Available online at: http://journal.unj.ac.id/unj/index.php/gjik
Gladi: Jurnal Ilmu Keolahragaan 16 (01) 2025, 46-58
Permalink/DOI: https://doi.org/10.21009/GJIK.161.05

PERCEPTION OF PHYSICAL EDUCATION STUDENTS ON THE INFRASTRUCTURE OF BIG BALL SPORTS

Dwi Laily Septi Nikmatin[1], Rizki Apriliyanto[2], Ahmad Sulaiman[3]

[1,2,3] Physical Education, Faculty of Teacher Training and Education, Universitas Muhammadiyah Jember. Jl. Karimata No.49 Sumbersari District. Jember 68124

Correspondiing author. Email **:** septidw22@gmail.com

(Submission Track: Received:01-02-2025, Final Revision: 14-02-2025, Available Online:21-02-2025)

Abstract The purpose of this study was to determine the perception of physical education students of the University of muhammadiyah jember class of 2021 on the feasibility of infrastructure for large ball sports, namely football, volleyball and basketball. The research method used is a quantitative descriptive method, the population in this study is all physical education students of the 2021 batch, the sample taken using a total sampling of 21 students. With data collection techniques using questionnaire closed through google form. The questions in questionnaire cover the facilities and infrastructure of big ball sports (football, volleyball, and basketball). The data obtained will be analyzed using descriptive statistical methods in which data analysis includes calculating the frequency, average, and percentage. Based on research that has been conducted 81,55% of respondents considered that the facilities and infrastructure in the Football course in the category of decent, 76,49% of respondents considered that the facilities and infrastructure in the volleyball course in the category of decent, and 77,08% of respondents considered that the facilities and infrastructure in the basketball course in the category decent.

Keywords: physical education; sports infrastructure; big ball Sports

INTRODUCTION

Muhammadiyah University of Jember is one of the Private Universities located in Jember Regency, precisely located on Karimata Street No.49, Sumbersari Jember-East Java. Muhammadiyah University of Jember has various study programs, one of which is Physical Education. The Physical Education Study Program is one of the study programs that has many enthusiasts, the learning process carried out in the Physical Education Study Program prioritizes movement activities such as basic movements in various sports. The main competence of graduates of program this study program ini is to become a teacher of Education, Physical, Sports and health (PJOK). Students who are registered in this study program can be referred to as future PJOK teacher candidates (Sulaiman, 2020). In the Physical Education Study Program, a lot of learning is taught such anatomias human anatomy, physiology, sports psychology, massage, sports tests and measurements, and many others. Thus, many assumptions about learning in Physical Education just playing sports games are very inappropriate, because there are still many other lessons to be taught. The concept of learning Physical education focuses on the process of socialization and culture through physical activities, games, and sports (Iswanto & Widayati, 2021).

Sport is a series of physical activities carried out individually or in teams. Classification of sports according to its purpose, namely Health Sports are sports that are carried out to maintain and improve physical and spiritual fitness, recreational sports are sports that are carried out to get pleasure, professional sports are sports that are carried out with the aim of becoming a professional athlete, achievement sports are sports that are competitive, educational sports are sports that are nor the University. Sport is an activity that must be done by humans, which aims to improve the physical condition and fitness of the body. In addition, Sport also serves as a means of recreation that provides tranquility through recreational activities. In addition to its role in improving physical fitness and as a form of recreation, sports also have an important goal, namely to improve individual achievement (Gumantan et al., 2020).

Sport is becoming one of the important elements in Student Life, which not only serves to maintain physical health, but also plays a role in the development of social, mental and emotional skills. In the context of education, sports are not only limited to

courses, but also a means to develop character and develop student potential to form character and develop student potential.

In higher education environments, such as the University of Muhammadiyah Jember, sports activities become a means to strengthen interaction between fellow students. With various programs and facilities provided, students have the opportunity to engage in beneficial physical activities, both individually and in groups. Sports itself can be done anywhere, including on campus, in addition to being a place to gain knowledge, it can also be a place for students to develop themselves in various aspects, including health and fitness. One way to achieve this is through sports activities. Lots of sports that can be done in the campus environment ranging from individual sports such as jogging and team sports such as football, futsal, basketball, volleyball.

Sports facilities are infrastructure / infrastructure available to support sports activities, this includes various buildings, equipment, and fields used for various types of sports. Facilities are facilities that support and facilitate the implementation of an activity. Generally, facilities are related to the provision of public infrastructure in a certain company or organization (Ningsih et al., 2019). The existence of this facility is very instrumental in improving the quality of life of students, with adequate facilities students can more easily access and participate in sports activities, which ultimately helps maintain physical and mental health. At the University of Muhammadiyah Jember, there are many sports facilities that can be used by students such as basketball, futsal, football, badminton, pencak silat, taekwondo, karate, tapak suci, athletics, volleyball, sepak takraw, and petanque.

Sports facilities and infrastructure have an important role in supporting the learning of Physical Education students, because it serves as a practical medium to integrate theory with skills. Facilities such as fields and sports equipment not only support learning simulations, but also help students in honing mastery of techniques in sports, the existence of adequate facilities also supports holistic learning by improving students physical and mental health, and developing soft skills such as leadership and cooperation. With adequate facilities, students can get the maximum learning experience. Sports facilities and infrastructure are very important elements in the world of sports. This applies both to the development of sports achievements and to the development of recreational sports among the community (Gunawan et al., 2021).

Physical education is not only limited to theory, but also direct practice, one of the practices carried out by physical education students is the big ball game. Big ball game is a type of sport that uses a large ball and is played in teams, for example, football, basketball, volleyball, futsal, handball, and so on. Currently, big ball sports have begun to develop and are favored by Indonesian people, for example football, volleyball, basketball, futsal, and handball. Big ball games such as football, basketball, and volleyball become Games that are very liked by all circles ranging from children, parents, including students and are played with certain skills. In addition to serving as a means to develop students' playing activities, the big ball game also contains values that can help in personality development (Julianur et al., 2020).

Physical education students need adequate sports infrastructure to hone their skills and knowledge. Muhammadiyah University of Jember, as one of the universities that has a Physical Education Study program is expected to provide facilities that support the learning process of students. The quality of adequate sports facilities and infrastructure is an important factor in supporting the success of the sports learning process. Adequate sports facilities and infrastructure are an important foundation in supporting the learning success Physical education students. The well-equipped and well-maintained facilities not only allow students to apply the theory they have learned firsthand, but also provide opportunities for them to develop a variety of skills in sports. The success of Penjaskesrek learning activities is influenced by several factors, consisting of internal and external factors. Internal factors include educators (teachers or lecturers) and sports facilities and infrastructure that serve as tools or media to support the lecture process. Meanwhile, external factors include everything that comes from outside the student, such as the family environment and social environment (Yulianti et al., 2020).

This study aims to determine the perception of Physical Education students on the feasibility of large ball sports facilities and infrastructure at the University of Muhammadiyah Jember. Perception is a complex observational process of receiving and interpreting information from the environment using the five senses. Thus, if a person has a perception of an object through his senses, it means that he knows, understands, and is aware of the existence of the object (Anggianita et al., 2020). The results of thisistudy are expected to provide a clear picture of the condition of existing facilities and infrastructure

for big ball sports, as well as provide input for related parties to make improvements and improve the quality of existing infrastructure.

METHOD

Research methods refer to procedures and scenarios applied in a study. Through research methods, research can be carried out in a structured, scientific, objective, and high-quality manner (Waruwu, 2023). The method used in this study is a quantitative descriptive method, this method was chosen because it aims to describe the perception of physical education students on the feasibility of large ball sports infrastructure. The quantitative approach is characterized by the use of numbers, which are presented in the form of tables or graphs, and involves hypotheses. In addition, the research instruments in this approach can be statistically tested (Waruwu, 2023).

The population in this study is all physical education students of the 2021 batch. Samples were taken using a total sampling of 21 students, with data collection techniques using questionnaire closed through google form where respondents choose one of the answers that have been provided. Which has a likert scale of strongly agree, agree, disagree, strongly disagree, with the highest point 4 and the lowest 1. Questions that will be asked about the facilities and infrastructure of big ball games include football, volleyball, and basketball. Questions in the questionnaire include whether the field used is suitable for lectures?, is the number of balls used enough with the number of students?, is the ball used already suitable for lectures (not hard and suitable in size)?, are there puddles in the field? (Manurung & Yantiningsih, 2020).

The data obtained will be analyzed using descriptive statistical methods in which data analysis includes calculating the frequency, mean/average, and percentage.

$$Percentage = \frac{average}{maximum\ Total\ score}\ X\ 100\%$$

RESULTS AND DISCUSSION

RESULTS

FOOTBALL FACILITIES AND INFRASTRUCTURE

a. The football field used is suitable for lectures

Table 1. frequency distribution of football fields used to be eligible for lectures

Value	Frequency	Description
1	0	Strongly Disagree
2	0	Disagree
3	14	Agree
4	7	Strongly Agree

Based on the frequency distribution table above, it is known that 7 respondents chose a statement strongly agreeing with the highest point 4, there were 14 respondents choosing a statement agreeing with point 3, and there were no respondents choosing a statement disagreeing and strongly disagreeing with point 2 and the lowest 1.

b. The ball used is enough with the number of students

Table 2. Frequency distribution of balls used is sufficient with the number of students

Value	Frequency	Description
1	0	Strongly Disagree
2	2	Disagree
3	10	Agree
4	9	Strongly Agree

Based on the frequency distribution table above, it is known that 9 respondents chose the statement strongly agree with the highest point 4, there were 10 respondents chose the statement agree with point 3, there were 2 respondents chose the statement disagree with point 2, and there were no respondents chose the statement strongly disagree with the lowest point 1.

c. The ball used is suitable for lectures (not hard and according to size)

Table 3. frequency distribution of the ball used for the lecture (not hard and appropriate size)

Value	Frequency	Description
1	0	Strongly Disagree
2	1	Disagree
3	14	Agree
4	6	Strongly Agree

Based distribusi on the frequency distribution table above, it is known that 6 respondents chose a statement strongly agreeing with the highest point 4, there were 14 respondents choosing a statement agreeing with point 3, there were 1 respondent choosing

a statement disagreeing with point 2, and there were no respondents who chose a statement strongly disagreeing with the lowest point 1.

d. There are puddles on the ground

Table 4. Frequency distribution of standing water in the field

Value	Frequency	Description
1	0	Strongly Disagree
2	6	Disagree
3	6	Agree
4	9	Strongly Agree

Based distribusi on the frequency distribution table above, it is known that 9 respondents chose a statement strongly agreeing with the highest point 4, there were 6 respondents choosing a statement agreeing with Point 3, there were 6 respondents choosing a statement disagreeing with Point 2, and there were no respondents who chose a statement strongly disagreeing with the lowest point 1.

VOLLEYBALL FACILITIES AND INFRASTRUCTURE

a. The volleyball court used is suitable for lectures

Table 5. frequency distribution of volleyball courts used to be suitable for lectures

Value	Frequency	Description
1	0	Strongly Disagree
2	6	Disagree
3	12	Agree
4	3	Strongly Agree

Based distribusi on the frequency distribution table above, it is known that 3 respondents chose the statement strongly agree with the highest point 4, there were 12 respondents chose the statement agree with point 3, there were 6 respondents chose the statement disagree with point 2, and there were no respondents who chose the statement strongly disagree with the lowest point 1.

b. The ball used is enough with the number of students

Table 6. frequency distribution of balls used is sufficient with the number of students

Value	Frequency	Description
1	0	Strongly Disagree
2	2	Disagree
3	15	Agree
4	4	Strongly Agree

Based on the frequency distribution table above, it is known that 4 respondents chose the statement strongly agree with the highest point 4, there were 15 respondents chose the statement agree with point 3, there were 2 respondents chose the statement disagree with point 2, and there were no respondents who chose the statement strongly disagree with the lowest point 1.

c. The ball used is suitable for lectures (not hard and according to size)

Table 7. frequency distribution of the balls used are suitable for lectures (not hard and according to size)

Value	Frequency	Description
1	0	Strongly Disagree
2	0	Disagree
3	12	Agree
4	9	Strongly Agree

Based on the frequency distribution table above, it is known that 9 respondents chose the statement strongly agree with the highest point 4, there were 12 respondents chose the statement agree with point 3, and there were no respondents chose the statement disagree and strongly disagree with point 2 and the lowest 1

d. There are puddles in the field

Table 8. frequency distribution of standing water in the field

Value	Frequency	Description
1	1	Strongly Disagree
2	7	Disagree
3	7	Agree
4	6	Strongly Agree

Based on the frequency distribution table above, it is known that 6 respondents chose to strongly agree with the highest point 4, there were 7 respondents who chose to agree with point 3, there were 7 respondents who chose to disagree with point 2, and there were 1 respondent who chose to strongly disagree with the lowest point 1.

BASKETBALL ADVICE AND INFRASTRUCTURE

a. The field used is suitable for lectures

Table 9. field frequency distribution used is suitable for lectures

Value	Frequency	Description
1	0	Strongly Disagree
2	0	Disagree
3	15	Agree
4	6	Strongly Agree

Based on the frequency distribution table above, it is known that 6 respondents chose the statement strongly agree with the highest point 4, there were 15 respondents chose the statement agree with point 3, and there were no respondents chose the statement disagree and strongly disagree with point 2 and the lowest 1.

b. The ball used is enough with the number of students

Table 10. Frequency distribution of the number of balls used is sufficient with the number of students

Value	Frequency	Description
1	0	Strongly Disagree
2	2	Disagree
3	14	Agree
4	5	Strongly Agree

Based on the frequency distribution table above, it is known that 5 respondents chose the statement strongly agree with the highest point 4, there were 14 respondents chose the statement agree with point 3, there were 2 respondents chose the statement disagree with point 2, and there were no respondents chose the statement strongly disagree with the lowest point 1.

c. The ball used is suitable for lectures (not hard and according to size)

Table 11. frequency distribution of the balls used are suitable for lectures (not hard and according to size)

Value	Frequency	Description
1	0	Strongly Disagree
2	1	Disagree
3	12	Agree
4	8	Strongly Agree

Based on the frequency distribution table above, it is known that 8 respondents chose the statement strongly agree with the highest point 4, there were 12 respondents chose the statement agree with point 3, there were 1 respondent chose the statement disagree with point 2, and there were no respondents chose the statement strongly disagree with the lowest point 1.

d. There are puddles on the ground

Table 12. Frequency distribution of standing water in the field

Value	Frequency	Description
1	0	Strongly Disagree
2	12	Disagree
3	6	Agree
4	3	Strongly Agree

Based on the frequency distribution table above, it is known that 3 respondents chose the statement strongly agree with the highest point 4, there were 6 respondents chose the statement agree with point 3, there were 12 respondents chose the statement disagree with point 2, and there were no respondents chose the statement strongly disagree with the lowest point 1.

Table 13. final results of the study on the feasibility of Physical Education learning facilities and infrastructure

Description	Statement											
	Football				Volleyball				Basketball			
	1	2	3	4	1	2	3	4	1	2	3	4
Total	70	70	68	66	60	65	72	60	69	66	70	54
Average	68.5				64.25				64.75			
Percentage	81,55%				76,49%				77,08%			

DISCUSSION

Based on the above information, the average number of all respondents ' statements about football facilities and infrastructure is 81,55%, it can be concluded that facilities and infrastructure in football courses in the Physical Education Study Program of the University of Muhammadiyah Jember are included in the feasible category.

Based on the above information, the average number of respondents ' overall statements about volleyball facilities and infrastructure is 76,49%, it can be concludeduthat facilities and infrastructure in volleyball courses in the Physical Education Study Program of the University of Muhammadiyah Jember are included in the feasible category.

Based on the information above, the average number of respondents ' overall statements about basketball facilities and infrastructure is 77,08%, it can be concluded that the facilities and infrastructure in the basketball course at the Physical Education Program of the University of Muhammadiyah Jember are included in the feasible category.

The results of this study indicate that the majority of students have a positive perception of the feasibility of advice and infrastructure of the big ball sports at the University of Muhammadiyah Jember. The positive perception shows that the existing infrastructure facilities such as football fields, volleyball courts, basketball courts are

available in good condition and adequate to support the learning process. Such a means as a ball of good quality is also assessed as quite adequate.

The majority of Physical Education students have a positive perception of the facilities and infrastructure of big ball sports available, this shows that the university has met the needs of students for the learning process. The positive perception is expected to be maintained and improved to support the development of student sports. However, maintaining the quality of existing facilities and infrastructure is not enough. The university needs to make improvements and innovations that adapt to the latest developments in sports science and technology. Efforts that can be done by the university is the construction of a sports hall (GOR), immediately replace and repair if there is damage to sports facilities and infrastructure, the procurement of new, more modern equipment.

Sports facilities and infrastructure have a very important roletin the learning process of Physical Education, both of which contribute greatly to creating an optimal and effective learning environment for students. Sports facilities and infrastructure are the main capital in the implementation of sports activities, the function of sports infrastructure facilities is as a supporting tool and helps the smooth implementation of a quality physical activity (Irawan, 2017). With the complete and proper sports facilities and infrastructure, students can get a better learning experience. A learning environment that has good facilities will make students feel more comfortable and motivated to actively participate in Lecture activities. In addition, sports facilities and infrastructure can also be used for research and development activities in the field of sports, both by lecturers and students.

Muhammadiyah University of Jember as one of the universities that has a Physical Education Study Program, has the responsibility to meet the sports facilities and infrastructure to support the learning process of Physical Education students. With adequate facilities and infrastructure, students can focus more and help the lecture process to be effective. Sports facilities and infrastructure have a very important role in creating a conducive and effective learning environment for Physical Education students. These two things not only improve the quality of learning but also contribute to the development of students ' skills , health, character and practice.

CONCLUSION

Sports facilities and infrastructure are very important in the learning process in physical education, with the availability of appropriate sports facilities and infrastructure to support effective learning activitiesy. Based on research that has been conducted 81,55% of respondents considered that the facilities and infrastructure in the Football course in the category of feasible, 76,49% of respondents considered that the facilities and infrastructure in the volleyball course in the category feasible, 77,08% of respondents considered that the facilities and infrastructure in the basketball course in the category feasible. It can be concluded that the majority of students are satisfied with the facility. Based on this data, it was concluded that the facilities and infrastructure for the three branches of big ball sports available at the University of Muhammadiyah Jember were included in the feasible category. However, keep in mind that this is just an assessment of a number of respondents.

REFERENCES

Anggianita, S., Yusnira, Y., & Rizal, M. S. (2020). Persepsi guru terhadap pembelajaran daring di sekolah dasar negeri 013 Kumantan. *Journal of Education Research*, *1*(2), 177–182.

Gumantan, A., Sina, I., & Pratiwi, E. (2020). Olahraga Rekreasi dalam Peningkatan Prestasi Olahraga. *SPORT-Mu: Jurnal Pendidikan Olahraga*, *1*(2), 103–114.

Gunawan, A., Mahendra, I. R., & Hidayat, A. (2021). Pengelolaan Sarana dan Prasarana Olahraga. *Salus Cultura: Jurnal Pembangunan Manusia Dan Kebudayaan*, *1*(1), 1–11.

Irawan, R. (2017). Studi Kelayakan Fasilitas Sarpras Olahraga Indoor Di FIK UNNES. *Jurnal Penjakora*, *4*(1), 90–102.

Iswanto, A., & Widayati, E. (2021). Pembelajaran pendidikan jasmani yang efektif dan berkualitas. *MAJORA: Majalah Ilmiah Olahraga*, *27*(1), 13–17.

Julianur, J., Fauzi, M. S., & Sukriadi, S. (2020). Pengembangan Permainan Sevolbas Dengan Pendekatan Pembelajaran Integrated Untuk Pembelajaran Bola Besar Penjasorkes Sekolah Dasar. *Jendela Olahraga*, *5*(1), 73–85.

Manurung, J. S. R., & Yantiningsih, E. (2020). Persepsi Mahasiswa Terhadap Kelayakan Sarana Dan Prasarana Olahraga Bola Besar Di Stkip Pamane Talino Tahun 2019/2020. *JOSEPHA: Journal of Sport Science And Physical Education*, *1*(1), 33–41.

Ningsih, Y. F., Hariadi, N., & Puspitaningrum, D. Ay. (2019). *Hubungan Antara Minat dan Bakat Mahasiswa Universitas Jember Kampus Bondowoso Terhadap Fasilitas Olahraga*.

Sulaiman, A. (2020). Kebugaran Jasmani Mahasiswa Program Studi Pendidikan Olahraga Angkatan Pertama Universitas Muhammadiyah Jember. *Sport, Pedagogik, Recreation and Technology: Jurnal Ilmu Pendidikan Jasmani Olahraga, Kesehatan Dan Rekreasi (Sparta)*, *2*(2), 36–38.

Waruwu, M. (2023). Pendekatan penelitian pendidikan: metode penelitian kualitatif, metode penelitian kuantitatif dan metode penelitian kombinasi (Mixed Method). *Jurnal Pendidikan Tambusai*, *7*(1), 2896–2910.

Yulianti, M., Makorohim, M. F., & Nasution, R. M. (2020). Tingkat Kepuasan Mahasiswa Penjaskesrek Fkip Uir Terhadap Ketersedian Sarana Dan Prasarana Olahraga. *Altius: Jurnal Ilmu Olahraga Dan Kesehatan*, *9*(1), 30–37.