

ORIGINAL RESEARCH PAPER

EXPLORING THE INFLUENCE OF CHAKRA MEDITATION AND SEED MANTRA CHANTING ON SACRAL CHAKRA AND SOLAR PLEXUS CHAKRA RELATED BEHAVIORS IN YOUNG ADULTS

YOGA

KEY WORDS: Sacral Chakra, Solar Plexus Chakra, Mediation, Mantra Chanting & Chakra Related Behavior.

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TO A GTP

The Sanskrit word "Chakra" is cited in the ancient Hindu texts (Vedas: a series of hymns). These chakras are the energy centers in the subtle human body along with spine. Objectives: The present study inquired the impact of Sacral Chakra and Solar Plexus Chakra meditation, subsuming seed (beej) mantras with specified frequencies (417 Hz for Sacral and 528 Hz for Solar Plexus), on the behavioural exhibition associated with these energy centers in young adults. Methodology: A 12 weeks intervention program involving meditation (6 days per week) was scheduled for the experimental group (40 undergraduate students: age 23.09±1.3 years). And a control group (n=40) remained without mediation. A pre-designed questionnaire assessed Sacral Chakra and Solar Plexus Chakra-related behaviors at baseline, mid-intervention, and post-intervention in both groups. Results: Statistical examination revealed a significant improvement in Sacral Chakra and Solar Plexus Chakra-related behaviours in the experimental group. In contrast, no significant change was observed in the control group. Conclusion: The findings of the study propose a prospective positive impact of Sacral and Solar Plexus Chakra meditation incorporating beej (seed) mantra chanting on the behavioural correlates of the energy centres among young adults.

INTRODUCTION

Meditation is a perspective of attaining tunefulness and balance between physical and mental potentialities of human being [3]. It is a technique of mental manipulation of thoughts with a concentrated state of mind and a self awareness. It helps in achieving a state of consciousness with emotional tranquility and mental clearance [22]. The system of human body chakras is documented in the Vedas (ancient Indian texts). In various spiritual and metaphysical traditions such as Yoga, Tantra, and Ayurveda originating in ancient India about 1500 and 500 BC. Chakras are described as spinning wheels or energy centers located along the subtle body or energy pathways in the human body. These energy centers are believed to correspond to specific physical, emotional, and spiritual aspects of an individual's being [6]. The concept of seven major chakras is indeed widely recognized in various spiritual and esoteric traditions, including some Western schools of thought $^{[2,7]}$.

There are numerous points of view for the interpretation of human body chakras; the scientific, spiritual, religious, mythical, physical, behavioral, psychological, psychic, symbolic, etc. [23]. But the community of scientists and philosophers find it extremely difficult to accept and explain the existence of the chakras in human body [24]. These chakras are associated with certain type of human behavior; Root chakra for survival instinct, security, vitality, stability, individuality and courage. Sacral chakra is associated with our emotions of desires, creation, procreation and socialization. Solar Plexus Chakra gives us the sense of "belonging." It grounds us firmly in life and governs our confidence, our personal power, and all matters of growth. The function of Heart Chakra is love and compassion. It allows us joyous acceptance in life. Throat Chakra relates to communication and creativity. It helps us make sense of our thoughts and the world around us. Third-Eye Chakra is responsible for perception, imagination, decision making, wisdom and intuition. Crown Chakra is related to universal energy, enlightenment, bliss and spirituality [37].

The Sacral chakra is also known as the Spleen and navel centre, Adhishthana, Bhima, Shatpatra, Skaddala, Padma, Wari-Chakra and Medhra ^[18]. In Sanskrit, the word "Swa" means 'one's own' and "Aadhisthana" means 'dwelling place or residence'.

Therefore, swadhisthana means 'one's own abode' $^{[28, 10]}$. It is located at the base of the spinal column, at the level of the coccyx and is physiologically related to the utero-vaginal plexus of nerves $^{[28]}$. The element of this chakra is Water and is associated with sexual energy (not with sex organs), having six lotus petals with saffron or orange color $^{[17,18,33]}$.

The Solar Plexus or Manipura in Hindi is derived from two Sanskrit words: "Mani" means "Jewel" and "Pura" means "City". Therefore, literally means "city of jewels" [28]. It is located at the navel region [28, 19, 11] hence called nabhi, nabhipadma, nabhipankaja, manipuraka, dashapatra, dashadala padma, dashapatrambuja and dashachchada [17]. The element of this chakra is Fire, having ten petals in yellow color [34,12]. The present study attempts to investigate the effects of Sacral Chakra and Solar Plexus Chakra meditation training along with beej/seed mantra chanting (with Solfeggio frequency: 417 Hz for Sacral and 528 Hz for Solar Plexus Chakra) on Sacral & Solar Plexus Chakra related behavior.

MATERIAL AND METHODS

A total of 80 students (age: 20-25 years, $M=23.09\pm1.3$) pursuing bachelor's degree in Physical Education from Kurukshetra University, Kurukshetra, India, were selected for the study. Participants were divided into two groups:

- Control Group (n=40): Continued their daily routine without meditation training.
- o Age: M = 23.08±1.97, Weight: 64.38±6.73, Height: 173.24±7.16
- Experimental Group (n=40): Underwent Chakraspecific meditation training.
- o Age: M = 23.29±2.69, Weight: 63.43±7.75, Height: 172.49±6.83

Chakra-related behavior of both groups was assessed using a self-designed and standardized Chakra-related behavior questionnaire at three time points: pre-test, mid-test (after 6 weeks), and post-test (after 12 weeks). The experimental group was trained for 12 weeks of Chakra-specific meditation with the chanting of Chakra-specific seed mantras: "WAM" (frequency in Solfeggio: 417 Hz) for the Sacral Chakra and "RAM" (frequency in Solfeggio: 528 Hz) for the Solar Plexus Chakra. The duration of the session for meditation was gradually increased over the 12-weeks period. Data were

analysed using the Statistical Package for Social Sciences (SPSS-26).

RESULTS

Table 1 indicates the means of Sacral Chakra of pre and mid tests of control group are 19.61 ± 3.16 and 20.29 ± 2.83 respectively. No significant difference was found in the Sacral Chakra related behavior in the control group during pre and mid test as the calculated t value was 0.97. Similarly, no change in Solar Plexus Chakra related behavior was found in the Solar Plexus Chakra.

Table 1 Comparative Analysis Of Sacral & Solar Plexus Chakra Of Pre And Mid Test Of Control Group

	Variables	Pre Test		Mid Test		MD	t
		Mean	SD	Mean	SD		value
	Sacral Chakra	19.61	3.16	20.29	2.83	0.68	0.97
	Solar Plexus Chakra	23.46	3.65	23.54	4.02	0.08	0.08

Table 2 Comparative Analysis Of Sacral & Solar Plexus Chakra Of Pre And Post Test Of Control Group

Variables	Pre Test		Mid Test		MD	t
	Mean	SD	Mean	SD		value
Sacral Chakra	19.61	3.16	20.02	3.35	0.41	0.53
Solar Plexus Chakra	23.46	3.65	23.94	3.68	0.48	0.55

Table 2shows no significant difference in the Sacral Chakra related behavior of the control group during pre and post test as the calculated t value was 0.53. Likewise no difference was found in the Solar Plexus Chakra related behavior as the t value was 0.55.

Table 3 Comparative Analysis Of Sacral & Solar Plexus Chakra Of Mid And Post Test Of Control Group

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Variables	Pre Te	st	Mid Test		MD	t
	Mean	SD	Mean	SD		value
Sacral Chakra	20.29	2.83	20.02	3.35	-0.27	-0.37
Solar Plexus Chakra	23.54	4.02	23.94	3.68	0.40	0.44

The means of Sacral Chakra of mid and post tests of control group are 20.29±2.83 and 20.02±3.35 respectively. The calculated t-values of both Sacral & Solar Plexus Chakra 0.37 and 0.44 reflect that there exists no significant difference in the behavior related to Sacral and Solar Plexus Chakras in control group during mid and post test.

Table 4 Comparative Analysis Of Sacral & Solar Plexus Chakra Of Pre And Mid Test Of Experimental Group

Variables	Pre Test		Mid Test		MD	t
	Mean	SD	Mean	SD		value
Sacral Chakra	20.82	3.71	21.65	2.91	0.83	1.03
Solar Plexus Chakra	23.66	4.15	24.53	3.46	0.87	0.95

Table 4 illustrates a significant difference at 0.01 level was found in behavior related to Sacral and Solar Plexus Chakras between the pre and mid tests of Experimental Group, as the calculated t values were 1.03 and 0.95 respectively. Similarly, in the experimental group a significant difference at 0.01 levels between the pre and post tests in the behavior related to Sacral and Solar Plexus Chakras was found.

Table 5 Comparative Analysis Of Sacral & Solar Plexus Chakra Of Pre And Post Test Of Experimental Group

Variables	Pre Test		Mid Test		MD	t
	Mean	SD	Mean	SD		value
Sacral Chakra	20.82	3.71	25.51	3.87	4.69	5.15
Solar Plexus Chakra	23.66	4.15	26.60	3.87	2.94	3.06

Table 5 depicts that the calculated t values for Sacral & Solar Plexus chakra for the pre and post test is 5.15 and 3.06 respectively, hence reflects a significant effect of Sacral & Solar Plexus Chakra specific meditation training on the behavior related to Sacral & Solar Plexus Chakra in the experimental group.

Table 6 Comparative Analysis Of Solar Plexus Chakra Of Mid And PostTest Of Experimental Group

Variables	Pre Test		Mid Test		MD	t
	Mean	SD	Mean	SD		value
Sacral Chakra	21.65	2.91	25.51	3.87	3.86	16.78
Solar Plexus Chakra	24.53	3.46	26.60	3.87	2.07	2.49

Table 6 depicts that the calculated t values for Sacral & Solar Plexus Chakra for the mid and post test is 16.78 and 2.49 respectively, this reflects that there exists a significant effect of Sacral & Solar Plexus Chakra specific meditation training on the behavior related to Sacral & Solar Plexus Chakra in the experimental group.

DISCUSSION

The results revealed a significant difference (p < 0.02) in Sacral and Solar Plexus Chakra-related behavior among participants in the experimental group. The present study was supported by the research of Priyanka Sharma et. al 2021, as in the meditative state, brain increases the activity of alpha waves responsible for a deep relaxation [36]. An another study claims that Meditation helps calm the mind, reduces stress, and improves focus, which can lead to better energy levels $^{[29]}$. Similarly, findings of various studies propose that meditation results in reducing anxiety, depression and enhancing the level of wellbeing and life satisfaction $^{\tiny{[14]}}$ and further helps in enhancing the quality and frequency of experiencing positive emotions [14]. The present study hypothesized that chakra specific meditation training has certain effects on chakra related behavior which was reinforced by Pinki Kumari Singh 2022 [29]. with a suggestion that vagus nerve is stimulated by meditation intervention which causes deep relaxation and positive emotions.

Sacral Chakra governs pivotal behavioural aspects such as irritability, shyness, guilt, tendency to blame, sexual obsession and lack or creativity. Similarly Solar Plexus Chakra rules certain behavioural traits like lack of self-esteem, timidness, sense of depression, fear of rejection, inability to make decisions and hostility. Effects of Concentration and Meditation on Sacral and Solar Plexus Chakra induce to intensify the stability and balance. The researcher argued that chakra specific meditation training affects the chakra related behavior, and this research is constant with this claim. In other words, meditation practitioners have emotional stability and behavioral positivity. In the meditative state, certain behavioral traits are dealt with, such as removal of cumulated stresses, increase in energy, and overall health is affected positively [31]. Besides, a bunch of researchers have found out great health benefits among meditation practitioners including reduction in stress, [1,9,4], anxiety, [32,21] and depression, [15,13].

Limitations

Notwithstanding the merits of present study, certain limitations also exist. The subjective nature of meditation experiences can make it hard to measure objective outcomes. Many significant research questions are still unanswered. The point about exploring the effects of specific colors, sounds or other modalities is also very interesting. Chakra meditation can involve various sensory components, and it would be fascinating to study how these elements interact and impact the chakra meditation experience or its outcomes.

CONCLUSION

The present study aimed at investigating the impact of chakra meditation on Sacral and Solar Plexus chakra-related behavior among young adults. The researcher argued that chakra specific meditation training affects the chakra related behavior, and this research is constant with this claim. In the last 3-4 decades, research in the field of chakra meditation has pushed a great momentum in the significance of behavioral effects. This research subsumes an eclectic review of pertinent literature by throwing light on the notion of positive behavioural changes enabled by chakra specific meditation. The results of this study can be employed to unveil various

covered truths with equal significance to bottomless scientific concepts. With a regular practice of Chakra meditation, negative emotions can effectively be disabled and activated positive ones, enabling the individuals to manage their behavioural states.

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