

Escalation of Visual Street Furniture Accentuation at Public Corridor of Baiturrahman Mosque in Putroe Phang Park

Rinaldi Mirsa^{1*}, Muhammad², Yenni Novianti¹, and Mega Aulia¹

¹ Department of Architecture, Faculty of Engineering, Universitas Malikussaleh, Lhokseumawe, Indonesia

² Department of Chemical Engineering, Faculty of Engineering, Universitas Malikussaleh, Lhokseumawe, Indonesia

*Corresponding Author: rinaldi@unimal.ac.id

Article history

Received: 24.02.2023

Revised: 14.04.2023

Accepted: 30.04.2023

DOI:10.31629/jit.v4i1.5635

Abstract

The public corridor is the basic character of the road which represents a linear movement space, becomes a provision for circulation. The road corridor as a linear space is not only a circulation space, but as part of a community activity space that has the potential to increase and develop. The formulation of the problem in this study is how to identify street furniture in public corridors, visual accentuation of street furniture in public corridors and escalation of visual accentuation of street furniture in public corridors. This study aims to find out how the escalation of the visual accentuation of street furniture. This study uses a quantitative method with a descriptive approach. The results obtained from this study are that the majority of respondents to street furniture that are more attractive and prominent are decorative lights. However, street furniture that doesn't stand out is the sidewalk. Things that must be escalated are sidewalks and facilities with pedestrian paths. To create a good pedestrian path, it must have complete, safe and comfortable criteria, which may applied to other interesting places in the city.

Keywords: corridor, escalation, accentuation, visual, street furniture.

1. Introduction

The road corridor serves as a circulation space for both pedestrians and vehicles [1]. The road corridor as a public space has several roles, including as a place for playing and sports, a place for social communication, a place for transition and waiting, a place to receive fresh air, a facility that connects one place to another, a barrier between building masses, research facilities, and education as well as guidance for the community in order to build environmental awareness, means to realize cleanliness, health, harmony and beauty of the environment. The public corridor of the Baiturrahman Grand Mosque-Taman Putroe Phang consists of 3 areas, namely: Baiturrahman Grand Mosque Banda Aceh, Sari Bustanussalatin Park Banda Aceh and

Putroe Phang Park Banda Aceh.

As a city with a large scope, of course, this causes high activities that occur in road corridors every day. Based on this, of course, it is necessary to pay attention to a balanced development between development intended for the benefit of pedestrians and development intended for vehicle users. This balanced development is expected to have an effect on increasing the quality of space in public corridors. Quality, functional and contextual road facilities with the surrounding environment are expected to enhance the city's identity. Local social and cultural values or historical values that are raised and accommodated in a public corridor design can be added value in elevating the image of an area and do not rule out the possibility of becoming one of the city's icons and becoming a tourist asset [2].

The existing condition in the public corridor area of the Baiturrahman Grand Mosque-Putroe Phang Park is a street furniture element that has not optimally accommodated the needs and comfort of users in terms of arrangement, visual and environmental aspects. Visual display is also the appearance of a building or environment that can display elements that are composed of a certain pattern to create its own expression. The visual appearance in question is the appearance of the entire surface of the building and environmental elements that can be enjoyed visually (Bently, 1985).

Harris & Dines (1988) defines street furniture as all elements placed in the street landscape for convenience, pleasure, information, circulation control, protection and comfort for road users, while according to Directorate General of Highways (1995) street furniture is all forms of road integrity and is located on the ground with the aim of its procurement is to achieve the best road function (in the sense of being safe, comfortable and beautiful). Bazerman & Moore (1994) Escalation can be divided into two parts, namely rational and irrational escalation. Emphasizing that design principles are the basis for realizing a design or engineering form (Hakim, 2012). Accentuation is the placement of points with a unified visual theme as the center of attention. Emphasis (accentuation) can be interpreted as an effort to highlight one component to make it stand out more than the others.

2. Methods

2.1 Types of research

The type of research conducted in the study area is descriptive research with a quantitative approach. A quantitative approach is carried out in the process of finding the meaning of observers on street furniture. Quantitative data were processed using Microsoft Excel and SPSS programs and the results were presented descriptively, in order to strengthen the quantitative analysis.

2.2 Method of Collecting Data

The research data collection methods, namely observation, questionnaires, interviews, literature studies and documentation.

3. Results and Discussion

As the center of government, Banda Aceh City is the center of economic, political, social and cultural activities. Banda Aceh is a plain that is inundated by the Krueng Aceh River, about 70% of its area is located at an altitude of less than 10 meters. The city of Banda Aceh is also the oldest Islamic city in Southeast Asia, where the city of Banda Aceh is the capital of the Aceh Sultanate and holds millions of stories from the era of the sultans.

Banda Aceh City Overview

The city of Banda Aceh consists of 9 sub-districts, 91 villages, 12 mukims and 20 urban villages. Initially there were only 4 districts in Banda Aceh, namely Meuraksa, Baiturrahman, Kuta Alam and Syiah Kuala. Banda Aceh was further developed into 9 districts and 1 district was merged with Aceh Besar District, namely: Baiturrahman District, Banda Raya District, Kuta Alam District, Kuta Raja District, Leung Bata District, Meuraksa District, Syiah Kuala District, Ulee Kareng District and Sub-District Darul Imarah. The research location consists of 3 objects, namely the public corridor of the Baiturrahman Grand Mosque, Park Sari Bustanussalatin and Park Putroe Phang.

In terms of user activity, the observations made indicate that activities in the public corridor of the Baiturrahman Grand Mosque-Park Putroe Phang consist of pedestrian and motor vehicle movement activities as well as user activities in public spaces in the area. The movement of pedestrians and motorized vehicle users is a type of activity where users only cross the area. As for this research, what is discussed is only pedestrian movement activities, because these activities are in direct contact with street furniture in the research area. The results of observations show that the Baiturrahman Grand Mosque Road corridor is the most crowded street crossed by pedestrians and corridor users, both on weekdays and on weekends.

3.1 Street Furniture Analysis

Define abbreviations and acronyms the first time they are used in the text, even after they have been defined in the abstract. Do not use abbreviations in

the title or headings unless they are unavoidable.

1. Street Furniture Identification

a. Decorative lights

Decorative lights in the public corridor area of the Baiturrahman Great Mosque-Park Putroe Phang are only found on Jalan Mohammad Jam totaling 1 unit which is placed at the intersection of the Baiturrahman Grand Mosque with colorful LED big tree umbrellas. However, the public corridors of Park Sari and Park Putroe Phang do not have decorative lighting elements.

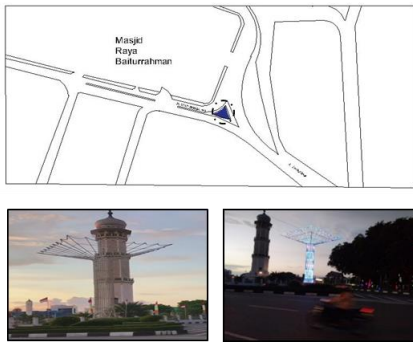


Figure 1. Decorative lights

b. Flower pot

Placement of flower pots in urban spaces is placed in many places (Rubenstein, 1992). There is 1 type of flower pot in the area that uses white and black paint finishing. Placement of flower pots in the research area with a linear pattern parallel to the sidewalk and regularly at a certain distance in the area. The flower pots in the Baiturrahman Grand Mosque Corridor are set at a distance of 2-2.5 meters per pot, while the flower pots in the Park Sari corridor are set at a distance of 4 meters between pots. However, the public corridor of Putro Phang Park does not have flower pots.

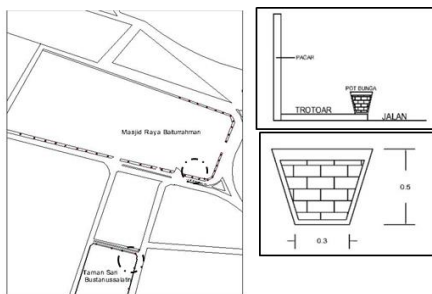


Figure 2. Flower pot

c. Sidewalk

The sidewalk in the public corridor of the Baiturrahman Grand Mosque measures 2.5 meters and a height of 40 cm from the road surface. This sidewalk uses ceramic material. Sidewalk on Jl.

Tengku H Abdullah Ujung Rimba has a sidewalk with a width of 1.5 meters and a height of 15 cm. This sidewalk uses cement material with a gray color.

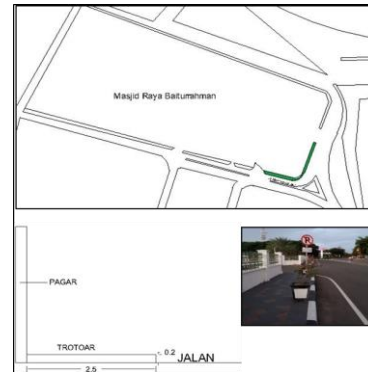


Figure 4. Trotoar

d. Fence

This Baiturrahman Grand Mosque fence uses concrete and iron materials with a combination of white, black and golden yellow colors. The fence in the Park Sari area has a fence in a private area, as shown in Figure 4, while the garden itself does not have a fence.

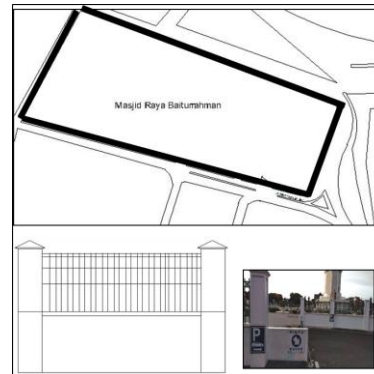


Figure 5. Fence

Putroe Phang Park fence uses concrete and iron material with a white color pattern. Gunongan Garden fence uses concrete and iron material with white and golden yellow colors. The private area in the Park Sari Bustanussalatin area has a white fence while the building next to it uses red.

2. Non-Physical Aspects of Street Furniture

A. Visual Quality

a. Decorative lights

Decorative lights in the research area are installed to add to the beauty of the city and attract tourists as well as to spoil the view with sparkling colorful lights at night. So that the atmosphere that

arises is considered in accordance with the function of decorative lights where a warm and relaxing atmosphere is needed so that visitors will be more relaxed and relaxed as well as the use of mixed lighting colors to be contextual with the environment and give a pleasant impression.

b. Flower pot

The visual quality of flower pots with a combination of horizontal and vertical lines is widely applied to create a formal, sturdy and firm impression and is comfortable for users. The shape of this flower pot is square, with a plastic shape and a rough texture with a width of 30cm and a height of 50 cm, so that it adds to the beauty of the public corridor.

c. Sidewalk

The research object area, there are 3 types of sidewalks that are different in terms of size and material, but only 1 type is optimal in using the path for the disabled. The sidewalk in the public corridor of the Baiturrahman Grand Mosque measures 2.5 meters and a height of 20 cm from the road surface. This sidewalk uses ceramic material. Smooth texture, geometric shapes, black and brown colors and horizontal lines.

d. Fence

The fence in the public corridor of the Baiturrahman Grand Mosque uses white and black colors, horizontal and vertical lines, geometric shapes, rough textures, concrete and iron materials.

B. Maintenance

a. Decorative lights

The majority of dynamic respondents (52%) and static respondents (44%) stated that the quality of decorative lighting maintenance was very good for placing in the area. The atmosphere produced by decorative lights can provide comfort and is therefore expected to trigger community or visitor activities.

b. Flower pot

The majority of dynamic respondents (56%) and static respondents (40%) stated that the quality of flower pot care in the category is sufficient to be placed in the area. Ornamental plants in urban spaces function as decorative elements in beautifying an area, because they can increase the interest of observers and add color to the face of the city. To get these results, determining the type of plant and its care is very important.

Ornamental plants in the research area, several

flower pot units are in an unhealthy condition. The plants are not well cared for so that they dry up and their leaves turn yellow, especially in the Park Sari corridor, so they are less supportive to enhance the beauty of the area. So it can be concluded that the presence of flower pots and ornamental plants is less able to increase the beauty of the public corridor of the Baiturrahman Great Mosque-Park Putroe Phang.

c. Sidewalk

The majority of dynamic respondents (56%) and static respondents (40%) stated that the quality of pavement maintenance was in sufficient category because the pavement surface condition of the Park Sari Bustanussalatin public corridor was uneven and damaged. In addition, the public corridor sidewalks of the Baiturrahman Grand Mosque and Putro Phang Park do not have special lanes for people with disabilities (people with disabilities).

d. Fence

The majority of dynamic respondents (44%) stated that the quality of fence maintenance was good because the surface condition of the fence was very well maintained, while static respondents (40%) stated that the quality of fence maintenance was in the sufficient category.

C. Aesthetic

a. Decorative lights

The majority of research respondents, 44%, both dynamic and static respondents, also thought that in terms of design, the quality of decorative lights was very good and made this area more attractive and lively at night. This impression is very important in supporting one of the activities in the area, namely recreation or traveling because it can provide an unforgettable experience for observers. Based on this, the placement of decorative lights in the area has succeeded in making it an element of decorating the city.

b. Flower pot

The majority (48% dynamic respondents and 36% static respondents) also think that from a design perspective, the quality of flower pots is in the sufficient category. Flower pots placed on the pedestrian path add aesthetics to the public corridor. However, the design of flower pots is only arranged in the public corridor of the Baiturrahman Grand Mosque. Meanwhile, in the public corridor, Park Sari has only a few flower pots. Based on the results of the interview, placing flower pots on the

sidewalk did not interfere with pedestrians walking.

c. Sidewalk

Responding to the quality of the pavement design, the majority of dynamic respondents 40% thought that the quality of the pavement design was in the poor and sufficient category, while the majority of respondents were static 36% in the sufficient category. Even though they are in the same area, the presence of 3 types of sidewalks indicates that there is no uniformity in the concept of pedestrian path planning in the public corridor area of the Baiturrahman Grand Mosque-Park Putroe Phang. The sidewalk in the public corridor of Putro Phang Park is used by street vendors to become a selling area. This reduces walking comfort, while the main function of the sidewalk is to provide comfort for its users.

d. Fence

The fence functions as a barrier between public and private areas in an area. Based on the determination of the design aspect, in general the form of the fence is left to the private land owner. However, there is no similarity in the form of the three research objects. The majority (52% dynamic respondents and 44% static respondents) assessed that the variation in the shape of the fence in the tourist attraction area was good. However, the Park Sari public corridor does not have a fence so there are no signs of security and limitations.

D. Important

a. Decorative lights

The majority of dynamic respondents 44% and static respondents 48% stated that the presence of decorative lights in the good category in an important sense is in the area because it can trigger interest and crowds at night.

b. Flower pot

The results of the questionnaire show that dynamic respondents who answered that the existence of flower pots in urban spaces is quite important (60% of respondents). Even specifically for flower pots / ornamental plant tubs, only 8% of dynamic respondents considered the existence of flower pots to be unimportant, while 32% of static respondents answered that the existence of flower pots was very important. This data shows that as observers, the community considers that the existence of flower pots/plant tubs is needed in an area, therefore careful planning and regular management are very necessary.

c. Sidewalk

The majority of respondents 48% stated that the presence of a sidewalk is very important in the area because it can protect the safety of pedestrians.

d. Fence

Observations in the field indicate the presence of this guardrail to keep open spaces in the regional courtyard from being entered by unauthorized users in accordance with the function of the building. Based on the results of the interview, the existence of the fence has no effect on other activities in the research area.

3. Visual Accentuation

A. Visual Quality

a. Respondents' Assessment of the Public Corridor of the Baiturrahman Grand Mosque

The following is a table of average ratings from respondents on the visual quality of the public corridors of the Baiturrahman Grand Mosque on 10 semantic rating scales:

Table 2. Average Rating of Baiturrahman Mosque Public Corridor

No.	Visual quality	N	MinMax	mean	Std. Deviation
1.	Ugly-good	50	1 3	2.40	.670
2.	Modern-colonial	50	1 3	1.80	.881
3.	boring-interesting	50	2 3	2.80	.404
4.	Not comfortable	50	1 3	2.40	.670
5.	Not safe	50	1 3	2.00	.639
5.	dirty-clean	50	1 3	2.10	.707
7.	ordinary-unique	50	1 3	1.80	.756
8.	Simple-complicated	50	1 2	1.60	.495
9.	chaotic-orderly	50	2 3	2.50	.505
10.	airy	50	1 3	2.10	.707

If the number is < 2.00 then the visual quality of the pedestrian space is poor, whereas if > 2.00 then the visual quality is good. Based on the results of the assessment of the visual quality of the public corridors of the Baiturrahman Grand Mosque, in general, the visuals of the public corridors tend to be positive (+) or good, where the average rating of the respondents is 2.40.

b. Respondents' Assessment of the Park Sari Bustanussalatin Public Corridor

The following is a table of averages and graphs of respondents' assessment of the visual quality of the Park Sari Bustanussalatin public corridor on 10 semantic rating scales:

Table 3 Average Rating of the Park Sari Bustanussalatin Public Corridor

No.	Visual quality	N	Min	Max	mean	Std. Deviation
1.	Ugly-good	50	1	3	2.46	.613
2.	Modern-colonial	50	1	3	1.74	.803
3.	boring-interesting	50	2	3	2.52	.505
4.	Not comfortable	50	1	3	2.28	.671
5.	Not safe	50	1	3	2.06	.652
5.	dirty-clean	50	1	3	2.00	.670
7.	ordinary-unique	50	1	3	1.62	.635
8.	Simple-complicated	50	1	3	1.58	.538
9.	chaotic-orderly	50	1	3	2.46	.613
10.	airy	50	1	3	1.74	.803

If the number is < 2.00 then the visual quality of the pedestrian space is poor, whereas if > 2.00 then the visual quality is good. Based on the results of the assessment of the visual quality of the Park Sari Bustanussalatin public corridor, in general, the visual quality of the public corridors tends to be positive (+) or good, where the average rating of respondents is 2.26.

c. Respondents' Assessment of the Putro Phang . Park Public Corridor

The following is a table of averages and graphs of respondents' assessment of the visual quality of the Putro Phang Park public corridor on 10 semantic rating scales:

Table 4 Average Rating of Putro Phang . Park Public Corridor

No.	Visual quality	N	Min	Max	mean	Std. Deviation
1.	Ugly-good	50	1	3	2.46	.613
2.	Modern-colonial	50	1	3	1.74	.803
3.	boring-interesting	50	2	3	2.52	.505
4.	Not comfortable	50	1	3	2.28	.671
5.	Not safe	50	1	3	2.06	.652
5.	dirty-clean	50	1	3	2.00	.670
7.	ordinary-unique	50	1	3	1.62	.635
8.	Simple-complicated	50	1	3	1.58	.538
9.	chaotic-orderly	50	1	3	2.34	.593
10.	airy	50	1	3	2.26	.664

If the number is < 2.00 then the visual quality of the pedestrian space is poor, whereas if > 2.00 then the visual quality is good. Based on the results of the assessment of the visual quality of the Putro Phang Park public corridor, in general, the visual quality of the public corridors tends to be positive (+) or good, where the average rating of the respondents is 2.26.

B. Maintenance

The following is a table of the average assessment of respondents on the maintenance of the public corridor of the Baiturrahman Great Mosque-Park Putro Phang on 10 semantic rating scales:

Table 5 Average Public Corridor Nursing Rating

No.	Street furniture	N	Min	Max	Sum	mean	Std. Deviation
1.	Decorative lights	50	3	5	213	4.26	.803
2.	Flower pot	50	1	5	142	2.84	.997
3.	Sidewalk	50	1	5	151	3.02	.915
4.	Fence	50	1	5	162	3.24	1.153

If the number is < 3.00 then the quality of street furniture maintenance in public corridors is poor, whereas if > 3.00 then the quality of maintenance is good. Based on the results of the assessment of the maintenance of the street furniture in the public corridor of the Baiturrahman Grand Mosque-Park Putro Phang, in general, the maintenance of the public corridors tends to be positive (+) or good, where the average rating of the respondents is 4.26.

Based on the table above, the accentuations that stand out in terms of nursing street furniture in public corridors are signs and decorative lights. While the accent that does not stand out is the flower pot.

C. Aesthetic

The following is a table of average ratings from respondents on the design of the public corridor of the Baiturrahman-Park Putro Phang Mosque on 10 semantic scales of assessment:

Table 6 Average Rating of Public Corridor Design

No.	Street furniture	N	Min	Max	mean	Std. Deviation
1.	Decorative lights	50	1	5	4.04	1.106
2.	Flower pot	50	1	5	2.80	1.107
3.	Sidewalk	50	1	4	2.20	.904
4.	Fence	50	1	5	3.34	1.154

If the number is < 3.00 then the design quality of street furniture in public corridors is poor, whereas if > 3.00 then the design quality is good. Based on the results of the assessment of the design of the street furniture in the public corridor of the Baiturrahman-Park Putro Phang Mosque, in general, the maintenance of public corridors tends to be positive (+) or good, where the average rating of the respondents is 4.26.

Based on the table above, accentuations that stand out in terms of street furniture design in public corridors are signs and decorative lights, while accentuations that do not stand out are sidewalks.

D. Important

The following is a table of average ratings from respondents on the design of the public corridor of the Baiturrahman-Park Putroe Phang Mosque on a 10 semantic rating scale:

Table 7 Average Assessment of the Importance of Public Corridors

No.	Street furniture	N	Min	Max	mean	Std. Deviation
1.	Decorative lights	50	1	5	3.94	.913
2.	Flower pot	50	1	5	3.02	1.152
3.	Sidewalk	50	2	5	4.20	.948
4.	Fence	50	1	5	3.36	1.191

If the number is < 3.00 then the quality of the importance of street furniture in public corridors is poor, whereas if > 3.00 then the quality of importance is good. Based on the results of the assessment of the importance of street furniture in the public corridor of the Baiturrahman Grand Mosque-Park Putroe Phang, in general, public corridor maintenance tends to be positive (+) or good, where the average rating of the respondents is 3.92.

Based on the table above, the accentuation that stands out in terms of the importance of street furniture in public corridors is the sidewalk. While the accentuation that does not stand out is the kiosk.

3.2 Visual Accentuation Escalation

The majority of respondents think that the street furniture design that does not stand out is the sidewalk, while the important thing that stands out is the sidewalk. Sidewalks in public corridors do not have equality in terms of the use of materials, existing facilities on the sidewalks such as trash cans, paths for the disabled, bollards and seats as resting places.

The majority of respondents 60% more dominant equality and improvement in each public corridor of research. So, there is a need for an escalation of visual accentuation of street furniture in the public corridor of the Baiturrahman Grand Mosque-Park Putroe Phang.

Based on the results of observations of 13 types of street furniture and identifying and analyzing, then several suggestions of potential that can be developed in the public access corridor prepared from the corridor of the Baiturrahman Grand Mosque-Park Putroe Phang as the first step in structuring a landscape that should be carried out based on existing standards in the regulations, so that in the future it will become a reference for other landscape arrangements, including:

1. The landscape elements needed in the public corridor area are already available in most of the public corridor area, especially the vegetation elements and there are street furniture landscape elements that must be provided.
2. Build a network of pedestrian facilities that are not piecemeal or partial and have a single function. Based on this, pedestrian access is built and/or improved to connect all tourist areas and increase walking activities as an urban mobility option. Connecting various land uses and activities to public transport.
3. The public corridor area which is dominated by settlements, offices provide potential and challenges in making arrangements that are in accordance with the characteristics of the area. While the results of the analysis with the Park Sari Bustanussalat in public corridor area need to refer to the standards in government regulations.

For the above, other aspects are needed that support holistic connectedness, including that the aspects of environmental improvement, criteria are needed that highlight vegetation elements to improve the quality of the surrounding environment by using vegetation which has their respective functions as a microclimate regulator, as well as absorbing air pollution. This is related to the ecological aspect.

Also, aspects of the formation of visual quality, it is necessary to have criteria that emphasize the processing of landscape elements, including elements such as hardscape, softscape and street furniture, which are more specifically on sidewalks, related to aesthetic visual effects that can be seen and felt by users. For the land connectivity, with context, criteria are needed that are more directed to the connectivity of the public corridor of the Baiturrahman Grand Mosque to the public corridor of Park Putroe Phang through the use of complete sidewalks and

in accordance with local conditions, as well as providing complete access.

Furthermore, the aesthetic aspect of composition, required criteria that are divided based on elements of vegetation, pavement elements and street furniture. The use of these elements pays attention to variations in shapes, colors, motifs and sizes in accordance with environmental characteristics, while the placement arrangements pay attention to design composition patterns such as balance, rhythm between elements, proportion patterns and unity between elements and their area. Then the aspects of the formation of visual quality in the public corridor area of the Baiturrahman Grand Mosque-Park Putroe Phang with the application of holistic regional connectivity in every public corridor, as also presented elsewhere [5,6].

4. Conclusion

Based on the results of the questionnaire, the majority of respondents to the more attractive and prominent street furniture are decorative lights. However, the street furniture that doesn't stand out is the sidewalk. Things that must be escalated are sidewalks and facilities with pedestrian paths. To create a good pedestrian path, it must have complete, safe and comfortable criteria. In addition, street furniture in public corridors should pay more attention to maintenance and design because street furniture plays an important role in urban areas. Street furniture should be available in proportion to the intensity of activity in a given area and carefully placed to create an unobstructed pedestrian path without creating a hazard. Furniture includes benches, trash cans, signs, lighting and other elements that make people feel comfortable. These elements must be coordinated and integrated so that they are both attractive and functional. However, beyond comfort, the purpose of this furniture is to provide a place with character and identity and to encourage people to enjoy open spaces. Street furniture also caters for special needs, such as seating and shelter while waiting for transportation.

References

- [1] Rizkiano, A., Sarkowi, M., Wibowo, R. C., (2022) Identification of Landslide Potential Area Based on UAV Data Analysis at Pidada Village Bandar Lampung City, Indonesia. *Journal of Applied Science*, vol. 2. no. 1, pp. 1-7.
- [2] Sukwai, J., Mishima, N. & Srinurak, N., (2022). Identifying visual sensitive areas: an evaluation of view corridors to support nature-culture heritage conservation in Chiang Mai historic city. *Built Heritage*, vol. 6, no. 23 pp. 1-20.
- [3] Karlinda, D. A., Rulhendri, R., and Murtejo, T. (2022). Analysis Facilities Pedestrian and Bicycle Lane Lanes as Facilitied Moda Transportation Public Integration in Bekasi Kota. *Astonjadro*, vol 11, no. 2, pp. 253–262.
- [4] Hakim, R. (2012). *Components of Landscape Architecture Design Second Edition*. Jakarta: Earth Literacy.
- [5] Harris, CW Dines, NT (1988). *Time-Saver Standards Design For Landscape Architecture Second edition*. New York: McGraw Hill Company.
- [6] Dafna, F. G., Pinsly, D. S., Wagner, I. A., and Burt, M. 2005. View-oriented three-dimensional visual analysis models for the urban environment. *Urban Design International* vol. 10, pp. 23–37



This is an open-access article distributed under the terms of the Creative Commons Attribution 4.0 International License (CC-BY).