# THE IMPACT OF HIGHEST RALLY TRAINING ON IMPROVING DRIVE SHOT ABILITY IN SQUASH GAMES

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**ABSTRACT**

This type of research is an experiment designed to determine the effect of Highest Rally Training on students' efforts to improve forehand drive hitting ability in squash at Makassar State University's Faculty of Sports Science. The sampling technique employed was a random selection of 33 male students. The t-test was employed to analyze the data. The data analysis results indicate that the mean difference between the average pre-test and post-test scores is -13.879, and the sig. 2-tailed is 0.000 or <0.05. Therefore, it can be deduced that there is a mean difference between the pre-test and post-test scores, indicating that efforts to enhance students' squash forehand driveability are impacted by the Highest Rally training.

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## 1. INTRODUCTION

People widely engage in sport, a physical activity that has become an integral part of their lives. Sport not only serves as a means to improve physical well-being but also as a means to gain knowledge and achievement (Babenko & Mosewich, 2017; Habyarimana et al., 2022). Sports activities cover a wide range of disciplines, including athletics, games, water sports, and combat sports. Squash is a sports game. Squash is a sport that is experiencing significant growth and development in Indonesia (Vai et al., 2022; Irvan et al., 2023). This game has undergone many modifications to date. The basic techniques in squash consist of forehand, backhand, and serve. The techniques mentioned above are very important in squash. Squash is a popular sport that is in demand at all levels of society, especially in Indonesia. Squash's universal appeal, accessible to individuals of all age groups from children to adults and even the elderly, has contributed to its evolution (Clavisi & Finch, 2000; Kingsley et al., 2006; Zani et al., 2023). Squash has experienced significant progress and attracted widespread interest. Since the inception of top-level competitive tournaments, participants have played an important role in promoting the sport's global popularity (Murray & Hughes,

2016; Hughes & Wells, 2016; Baclig et al., 2020). As a result, squash instruction at a high level has become available to individuals of all ages and genders.

Squash is a very popular sport, giving rise to intense competition between its participants (Kingsley et al., 2006; Baclig et al., 2020; Irvan et al., 2023). Squash is a sport that allows singles matches, played between two individuals, and doubles matches, played between two pairs. The goal of this game is for each player to score points by hitting the ball with a racket according to the rules. When the opponent fails to reach the ball, the game awards points (Ariesna & Setiawan, 2018). Squash is a popular and highly respected sport among individuals of middle and upper socioeconomic status. Mastering the technique of hitting the ball is a basic requirement for beginner squash players (Kim et al., 2018; Murray et al., 2018). In competitive play, the main goal is to hit the ball with maximum force and send it away, making it difficult for them to catch or return the ball. According to Jones et al. (2018), playing squash necessitates meeting certain conditions beyond just hitting the ball. Various aspects, including physical, technical, tactical, mental, and strategic elements, can have a significant impact on the outcome of a squash match (Zillmer & Dardarian, 2021).

To compete professionally, athletes must have the necessary basic skills and be in optimal physical condition. Basic technique refers to the sequence of movements used when participating in a sport. The basic method is the fundamental foundation for playing court squash. There are various fundamental methods in squash, which include: (1) basic racket holding techniques; (2) basic forehand techniques; (3) basic backhand techniques; (4) basic serving techniques; and (5) basic volleyball skills (Jones et al., 2018; Williams et al., 2020; Zillmer & Dardarian, 2021). In squash, the forehand is the most efficient stroke for offensive play. A player must master the forehand stroke to launch an offensive attack from the forehand side. The forehand can serve as the main stroke for offensive maneuvers. The forehand in squash is the most dominant stroke used to smash (Kamal Ghoneim & Hassan El-Gizawy, 2016; Williams et al., 2020).

Forehand strokes occur more frequently in squash than backhand strokes. When making a forehand shot, the body position is open so that the arm can follow up without limits, resulting in a faster ball trajectory toward the target (Kamal Ghoneim & Hassan El-Gizawy, 2016). When using a backhand shot, the body position contracts slightly, limiting the freedom of arm movement and reducing ball speed. The forehand stroke method in squash consists of several components, as described by Williams et al. (2020). The basic elements of making a forehand shot are as follows: (1) observe the ball; (2) estimate the direction of the ball based on the opponent's movement; (3) prepare the shot in advance; (4) maintain proper footwork; (5) maintain a strong sense of balance; (6) be aware of the timing and make appropriate strokes; (7) maintain a high level of concentration. These concepts serve as essential building blocks for developing fundamental strokes. According to the previous explanation, the forehand stroke consists of three components: the forehand drive, flat, and forehand slice. A forehand shot entails hitting the ball with the palm of one's hand while holding the racket with the face facing the direction of the intended shot (Williams et al., 2020). Typically, a forehand refers to a shot aimed at the player's right side. The forehand is the most

commonly used stroke in squash. Making a forehand shot with a racket is similar to hitting the ball with your palm. Forehand strokes are more challenging than backhand strokes. Furthermore, forehand strokes constitute the majority of all squash movements.

Training is a deliberate, systematic, gradual, and repetitive process of carrying out sports activities over a long period (Smith, 2003; Brewer, 2017). The main goal is to improve performance by maximizing optimal performance. Sports practice, or training, refers to the individual and team preparation process that focuses on improving athlete performance through the development of physical, technical, tactical, and psychological abilities (Gamble, 2013; Mujika et al., 2018; Silva et al., 2021). The required training must be systematic and focused. Systematic training is an organized and methodical approach that is conducted periodically, planned, and adheres to a specific schedule and pattern (Rajšp & Fister Jr, 2020; Eraslan et al., 2021; Cunningham et al., 2022; Rodriguez Macias et al., 2022). It involves a systematic progression from easy to difficult tasks to achieve a desired goal.

Therefore, improving athlete performance requires implementing a well-designed training program. The goal of training is to improve an athlete's or sports team's skills and performance as much as possible. We achieve this by addressing various training areas, including physical conditioning, technical proficiency, strategic maneuvers, and psychological preparation. Every coach and athlete must acquire and learn various facts and knowledge. Forehand drive training, which uses the highest rally training method, aims to improve the ability to hit the ball by providing variation in the training process (Kamal Ghoneim & Hassan El-Gizawy, 2016; Williams et al., 2020). This activity aims to improve children's ball control skills and develop their ability to identify and correct ball-handling mistakes. The rally, the highest form of forehand training, is a highly effective training method that improves accuracy, footwork, and overall proficiency in executing the forehand shot.

The sequence of the rally's highest training stages is as follows (Angraini & Fardi, 2020): player (A) makes a forehand shot and receives four balls from player (B) during the rally. Both player C and player D perform the same drill, which involves rallying with the forehand. After completing this drill, player C and player D switch positions to perform different drills, just like players A and B. Once you've completed the task, you should continue to alternate with other players or participants in the drill. The benefit of practicing driving shots with the highest level of difficulty is the ability to identify errors, allowing faster correction of hitting mistakes and quicker mastery of driving techniques with a relatively lower level of difficulty. The inherent disadvantage of doing drive drills with the Rally Highest is that the person doing the drill may quickly experience boredom due to the repetitive nature of doing just one drive stroke. Based on this method's explanation and benefits, the researchers made an effort to improve forehand driveability using the highest rally approach.

## 2.  METHOD

This research uses an experimental approach (Haerens & Tallir, 2012; Araújo et al., 2014) that aims to determine the effect of Highest Rally Training on the ability to play

forehand drives in the squash game of students from the Physical Education, Health, and Recreation Study Program at FIK UNM. This research uses a one-group pretest-posttest design. We conducted research on the squash court at the Faculty of Sports Sciences, Makassar State University. This study included 33 male students from the Physical Education, Health, and Recreation Study Program at FIKK UNM. This research employs a random sampling technique. The SPSS application carried out a t-test analysis to answer the research's hypothesis.

## 3. RESULTS AND DISCUSSION
### Results

The normality test is one of the prerequisites for paired sample t-test analysis. The following table 1 displays the results of the normality test for pre-test and post-test data on the forehand squash driveability of students from the Physical Education, Health, and Recreation Study Program at FIK UNM.

**Table 1.** Normality Test

| FIK UNM | Data | P | A |
|---|---|---|---|
| Students' | Pre-Test | 0,138 | < 0,05 |
| Forehand | Post-Test | 0,104 | < 0,05 |
| Squash Drive | | | |
| Ability | | | |

The table of normality test results above shows that each probability value for the pre-test and post-test results of the forehand squash driveability of the students of the Physical Education, Health, and Recreation Study Program at FIK UNM is 0.138 and 0.104, respectively, or less than 0.05, indicating a normal distribution of the test results.

Following the fulfillment of the prerequisite test or normality test, we conduct a hypothesis test using paired sample t-test analysis, with the aim of determining the impact of Highest Rally training on enhancing the forehand driveability of the squash game among students in the Physical Education, Health, and Recreation Study Program at FIK UNM. The table below displays the results of the hypothesis test.

**Table 2.** Hypothesis Testing

| Pre-Test and Post-Test of FIK UNM Students' Forehand Drive Squash Ability | N | Mean | df | Sig (2-tailed) |
|---|---|---|---|---|
| | 33 | -13,879 | 32 | 0,000 |

When we applied the maximum rally exercise, we found an average difference of -13.879 between students' forehand squash driveability in the Physical Education, Health, and Physical Education Study Program and FIK UNM Recreation. This information is based on the table above, which shows that the results of the hypothesis test of 33 sample people yielded a Sig (2-tailed) value of 0.000, or <0.05.

**Discussion**

The Rally Highest exercise consists of the following steps: Player (A) makes a forehand shot and receives four balls from player (B) during the rally. Both player C and player D perform the same drill, which involves rallying with the forehand. After completing this drill, player C and player D switch positions to perform different drills, just like players A and B. Once you've completed the task, you should continue to alternate with other players or participants in the drill. The benefit of practicing driving shots with the highest level of difficulty is the ability to identify errors, allowing faster correction of hitting mistakes and quicker mastery of driving techniques with a relatively lower level of difficulty. The inherent disadvantage of performing driving drills with the highest Rally is that the repetition of just one driving stroke can quickly lead to boredom. The researchers attempted to improve forehand driveability using the highest rally approach, based on its explanation and benefits (Al-Khalaf, 2006; Lee & Lee, 2007; Williams et al., 2020).

The research results showed that the highest level of rally training had a positive impact on improving the squash forehand driveability of students at the Faculty of Sports Science, Physical Education, Health, and Recreation Study Program, Makassar State University. The difference in the pre-test and post-test scores indicates an improvement following the treatment or training method. Highest Rally Training focuses on improving your skills and proficiency in hitting the ball. This method aims to improve a squash player's ball control skills and develop his ability to identify mistakes and make immediate corrections. The Highest Rally form of forehand training is a training method that improves accuracy, footwork, and overall proficiency in executing a forehand shot.

We conducted an initial assessment (pre-test) to evaluate the forehand driveability of students in the FIK UNM physical education, health, and recreation study program before administering treatment to the sample. Next, we treated the students to the highest rally exercise, which culminated in a post-test evaluation of their forehand driveability in the squash game. The research findings showed that this exercise had a positive impact on improving forehand driveability (post-test) in the squash game of FIK UNM physical education, health, and recreation study program students. Therefore, we can conclude that high-level rally training positively impacts students' efforts to enhance their forehand drive abilities in squash. Therefore, squash coaches and lecturers should consider incorporating this drill into all student drills to enhance their proficiency in executing forehand drives.

## 4. CONCLUSION

Based on the results of the research and data analysis, it can be concluded that Highest Rally Training influences efforts to improve forehand drive abilities in the squash game of students from the Physical Education, Health, and Recreation Study Program at FIK UNM. Based on the results of the data analysis, the Sig value is known. 2-tailed is 0.000 or <0.05, with a mean value or difference between the average pre-test and post-test scores of -13.879. So, it can be concluded that there is a mean difference between the pre-test and post-test

scores, which shows that the highest rally training affects efforts to improve students' forehand driveability in squash. So, it is recommended for coaches and lecturers to consider this training method in the learning and training process for squash games.

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