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# IMPACT OF YOGA ON MENTAL AND PHYSICAL HEALTH Dr. Harender Singh<sup>1</sup>

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# **ABSTRACT**

Yoga is a way of better living. It ensures great efficiency in work and a better control over mind and emotions. Through Yoga one can achieve both physical and Mental health. Health is the greatest blessing to us by GOD. Health is not just the absence of disease. To enable the individuals to lead a life of complete physical, mental and social well-being and not merely the absence of disease. Yoga and Physical education may provide the right direction and needed actions to improve our physical & Mental Health. Educate and schools are looking to include yoga as a cost effective, evidence based component of urgently needed wellness programs for their students. Lastly we can say that yoga is basically the most important ancient art that aims towards the building up of a healthy mind in a healthy body.

Key words: Yoga, Health, Fitness, Psychology Factors, Physical Education, Sports

#### **1. INTRODUCTION**

The word 'Yoga' is derived from the Sanskrit root 'Yuj', meaning 'to join' or 'to yoke' or 'to unite'. As per Yogic scriptures the practice of Yoga leads to the union of individual consciousness with that of the Universal Consciousness, indicating a perfect harmony between the mind and body, Man & Nature (Basavaraddi (2015)).

Yoga, originating from India, is an ancient contemplative practice dating back over 3,500 years, which aims at one thing to alleviate suffering and promote optional physical and mental thriving. In Western contemporary settings, yoga tends to be synonymous with yoga postures, breathing, and some, mediation practices. Historically, however, the practice of yoga was understood to be much broader and more comprehensive, including wider range of techniques to promote well being and balance among mind brain body functions, intellectual discernment, and mediation, and each offered practices to mitigate suffering and produce higher levels of consciousness (Basavaraddi (2015)). There are many components of yoga that have developed historically. We are giving some of then as following :

# **1.1 Postures**

Yoga Sutras in Patanjali, the limb of asana is defined as steady and comfortable posture. Physically challenging postures are further described to be sustained through the fluctuations of the mind. Postures are one of the most commonly utilized Yoga practices in modern interpretations. Historically, postures were used to physically control the body in preparation for controlling the mind in meditation for emended periods of time. A common premise behind modern yoga classes is that practicing various postures any help to reduce physical and emotional stress. A physical yoga class will include a series of postures regarding different part of the body. for example a class sight include forward and backward bends, twists, seeding papers, and balancing poses. Modern and historic yoga practice manuals often suggest a attractions between emotional states, physical health, and posture. Although this link has not scientifically been established yet for any particular poses specifically, there is evidence linking posture, emotion, and mental health.

#### **1.2 Breath Regulation**

Pranayma is the fourth of the eight limbs of Yoga and has a deeply settling influence on the mind helping the subject be in the present, i.e., "mindful". It is, therefore, widely employed as a preparation for mediation. The Sanskrit word pranayama is composed of the word prana, which translates to breath as a life-sustaining force, and the word ayama which translates to freedom or release.

Pranayamas are a series of specific techniques to control the breath in order to allow the breath and life force to flow freely. Traditionally, two benefits of pranayama are described to help the practitioner down-regulate arousal and increase awareness of the interaction between the body and the mind. Similar to asana as preparation of the body for meditation pranayama is meant to prepare the mind for meditation. Pranayamas differ from normal breathing on a number of dimensions, including the duration of the in breath, the out breath, the holding of the breath, and the ratio of these.

All pranayamas involve diaphragmatic breathing, mostly deep and slow in quality through the nose. Popular pranayama techniques include deep, even, three-part inhales and exhales, alternate nostril breathing, forceful expulsion of breath using the diaphragm and abdominal muscles, and slow diaphragmatic breathing with partial closure of the glottis creating an audible sound of rushing air described "like an ocean". Its settling influence has been confirmed by such observations as test anxiety reduction, improved test performance and

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perceived stress reduction and improvement in cardiovascular parameters. It also reduce aggression. These results suggest that application of pranayama methods to decrease effects of stress in society might prove valuable. Teaching them in schools would make a highly beneficial life-long skill available just as mindfulness-based interventions are seen as achieving. Hence, so many studies, have been published on various pranayama programms that its effects may be considered quite well standardized. It can be used as a comparison for another method requiring assessment for comparative effects. In this context, pranayama represents a recognized way of managing mild levels of stress, and so improving emotion regulation and decreasing tendencies to aggression. In particular, pranayama practice usually involves focusing on the breathing process bringing the mind to the present moment. Improving that ability will clearly be of value when taking tests and exams.

The pranamaya doing people improved more in mindfulness than the people which are not doing and alone decreased highly significantly in aggression and significantly on negative emotion regulation. Several studies have reported increases in emotional regulation resulting from mindfulness training. For one group to both increase in a measure of mindfulness and decrease in aggression and negative emotion is consistent with these results. In support of this, Yoga, including nadishodana pranayama has been found to be very effective in changing the levels of key endocrine molecules associated with stress such as epinephrine and nor epinephrine. For more details one can see (2, 3) and references therein.

# 2.YOGA AND MENTAL HEALTH

Yoga is an ancient yet contemporary practice with growing popularity among all ages, and it focuses on the mind, body and spirit. Yoga can improve students' balance, strength and flexibility, which are important for child motor development as well as general fitness. Whether used as a physical activity break or a project portion of a module, practicing yoga to promote math literacy can provide an outlet for developing health related fitness components such as flexibility, muscular endurance, muscular strength and cardio respiratory endurance, while uniting the mind, body and soul. Using yoga as a way to promote interdisciplinary lessons that can improve student's understanding of math concepts, as well as their achievement of lifelong physical activity. Students can benefit from the enjoyment of yoga and from participating in yoga with friends and family outside of physical education.

Pilkington, et.al.(2005) & Uebelacker, et.al.(2010) found four relevant publications, including two reviews on the effects of yoga on depression. Pilkington, et.al.,2005 & Uebelacker, et.al.(2010) studied on yogic breathing. Brown and Gerbarg, (2005) for depression, and for depressive and anxiety disorders.( Saeed. Antonacci, and Bloch, 2010). yoga was no better than Mindfulness-based Stress Reduction atreducing anxiety in patients with cardiovascular diseases. (Ospina,Bond, and Karkhaneh et al.,2007). yoga may reduce perceived stress as effective as other active control interventions such as relaxation, cognitive behavioural therapy, or dance (Chong, et.al., 2011)

Pilkington, et.al. (2005) indicated the results on mathematics anxiety through Super Brain Yoga. In this technique Alpha waves in the brain and Synchronization of left and right brain hemispheres are heightened. It is a Alpha waves in the brain indicates that the body has brain hemispheres integrates the brain. Students having integrated brain are efficient in solving Mathematical problems by using resources or both left and right hemisphere (Taneja, 2014). Ussing, et.al. (2012) indicated beneficial effects of yoga for pain-associated disability and mental health. Yoga may well be effective as a supportive adjunct to mitigate some medical conditions, but not yet a proven stand-alone, curative treatment.

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# **3. YOGA AND PHYSICAL HEALTH :**

**Roland, Jakobi, and Jones, (2011)** evaluated whether yoga can engender fitness in older adults Ten studies with 544 participants were included; 5 of these studies were RCTs, and 5 studies had a single-arm pre/post-design. With respect to physical fitness and function, the studies reported moderate effect sizes for gait, balance, body flexibility, body strength, and weight loss. A reduction of systolic and/or diastolic pressure. However, there were several noted potential biases in the studies reviewed (i.e., confounding by lifestyle or other factors) and limitations in several of the studies which makes it "difficult\ to detect an effect specific to yoga (Innes, Bourguignon, and Taylor, 2005). The practice of yoga may be associate with improvement in cardio respiratory fitness. A study of evaluated heart rate for standing yoga postures found love heart rates and higher rates of perceived exertion for the yoga postures, as compared to treadmill walking (Uebelacker, 2010).

Mental stress, diabetes, hypertension, and cardiovascular disease are fast growing epidemics consequent to changing lifestyles accompanying globalization and modernization. In the past few decades it has been the subject of research as a therapeutic measure as mental stress, obesity, diabetes, hypertension, coronary heart disease, and chronic obstructive pulmonary disease. Overweight and obesity are strong risk factors for diabetes hypertension, and ischemic heart disease. Yoga has been found to be helpful in the management of obesity. Training of yoga asnas and pranayama for three continuous months, one hour every day in the morning by a yoga expert resulted in decrease in body weight, body mass index (BMI), and waist hip ratio.

The practice of yoga asanas and pranayama helps in control of type II diabetes mellitus and can serve as an adjunct to medical therapy. Training of yoga asanas and pranayana for three continuous months, one hour every day in the morning by a yoga expert resulted in decrease in fasting as well as postprandial blood glucose levels and acetylated hemoglobin.

In another study from India, yoga asanas and pranayama after 40 days of practice brought down fasting as well as postprandial blood glucose levels and acetylated hemoglobin in patients of non-insulin-dependent diabetes mellitus. They developed a sense of well-being within 10 days and there was a lowering of anti-diabetic drugs.

Patients with angiographically proven coronary artery disease who practiced yoga exercise for a period of 1 year showed a decrease in the number of anginal episode per week, improved exercise capacity, and decrease in body weight. Reveascularization procedures were required less frequently in the yoga group (Uebelacker, 2010).

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