

### International Research Journal of Education and Technology

### A Comparative Study of speed among Basket Ball and Hand Ball Players of Khammam District in Telangana State

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#### **Abstract**

The Purpose of the study to find out the Speed among Basket Ball and Hand Ball Players of Khammam District. The sample for the present study consists of 15 Basket Ball Players and 15 Hand Ball Players of Khammam District between the age group of 18 to 20 Years. 50 M Run Test were conducted to both the groups to assess the speed. This Results of the Study shows that Hand Ball Players are having better speed compare to Basket Ball Players. Speed is important for Hand Ball and Basket Ball Players for better Performance. Key words: Speed, Basket Ball, Hand Ball etc.

#### **Introduction:**

Sports play a major role in the lives of almost every individual player, coaches, officials and even spectators also. Fitness is a very important component of success in any game. The important of physical fitness for sports performance is so obvious that coaches and sportspersons give the major parts of sports training for developing physical fitness, as performance of the sportsperson in any sports activities depend on the level of physical fitness of the sportspersons. Physical fitness is the capacity to carry out reasonably well various forms of physical activities without being unduly tired and includes qualities important to the individual's health and wellbeing

Sport is true action requiring considerable psycho physical involvement, at times even almost total personal engagement or devotion. Sports as competitive games is found in almost all societies. If one accounts for rates of involvement in terms of participation in competitive sport, recreation sport, school sport, sport spectatorship and fellowship in the mass media, then sport in industrial societies has become one of the most important institutions of modern life. Sports participation builds a lot of character if handled in the right way.



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Varuna Raja Basaveswara K.S., Dr. R. Srinivasa (2019) studied to determine speed, agility, and explosive power of Basketball and Handball male university players. The intention of the research is to compare the speed, agility and explosive power of basketball and handball players of different universities, Karnataka India. For the purpose of the study thirty (72) male university players were selected randomly from three universities (Bangalore University Bengaluru, Davanagere University, Davanagerem and Gulbarga University, Kalaburgi) who had their credit in participating in South Zone Interuniversity Tournaments during the academic year 2017-18 in their respective games. The age of the subjects were ranged from 18 to 28 years. Among the selected subjects 36 subjects were Basketball players and remaining 36 were Handball players. The speed measured by 30 meters standing start in seconds; agility measured by shuttle run (10 meters x 6 Mtrs) in seconds and leg explosive power measured by standing broad jump in meters. The collected data was analyzed by using independent 't' test to find out the significant difference in the speed, agility and leg explosive power between basketball and handball players. The statistical software Statistical Package for Social Science (Version 20) was utilized for knows the significant difference between groups. The study concluded that it was found significant difference in the explosive power between basketball and handball male university players. The handball players had superior explosive power than basketball players. The result also concluded that no significant difference exists in speed and agility between basketball and handball male university players. Speed, agility and explosive power are vital to the performance of fundamental skills like throwing, kicking, jumping, striking, hopping and skipping

The demand of the physical fitness varies from sport to sport, the basketball is highly intensity sports (Paiva and Cesar, 2005), the key fitness factors for basketball game are speed of movement, endurance, and agility (Ziv and Lidor, 2009). The handball is also contact sports, it requires high power and strength to throw the ball (Gorostiaga et al., 2005). Basketball requires a player to start and stop throughout the game, forcing a player to accelerate, decelerate and change direction with equal proficiency (Rani, Singh, & Kalsi, 2013). The performances of athletes in sports today have dramatically elevated the level of agility necessary for performance success. Power is the ability to exert maximum muscular contraction instantly in an explosive burst of movements. The two components of power are strength and speed. Strength training is a fundamental element for the physical conditioning of basketball players. Its purpose is to improve explosive power and acceleration/speed around the court and to reduce the risk of joint and tendon injuries. The explosive power in basketball is manifested through different jumps, starting acceleration, sudden changes in the direction of movement, slowing down, sudden stopping and in passing the ball to each other.



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#### **Methodology:**

The sample for the present study consists of 15 Basket Ball Players and 15 Hand Ball Players of Khammam District: between the age group of 18 to 20 Years. 50 M Run Test were conducted to both the groups to assess the speed.

#### 50 Meter Run:

Sprint or speed tests can be performed over varying distances, depending on the factors being tested and the relevance to the sport.

- **purpose:** The aim of this test is to determine acceleration and speed.
- equipment required: measuring tape or marked track, stopwatch or timing gates, cone markers, flat and clear surface of at least 70 meters.
- o **procedure:** The test involves running a single maximum sprint over 50 meters, with the time recorded. A thorough warm up should be given, including some practice starts and accelerations. Start from a stationary position, with one foot in front of the other. The front foot must be on or behind the starting line. This starting position should be held for 2 seconds prior to starting, and no rocking movements are allowed. The tester should provide hints for maximizing speed (such as keeping low, driving hard with the arms and legs) and encouraged to continue running hard through the finish line.
- o **results:** Two trials are allowed, and the best time is recorded to the nearest 2 decimal places. The timing starts from the first movement (if using a stopwatch) or when the timing system is triggered, and finishes when the chest crosses the finish line and/or the finishing timing gate is triggered.



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#### **Results:**

This Results of the Study shows that Hand Ball Players are having better speed compare to Basket Ball Players. Speed is important for Hand Ball and Basket Ball Players for better Performance.

Table No.1 Showing the Performance of Basket Ball Players and Hand Ball Players in 50 M Run

Speed	N	Mean	Std.Deviation	t	Sig.
Basket Ball Players	15	8.64	0.702	1.39	0.174
Hand Ball Players	15	8.32	0.557		

The Mean Performance of Hand Ball Players is 8.32 in 50 M Run and Basket Ball Players Mean Performance of Hand Ball Players is 8.64. The Mean Performance of Hand Ball Players and better than Basket Ball Players in 50 M Run.

#### **Conclusions:**

This Results of the Study shows that Hand Ball Players are having better speed compare to Basket Ball Players. Speed is important for Hand Ball and Basket Ball Players for better Performance

#### **Recommendations:**

The present study should help physical education teachers and coaches to identify talents and to understand the physical variables most affected by the practise of these sports. More data would be helpful on the above studied variables along with physiological and physical variables to assess relationship among them and with performance in Basketball and Handball players. Similar Studies can be conducted among females and in other Sports and games. This study is useful to the Coaches to prepare the conditioning program to improve the motor abilities of the Basket Ball and Hand Ball Players.



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