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An Application of Pedestrianization Concept as a Public Space for Social Need within Campus Area

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Abstract

A pedestrian line should be a good facility provided either by government or private institutions as a tool for pedestrians. The need for pedestrian facilities as public open spaces have also increased due to an adjustment of lifestyle and standard of living for Indonesian community generally and Jakarta's community particularly. Pedestrian areas have many functions, one of their functions either as a tool for pedestrians, also as a space for social need for many people. A distance from residence to work place should be well planned and well designed as an easy access and can be reached by walking distance. This is become a background why the concept of pedestrian is important to be applied within public areas such as campus area. But in fact the existing pedestrian path is far from optimal in terms of planning, design or use.

This paper is aimed to analyse the application of pedestrianization concept within campus area as a public space for social need. As the fact showed that number of pedestrian's flow within campus area is quite high. The need for socialization between students and others is significant as well. Descriptive method as well as comparative studies method have been chosen as a methodology of the research. The final of the research is by delivering a typology of pedestrianization concept within campus area from some case studies.

Keywords: pedestrianization, public space, social need

1. Introduction

The need of open space is a significant need that has to be concerned in urban planning particularly in the planning of open spaces. Ideally, open space within an urban area is about one-third or not less than 30% of the total area. Meanwhile, 7% of the area of open space should be designated as a city park or a local park. Those parks are open public spaces that should be provided for all people of the community to interact one to another as well as to do some activities. Thus it should be concerned that the safety and comfort need within those parks should be applied. Open facility is indeed a public open space which is provided for all activities of the community interaction without notice any differences in either the level of social hierarchy, educational and economic levels among them.

2. Theory of Open Space

In urban planning, the need of open space should need to be taken into account its existence. It has been happening around the 15th century AD along with the birth of the Renaissance, the application of open spaces within the city has been applied to the cities in the West..

Paul Zucker an urban expert gives a fairly clear picture of the history and aesthetics of an empty space which is formed artistically. He had found an expression in the open space known as the city or town square. According to his thought, an original open space just had been developed within cities of Greece after 500 BC. After centuries, the development of open spaces had been ups and downs. In the 15th century AD along with the birth of the Renaissance, architects and world famous artists such as Michaelangelo, Mansart, Christopher Wren and many more world famous architect became a supporter to drive the development of the concepts of open space in urban areas.

The open space concept applied to the planning and design of cities in the West, and reached its high level in the Baroque era to the 17th century and 18th centuries AD. The concept of open space continues to grow and change along with the changing times to the present.

Currently, when we are talking about open space or public space which is known within society, it comes in a mind that it is a city park which is full with big trees, a comfortable memorable space that is also used to sit around or leisurely stroll. But there is also an understanding of the public space as an empty

space without anything, while open space has been defined as a place for surrounding communities to do some activities and interaction freely within it. .



Figure 1: Puerta del Sol: one of an example of public open space in Classic City Madrid. The main function is as a place for meeting point.
Source: Wikimedia Commons, 2006

Hamid Shirvani in the book of *the Urban Design* (1985:7) has classified an *open space* as one of 8 elements of urban architecture. The other 7 elements are as follow: land use, building mass composition, parking and circulation, pedestrian ways, preservation, signages and activity support.

By grouping these urban planning elements, it has been understood that open space is an important element in the formation of urban architecture. Furthermore, Shirvani had stated that open space can be interpreted as a landscape, hardscape (roads, sidewalks, etc), parks and recreation areas within urban areas. Referring to Shirvani's statement, it is very clear that open space has an important role in urban architecture planning. A city requires public spaces for citizens to interact each other, to seek an entertainment and to do some recreational activities.



Figure 2: Orchard Road: Pedestrian way in Orchard Road. Comfortable pedestrian way in Singapore, supporting facilities have been applied in this way (benches, big trees, etc)
Source: private documentation, 2013

Danang Priatmodjo stated that places that could be categorized as a public space are a garden city (either city's scale or environment's scale), plazas (including field or square), as well as the path that allows the flow of pedestrians in

large numbers (pedestrian ways) to enjoy the scenery, entertainment, snacks or sale of various types of goods.

3. An Application of Open Space

Ahmadin Ahmad (2002) explained some functions of public spaces and open spaces within a city. According to his explanation, the functions of open spaces and public spaces depend on the cultural background and the habits of the society. In example, for Jakarta's society, public spaces have a cultural, social and economical function as follow:

- a. As a meeting point, to interact and socialize between citizens. Have been used as a recreation place with a specific activities such as: playing, exercise, and relaxing.
- b. As a symbol of a place and identity of the city. Presenting urban scene particularly at a densely populated area.
- c. To protect the ecological functions of the area, providing natural light and air circulation to the surrounding buildings. As a place for people to breath of fresh air and refreshing the view.
- d. To serve as an alternative area for future development.
- e. To be used as a street vendor selling, or used for flea market or temporary market.



Figure 3: Taman Lembang, Menteng: one of public park in Jakarta. It is located within highclass housing in Menteng. It is a favorite place for teenagers for hangout and enjoying foods surrounding Situ Lembang (Lembang's lake)
Source: Private documentation, 2010

According to the above explanation about open space, it has been clarified that open space is no longer has a function just as a public space, but there are many functions which has been transformed become new functions and meanings. These transformation of new functions and meanings have been formed as an impact of the need of surrounding community.

Public open space has been transformed to a new function and new form, for example there is a city public open space which has been formed from the existence of buildings, it has been known as space between buildings.



Figure 4: Cihampelas Walk: one of example of space between buildings which has been used as facilities for windows shopping, walking around or just enjoying the atmosphere by sitting at cafes within this open space. Source: private documentation, 2010

Public space is a significant requirement in a city planning. Classic towns had used urban open space as a place to meet, interact, gathering either for religious purpose, trade or to develop government.

In the old towns which are based on religion, public space for ritual had been distinguished with urban space generally. Meanwhile the cities that developed later, public spaces beside have a function as a meeting point traditionally, public spaces have a function as an identity of the city. Not surprisingly, if there are many cities which utilized public open space as a symbol and as a central of social interactions.

Public open space serves as a meeting place between an individual with surrounding communities, between government and citizens, between local residents and migrants. All those interaction activities will become a soul of a city that is able to familiarize between communities.

The development of modern cities will expand the function and role of public open spaces. Public open space is interpreted as a place that allows every citizen without discrimination to interact and meet with equality and more important is to have access to use it.

Public open space is a space that does not only built in the city that works to increase the quality of aesthetic, the environment as well as the welfare of its citizens.

An accessibility to enter an open space or public space is to be one of the characteristics of public open space because these spaces are a facility owned by public, thus anyone could access those places. Shortly, it is about equality without discrimination.

4. Pedestrianization Concept

Urban expertise, Kevin Lynch had stated that formerly a city had been built for a symbolic reason and furthermore the reason had been developed for a self defense. But in the end it had been realized that one of the benefits that can be

derived from a character of the city is the lack of access. Even some experts have seen that the transportation and communication is the most important asset in the urban area.

Transportation access not only an access for vehicles, but in it also covers an access for pedestrians to enter open space, access to work, access to the service area, access to shopping centers, etc.

Recently, transportation problem in Indonesia generally and Jakarta particularly, become a main problem which never been solved significantly. Especially when the transportation problem is related to how expensive the fuel of vehicles is. There is an alternative to minimize the use of vehicles particularly private vehicles. This alternative could be applied to some citizens whose live nomadic, because they do not have a permanent place to live. They have flexibility in choosing their house nearby to their workplace. This condition could become an effective and efficient thing because they could reach their workplace from their house by walking distance. But the problem will not be solved with only by applying this alternative.

The problem turns out to be more complex, because the facilities that should be provided to support the above alternative are quite limited. Many people are complaining about this lack of facilities. Pedestrian ways that have been provided by government to serve the need of pedestrian are not used optimally. There are many pedestrian ways that have been used for other function. One of the misapplication of those pedestrian ways is by using those ways for motorcycles, pedestrian will not use those ways because it is not safe for them anymore.



Figure 5: Jalan Raya Ragunan: misapplication of pedestrian way. The pedestrian way has been used by motorcycles to cut their route. There is a pedestrian who tried to pass the pedestrian way which is not safe anymore for him. Source: Private Documentation, 2010

Basically, concept of pedestrian way should has some elements which will support its function. An element of pedestrian should be helped by providing others elements to interact with. Those elements should be related to the environment, urban planning and activities' patterns which should be adjusted to the development and planning for the future. The

changing of the increasing of pedestrian ways' use should concern some aspects as follow:

- a. Activities' support within pedestrian ways: commercial facilities such as shops, kiosks, cafes
- b. Street furniture: trees, signage, lamps, benches, etc

In urban planning, concept of pedestrian ways should have some requirements. These requirements will support the use of pedestrian ways optimally and will give comfort and safety for pedestrian. The requirements are as follow:

- a. Safe and free from vehicles
- b. Pleasure with easy and clear route which is adjusted to the traffic circulation of pedestrian
- c. Easy to access all direction without any obstacles which are caused by narrow space, existence of ramp up and down, and misappropriation of other function
- d. Having an aesthetic value and attraction with providing facilities and infrastructures such as: parks, benches, trash bin, potted plants, etc



Figure 6: supporting facilities within pedestrian ways, benches and potted plants in Orchard Road, Singapore.
Source: Private documentation, 2013

5. Pedestrianization Within Campus Area

One of the pedestrian ways' function is to accommodate the social needs of the users, either for socializing among individuals, as well as to provide an open space facilities within environment. Campus as one of the public facilities also has a need for open space for its users.

The main user of pedestrian ways within campus are academic community which consist students, lecturers, and staffs. The circulation of those users which area regarded relative a lot should be well accomodated. The need of this public area should be concerned as well as a social need for those academic community. Each individu within academic community could interact each other and communicate each other by using this pedestrian area around campus area.

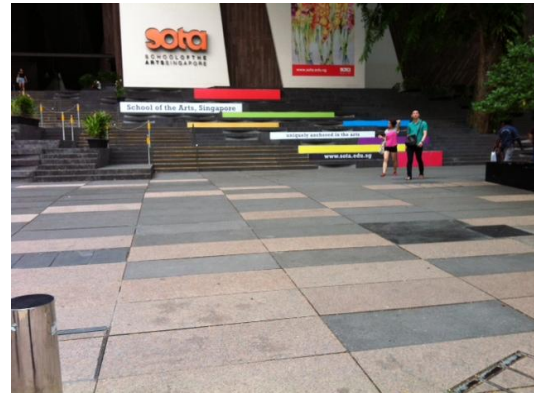


Figure 7: Pedestrian area within campus **School of the Arts Singapore**. It shows that the area of pedestrian is quite large and could accommodate all academic community of SOTA.

Source: private documentation, 2013

Two case studies have been designated to be good examples in providing public space for campus' users or pedestrian within campus area. Those two case studies are SOTA (School of The Arts of Singapore) and Lassale College of the Arts Singapore. These two campuses have a very well designed of pedestrian areas. These two campuses have an appropriate and an adequate pedestrian area for users either for academic community or for public users who passing through those pedestrian areas.

The above figure 7 shows that pedestrian area at SOTA is quite spacious to accommodate the need of open space for campus area. Public users or public pedestrian who have been regarded not as users within campus (academic community): lecturers, students, academic staffs could also enjoy the comfort of pedestrian area of SOTA.



Figure 8: There are steps at pedestrian area of SOTA which could be functioned as a facility for interaction, socializing between students to relax or just sitting around with friends.

Source: Private documentation, 2013

Some facilities have been found in locations as supporting facilities for social need within public areas. Figure 8 shows there are some steps which could be used as sitting areas for students to interact between individuals. It shows that students of SOTA have enjoyed the

facilities for just sitting around either to discuss with friends or just for relaxing. This public area of pedestrian area in SOTA has another function, students usually use this area to promote some activities and events within SOTA by distributing some brochures for public pedestrian who pass through the area of pedestrian in SOTA.

On the other hand, pedestrian area at Lassale College of the Arts, seems to be different. This area of pedestrian looks like an enclosed area just for private users only. However, when we look deeply, pedestrian area of Lassale is a continuous pedestrian way from Bugis Village to Village Hotel Albert Court.

Pedestrian area at Lassale also has designed as a continuous area to the inside pedestrian area within campus area. The concept of this pedestrian area shows how contextual it is with the concept of campus.

The convenience factor for users especially for the campus academic community has to be concerned. Thus, students, lecturers and academic staffs as users of pedestrian area within campus area will enjoy and feel the comfort and the safety in using the facility.



Figure 9 and 10: pedestrian area within campus area of Lassale College of the Arts. Above figure shows pedestrian way in front of Lassale to Bugis Village. And below figure shows pedestrian way from Lassale to Village Hotel Albert Court
Source: Private documentation, 2013

Figure 9 and 10 show how the environment of pedestrian area in front of Lassale, with a relative large space will give a comfortable feeling for the users. The combination of material used between public area in front of Lassale and semipublic area inside

Lassale shows the differences of the authority between two areas. Those two pedestrian areas have been designed to support each other, thus the differences between two areas will not be a constraint for users either public pedestrian or private pedestrian (academic community).



Figure 11 and 12: those figures show the area of pedestrian within campus area of Lassale. This pedestrian area is heading to enter inside the campus area. The using of material on the floor giving a comfortable feeling for the users. Some parts of the floors have been designed by putting some glasses to give natural light for basement floor.
Source: Private documentation, 2013

6. Contribution of Pedestrianization Concept for Sustainable City

Sustainable city design starts with the human body and its needs. The human body depends on walking – 10,000 steps a day to maintain optimal functioning (Tumlin, 2012). Thus, the first principle of a sustainable city, perhaps more important than all the others combined is that walking must be delightful. It is not enough that walking be safe and comfortable. Cities must be designed so that people of all ages and abilities walk for the sheer joy of it.

Designing a pleasant walking environment is easy and designers should have no excuses for creating places that are uncomfortable to walk in, even intertemperate climates. Places of pedestrian or pedestrian way should be designed with a proper and appropriate requirement, thus it will become a successful open spaces for all. In designing pedestrian ways to create a sustainable city, there are some considerations as follow (Tumlin, 2012):

- a. Some of the best places in the world are comprised of mediocre buildings that enclose beautiful spaces. Ensure the right proportions of buildings in relationship to the street
- b. Focus on the bottom 9 meters of buildings, ensuring the right relationship to the sidewalk, richly textured materials, and plenty of transparency. This will inspire curiosity of the pedestrian.
- c. Underlined the statement of “eyes on the street” including occupied windows that look down on pedestrian ways and lots of people out and about. Humans find nothing more interesting than other humans.
- d. Moderate temperature extremes by putting some shades and directing wind where it is hot and by putting sun and wind shelter where it is cold (this could be applied for some countries with 4 seasons climate)
- e. Providing big trees all the way long in pedestrian ways. These big trees will serve more comfortable for the users.
- f. Providing more supporting facilities to make the area of pedestrian more delightful and comfortable to use (benches, potted plants, trash bin, lamps, signage, kiosks, shops, etc)

7. Conclusion

The importance of pedestrian area in an area of public facilities could be a significant thing that should be considered by urban planners and architects. A public facility, especially facility such as college education or campus is an area with a crowded circulation of occupants. The number of pedestrian flow either who heading from outside to go inside campus area or from inside campus to outside campus area will affect a significant impact in providing the facility of pedestrian. Planning of pedestrianization concept within campus area is an appropriate alternative solution to cover how crowded the traffic recently in Jakarta.

By conducting two case studies within campus area in Singapore which have been regarded as a succeed design in applying pedestrianization concept, thus these two case studies could be applied as references in designing adequate and appropriate pedestrian ways within campus area in Jakarta. The application of pedestrianization concept within campus area hopefully will decrease the number of vehicles use, academic community (students, lecturers, academic staffs) are encouraged to walk.

The application of pedestrianization concept within campus area particularly and within city generally, surely will contribute a lot in designing a sustainable city. Decreasing the use of vehicles will affect to the fuel use which will contribute to maintain the sustainable city. By walking distance, people will be encouraged to maintain their health as well, then could work optimally and thus will contribute to maintain sustainable city.

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