COMPARISON OF HEALTH RELATED PHYSICAL FITNESS COMPONENTS BETWEEN CRICKET AND FOOTBALL PLAYERS OF DELHI

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ABSTRACT

The present study i.e. "Comparison of Health Related Physical Fitness Components between Cricket and Football player OF DELHI" was conducted on 60 male students studying in University of Delhi and subsequently those who represented the college teams in cricket and football were selected as subjects for the present study. Out of 60 subjects, 30 each player was selected from college cricket and football male teams during the year from 2010 to 2012. The subject's age was ranged from 18 to 25 years. The variables for study were Flexibility, Muscular Strength, and Agility, Endurance, and Body composition.To compare the health related physical fitness components between Cricket and Football player of Delhi't' test was used. The level of significance was set at 0.05 levels. The result showed significant differences in Muscular Strength, Agility & Endurance and insignificant differences in Flexibility & Body composition.

Key Words - Flexibility, Muscular Strength, Agility, Endurance, and Body Composition.

INTRODUCTION:

Every Nation is becoming increasingly concerned about the physical fitness of its men, women and children, recognizing that physical fitness in fundamental and contributory to happy and useful living in any capacity.

Physical fitness is a matter of fundamental importance to individual well-being and to the progress and security of a nation. It is the basis for all other forms of excellence. With increased mechanization there has been a corresponding decrease in the number of tasks that require an expenditure of energy, sufficient vigorous exercises are not done to develop and maintain equate levels of physical fitness. Many individuals must rely on attain an acceptable level of physical fitness (Robert, 1973).

The civilization of Sparta, Athens and Rome in the history of the world has stressed physical fitness or physical training as an important objective of the educational programme (Nixon and Jewett, 1969).

Physical education must recognize the basic needs of physical fitness for boys and girls under their charge and this recognition should become a determination formulate and conduct a sound and effective physical fitness programme for them (Clarke,1981).

Physical fitness is to improve the muscular performance of the human being; it can useful for optimum performance of the game in competitive situations. Physical fitness is to develop emotional stability, endurance, strength, agility, speed, flexibility and co-ordination.

Regular activity of physical exercise stimulates growth and development. Fitness improves general health and is essential for full and vigorous living. The physically fit children can to move with confidence.

Physical Fitness is the ability to meet each day demands without becoming exhausted. It is the ability to have a reservoir of endurance life' emergencies in short, "physical fitness is that condition of your body that giver buoyancy to living." (Walsh, 1966).

Health and physical fitness have remained the motto of man from ancient times. The marked deterioration in health and physical fitness of people may be due to present automation and a short of mechanized day to-day life. Because of very limited movements caused by scientific and acute stress and strain has caused considerable damage to the health of the people by and large.

A physically fit man will live a long and rich life. His entire success in life depends on his physical fitness. A physically fit man not only lives for himself but also for others. The society and the nation particularly in a developing country like ours, the need for physically fit person is very great. "Since the days of early Greeks, physical fitness has important objective of physical education. Infect the desire to establish a scientific approach to the development of physical fitness was the primary reason for meeting of physical education in 1985 that resulted in the birth of as profession." (Nixon, Eugne and Cadezens, 1956).

According to Bucher (1986) "Health related physical fitness is to measure physical fitness offering the positive health care, cardio vascular respiratory function, body skeletal functions.

According to Rash (1986) "Health related physical fitness consist of cardio-vascular function, body composition, strength and flexibility"

Hence, the scholar has conceptualized the study as entitle "Comparison of Health Related Physical Fitness Components Between Cricket and Football Players of Delhi".

MATERIAL AND METHODS:

The present study i.e. "Comparison of Health Related Physical Fitness Components between Cricket and Football player of Delhi was conducted on 60 male students studying in University of Delhi and subsequently those who represented the college teams in cricket and football were selected as subjects for the present study. Out of 60 subjects, 30 each player was selected from college cricket and football male teams during the year from 2010 to 2012. The subject's age was ranged from 18 to 25 years.

Variable

Following Physiological variable were selected

1. Flexibility: - Sit and reach test was used and it was recorded in cm.
2. Muscular Strength: - Muscular strength was measured with the help of sit ups and the number of sit ups in one minute was taken as the score.
3. Agility: - Agility was measured by using 4 x 10 m shuttle run. The score was recorded to the nearest tenth of a second.
4. Endurance: - Cardio vascular endurance was measured by the 600m run/walk and the score was recorded to the nearest one tenth of a second.
5. Body Composition was measured by test for Fat percentage.

Statistical Analysis

To compare the health related physical fitness components between Cricket and Football player of Delhi't' test was used. The level of significance was set at 0.05 levels.

RESULTS AND DISCUSSION:

Table-1 Mean Comparison of Flexibility between the Cricket and Football player of Delhi

	Cricket players	Football player	"t" ratio
Mean	11.0600	11.1930	.262
SD	2.2097	2.1801	

Significant t 0.05 (58) = 2.021

It is evident from the table -1 that insignificant differences was found in muscular strength between the Cricket and Football player of Delhi as the calculated value *of* 't' value .262 was less than tabulated 't' value 2.021 at 0.05 level and required to be insignificant.

Table-2 Mean Comparison of Muscular Strength between the Cricket and Football player of Delhi

	Cricket players	Football player	"t" ratio
Mean	40.7333	45.4333	2.885
SD	6.9477	7.4726	

Significant t 0.05 (58) = 2.021

The table-2 reveals that significant differences was found in muscular strength between the Cricket and Football player of Delhi, as the calculated value *of 't'*= 2.885 *was greater* than the tabulated $t_{.05}$ (58) = 2.021. at 0.05 levels of significant and required to be significant.

Table-3Mean Comparison of Agility between Cricket and Football player of Delhi

	Cricket players	Football player	"t" ratio
Mean	11.0660	10.4163	-
SD	.67053	.95354	2.880

Significant t 0.05 (58) = 2.021

The table-3 reveals that significant differences was found in Agility between the Cricket and Football player of Delhi, as the calculated value *of 't'*=2.880 *was greater* than the tabulated $t_{.05}$ (58) = 2.021.

Table-4 Mean Comparison of Endurance between the Cricket and Football player of Delhi

	Cricket players	Football player	"t" ratio
Mean	95.7133	98.6133	3.338
SD	3.8941	4.9839	

Significant t 0.05 (58) = 2.021

The table-4 reveals that significant differences was found in Endurance between the Cricket and Football player of Delhi, as the calculated value *of 't'*= 3.338 *was greater* than the tabulated $t_{.05}$ (58) = 2.021.

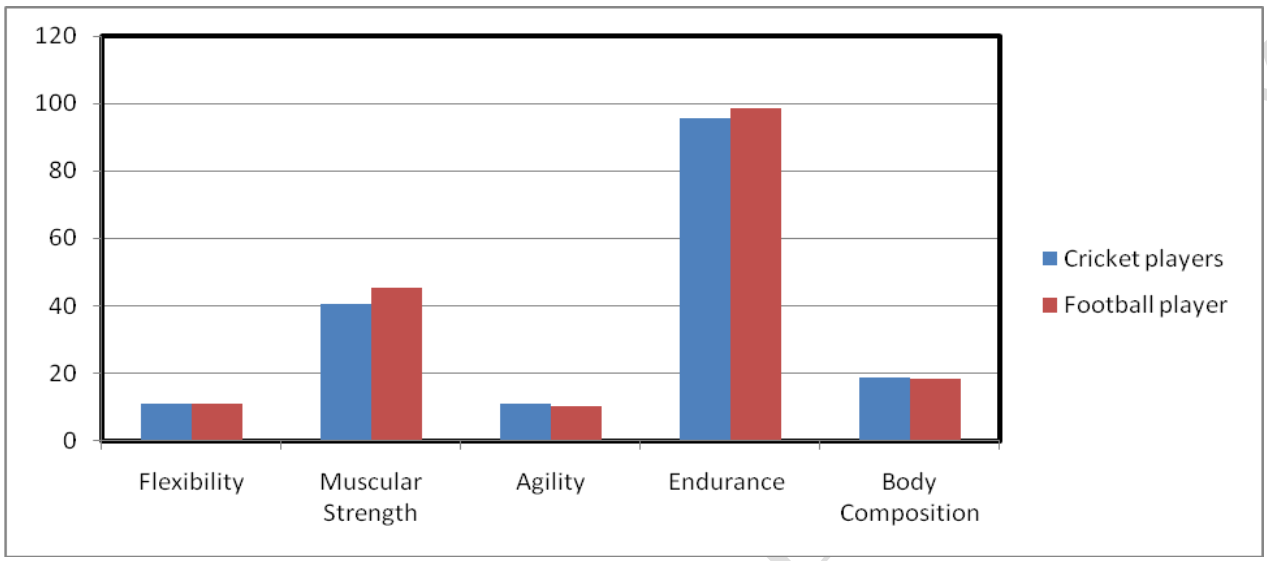
Table-5 Mean Comparison of Body Composition between the Cricket and Football player of Delhi

	Cricket players	Football player	"t" ratio
Mean	18.7800	18.5293	.815
SD	2.3327	2.2373	

Significant t 0.05 (58) = 2.021

The table-5 reveals that insignificant differences was found in Body Composition between the Cricket and Football player of Delhi, as the calculated value *of 't'*= .815 *was less* than the tabulated $t_{.05}$ (58) = 2.021.

Fig. 1: Graphical Representation of Flexibility, Muscular Strength, Agility, Endurance, and Body composition of Cricket and Football player of Delhi.



CONCLUSION:

On the basis of results and within the limitations of the study, the following conclusions were drawn:-

1. Football player have more Agility than the Cricket player.
2. Football player have more Muscular Strength than the Cricket player.
3. Football player have more Endurance than the Cricket player.
4. Cricket and Football player were similar in Flexibility and Fat Percentage.

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