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## **The availability of open spaces in Surakarta (A Survey of the Utilization of Open Spaces in Surakarta as a Sport Facility)**

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### **ABSTRACT**

The main purposes of the research are: 1) identify open space as a sport facility in Surakarta, 2) tell about some types of sports that utilize open space intensively, 3) tell about community groups that utilize open space to do exercise.

This research was conducted at open spaces in Surakarta. The method of the research was descriptive qualitative. The data collection techniques used in this research were interview and observation. The object of the research was the people who utilized open spaces in Surakarta. There were 30 people as the samples of the research that were taken randomly using *Proportional Purposive Random Sampling*. The data sources in this research were obtained from the people who utilized open spaces as a sport facility. The data analysis techniques used in this research were data collection, data reduction, data presentation, verification and conclusion.

The results of the research show that: 1) first, based on the SDI ratio analysis or the comparison of the open spaces in Surakarta to the population of 7 years and above, the availability of open spaces in Surakarta that is only 366,144.44 m<sup>2</sup> does not meet the ideal level. Second, the open spaces that are most visited and utilized by the people as a sport facility are Gelora Manahan and Car Free Day (CFD) on Slamet Riyadi street. 2) Gelora Manahan and Car Free Day are dominated by both individual sports and group sports from low to high intensity of sports. 3) There are three categories of groups of people who utilize the open spaces. The groups are categorized based on gender, age, and background of activities.

**Keywords: open spaces, sports, utilization survey**

## **BACKGROUND**

Sports basically have a very strategic role to establish and improve the quality of human resources for development. Cities, regencies, or provinces that wish for rapid progress in various fields, should consider sports as something important. Awareness of the strategic meaning of sports must through development planning that is in favor of the progress of the sports as a whole. The development planning must be comprehensive because sports have a variety of potentials that contain a spirit and strength to progress. Sport is actually a “sense of spirit” from a long process of development itself. Sports must be seen as a goal as well as asset of development (Agus Kristiyanto, 2012: 2-3). Sport is open to all people according to their abilities, pleasures, and opportunities without distinguishing rights, social status, or level of society. Sports as a physical activities have a very important role to increase human quality, besides it has benefits for human survival. Sports have various functions, both direct and indirect. It gives a fitness effect. The fitness effect can increase as the sport intensity increases, depends on the body capacity. Additionally, it can maintain health for very essential organs of the body, such as heart, lungs, and liver. Sports that are done well and properly will give a good impact to the body.

Open space is a planned space from the government for the society to do various activities, including sports. Actually open space is just one type of public spaces (Eko Budiharjo & Djoko Sujarto, 2005: 89). Open space refers to a place for doing sports and other physical activities in the form of buildings, closed sports field or open sports field (Cholik and Maksum, 2007: 7). Theoretically the notion of open space is: first, it is a hard space that is limited by walls, and soft space that is surrounded by natural environments such as gardens, green lanes, and park (Trancik, 1986). Second, it is a three-dimensional space that is surrounded by various elevations such as buildings and trees (Krier, 1979). According to Rustam Hakim (2012: 82), open space is a space that can be accessed by the people, either in a limited time, or in an indefinite period of time.

Stephen Carr, et al (1992) describe open space as a shared space, where the people conduct personal and joint activities. Open space is a need for people to do physical activities. According to Clerici (1976), the wide standard of open spaces is 3.5 m<sup>2</sup> per person. The existence of open spaces for sports that are easily accessible by all levels of society can encourage people to do sports and other physical activities. Open space as a sport facility must meet some requirements, among others: designed for sports, used for sports, and accessed easily by wider community (Cholik and Maksum, 2007: 38). Managing the availability of open spaces for the people to do sports is one of the obligations of the central government and regional government. UU SKN (Law of National Sports System) Law Number 3 of 2005 article 67 paragraph 2 states that the regional government guarantees the availability of standard sports infrastructures. The infrastructures may cover sports buildings, fields, circuits, swimming pools, jogging tracks, or bicycle lanes. Factors that influence the construction of the infrastructures are types of sports, space characteristics, and supporting mediums. These three factors collaborate in order to maximize the function of the infrastructures at open spaces.

Sport facilities according to (Harsuki: 2012: 83) can be divided into several types, they are:

- 1) Single Facility  
It means that the facility is generally used only for one sport, for example a swimming pool and a golf course.
- 2) Multipurpose Facility  
It can be indoors or outdoors, for example a gymnasium because it can be used to hold various sport competitions in it.
- 3) Facility at the Club House  
This type of facility is usually found in European countries. This house is equipped with locker, toilets, showers, restaurants, and sports equipment stores.
- 4) Large Sports Facility  
It not only provides spacious space for doing sports, but also provides spacious space for the audience. For example, a football stadium or a basketball hall.

Sport facility covers physical facilities and non-physical facilities. Physical facilities cover stadium, arena, or sports field. Meanwhile non-physical facilities cover sports association, trainers, or physical education/sports teachers. The availability of these two types of sports facilities will be able to improve people's perception and participation to do sports. The existence, type, quantity and quality of sports facilities depend on the needs of the people. It also depends on the conditions of each region and intervention of the regional government. The government must list down and provide some new sport facilities needed in its region. Therefore, in an effort to provide sport facilities for the people, government needs "needs evaluation". According to Harsuki (2012: 188), needs evaluation is a device to determine whether new facilities and new specifications are needed.

The history of Surakarta began when Sunan Pakubuwana II ordered Tumenggung Honggowongso, Tumenggung Mangkuyudo, and Commander of the Dutch forces J.A.B Van Hohenndorff to find the location for the capital of the new Islamic Mataram kingdom. After considering physical and non-physical factors, finally in 1746 AD or 1671 Java, a village on the banks of the Bengawan River called Sala Village was chosen. After that, the name of Sala Village changed to Surakarta Hadiningrat and continued to grow rapidly. Surakarta was designated as the center of the Surakarta Residency (Residentie Soerakarta) with an area of 5,677 km<sup>2</sup>. The Surakarta Residency consists of Surakarta, Karanganyar, Sukowati, Wonogiri, Sukoharjo, Klaten, and Boyolali. The anniversary of modern city of Surakarta is celebrated on June 16. After the Surakarta Residency was abolished on July 4, 1950, Surakarta became a city under the administration of Central Java Province. Since the enactment of the Regional Government Law which gave many regional autonomy rights, Surakarta has become an autonomous city.

Geographically, Surakarta that is also called Solo or Sala, is a city located in Central Java province. It is between 110°45'15" - 110°45'35" E and 7°36'00" - 7°56'00" S with an area of 44.04 km<sup>2</sup>. Surakarta is located in the lowlands at 105m above sea level, while the city center is 95m above sea level. Administratively, Surakarta is divided into 5 sub-districts, they are Laweyan, Serengan, Pasar Kliwon, Jebres, and Banjarsari. 66% of land in Surakarta is used as citizens' settlements, and 17% is for economic activities. The air temperature in Surakarta in 2017 ranges from 15.1° C to 33.5° C, while the air humidity ranges from 69% to 87%. Based on the results of the 2010 Population Census Projections, the population of Surakarta in 2017 reached 516,102 people with a sex ratio of 95%; which means that in every 100 women there are 95 male residents. The population density in 2017 reached 11,718.78 people/km<sup>2</sup>. In 2017 the highest level of population density was in Pasar Kliwon sub-district that reached 15,941.19 people.

Based on the data above, to identify the availability of open spaces, types of sports, and groups of people using open spaces in Surakarta as a sport facility, the researcher conducted a survey. The survey was done on the people who utilize open spaces in Surakarta to answer the research questions.

## **RESEARCH METHODS**

### **1. Research Design**

This research used a survey research method with a qualitative descriptive approach. A survey research aims to describe and analyze individuals and groups' phenomena, events, social activities, attitudes, beliefs, perceptions, and thoughts. This research was conducted at open spaces in Surakarta from April 2018 to May 2018.

### **2. Population and Samples**

Population is all individuals who will be the object of the research. Every individual must have the same nature as other individuals. The population in this research was all people who did sports at the open spaces in Surakarta. There were 30 people as samples for the research. The sample technique method applied in this research was *Proportional Purposive Random Sampling* (Suharsimi Arikunto, 2006: 131).

### **3. Research Instruments**

The instruments used in this research were:

1) Observation

According to Suharsimi Arikunto (2006: 222), observation is a direct watching on something (direct observation). In this research, the author used the observation method to examine the object of the research directly.

2) Interviews

According to Lexy J. Moleong (2007: 186), interview is done with a specific purpose. It is consisted of two parties, interviewer and interviewee.

3) Documentation

It is a method of collecting data that becomes a written record and can be accounted for as an official evidence (Suharsimi Arikunto, 2006: 231).

#### 4. Data Validity

Qualitative research must reveal objective truth. Therefore, the validity of the data in a qualitative research is very important. In other words, qualitative research can be achieved through data validation. It must be trusted and can be accounted for. This research obtains the data validity through triangulation. Triangulation is a technique of checking the validity of data that uses something else other than the data itself for checking or for comparing to the data (Moleong, 2007: 330).

#### 5. Data Analysis

There are four components in analyzing qualitative research. The four components are data collection, data reduction, data presentation, verification and conclusion. Next, the data that has been analyzed is explained and interpreted in the form of words to describe facts or answer the research questions.

### RESULTS AND DISCUSSION

The initial stage of the research was conducted on April 22, 2018 until March 6, 2018 by making preliminary observations on the availability of open spaces and the use of sports facility in Surakarta. The conclusions of the observations are: first, there are several open spaces that can be used as a sport facility, among others Gelora Manahan, square, Car Free Day area, and city parks. Second, open spaces are dominated by students and adults in the morning (approximately from 5 am until 10 am) to do sports. Meanwhile, in the afternoon (at about 3 pm until 5.30 pm), the open spaces are usually dominated by adults. Third, the kinds of sports that can be done at open spaces are among others walking, jogging, cycling, roller skating, doing gymnastics, skateboarding, wall climbing, etc.

The second stage of the research was conducted on May 13, 2018 until May 27, 2018 by conducting interviews. The interviewees are the people doing sports at open spaces. At this stage, the researcher will describe the results of the interviews. Along with the results of the interviews, the researcher analyzes the information obtained from the respondents both in written or oral form with descriptive procedures. The interview questions are designed to answer some research questions as follows:

#### 1. The Availability of Open Spaces as a Sport Facility

The availability of open spaces is one of the important elements in doing sports. At open spaces, people can do sports freely and comfortably. They can also enjoy the open air. However, open spaces must ensure the safety of the people too.

In UPTB (Technical Implementation Unit) data on Sports Infrastructure of DIKPORA (Physical Education and Sports Services) Office in Surakarta, Sports Infrastructure is a task for Service Technical Implementation Unit (UPTD) created based on Surakarta Mayor Regulation No. 15-V of 2011 dated December 16, 2011 under the Surakarta City Youth and Sports Education Office. UPTD has a basic task to manage appropriate and adequate sport infrastructures under

technical policies set by the Head of the City Youth and Sports Education of Surakarta. The aforementioned infrastructures are listed down below:

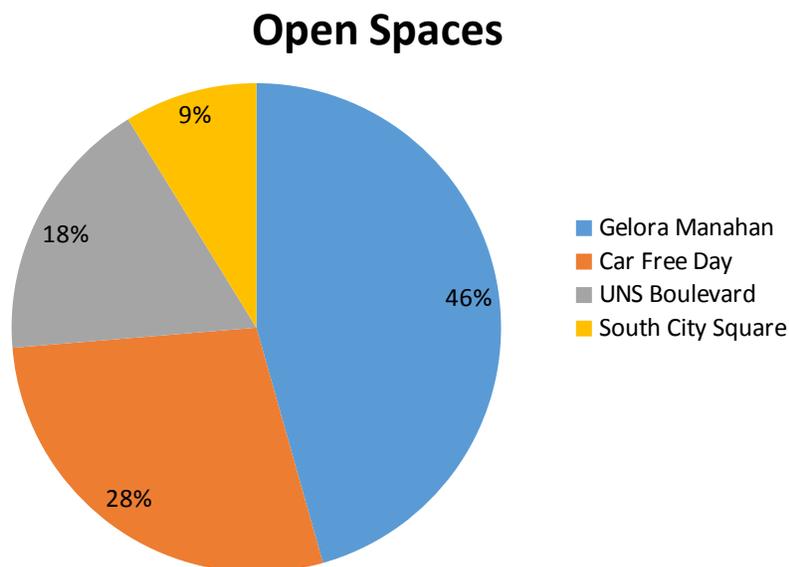
Table 1. The wide of open spaces managed by the government of Surakarta

No.	Name	Wide in m <sup>2</sup>
1	Gelora Manahan Stadium	170.000
2	R. Maladi Stadium	58.579
3	Gelora Manahan	33.561
4	Pemuda Bung Karno Arena	7.600
5	Manahan Velodrome	24.011
6	Basketball Court	840
7	Volleyball Court	2.268
8	Tennis Court	3.650,64
9	Badminton Court	1.634,8
10	Football Field	64.000
<b>Total</b>		<b>366.144,44</b>

Source: UPTD of Physical Education and Sports Services of Surakarta

Based on the results of the interview of 30 respondents, it can be described that the availability of open spaces as a sport facility is as follows:

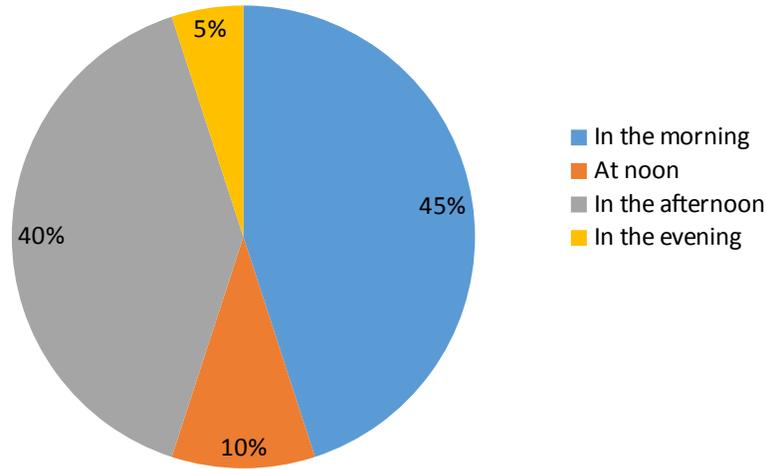
First, open spaces are attractive to be a space for doing sports. Based on the results of the research, it is known that open spaces are the most anticipated and utilized by the people in Surakarta as a sport facility. The percentage of people's interest in 1) Gelora Manahan is 46%, 2) Car Free Day Slamet Riyadi is 28%, 3) UNS (Sebelas Maret University) Boulevard is 17%, and 4) South City Square is 9%.



Picture 1. The most visited open spaces

Second, time of doing sports. Based on the results of the interview, people's most favorite times of doing sports are divided into four, they are 1) in the morning from 5 am until 10 am with 45%. 2) at noon from 11 am until 2 pm with 10%. 3) in the afternoon from 3 pm until 5.30 pm with 40%, and 4) in the evening from 7 pm until 10 pm with 5%.

## Time



Picture 2. Time of doing sports at open spaces

## 2. The types of sports at open spaces

Based on the results of the research toward the types of sports in Surakarta, it is known that Gelora Manahan and Car Free Day area are the most anticipated and utilized by the people. The explanation below will give more detail information about the findings.

First, Gelora Manahan becomes the most visited open space in Surakarta to do sports. It is because Gelora Manahan has adequate and feasible infrastructures for doing sports compared to other open spaces in Surakarta. The following is the list of the types of sports that can be done at Gelora Manahan.

Table 2. Types of sports and intensity that can be done at Gelora Manahan

No.	Types of Sports	Community Name	Intensity
1	Jogging	Manahan United	Moderate
		SikSOROGO	High
2	Basketball	Public	Low – Moderate
3	Wall Climbing	Public	High
4	Cycling	LSFR	Low
5	Gymnastics	Gita Ketawa	Low – Moderate
		Senam Tongkat (Stick Gymnastics)	Low
		Senam Taichi (Tiachi Gymnastics)	Low
6	Outdoor Fitness	Street Work Out	High

Based on the results of the research, it is seen that the types of sports that can be done at Gelora Manahan are jogging, basketball, wall climbing, cycling, gymnastics, and outdoor fitness. The intensity of the aforementioned sports is varied from low until high intensity. There are a lot of individuals and sport groups doing sports at Gelora Manahan. Commonly, individuals do typical of individual sports such as jogging and cycling. On the other hand, sports groups mostly conduct gymnastics, because there are quite a lot gymnastics enthusiasts in Surakarta. A gymnastics community can consist of 30 up to 50 people.

Meanwhile, Car Free Day on Slamet Riyadi street is a new option for an open space in Surakarta. This Car Free Day or what is usually called as CFD, is really interesting and fascinating for the people to do sports. CFD is actually a government policy to sterilize certain areas from vehicles. However, it turns to be another perfect place to do sport and social interaction. One of the activities that is very visible in CFD area is doing sports. CFD is a place for doing individual sports and group sports. CFD is only open on Sunday morning for about 4 hours, starting from 5 am until 9 am. CFD is always be very crowded. Thousands of people visit CFD every Sunday to do various activities, including sports. The following is the kinds of activities that can be done at CFD Slamet Riyadi:

Table 3. Types of sports and intensity that can be done at CFD Slamet Riyadi

No.	Types of Sports	Community Name	Intensity
1	Walking	Public	Low
2	Jogging	Public	Low
3	Cycling	Onthel Lawas Solo	Low
		BMX	Low – Moderate
		SFGSS	Low
		Seli	Low
4	Parkour	Spartarun Solo	High
5	Roller Skating	In Line Skate	Low
6	Gymnastics	Senam Tera (Tera Gymnastics)	Low
		Senam Solo Ceria	Low – Moderate
7	Skateboarding	ASSC	Moderate
8	Table Tennis	Public	Low
9	Futsal	Public	Moderate

Based on the results, it is known that the types of sports that can be done at CFD Slamet Riyadi are walking, jogging, cycling, parkour, roller skating, gymnastics, skateboarding, table tennis, and futsal. The intensity of the sports is varied from low until high intensity. There are individuals and groups who do sports at CFD area.

Walking is the most common sport for individuals. There are a lot of walking enthusiasts at CFD. It is because most of the people do not want to do high intensity of sports. They just want to have low intensity of sports and recreational activities, such as hanging out, buying snacks or drinks, meeting friends, etc. On the one hand, sports groups mostly do gymnastics, because there are quite a lot gymnastics enthusiasts in Surakarta. Moreover, there are several gymnastics groups at CFD. They do various gymnastics types, such as Tera Gymnastics.

### 3. Groups that utilize open spaces as a sport facility

Based on the results of the research, the researcher classified some groups of people to help identifying the groups who utilize the open spaces. The groups of people can be categorized as follows:

Table 4. Groups of people who utilize open spaces as a sport facility

No.	Types of Groups	Classification
1	Based on gender	Men
		Women
2	Based on age	Children
		Teenagers
		Adults
		Elderly
3	Based on background of activities	Students
		University Students
		Workers
		Pensioners

The first category is categorized by gender, men and women. At open spaces, everyone has the same privilege to do sports. Based on the results of the research, it is seen that the obvious difference of the user of open spaces is in the total percentage of men and women. Groups of men usually do different activities from groups of women. However, the two groups sometimes do the same activities, such as doing gymnastics.

The second category is categorized by age. There are four categories, among others children, teenagers, adults, and elderly. Every category has different types and time of activity. For example, cycling and roller skating are more famous for the children category.

The third category is categorized by background of activities. This means that the people who do sports in open spaces have various daily activities. Based on the results of the research, the category of background activity of the open space users is divided into four categories, namely students, university students, workers, and pensioners. All groups of this category is involved in outdoor activities or sports. In the morning, the open spaces are usually dominated by students and pensioners. Meanwhile, in the afternoon, it is dominated by university students and workers.

## CONCLUSION

Based on the results of the research and the discussion that has been explained above about the availability of open spaces in Surakarta, it can be concluded as follows:

First, based on SDI ratio analysis or the comparison of the open space areas in Surakarta with the population of 7 years and above, the availability of open space facilities in Surakarta that is only 366,144.44 m<sup>2</sup> does not meet the ideal level. However, in the middle of the limited open spaces in Surakarta, Gelora Manahan and Car Free Day Slamet Riyadi (CFD) are very interesting for the most people. They are the most visited and utilized open spaces as a sport facility. Gelora Manahan is the best choice because it has complete infrastructures for doing sports. CFD is also a very good option for the people to do sports and other activities.

Second, there are several types and intensity of sports that people can do at open spaces in Surakarta. Jogging, cycling, and doing gymnastics can be done at both Gelora Manahan and CFD. There are some jogging communities at Gelora Manahan because the space is very supporting. On the other hand, table tennis communities are usually seen at CFD because the area is more suitable for playing table tennis. Furthermore, there are three sports intensity levels that can be done at open spaces, they are low, moderate, and high intensity. It depends on the types of sports and the purpose of doing sports.

Third, groups of people who utilize open spaces in Surakarta consist of three categories. They are groups based on gender, age, and background of activities. Every groups contribute to the types of sports

at open spaces. Each group has typical characteristics too. Some do individual sports, while some other do group sports.

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