

Zonning, Circulation And Convenience Of Traditional Market In Bandar Lampung. (Case Study Way Kandis Traditional Market)

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Abstract— The traditional market is a shopping tool to make ends meet. Circulation conditions and zoning traditional market is still not good enough so that still need to be improved in order to increase user convenience market. This study aims to determine the zoning in Market Way Kandis, knowing the condition of circulation in Market Way Kandis, determine the level of user comfort Market Way Kandis circulation and circulation planning and zoning arrangement model of good to overcome the problems in Market Way Kandis. The research method is descriptive. Research approach to the study of literature and case studies. Study of literature on the theory of the circulation of the traditional markets and traditional markets zoning theory. The case study by dividing the data into two, namely primary data and secondary data. Analysis of the data by comparing the standards based Neufert and Panero, as well as other literature, describe the results of a questionnaire and find solutions to the circulation and zoning better market. Based on the results of this study concluded that circulation and zoning arrangement in the traditional market is very influential on the market user convenience in their daily activities. From the discussion, it was found that there are still many elements of good circulation and zoning in Market Way Kandis that do not meet the criteria set standard. According to traders access to the market, loading and unloading goods, and parked the vehicle in the market that includes easy with an average ratio of 65% on Market Way Kandis. That's because they are doing the activity when the market is quiet. Meanwhile, according to the buyer at Market Way Kandis comfort level of circulation in the market is quite good with an average ratio of 63% of respondents answered easily. To overcome the problems of circulation and zoning in Market Way Kandis should be redesigned so that the circulation in the market and zoning that is in these markets that can meet the existing standards. Keywords— traditional market; zonning; circulation; convenience

1. Introduction

Along with the increasingly rapid globalization, thereby boosting economic growth also increased. This is evidenced by the growing number of new businesses in the community. Foreign modern stores have a lot of standing in Indonesia, not only in urban centers but also in rural areas so deadly small traders and traditional markets. Modern store is a store with self-service system, selling various kinds of goods at retail in the form of minimarkets, supermarket, departmentstore, hypermarket grocery or wholesale shaped. While it is a traditional market is a market that is built and managed by the Government, Local Government, Private, State Owned Enterprises and Regional Owned Enterprises, including cooperation with the private sector with businesses such as shops, kiosks, stalls and tents that are owned or managed by small traders, medium-sized, non-governmental or cooperative with small-scale enterprises, small capital and the process of buying and selling merchandise through bargaining.

People in the city of Bandar Lampung even today prefer to shop at the market / modern minimarket store or mall compared to the traditional market, because people feel safer and more comfortable when shopping at the market / modern shops. Traditional markets in Bandar Lampung city still has many shortcomings, such as dirty and smelly because a lot of garbage scattered, untidy arrangement that makes traffic through the market becomes jammed, as well as prone to crime such as pickpocketing. One of the traditional markets which still have such problems is the Market Way Kandis. Market Way

Kandis it's been around a long time, but a few years ago to get help for and then built again become bigger and better, so that since 2008 has been a lot of traders who then empty stall, construction is then completed by 2010, with the kiosks built is about 294, this is what also makes markets Way Kandis be large enough in Lampung, in that year also the majority of the population has begun to inhabit the Way Kandis market, buying and selling process as well start again. It is therefore important for the writer to conduct research on the circulation and zoning on Market Way Kandis.

1.1 Convenience aspect

Comfort aspect consists of:

- a. Physical comfort with respect to bodily sensations felt by the individuals themselves.
- b. Psychospiritual comfort with regard to internal self-awareness, which includes the concept of self-esteem, the meaning of life, sexuality until a very close relationship and higher.
- c. Comfortable environment with respect to environmental conditions and influences from outside to humans such as temperature, color, temperature, lighting, sound, etc.
- d. Socio-cultural comfort with regard to interpersonal relationships, family, and social or community (financial, health care of individuals, religious activities, as well as a family tradition) [1].

1.2 Factors Affecting Leisure

There are several factors that affect the comfort among others:

a. circulation

Leisure can be reduced due to poor circulation, such as the absence of a clear division of space for the circulation of people and vehicles, or there is no division between the circulation space with each other. Circulation divided into two circulation in space and circulation outside the room or the transition between inside and outside like a foyer or lobby, corridor or hall.

b. Natural resources or climate

1. Solar radiation to reduce the comfort especially during the day, so the need for shade.
2. Wind wind direction should be paying attention to organize the space so as to create a cool micro wind movement and provide comfort. In broad ruang yang need to hold the elements of wind barrier so that the speed can be reduced by a fierce wind.
3. Rainfall precipitation factors often cause interference on human activities in outer space so the need to provide shelter in case of rain (shelter, gazebo).
4. Temperature

If the ambient temperature is very low then akan menurun skin surface temperature and vice versa if the temperature in the chamber will rise too high. Influence for work activities is that the temperature is too cold will lower morale and temperatures too hot can make the fatigue in their work and tend to be many errors.

c. Noise

In congested area such as an office or industrial, noise is one of the main problems that can interfere with the workers who are in the vicinity. One way to reduce noise is to use personal protective equipment (ear muff, ear plugs).

d. Aromas or smells

If the workspace close to a landfill then a bad odor will be smelled by people passing through it. This can be overcome by moving the source of the smell and placed in a closed area dari pandangan visual and obstructed by trees or shrubs or plants with the ground surface elevation.

e. Shape

Shape of the construction plans should be adapted to the human standard size in order to generate a sense of comfort.

f. Security

is an important issue, because it can interfere with and inhibit the activity to be undertaken. Security does not mean just in terms of the crime (crime), but also includes power construction, the shape of space, and clarity of function.

g. hygiene

Something clean in addition to increasing the attractiveness of the location, it also adds a sense of comfort as free of debris litter or smells bad. In certain areas menutut high cleanliness, the selection of trees and shrubs must pay attention to the strength of fall leaves and fruits.

h. The beauty of

beauty is to be considered to obtain comfort since it covers the problem of inner satisfaction and senses. To assess the beauty is quite difficult because everyone has a perception that berbedauntuk states something that is beautiful. In terms of comfort, beauty can be obtained in terms of shape or color.

i. Illumination

To obtain a good lighting in the room need to consider several things: natural light, strong lighting, light quality, lighting power, selection and placement of lights. Natural lighting here may help artificial lighting within certain limits, kind and quality as well as within reach in the room [2].

1.3 Standard-Standard Traditional Market Infrastructure

1.3.1 Containsstandard of furnishings and human dimensions that support the existence of traditional markets as public space.

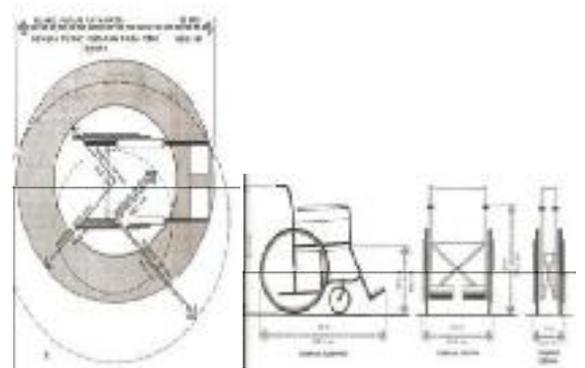
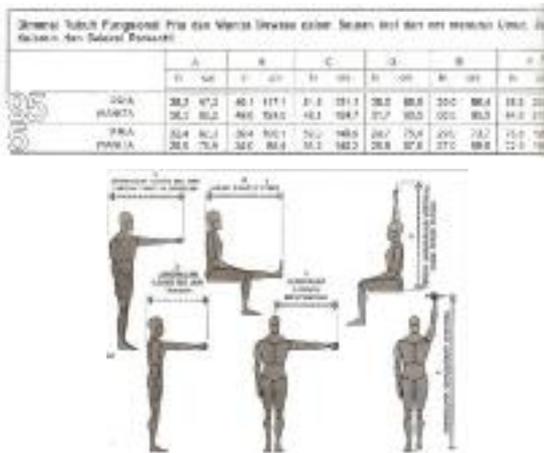


Figure 2. Standard User Space F

Figure 1. Standard Dimensions Body Functional [3] or Wheelchairs [3]

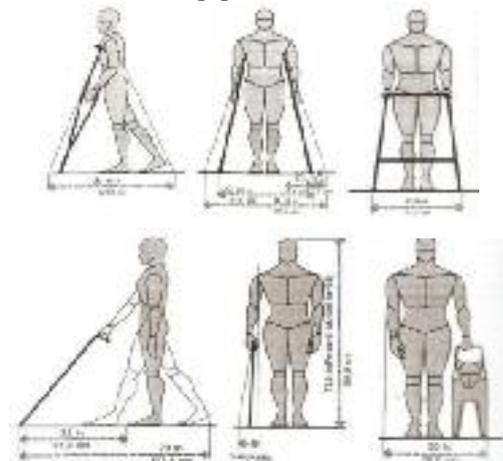


Figure 3. Standard Room For The Road Tool [3]

From the standard-the standard of the human dimension of the above, it can be the appropriate standard for pedestrian space in the traditional markets, as follows:

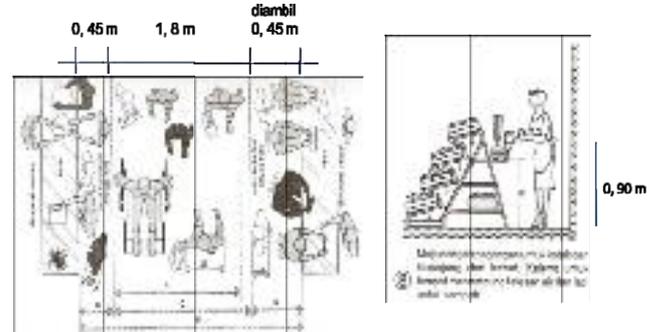


Figure 4. Standard Furniture and circulation in the Display Kiosk [3] [4]

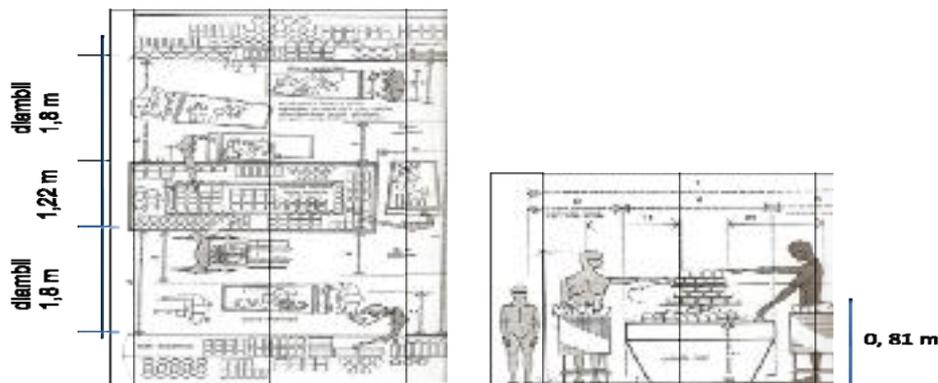


Figure 5. Standard Furniture and circulation in *the Display Los* [3] [4]

2. Method

2.1 Type and Research Approach

This study aims to describe and analyze the facts and analysis of data on circulation, zoning, and user convenience at traditional markets (Market Way Kandis case study). The research method in this study is a qualitative case study method. The case study is a research on the status of research subjects that relate to a specific phase or typical of the whole personality [5]. This case study technique is very useful to conduct in-depth studies, intensive of a particular phenomenon. Using case studies, the researchers wanted to examine the background and environment interaction of social units to be studied. The results of the case study is a generalization of the patterns are typical cases of individuals, institutions, groups, etc. "[6]. Qualitative methods are research intends to understand the phenomenon of what perception, motivation, action and others, holistically and by way of description in the form of words and language, in a specific context naturally and by using various natural methods. Thus prefers qualitative methods to explore the ability of researchers to focus on the problems studied [7]. This qualitative approach was considered suitable for use in this study with the following considerations:

1. It is easier when faced with kenyaatan plural.
2. Presenting the direct nature of the relationship between researcher and respondent.
3. More sensitive and more able to adjust to a lot of sharpening the joint influence of these patterns of face value [7].

Research using qualitative approach leads to circumstances and individuals holistic (whole). Principal study, whether an organization or individual shall not meredusir (simplified) to variables that have been laid or a hypothesis that has been planned in advance, but will be seen as part of something whole "[7]. In addition to providing a definition of the qualitative approach also offers five characteristics of qualitative judgment as follows:

- 1) Performed on natural conditions, directly to the source of data and research are key instruments;
- 2) Qualitative research is more descriptive. Data collected in the form of words or pictures, so it does not emphasize the number;
- 3) Qualitative research more emphasis on process rather than product or outcome;
- 4) Qualitative research is inductive data analysis; and
- 5) more emphasis on the qualitative study of meaning (data behind the observed) [8].

2.2 Time and Research Sites

2.2.1 Time Research

The research was conducted in March 2017 to July 2017. In detail as follows:

Table 1. TimeResearch

No	MatterThesis	Research time
1	Proposal	March
2	Preparation Chapter 1	March
3	Preparation of Chapter II and III	from March to April

4	Implementation of Field Research	from April to May
5	Processing Data Fields (Chapter IV)	May
6	Data Analysis (Chapter V)	June
7	Conclusions and Recommendations (Chapter VI)	July

Source: [9]

2.2.2 The research

Study was conducted in Market Way Kandis located on Jl. Queen Dibalau No. 5, Village Way Kandis, District Tj. Happy, Bandar Lampung.

2.3 Population and Sample

The population for this study is the traditional markets in Bandar Lampung, among others:

1. market Pasir Gintung
2. Market Bambu Kuning
3. Market Down Ramayana Tanjung Karang
4. Tugu Market
5. Market Way Kandis
6. Market Joints
7. Market Watercress
8. Farmers Market Kemiling
9. Market Master Tamin
10. MarketCentral
11. Kogamarket
12. Housing market Way Halim
13. Mambo market
14. Auction Warehouse market
15. Long market

Samples taken by the author is Kandis Way market, because the market is one of the largest traditional market in the city of Bandar Lampung. Kandis Way market also has some similar issues that the authors make those markets as samples for research on the analysis of circulation, zoning, and user convenience at traditional markets. [10]

2.4 Technical Data Collection

In the context of collecting data and information required for program analysis and problem solving in particular by:

- a. The literature study data collection technique by studying books, magazines, newspapers and other information related to the research in accordance with the research title this.
- b. Field observation This technique is done by directly observing the team to obtain data on the circumstances and the situation at the location of the object of research.
- c. questionnaire questionnaires were completed to the seller and the buyer.

2.5 Research Instruments

Research instruments used include:

Laptop equipped by the program:

- a. AutoCAD 2010, is used to create two-dimensional images.
- b. Microsoft Word 2013, used to write the report.
- c. Microsoft Excel 2013 is used to compile research data in tabular form.

Digital camera or Smartphone, used to take visualization (photo) during the field survey.

Meter, to measure circulating on the object of research.

2.6 Technical Dataanalysis

Analysis Data is the process of arranging the order of the data, organize them into a pattern, categorization, and unit basic description. Analysis of the data is the effort made by working with the data, organize data, sorted them into units that can be managed, synthesize, search and find patterns, find what is important and what is learned, and decide what can be narrated in others [7]. Data

analysis techniques used in this study is referred to the concept that is *interactive model* that classifies the data analysis in three steps, namely:

1. data reduction (*Data Reduction*)
data reduction which is a sorting process, focusing on simplification, abstraction and transformation of raw data that appears of written records in the field.
2. Presentation of data (*Display Data*)
This data is arranged such that it provides the possibility of drawing conclusions and taking action. The forms that are commonly used in previous qualitative data is in the form of a narrative text.
3. Conclusion (Verification)
In this study will be revealed about the meaning of the data collected. From the data we concluded that tentative, vague, rigid and doubt, so that the conclusions need to be verified. Verification is done by looking back at data reduction and display data so that the conclusions do not deviate [11].

2.7 Technical Sampling

Samples should be profuse. This argument assumes that the more samples taken the more representative and the results can be digenelisir. But the size of the sample received will depend on the type of research.

1. If the research is descriptive, then the sample minimumnya is 10% of the population
2. if penelitianya correlational, sample minimumnya is 30 subject
3. If causal research comparison, a sample of 30 subjects per group
4. If the experimental study, the sample minimum is 15 subjects per group

Some guidelines for determining the sample size namely:

1. sample size of more than 30 and less than 500 is appropriate for most research
2. If the sample is broken down into subsample (male / female, junior / senior, etc.), the minimum sample size 30 for each category is appropriate
3. research *mutivariate* (including analysis regression), the sample size should be 10 times greater than the number of variables in the study
4. for a simple experimental study with rigorous control experiments, the research that success is possible with a small sample size of between 10 and 20 [12].

The sample size of a population with the following formula:

$$n = N / N (d)^2 + 1 \quad (1)$$

n = sample; N = population; d = the value of 95% or sig precision. = 0.05.

For example, the number of population is 125, and the desired level of error is 5%, then the number of samples used is:

$N = 125 / 125 (0.05)^2 + 1 = 95.23$, rounded to 95 [13] The minimum sample size for

1. researchdescriptiveof 100
2. correlational study50
3. Research causal-comparativeas much as 30 pergroup
4. studyexperimentalas much as 30 or 15 per group [14].

For the factor analysis, the recommended sample size is not less than 50 observations, and suggested a sample size of 100 or more. As a general rule, some researchers recommend a ratio of 10: 1 or 20: 1 case for every variable .This question is if the item questionnaire was designed as many as 20 items, then the minimum sample size is $20 \times 10 = 200$. For regression analysis, it is recommended is 15 - 20 observations per independent variable, further explained that the sample size can reduce acceptance limit loading factor on the item. For example, for the 100 respondents, the loading factor of 0:55 or more can be considered significant. 0:30 As for the loading factor can be significant for a sample size of 350 or more. For discriminant analysis, many researchers suggest using a ratio of 20x the number of predictor variables [15]

3. Result

3.1 Zoning AnalysisMarket

3.1.1 Analysis Market Way Kandis Zoning



Zoning Figure 6. on Market Way Kandis. Source: [16]



Figure 7. Type of different merchandise mix in one place. Source: [9]

Zoning in Market Way Kandis currently not well ordered. In the market there are still some vendors selling different types of merchandise but mixed in one place. Zoning division in this market has not given a clear identity.



Figure 8. The absence of a clear identity zoning. Source: [9]

According to the Implementation Guidelines healthy market KEPMENKES No. 519 on Spatial Planning of trade are as follows:

- a. area division according to the type of commodity, according to the nature and classification such as wet, dry, sales of live poultry, poultry slaughtering
- b. zoning division were given a clear identity
- c. where sales of meat, poultry carcasses, fish were placed in a special place.

It can be concluded that the existing zoning in Market Way Kandis not currently meet the standards that have been defined.

3.2 Circulation AnalysisMarket

3.2.1 AnalysisMarket Circulation Way Kandis

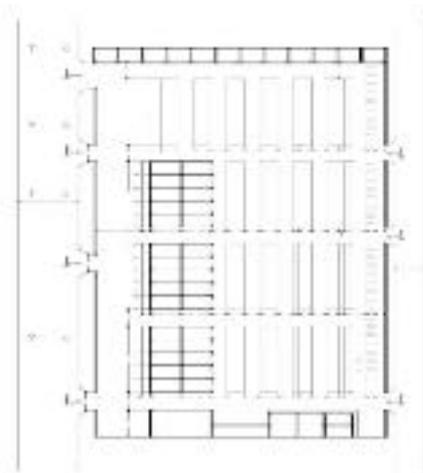


Figure 9. Site Plan Kandis Way Market. Source: [16]



Figure 10. Circulation in Market Way Kandis. Source: [9]

After making the measurement, data obtained width of the main circulation in Market Way Kandis is 3.90 meters. Obtained data also wide hallways in this Kandis Way Market is different. There is a 1:55 meters wide, 1.5 meters, and 1:45 meters. The magnitude of the main circulation on the market is 3-4 meters [17]. Then for the main circulation Way Kandis on the market already meet the standards. Circulation of the right aisle to the traditional market was 1.8 meters [3] [4]. It can be concluded that the circulation of the hall in Market Way Kandis not meet the standards.

3.3 Data Analysis Questionnaire

In this study the authors made a questionnaire for mengkriteriakan level of comfort provided to the users of the market: sellers and buyers on the market.

3.3.1 Questionnaire Data Analysis Market Traders in

Table 2. Tingkat comfort circulation market traders Way Kandis. Source: [16]

	Very Easy	Easy	Difficult	Very Difficult
access to markets	6%	69%	21%	4%
loading and unloading of goods	25%	62%	13%	0%
Parking	6%	65%	29%	0%
Total Average	13%	65%	21%	1%

3.4 Analysis Kueisioner Buyers market Data

Table 3. Tingkat comfort circulation market buyers Way Kandis. Source: [16]

	Very Easy	Easy	Difficult	Very Difficult
access to markets	22%	74%	4%	0%
access surround the market	8%	52%	40%	0%
Parking	17%	71%	12%	0%
for goods to be purchased	4%	56%	40%	0%
Total Average	13%	63%	24%	0%

The division of zoning in Market Way Kandis still not good. The mixing of different types of merchandise in one area still often found in those markets. Then zoning in Market Way Kandis still not meet the standards set forth by KEPMENKES Number: 519 / Menkes / SK / VI / 2008 on Implementation Guidelines healthy market. To remedy the problem of zoning in the market, the division zoning should match the type of commodity, and there must also be a clear zoning identity in order to facilitate buyers to search for items they want to purchase. It would also increase the convenience for shoppers in shopping at the market. The size of the width dimension circulation in Market Way and Market Kandis Pasir Gintung still not meet the standards of existing theories. And it will affect the comfort of the users of the market. Market Way Kandis lebar main circulation is 3.9

meters, to meet the standard that is the width of the main circulation in the traditional markets of at least 3-4 meters [17]. But for circulation aisle in Kandis Way Market is not yet meet the standards. Circulation aisle obtained from the measurement results in the market is still less than 1.8 meters which is standard [3] [4].

To overcome the problems of circulation in the market it is necessary to redesign so that the circulation in the market can meet the standards. Market Way Kandis just need to do a little widening circulation aisle in order to meet the standards. Therefore, one way is to make the market become stratified traditional markets. With so the traders can be moved, but still within the market area. For the arrangement of zoning in the planning of the multi-storey market will be divided into two floors. On the first floor is the place for areas of clothing, fruits, groceries and prepared foods. While on the 2nd floor is the place to sell daily necessities such as vegetables, eggs, meat, fish, tofu, tempeh, and others.

4. Conclusion

Based on these results it can be concluded that circulation and zoning arrangement in the traditional market is very influential on the market user convenience in their daily activities. From the discussion, it was found that there are still many elements of circulation and zoning in Market Way Kandis does not meet the standard criteria that have been defined. Here are the conclusions that can be drawn from this study:

1. Zoning in Market Way Kandis not well ordered. There are still many shortcomings such as the mixing of different types of merchandise trader and the absence of a clear zoning identity. Then the zoning arrangement in both markets is still not meet the standards of KEPMENKES No. 519 / Menkes / SK / VI / 2008 on Guidelines for the Implementation of the healthy market.
2. The width dimension Way Kandis circulation in the market still does not meet the existing standards. The width dimensions of the hall in the market circulation is still less than the standard that is 1.8 meters. For the primary circulation in Market Way Kandis with dimensions of 3.9 meters to meet the standard is 3-4 meters for primary circulation in traditional markets, while the main circulation in the Sand Market Gintung not meet these standards for measuring only 2.7 meters.
3. From the results of a questionnaire that was given to each of the respondents of the market, it can be concluded that according to traders access to the market, loading and unloading goods, and parked the vehicle in the market that includes easy with an average ratio of 65% on Market Way Kandis. That's because they are doing the activity when the market is quiet. Meanwhile, according to the buyer at Market Way Kandis comfort level of circulation in the market is quite good with an average ratio of 63% of respondents answered easily.
4. To overcome the problems of circulation and zoning in Market Way Kandis should be redesigned so that the circulation in the market and zoning that is in these markets that can meet the existing standards.

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