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Effect of aerobic dance on agility of men kabaddi players

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Abstract

The purpose of the present investigation was to find out the effect of aerobic dance on agility. To achieve this purpose, thirty male Kabaddi players were selected randomly as subjects. They were assigned randomly into experimental and control groups on fifteen each. Group I underwent aerobic training and group II acted as control. All the subjects of two groups were tested on agility. Analysis of covariance was used to determine the significantly difference existing between pre test and post test on agility. The result of the study proved that due to the effect of aerobic training improved agility of the experimental groups.

Keywords: aerobic dance, agility, kabaddi players

Introduction

The word aerobic literally means "with oxygen" or "in the presence of oxygen." Aerobic activity trains the heart, lungs and cardiovascular system to process and deliver oxygen more quickly and efficiently to every part of the body. As the heart muscle becomes stronger and more efficient, a larger amount of blood can be pumped with each heartbeat. As a result, a fit individual can work longer, more vigorously and achieve a quicker recovery at the end of the aerobic session.

"Aerobic dance is a fun way to get fit. It combines fat-burning and stretching into routines that are performed to music" (Aerobic Dance, 1997, Online). It is usually offered at three intensity levels: low, intermediate and high. Low impact is usually for beginners. It is performed at a lower intensity and at a slower pace. At the intermediate-level dancers start to receive the benefits of dance aerobics. Their lungs and heart become stronger and more efficient. At the high-level intensity dancers work extremely hard and this also helps the heart and lungs become for efficient and stronger.

Methodology

Subjects and Variables

The purpose of the study was to find out the effects of aerobic dance training on agility of men Kabaddi players. To achieve the purpose of the study thirty male students, from Annamalai University were selected as subjects. The age, height and weight of the subjects ranged from 18 to 23 years, 162 to 175 centimeters and 50 to 65 kg respectively. They were assigned randomly into experimental and control groups on fifteen each. Group I underwent aerobic dance and group II acted as control. All the subjects of two groups were tested on agility. Analysis of covariance was used to determine the significantly difference existing between pre-test and post-test on agility. Agility was measured by shuttle run test.

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Table 1: analysis of covariance on agility of experimental and control groups

	Experimental Group	Control Group	S o V	Sum of Squares	df	Mean squares	F'' ratio
Pre-Test	19.43	19.29	B	0.14	1	0.14	0.15
Mean SD	1.20	0.69	W	27.01		28 0.96	
Post-test Mean SD	24.14	19.58	B	3.45	1	3.45	4.66*
	0.87	0.84	W	30.77	28	0.74	
Adjusted Post Test Mean	21.12	19.61		3.73	1	3.73	5.48*
				3.34	27	0.68	

(The required table value for significance at 0.05 level of confidence with degrees of Freedom 1 and 27 is 4.21 and degree of freedom 1 and 28 is 4.20.)

*Significant at .05 level of confidence.

Table –I shows that the pre-test means and standard deviation on agility of experimental group and control groups are 19.43 + 1.20 and 19.29 + 0.69 respectively. The obtained 'F' ratio value of 0.15 was lesser than the required table value of 4.20 for the degrees of freedom 1 and 28 at 0.05 level of confidence, which proves that the random assignment of the subjects were successful as the pre test scores on agility. The post-test means and standard deviation on agility of experimental and control groups are 24.14 + 0.87 and 19.58 + 0.84 respectively.

The obtained 'F' ratio value of 4.66 was higher than the required table value of 4.20 for the degrees of freedom 1 and 28 at 0.05 level of confidence. It implies that there is a significant difference existed between the groups during the post test period on agility. The adjusted post-test means on agility of experimental and control groups are 21.12 and 19.61 respectively. The obtained 'F' ratio value of 5.48 was higher than the required table value of 4.21 for the degrees of freedom 1 and 27 at 0.05 level of confidence. Hence, it concluded that due to the effect of six weeks of aerobic dance training the agility of the subjects was significantly improved.

Conclusion

It concluded that due to the effect of six weeks of aerobic dance training the agility of the subjects was significantly improved.

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