to improve the quality of people's lives around the government directly or indirectly. Understanding tourism according to UU No. 9 th.1990 on Tourism is as everything related to tourism, including the exploitation of objects and appeal and related efforts in that field.

2.3. The Sundanese people Eating Habits

The Sundanese are ethnic groups originating from the western part of Java Island. Sundanese have some value that is highly valued by the community and is reflected in the successive expressions of compassion (love one another), penance grindstones (mutual fixing), penance foster (protect each other). Its values include the value of modesty, have a humble attitude toward others, respectful to elders, and love toward smaller, mutual cooperation and togetherness.

Sundanese people known have to an optimistic nature, friendly, courteous, and humble. Noted in the official text of the Suma Oriental written one of the Portuguese named Tome pires in 1512-1515. In this manuscript called that Sundanese people have honest and brave nature. In his life, the Sundanese people have some manners in the following eating activities, such as:

- Sitting Position. Seated position is divided into 2 types, namely the type of sitting men and the type of sitting woman. How to sit for men is to sit cross-legged. While women sit with kneeling folded feet under the body. Then the next way is the body slightly bent towards the food, because at meal times the body is closer to the food.
- Usage Dinnerware. In the Sundanese people's habits, there are two ways the use of cutlery, which is fed using the right hand directly or dine with tools named suru. Eating with the right hand is directly done on solid foods. Eating use suru (banana leaf) in the form of thin foods or wet, by bending banana leaves into two parts.

2.4. Psychological aspects

Psychology is a field of applied science and science that studies the behavior and mental functions of human beings scientifically. According to the origin, psychology comes from the Ancient Greek ie, Psyche which means soul, and logia which means science, so etymologically, psychology can be interpreted into the study of the soul. In designing a product, the designer must first understand the various problems that are closely related to the psychological impact caused by the presence of a product in the community environment. Classification of the psychological aspects is divided into 2 (two) namely [2]:

- The psychological effect based on the existence of a product to human beings or vice versa, in this case humans act as direct users of the product; users of the product indirectly; or non-users. In this condition indirectly will form the relationship between the product with humans or vice versa; which should be considered in the financing process.
- The psychological impact is based on the relationship and influence between one human being and the other. In this case the human being is individual; or in groups. In this condition will make the relationship between one individual with another individual, will eventually create a character, custom, institutions, kinship, culture, traditions, ordinances, rules, or laws that will be formed and applied to humans both in groups and not which should be considered in the implementation of the planning process.

Unconsciously a space can affect a person's behavior. Starting from the colour, spatial arrangement, lighting, air and all elements of the interior of the space that can built an atmosphere of interest to visitors. Weinschenk mentions that what users see is not always what will be received by the brain [3]. Because is involved by the eyes and optics of humans is concluded differently. Its relation to space is that it can function as an impression of either higher space or lower, broad or narrow space. In addition, researchers also have to think about customer focus, this application aims to attract the focus of prospective buyers to get into the restaurant room. Then adding repetitive accents is always easy for visitors to remember. Next is how people feel, example is the sense of vision, Vision provides visual

effects that affect human response and analysis of visitors to the object. The interior theme park, suggest that lighting has an important role in building and managing a visitor atmosphere [4]. Light colored cool light (blue), will reduce the appearance of food and decrease appetite visitors. The color of light in a space will also affect the mood of visitors who are inside. The right color of light to be used in a restaurant is warm or warm temperature with a kelvin range of 3000K. This is judged because the temperature can give the effect of familiar, friendly, personal and exclusive mood. Warm colors like red, orange, and yellow tend to be more eye-catching.

3 Empirical Data

3.1. Observation

The observations were conducted in Dusun Cisema, Pakualam Village, Jatigede, Sumedang Regency. In the observations made by researchers, there are some things related to existing dining facilities if reviewed based on psychological aspects of the theory is not considered appropriate. The first is the states of the appearance of the building facilities that seem improperly so impressive create a slum impression since the first look at it. While the vision is the beginning of humans get a visual effect that can affect the response and analysis of the show to the facility itself. The conditions of the building seem improperly supported by the lack of proper lighting, such as on display tables that tend to be dark.

Next is the placement of the kitchen section of the dining area is considered less precise, because when the seller cooks food including liwetan, then the aroma of the dish may be smelled by visitors, but with the state of the kitchen that has not been feasible will make visitors less comfortable when seen, less being from kitchen waste will also be directly smelled by visitors. Because the smell is closely relate to the influence on the area of the brain that will connect with the emotional and psychological side of a person.



Fig. 1. Room arrangements at existing dining facilities

3.2. Interview

This interview was conducted by researchers with a resource named Mak Entin, as one of the food traders in Jatigede Reservoir which is a resident affected by drowning. According to the initiation of the construction of the dining facility comes from one of the villagers who work in the city of Bandung. Opening hours dining facilities on the banks of Jatigede starts from 09.00 am to 17.00 pm. According to Mak Entin, the construction of a building, whether permanent or not, should only be done in Jatigede Reservoir, not allowed on the waters due to the Jumbo Jatigede Reservoir water itself is used for clean water and hydroelectricity.

For visitors who come to Jatigede Reservoir is dominated by entourage, both entourage from work and family group, both small and big family. Many individual visitors also come to Jatigede Reservoir. The dominance of citizens or visitors who come is people who live in

Sumedang, although there are also residents outside the Sumedang who visited. Although the visitors dominated by the entourage, but large vehicles such as buses can not enter into the tourist area, due to road access that is still not qualified.

3.3. Documentation

The condition of the road that must be traversed to Jatigede Reservoir is still not enough, especially the access road that has not been illuminate, the road is still a red one lane. In line with the condition of road access, the condition of the space at the existing dining facilities in Jatigede Reservoir was made with a simple impression without considering more convenience to visitors. Besides the dining floor that became one with the road and still in the form of red soil impression of dirty and dirty image in the dining room. Here are photos of the road conditions to Jatigede Reservoir as well as photos of the condition of existing dining facilities in Jatigede Reservoir:



Fig. 2. The condition of the access road, existing dining facilities, and dining facilities in Jatigede Sumedang

4 Analysis Results

In the study of psychology, the activity included into things that should be the main consideration, because the activity of visitor will be directly relate to the psychological effects that will be received. Table of user activity is obtained investigator from the observation that has been done before in the dining facilities at Jatigede, Sumedang. Here is a table of user needs analysis based on user activity in existing dining facilities at Jatigede Reservoir:

No	Activity	Analysn	Needs
1.	Visitors entering the dining facility	Visitors will see whole of dining facilities	The dining facilities that can be visually attract visitors outside
2.	Visitors take off footwear	Will wait for their turn to open footwear and footwear lay in certain	The area for opening footwear and storage of footwear area
3.	Visitors entering the dining area	Visitors look at the inside of the dining facility	The area that separates the dining area, seating area, and areas use take off footwear
4.	Visitors sat down	Sitting following the pattern of the building being made. Visitors will be looking for a backpack. Put the luggage. Sitting adjacent to the closest member	Seating area. A backpack. Luggage lying area
			1. Visitors entering and leave area
			2. Visitors are looking for the seat
			3. Used as a desk seat
			4. Visitors enjoy the seat
			5. Visitors finished eating
			6. Visitors took their bags
			7. The road is not wide and without a street light, visitors see the road, which is dark, so they usually use a flashlight
			8. Visitors are not satisfied with the appearance of the dining facilities, especially the area of the dining facilities. The owner organizes the food, but there are still some things that are not good
			9. Visitors are not by hand, so they have to walk to the dining area, which is not very clean
			10. Visitors took their bags
			11. Visitors enjoying view of the reservoir
			12. Visitors capture their moment
			13. Visitors pack up their goods
			14. Visitors pay for the meal
			15. Visitors leave the dining facilities
			16. Visitors will be lean, Visitors will play or talk together
			17. Visitors will take pictures. Looks for objects that can be used as an interesting background
			18. Visitors take luggage. Visitors who bring a child will take care of the child before returning home
			19. The owner came to the visitor
			20. Visitors search for their stacked footwear. Visitors wear their footwear
			21. A backpack. Direct access to the reservoir scenery
			22. Interesting atmosphere for background photos.
			23. The area that can accommodate visitors activities
			24. Cashier
			25. Access for visitors to entering and out the dining facility. Wearing footwear area

Fig. 2. User Activity

Based on the figure above, we can see activity that visitors do from coming until leaving the dining facilities. As well as the facilities and elements can be seen as what is needed by researchers to build a mood that will intersect with the psychological aspect of visitors.

– Visitor entering the dining facility.

Major activities of the visitors are they make after arriving and parking their own vehicles are entering the available dining facilities. This is because the weather around the reservoir is blazing and windy, and the effect of the journey has a terrain that can make the body tired. So when the first time out of the vehicle, then visitors will choose at the dining facilities where he will dine. While the dining facilities contained in the Jatigede Reservoir at this time the appearance of the building facilities that seem improper dining so it gives the impression of slum since the first look at it. While the

vision is the beginning of humans get visual effects that can affect the response and analysis of the protector against itself. Therefore dining facilities are recommended to have a front or facelift that can attract visitors. Such as the selection of orange color that can give the impression of warm so that will cause the impression of intimacy and warmth. Visible visual stimulation can also be formed by the selection of form shapes that can interpret the atmosphere of togetherness, dynamic, like a square shape or shape that can interfere with the family atmosphere, the circle or round shape.

- Visitors take off their footwear
In this activity the visitors who have entered the area of the dining facilities at Jatigede currently must wait their turn to open footwear, besides laying open area of footwear is also not laid properly. This is because the absence of a special place of footwear visitors. This will obviously cause discomfort for visitors in terms of psychology. Due in the absence of storage areas, removable footwear that will overlap, crushed, or dispersed with each other pairs. And this will make the visitors will have difficulty in wearing or removing footwear. So from that researchers recommend the holding of facilities to support this activity in the form of areas to install or remove footwear, as well as the store area of footwear. The area of installing or removing footwear can be placed in front of the entrance, separate from the dining area and seating area. Marking on the floor outside the dining facility can also be used as a differentiator. The sign is recommended, because the majority of visitors will be easier to remove it immediately and immediately enter into the dining facility, rather than having to put footwear in a particular drawer, which would inconvenience the visitor and give inconvenience.
- Visitors entering the dining area
The dining area is the principal area and the most crucial area that will determine whether or not visitors are comfortable with their psychological side. This is because, during a visit to this dining facility, visitors will spend the majority of time in this dining area. The first thing that the majority of followers will do is look at the whole of the dining area. Unfortunately at the available dining facilities, visitors do not get comfort that can improve mood. This is due to the orientation of the owner of the existing dining facility, just to survive, not to how to make visitors feel at home. On the basis of this the researchers recommend improvements with the division of areas contained in the front area, dish area, and seating area.
- Visitors sat down
After doing the activity of entry into the dining facility, visitors in the subconscious will find the location of the sitting located at the dining facility. Then will sit to follow the pattern of existing building. But unfortunately the sitting area contained in the dining facility has a pattern that makes visitors disturb, because the pattern is to form the letter L, where at one point visitors will have a backfire that automatically disturb the visitor psychic. When it has found the area to be occupied, the majority of visitors would sit cross-legged way, but since then there is a tiring journey visitors will sit by way of leaning back and fore foot menyelonjorkan. Meanwhile, the majority of visitors will also put luggage such as bags or travel equipment for babies or toddlers near where he sits. In terms of emotional visitors also the majority will sit near people they know well or close. For visitors who bring children, the majority will occupy their children with the maximum age is toddler in front of him, so it is easy to take care of. In this activity the visitor assessment of an eating facility continues, ie, whether the facility is considered feasible, or not. But visitors will only keep these assumptions in their minds or not verbally mentioned. On the basis of these problems researchers recommend to create a sitting area that can be used to put luggage, parenting, and the use of privacy zone with an intimate distance, because at this distance allows acceptance and communication signals very well.

- Visitors ordering menu available
When visitors do activities to find a sitting area, then the owner of the dining facility will approach the visitors and offer some of the menu's mainstay dining facilities. Visitors will tend to choose the menu that characterizes the facility and choose a menu that visually appeals to them. On that basis, researchers recommend the appearance of the menu that will arouse the purchasing of visitors. In the form of visual images.
- Visitors waiting for the dish
The next activity is after ordering the food; then the owner will go to the kitchen area to cook orders. While the owner cooks, then the visitor will perform communication activities such as light conversation. In this conversation activity, visitors will subconsciously relax themselves by enjoying the scenery of the reservoir. Meanwhile, for those who bring children will play or take care of their children inside or outside the dining facility. But in reality, the things contained in the dining facility at Jatigede Reservoir are currently not accommodating these activities. This is because there are still many textures or objects that are considered to make visitors' reduced comfort level. An example is the texture of a rough and dirty seat mat; this will make visitors have a bad perception of the food menu to be eaten because it will indirectly affect the mood of visitors. Therefore, the researcher recommends by creating an atmosphere that can build togetherness of visitors and that can accommodate the activities of child care, for example is the use of materials with the level of texture not too rough but not too subtle, so that will reduce the chance of mild injury by visitors, and can increase the level of cleanliness of dining facilities.
- Visitors enjoy the meal
In terms of enjoying or tasting the food provided, majority visitors will eat by hand or not using a spoon or fork. Automatically, visitors will eat by surrounding the food and gathering with other members. However, children will tend to eat or drink with a mess; this is because the motor system is not perfect. Meanwhile, if an adult visitor brings the baby, then the visitor will first feed the child. Based on the analysis of the activity, the researcher recommends areas with distance that can accommodate the feeding activity of children. With the selection of materials that are easy to clean. In addition, signing will help to stimulate visitors to differentiate between the area of the dish and the eating area.
- Visitors enjoy the scenery of the reservoir
When visitors finished eating, the majority of visitors will rest, because when after eating directly run will cause disruption of the digestive system is not able to absorb the nutrients we eat. In this activity, visitors will instinctively chat or will rest the body by leaning on the existing area. At the Jatigede Reservoir dining facilities are currently not available for visitors and facilities to accommodate the gathering activities have not been maximized. Based on this, the researchers recommend to make direct access for visitors to see the charm of the reservoir as well as complete with a backrest for visitors. Researchers also recommend adding the introduction of traditional Sundanese play tools to be played by visitors. This is because not all visitors can affiliate with other members. So with the placement of games that require played in groups, it will make visitors can be more affiliate and will leave the impression of harmony when returning home each. In addition, because the majority of visitors have been aware of social media, then often they do photographs at the dining facility. From here, the researchers recommend the use of an interesting background to be used as a background to capture the moment.
- Visitors pack up
In this activity, visitors will pick up luggage and will tidy up luggage. For visitors who have children of infancy, will tend to take care of their children first in order to travel, such as carrying with empty hands, with a sling or placed in a stroller. Researchers

recommend the distance between the sitting area and the outside area that can accommodate this activity.

- Visitors leave the dining facilities
In this activity visitors will leave the dining area alternately. Then visitors will use footwear. However, because the footwear storage facilities is not qualified, so the footwear will tend to be scattered, stacked one with the other and make footwear trampled by other visitors. This will create discomfort for visitors, especially the female visitors whose moods can decline with this situation, because the footwear that are stamped and piled up and dirty. Which is will reduce the look and quality of the footwear. Therefore the researchers recommend the exit without inhibition and connected directly with the area using footwear. In addition, researchers also recommend there is a distance between storage footwear to avoid footwear piled or separated.
- T.O.R (*Term of Reference*)
In this stage of analysis is done limiting the scope of design and develop the results of analysis and interpret into the reference design concept includes design description. It takes a product of a dining facility that can facilitate visitor feeding activities, with emphasis one on psychology studies. By designing the atmosphere of the dining facility. As well as setting the position as well as the visitor zone. And then, design considerations are required in design aspect. So that the resulting product can be used properly. In terms of these design considerations, psychology becomes the reference point of researchers in designing this dining facility. And the last one is design limitations. Visualization of the design refers to the concept of traditional blend of Sundanese and modern have a setup that can bring up and improve the mood of the user.

5 Conclusion

While some things need to be improved by applying the psychological aspect, consider the mood and atmosphere, mood including things related to feelings. Style design, selection of decorations and furniture arrangements simultaneously will produce imagination that can lead to the impression of togetherness or some desired character. For lighting system selection, lighting is dominated by natural lighting considering the opening hours of the feeding facility from 9:00 am to 5:00 pm, but with the help of artificial lighting to be placed by lighting at the display table, this is done so that the focus of the visitors can be fixed directly to the dish being sold. Artificial lighting colors to be used will be adjusted to warm or warm temperatures with a 3.000K range kelvin. In addition, the control or circulation arrangement uses a branched linear system, ie the circulation of visitors is made with clear boundaries.

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