



# THE EFFECT OF AEROBIC TRAINING ENHANCING MINDFUL ATTENTION AMONG STUDENT TEACHERS

**Dr. S. VELVIZHI**

Director of Physical Education  
Sri Sarada College of Education  
Salem - 16

## *Abstract*

*The purpose of this research was to investigate the effect of sixteen weeks Aerobic training on Mindful attention among student teachers. In this experimental study, demographic questionnaire, Mindful Attention Awareness Scale(MAAS) for this study were used. Sixty Sarada college of education student teachers (women) were chosen with randomized way allocated into an experimental and a control group. The experimental group participated in daily Aerobic training for 30 minutes duration for Sixteen weeks. Both groups were assessed again after the sixteen weeks study period. The data were analyzed using descriptive Mean, SD and independent t-test in statically methods. Result exposed significant increase in Mindful attention.*

*Keywords : Aerobics, Mindful attention, Student teachers.*

## INTRODUCTION

Physical activity is a broad term that applies to any bodily movement produced by skeletal muscles that require energy spending. Aerobic exercise is a specific subdivision of physical activity that is characterized by rhythmic, sustained movement of large muscle groups, and which is primarily dependent on energy-producing processes that occur through oxygen metabolism. The primary goal of aerobic exercise is to improve or maintain cardiorespiratory fitness, which is the capacity of the circulatory and respiratory system to supply oxygen during sustained exercise.

Aerobic exercise can be implicated in improvement in cardiorespiratory fitness, which in turn is associated with widespread physiological effects that enhance cardiovascular health. For example, this includes improved glucose tolerance, reduced low-grade chronic inflammation, and a lower prevalence of hypertension]. With respect to psychosocial stress, it has been hypothesized that the salutary mental health outcomes that arise following exercise training may be related to exercise-associated adaptations to stress-responsive systems]. This includes a reduction in

reactivity of cardiovascular, metabolic, autonomic, and neuroendocrine systems in response to exercise stress, which carry over to a reduction in reactivity in response to psychosocial stressors. Consequently, cardiorespiratory fitness may be an important mediator of improvements in mental health outcomes observed following regular aerobic exercise.

Mindfulness is a mental practice that encourages contemplative traditions and evidence-based research, and which has been adopted as a therapeutic approach to enhance mental and physical health. In a clinical and research context, mindfulness has been described as a non-condemnatory, non-reactive, and non-elaborative attention to the present moment experience, and is an inborn capacity that can be reinforced through formal meditation and informal practice.

Aside from mindful exercises, some researchers have raised the question whether involvement in regular physical activity per se (i.e., without explicit instructions to direct attention in a specific way to body and movements, e.g., aerobic exercise) has the potential to increase dispositional mindfulness (e.g., Kee & Wang, 2008; Salmon, Hanneman, & Harwood, 2010; Ulmer, Stetson, & Salmon, 2010). Indeed, aerobic exercises such as swimming, cycling, or jogging share a variety of characteristics with many mindful exercises.

Regular aerobic exercise increases mindfulness. Both types of exercise contain predictive breathing and movement patterns, are repetitive in nature, and are often characterized by an absence of competition. However, they differ from each other, because aerobic exercises are not performed with a deliberate nonjudgmental attention to body and mind (Berger & Owen, 1988; Netz & Lidor, 2003). Nevertheless, several researchers have suggested that aerobic exercise affects dispositional mindfulness, potentially through inherent body- and mind-related experiences associated with exercising or via an improved capacity to self-regulate attention. For instance, Kee and Wang (2008) suggested that involvement in physical exercise may lead to increased mindfulness through the opportunities it fosters for moment-to-moment attention. Likewise, another study contended that long-distance running, similarly to meditation practice, promotes “sustained, essentially nonjudgmental attention that can be directed at will toward a wide range of internal and external experiential cues” (Salmon et al., 2010, p. 150). However, compared with the relatively large body of research showing increases in mindfulness following mindful exercises (Brisbon & Lowery, 2011; Caldwell et al., 2011; Caldwell et al., 2010), there is very little empirical research examining the potentially positive effects of regular aerobic exercise on dispositional mindfulness.

## METHODOLOGY

The purpose of the study was to investigate the effect of Aerobic training enhancing Mindful Attention among Student teachers. To achieve the purpose of these study Sixty student teachers were randomly selected in Sri Sarada College of Education, Tamil Nādu, India and their age ranged between 21 to 25 years.

For the tests randomized group design which consists of control group and experimental group were used. The subjects were randomly assigned to two equal groups of Thirty each and named as Group 'A' and Group 'B'. Group 'A' undertook Aerobic training for thirty minutes once a day for sixteen weeks and Group 'B' undertook not any practice, and they had their routine life. Mindful Attention Awareness Scale(MAAS), measure widely used in social-science research.

The data was collected. Before and after sixteen weeks of training paired 't' ratio was computed. The level of significance was set at 0.01.

## RESULT & DISCUSSION

The primary objective of the paired 't' ratio was to describe the differences between the Control group and Experimental Group mean among Student Teachers (Women)

**TABLE – I**

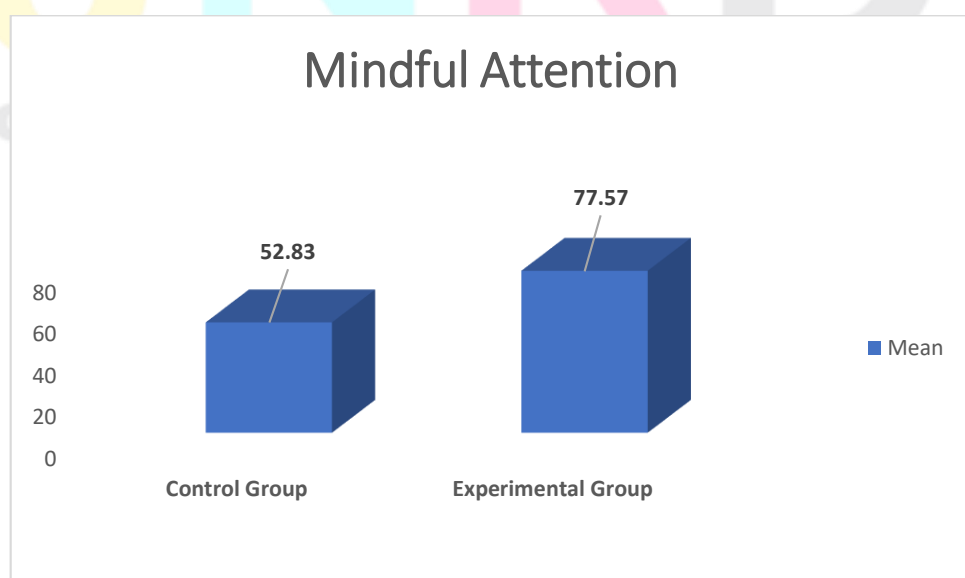
**SHOWING MEAN DIFFERENCE OF CONTROL AND EXPERIMENT GROUP AMONG STUDENT TEACHERS IN THEIR AEROBIC TRAINING OF MINDFUL ATTENTION**

Mindful Attention	N	Mean	SD	t- value	Significant/NS Level
Control Group	30	52.83	11.53	8.26	0.01
Experimental Group	30	77.57	10.15		

Required table value: 2.58 (0.01)

It is obvious fact from table that Aerobic training has significant effect enhances Mindful attention level between control group and experimental group. As the mean value of control group is 52.83 and experimental group is 77.57 An examination of table indicates that the obtained 't' ratio was 8.26 for mindful attention respectively. The obtained 't' ratio was found to be greater than the required table value of 2.58 at 0.01 level of significance for 1, 29 degrees of freedom. Hence it was found to be significant.

The results have better concentration and focus and better our overall cognition. Aerobic training that stimulates the brain and nervous system to improve mindful attention and concentration. Spine lengthening postures, the forward, and back bending poses, activate the spinal column and stimulate the nervous system. Inverted postures nourish the brain by increasing circulation of blood and oxygen. The brain plays a phenomenal role in carrying out daily tasks. Its ability to respond, comprehend, perceive and function well is related to the health of the brain.



## Conclusion

Aerobic training has prominent role in knowledge due to its changeable ability and its capability to making relationship among student teachers. Aerobic training is all powerful tools that stimulate the brain and improve the power of the mind. Efficient practice is improvement will be minimal without informative feedback regarding performance during practice. It is sufficient for student teachers to simply practice and wish to gain skills rapidly. Similarly, continuous repetition of an activity will lead to improve the performance. Aerobic training can boost the functioning of the anterior cingulate cortex, a brain region that has been linked to improved self-regulation of attention.

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