

Available online at www.starresearchjournal.com (Star International Journal)

## PHYSICAL EDUCATION

**UGC Journal No: 63023** 



ISSN: 2321-676X

# EFFECT OF PHYSICAL EXERCISES ON FLEXIBILITY AMONG COLLEGE STUDENTS

#### Dr.K.RAJENDRAN

Assistant Professor, Department of physical Education and Sports Sciences, Annamalai University, Chidambaram, Tamilnadu, India.

#### **Abstract**

The purpose of the study was to find out the effect of physical exercise on flexibility among college students. To achieve this purpose of the study, thirty students from the Department of Physical Education and Sports Sciences, Annamalai University, Annamalai Nagar, Chidambaram, Tamil Nadu, and India were selected as subjects at random. The selected subjects were divided into two equal groups of fifteen subjects each, such as experimental group and control group. The group I underwent physical exercises for three days per week for twelve weeks. Group II acted as control who did not participate any special training. The analysis of covariance was used to analyze the significant difference, if any between the groups. The level of significance to test the 'F' ratio obtained by the Analysis of Covariance was tested .05 level of confidence, which was considered as an appropriate. It was concluded that the experimental group produced significant improvement on flexibility than the control group.

Keywords: Physical Exercises, Flexibility, College Students.

#### INTRODUCTION

Sports is carrying away from work, suggesting an absolute freedom of activity. The major aim of sports is recreation. Having become highly competitive, sports today are seen in a much broader perspective than ever before. Sport, in fact, is an attitude of mind. For most people, sports are recreation, for the 'genetically endowed' ones it is competition - the means to excel and achieve high standards in performance. Sports are largely individual events such as athletics, archery, swimming, shooting etc. wherein the participant tries to compete against his own previous standards as well as those of others. Today, sports are highly organized. They are institutionalized. Rules of organization and competition are well-defined for each sport discipline. With research and scientific inputs, there is constant effort by athletes to improve standard in performance and achieve perfection in skill. Several sports have carry-over value. They can be played even in old age depending upon the physical condition of the person.

Learning even though a narrow objective of education is an obsession with the common man. This gross misconception is the very root of gap between education and physical education. Education may mean different things to different people but the essence of all definitions of education is that it should afford equal opportunities to all for optimal development of their potential. It should draw out the best in child. This broad

view of education takes cognizance of all factors and forces that contribute to the harmonious development of human personality. The development of brains without corresponding development of the brawn is not conducive to human productivity and efficiency. It simply reflects lop-sided development. Therefore, the importance of physical education as a core of education effort must be recognized.

## METHODOLOGY

The purpose of the study was to find out the effect of physical exercise on flexibility among college students. To achieve this purpose of the study, thirty students from the Department of Physical Education and Sports Sciences, Annamalai University, Annamalai Nagar, Chidambaram, Tamil Nadu, and India were selected as subjects at random. The selected subjects were divided into two equal groups of fifteen subjects each, such as experimental group and control group. The group I underwent physical exercises for three days per week for twelve weeks. Group II acted as control who did not participate any special training. The analysis of covariance was used to analyze the significant difference, if any between the groups. The level of significance to test the 'F' ratio obtained by the Analysis of Covariance was tested .05 level of confidence, which was considered as an appropriate.

ISSN: 2321-676X

TABLE – I
COMPUTATION OF MEAN AND ANALYSIS OF COVARIANCE ON FLEXIBILITY OF EXPERIMENT AND
CONTROL GROUPS

	Experiment Group	Control Group	Sum of variance	Sum of squares	df	Mean square	F
Pre test mean	22.87	23.53	BG	3.33	1	3.33	1.27
			WG	73.47	28	2.62	
Post test mean	25.87	24.27	BG	19.20	1	19.20	7.40*
			WG	72.47	28	2.60	
Adjusted Post test mean	24.02	26.11	BG	31.23	1	31.23	25.13*
			WG	33.56	27	1.24	

<sup>\*</sup> Significant at 0.05 level

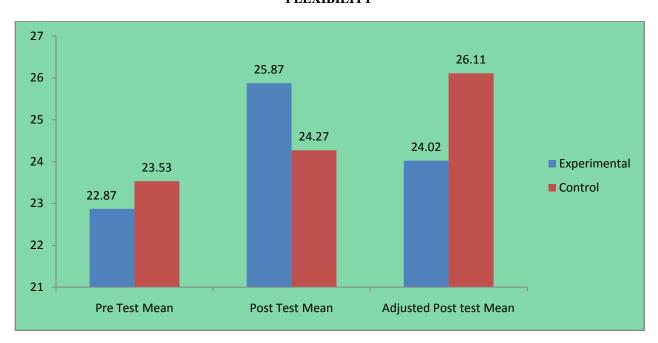
Table value for df 1 and 28 was 4.20

Table value for df 1 and 27 was 4.21

The above table indicates the adjusted mean value of flexibility of experimental and control groups were 24.02 and 26.11 respectively. The obtained F-ratio of 25.13 for adjusted mean was greater than the table value 4.21 for the degrees of freedom 1 and 27 required for significance at 0.05 level of confidence. The result of the study indicates that there was a significant difference

among experimental and control groups on flexibility. The above table also indicates that both pre and post test means of experimental and control groups differ significantly. The pre and post mean values of flexibility of both experimental and control groups are graphically represented in the Figure-I.

FIGURE I FLEXIBILITY



### **CONCLUSION**

It was concluded that the experimental group produced significant improvement on flexibility than the control group.

#### REFERENCES

- 1. Harold,M,B., and Rose M, M.(1989) *A practical measurement in physical education*: Lea and Philadelphia. P.103.
- 2. Majumdar, P. (2002). *Physiology of Sports and Exercise*, New Central Book Agency: India. P.43.
- 3. McPortlin, C.A. Fitness for Sports, (London:G.Bell and Sons Ltd., 1957) p.10.

4. Johnson S.M., and Stalberg D.C., Sports, Exercise and You, (New York: Halt Rinchart and Winston, 1975), p. 10.

ISSN: 2321-676X

- 5. Geleman or Criffith, Psychology and Athletics (New York: Chales Senine sons, 1928) p.56.
- 6. Hardayal Singh "Sports Training "General Theory and Methods (Patials: NIS Publications, 1984) p.148.
- 7. Harrison H. Clarke and David H. Clarke Development and Adapted Physical Education (Englewood Cliffs, N.J: Prentice Hall, Inc. 1972), 184.
- 8. Harrison H. Clarke, Application of Measurement in Health and Physical Education (Englewood Cliffs, N.J. Prentice Hall, Inc., 1963) p.14.