



P-ISSN: 2394-1685
E-ISSN: 2394-1693
Impact Factor (RJIIF): 5.38
IJPESH 2023; 10(6): 247-249
© 2023 IJPESH
www.kheljournal.com
Received: 04-08-2023
Accepted: 05-09-2023

G Pushpa
Research Scholar, Department of
Physical Education, Bharathiar
University, Coimbatore, Tamil
Nadu, India

R Ramya
Research Scholar, Department of
Physical Education, Bharathiar
University, Coimbatore, Tamil
Nadu, India

A comparative study on endurance and agility between the inter collegiate level football and basketball players

G Pushpa and R Ramya

Abstract

The study was to find out the compare the levels of endurance and agility between intercollegiate-level football and basketball players. To achieve this objective, 30 players were randomly selected from affiliated colleges of Bharathiar University, Coimbatore, Tamil Nadu, with ages ranging from 18 to 25 years. The subjects were divided into two equal groups, consisting of 15 intercollege-level football players and 15 intercollegiate-level basketball players. Statistical analysis was conducted using an independent 't' test to determine the significance of improvements in the selected variables. The results indicate a significant enhancement in both endurance and agility.

Keywords: Football, basketball, endurance, and agility

Introduction

Endurance and agility are important physical attributes for both football and basketball players, but the specific demands of each sport can lead to variations in how these attributes are prioritized and trained. Here's how endurance and agility are related to football and basketball players

Football

In football, both endurance and agility are essential attributes. The sport demands short bursts of intense effort interspersed with periods of rest, highlighting the importance of both aerobic and anaerobic endurance. Players must maintain their performance throughout games that can last several hours, including stoppages. Endurance training for football encompasses activities such as long-distance running, interval training, and high-intensity drills. Additionally, football players must exhibit rapid changes in direction, evading defenders, and reacting swiftly to dynamic game situations, emphasizing the significance of agility. This agility is crucial for various positions, including running backs, wide receivers, defensive backs, and linemen, all of whom require quick footwork during plays

Basketball

In basketball, players need to possess both endurance and agility to excel. The game is fast-paced with frequent transitions between offense and defense, demanding robust cardiovascular endurance to maintain performance throughout. The constant movement, running up and down the court, and frequent jumping create a physically demanding environment, making endurance training crucial, which includes sprints, interval training, and extensive aerobic work. Additionally, basketball players rely on high levels of agility to excel in skills such as dribbling, cutting, pivoting, and defending. These actions depend on quick changes in direction and body control, and agility training focuses on drills that enhance lateral movement, footwork, and reaction time.

Criterion Measures

The following tests were used to measure the selected variables.

1. 12 mins/run and walk test was used to measure the endurance and score was recorded in minutes
2. Shuttle run test was used to measure the agility and score was recorded in seconds.

Corresponding Author:
G Pushpa
Research Scholar, Department of
Physical Education, Bharathiar
University, Coimbatore, Tamil
Nadu, India

Methods

To achieve the purpose of the study, 30 football and basketball players will be selected as subjects from affiliated colleges of Bharathiar University, Coimbatore, Tamil Nadu. The subjects age ranged between 18 and 25 years. The selected football and basketball players will be assessed by endurance and agility. The selected 30 subjects will be

divided into two equal groups, Group – I intercollegiate football players and Group-II intercollegiate basketball players

Statistical Analysis

The descriptive calculation and ‘t’ test will be computed. The level of significance will set at 0.05 level of confidence

Table 1: The mean standard deviation and ‘t’ ratio values on endurance of football and basketball players

Groups	Mean	Standard Deviation	‘t’ radio
Football player	2210	1.84	8.09*
Basketball player	2100	1.89	

(Significance at 0.05 level of confidence (2.02).

Table.1 showed that the mean values of football and basketball players on endurance were 2210 ± 1.84 and 2100 ± 1.89 respectively. The obtained ‘t’ ratio value of 8.09 was greater than the required table value 2.02 for significance at .05 level of confidence. The results of study showed that there was a

significant difference that exists between football and basketball players on endurance in favour of football players. The mean values of football and basketball players on endurance power were graphically represented in Figure 1.

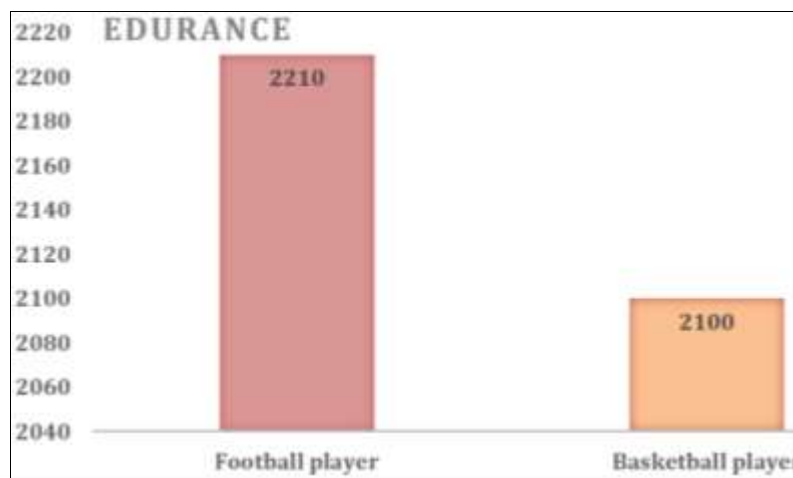


Fig 1: Graphical Represented on mean values of football and basketball on Endurance

Table 2: The mean standard deviation and ‘t’ ratio values on agility of football and basketball players

Groups	Mean	Standard Deviation	‘t’ radio
Football player	12.67	1.55	8.18*
Basketball player	12.70	1.58	

Significance at 0.05 level of confidence (2.02).

Table.2 showed that the mean values of football and

basketball players on agility were 12.67 ± 1.55 and 12.70 ± 1.58 respectively. The obtained ‘t’ ratio value of 8.18 was greater than the required table value 2.02 for significance at .05 level of confidence. The results of study showed that there was a significant difference that exists between football and basketball players on agility in favour of football players. The mean values of football and basketball players on agility were graphically represented in Figure - 2.

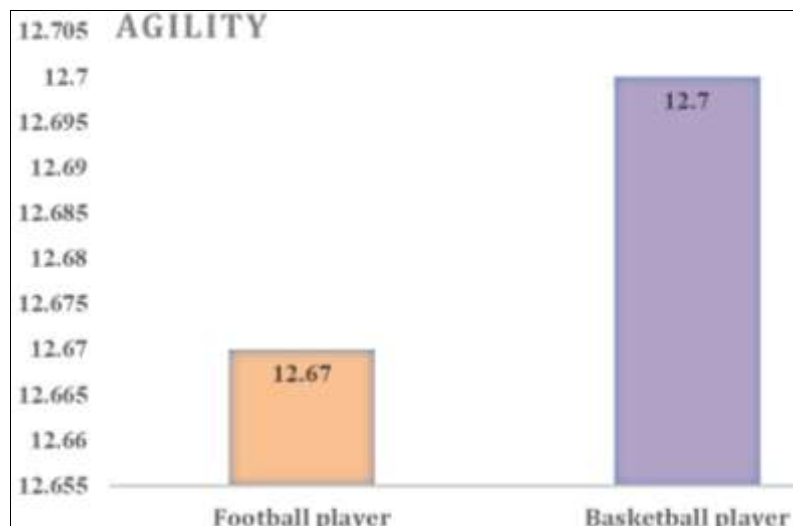


Fig 2: Graphical Represented on mean values of football and basketball on Agility

Conclusions

From the results of this study, the following conclusions.

1. It was concluded that there was significant difference between football and basketball men players on endurance.
2. Further, it was concluded that there was significant difference between football and basketball men players on Agility.

Reference

1. Chowdhury B. A Comparative Study on Motor Fitness of Varsity Level Male Athlete of Four Selected Games. *Int. J Health Phys. Educ. Comput. Sci. Sports.* 2012;9(1):18-19. ISSN 2231-3265.
2. Malakar B. A Comparison of Motor Ability among District Level Women Football, Cricket, and Kabaddi Players. *Concha J Educ.* 2014;2(4):141-151. ISSN 2347-5706.
3. Chandrasekaran A, Anbanandan A, Krishnaswamy S, Balakrishnan A. A Study of Selective Motor Fitness Components Empowers on playing ability among Low and High Performers of state Level Football Players. *Int. Multidiscip. Res. J.* 2012;2:54-60. ISSN 2231-6302.
4. Chittibabu. Effect of handball-specific repeated-sprint training on aerobic capacity of male handball player. *Int J Phys. Educ. Fitness Sports.* 2013;2(4):192-213. ISSN 2277-5447.
5. Durge R, Rajeshwar R, Lamkhede P. Effect of Break in Training on Selected Physiological Parameters and Physical Fitness Components of Trained Athletes. *Int. J Phys. Educ. Sports Yogic Sci.* 2012;1(2):78-80.
6. Singh J. Comparison of Motor Fitness Components among Different Game Players. *Int. J Mov. Educ. Sports Sci. (UMESS).* 2013;1(1):123-129. Online ISSN 2321-720.