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Shooting Ability Of Petanque Athletes In Palopo: The Role Of Physical Conditions And Kinesthetic Perceptions

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Abstract

Petanque is a relatively new sport in the developing City of Palopo. However, petanque athletes need help with physical condition aspects seen from the training and competition processes and kinesthetic perception. This research aims to determine the relationship between physical condition and kinesthetic perception of shooting ability. Several physical elements support the shooting in petanque: arm strength, hand-eye coordination, balance, and kinesthetic perception. The research results show a significant relationship between physical condition and kinesthetic perception of shooting ability. It can be concluded that petanque athletes' shooting ability strongly relates to physical condition aspects and kinesthetic perception. This research is expected to examine aspects of the physical condition to contribute to the Petanque sport of Palopo City.

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INTRODUCTION

Sport is a series of movements, or it can be said that the body is organized and structured (Agustini et al., 2018). Sport is a form of physical activity that is usually competitive (Mulya, 2020). The development of new sports from year to year is increasing rapidly; this has caused each region to always look for chances to achieve superior

achievements in every sport (Yarmani & Defliyanto, 2020).

One is the petanque sport in Indonesia (Sudiadharma & Suardi, 2019). Compared to other sports, such as football, badminton, and volleyball (Sulastri et al., 2021). Petanque came into Indonesia in 2011 at the SEA Games event in Palembang (Okilanda et al., 2018). This sport requires concentration and

dexterity when throwing a metal ball (bosi) to approach a wooden ball (Boka), a target made of wood (Taufik et al., 2020).

Petanque is a relatively new sport in the developing City of Palopo. Starting from the campus/university and even the school level. Most of the Palopo petanque athletes come from students of the Muhammadiyah Palopo University. Even though they are relatively new, the Petanque athletes from Palopo City have participated in various tournament events such as PrePorprov, Pomnas, and Porprov selection. A recent achievement was winning a bronze medal in the triple women's number at the 2022 Porprov Sinjai-Bulukumba event.

Petanque is a form of boules game in which the aim is to throw an iron ball as close to a wooden ball as possible, called a cochonnet, and the feet must be in a small circle (Rabani Arsi, 2021). Petanque is a sport that can be played by one, two, and three people (Agustini & Maulana F, 2018). Each team has one person for the single category, two for the double class, and three for the triple variety (Wijaya et al., 2021). In a petanque game, there are 2 (two) types of skills (Zainuddin et al., 2022). The basic techniques in throwing are Pointing and Shooting. Pointing in petanque, several ways exist, such as roll, soft lob, and full lob (Bustomi et al., 2020).

Shooting is one of the numbers contested in the sport of petanque and the most important part of the game of petanque (Badaru et al., 2021). Shooting is a throw to repel the opponent's boss from the target box (Saddle, 2016). Shooting in petanque is an

effort to keep the target ball away to reduce the opponent's points and add points to the team (Ati Safitri et al., 2021). shooting is one of the techniques in the petanque game that requires accuracy, high concentration, and accuracy shooting (Gracia Sinaga & Ibrahim, 2019). Shooting is one of the numbers competed in the sport of petanque and the most important part of the game of petanque (Badaru et al., 2021).

The physical condition is a unified whole of interrelated components (Dawud & Hariyanto, 2022). This physical condition includes arm muscle strength, hand-eye coordination, and other movement organs as support to perform a series of movements when throwing a shooting (Agustini et al., 2018). The physical condition consists of several components that exist in the body. In all sports, the parts needed are not different; the difference lies in the training process, and the details of the physical condition given will be more specific in each sport (Hilmi, 2021).

Several physical elements support shooting petanque sports. Arm muscle strength helps to achieve the throw, that is, physical exercise, be it pull-up exercises using rubber such as latex or push-up activities in a fast and slow rhythmic manner (Badaru et al., 2021). Eye-hand coordination is a complex cognitive ability, as it calls for us to integrate our visual and motor skills, allowing the hands to be guided by the visual stimulation our eyes receive (Mulya, 2020). Balance is used to adjust the straightness of the ball output at the time of the shooting. Because when shooting,

athletes must consider distance, power, throw angle, and straightness (Saddle, 2016).

Kinesthetic perception is the ability to sense the position, effort, and movement of body parts or the whole body during muscular activity, sometimes considered the sixth sense. (Umma, 2018). Kinesthetic perception is the ability to feel body movements apart from visual or auditory tools or, in popular terminology, to feel body movements (Hutabarat A et al., 2017). Cinesthetics can provide awareness of the position of the body or body parts when moving, as well as the ability to recognize muscle contractions and body balance (Rosmi, 2017).

Previous research results (Agustini et al., 2018) showed that arm strength and hand-eye coordination had a significant relationship with the results of shooting accuracy in pétanque athletes at the Sukabumi City club in 2018. The novelty of this study was to add an element of physical condition, namely balance. And kinesthetic perception to support the shooting abilities of petanque athletes.

METHODS

This study uses a quantitative and descriptive correlational method to determine the relationship between physical condition and kinesthetic perception (Ramadan & Juniarti, 2020). The population in this study were Petanque athletes from Palopo City. There are 15 Petanque athletes involved in this study, seven male and eight female athletes; all will be sampled in the survey. In this research, what we want to examine is the shooting ability of Petanque athletes in Palopo City, which is supported by the role of physical condition and kinesthetic perception.

The test instruments used in this study were tests of physical condition (strength, arms, hand-eye coordination, and balance), kinesthetic perception tests, and shooting abilities. Physical condition data using the T-Score test. The research data were analyzed descriptively; the requirements tests were the data normality and correlation tests. So the entire statistical data analysis was processed via computer in the SPSS version 23.00 program

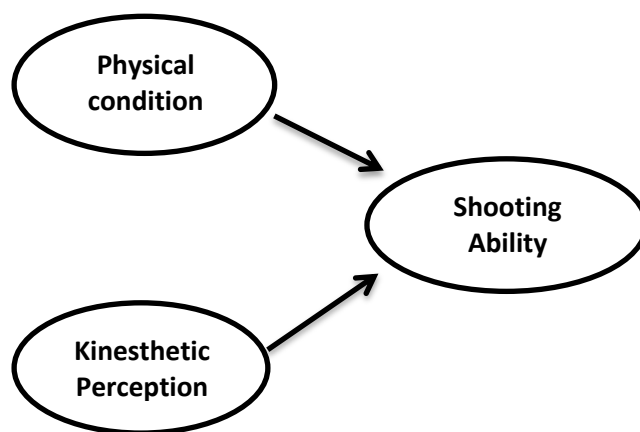


Figure 1. Research Design

FINDINGS AND DISCUSSION

Findings

Based on table 1, it can be stated the physical condition data with a mean value of 149.99, a median value of 149.17, a standard deviation value of 14.27, a range value of 52.76, a minimum value of 126.42 and a maximum value of 179.18. Kinesthetic perception data with a mean value of 7.20, a

median value of 8.00, a standard deviation value of 1.521, a range value of 5, a minimum value of 4, and a maximum value of 9. Shooting ability data with a mean value of 17.73, median of 17.00, standard deviation value of 4.605, range value of 17, minimum value of 10, and maximum value of 27.

Descriptive analysis, which includes the mean, median, standard deviation, range, minimum, and maximum as follows:

Table 1 Summary of Descriptive Analysis

	Physical condition	Kinesthetic Perception	Shooting Ability
Means	149.99	7,20	17,73
Median	149.17	8.00	17,00
SD	14,27	1.521	4,605
Range	52.76	5	17
Minimum	126,42	4	10
Maximun	179.18	9	27

The significant value of physical condition is $0.965 > 0.05$ or normally distributed. The considerable weight of concentration is $0.126 > 0.05$ or normally distributed. The practical value of shooting ability is $0.757 > 0.05$ or normally distributed. It can be stated that physical condition has a substantial relationship with shooting ability, with a considerable value of $0.001 > 0.05$. Kinesthetic perception is significantly related to shooting power, with a significant deal of $0.000 > 0.05$. The conclusion is that there is an important relationship between physical condition variables and kinesthetic perception of shooting ability.

Discussion

Throw shooting is influenced by several factors, such as strong-arm muscle strength

when throwing and eye-hand coordination, which must be synchronized when throwing, so that arm muscle strength can contract with eye-hand coordination simultaneously to get the right throw on target (Agustini et al., 2018). The target in petanque is to be able to win the game with precise and accurate throws (Zuhri et al., 2020).

Good physical condition in athletes will make it easier to practice during competitions. On the other hand, if the physical condition is excellent, it will facilitate achieving goals in shooting targets (Dahrial, 2019). The physical condition of the players will also affect their mentality of the players. Conversely, the players' mentality will also affect their physical condition and their techniques and tactics. Technique, tactics, and mental and

physical condition are the most important elements to creating a good game (Maizan, Inggar, 2020).

Arm muscle strength supports carrying out a series of movements when shooting a throw (Agustini et al., 2018). Eye-hand coordination is dominant in terms of physical condition factors that support the game in pétanque sports because good shooting requires this coordination (Mulya, 2020). Good eye-hand coordination and arm muscle strength will improve accuracy in throwing petanque balls. A lack of arm muscle strength and hand-eye coordination will result in the accuracy of the ball hitting the target being low (Asmarani & Setiawan, 2020).

Balance in petanque sports, especially when shooting, is very necessary. An athlete must maintain a stable balance because, at certain distances, the athlete will need a lot of energy so that the throw is on target, affecting the balance (Saddle, 2016). Balance is very important because releasing the ball toward the desired target can be done easily. If you don't have balance, the ball direction will not be directed to the desired target or target (Zuhri et al., 2020). In addition, good credit is needed to maintain consistency in the direction of the throw, which is done by training the body's balance muscles (Isyani & Primayanti, 2019).

Kinesthetic perception is sometimes referred to as the sixth sense because some people can feel wrong and right movements in shooting movements (Kristanto, 2020). As a shooter in the sport of petanque, you must have good perception skills to determine the

drop of the ball so that it hits the target (Pradana & Nurkholis, 2019).

CONCLUSION

Based on the findings in the field, physical condition aspects (arm strength, hand-eye coordination, balance) and kinesthetic perception have a positive relationship with the shooting ability of Petanque athletes in Palopo City. This research is expected to examine aspects of the physical condition to contribute to the Petanque sport of Palopo City.

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