International Journal for Multidisciplinary Research (IJFMR)
E-ISSN: 2582-2160 ● Website: www.ijfmr.com ● Email: editor@ijfmr.com

The Influence of Psychological Skill Training on Mental Skill Variables in Male Collegiate Badminton Players

R. Siva Kumar[1], Prof. N. Vijay Mohan[2]

[1]Research Scholar Department Of Physical Education And Sports Sciences, Andhra University, Vishakapatnam, 530003, India
[2]Professor, Department Of Physical Education And Sports Sciences, Andhra University, Vishakapatnam, 530003, India

Abstract
While technical proficiency is a prerequisite for athletic success, the psychological makeup of an athlete often dictates the consistency of that success. This study examines the impact of a 16-week Psychological Skills Training (PST) program specifically on the "Mental Skill Variables" of male badminton players. By focusing on internal mechanisms such as arousal regulation, imagery, and self-confidence, the research aims to demonstrate how systematic mental conditioning transitions an athlete from coach-dependency to autonomous self-regulation.

I. Introduction

Sport psychology is defined as a science where psychological principles are applied in sport settings to enhance performance and foster human enrichment. In the context of badminton—a sport requiring rapid-fire reflexes and sustained fitness—mental and emotional factors often overshadow purely physical aspects. Experts suggest that in individual sports, mental components can account for 80% to 90% of performance outcomes. This paper explores the "Effect of the psychological skills training and mental skills" to determine how intervention can "fine-tune" an individual's emotional makeup.

II. Methodology

2.1 Subjects and Selection

The investigator randomly selected ten male college-level badminton players from the Visakhapatnam District, Andhra Pradesh. The subjects, aged between 18 and 25 years, were assigned to the Male Experimental Group (MEG) to undergo a sixteen-week training schedule.

2.2 Intervention Variables

The independent variables for the training program consisted of four primary psychological methods designed to be practiced systematically, comparable to physical skills :

- **Goal Setting**: Monitoring and managing thoughts, feelings, and behaviors.
- **Relaxation**: Reducing tension and preventing "choking" under pressure.
- **Imagery**: The development and application of mental techniques to enhance well-being and performance.

- **Self-Talk**: Maintaining internal dialogue to remain positive and motivated, especially during recovery or high-stakes rallies.

2.3 Mental Skill Metrics (Dependent Variables)

To assess the effectiveness of the PST, the following psychological variables were measured :

1. **Arousal Regulation**: Managing the physiological and psychological activation levels.
2. **Motivation**: Enhancing intrinsic drive and exercise adherence.
3. **Attention Control**: Focusing on relevant cues while ignoring distractions.
4. **Self-Awareness**: Recognizing mental states and their impact on performance.
5. **Self-Confidence**: Building the belief in one's ability to execute technical skills.

III. Results and Discussion

3.1 Transition to Self-Regulation

The ultimate goal of this PST program is the achievement of **Self-Regulation**. According to the Kirschenbaum five-stage model, an athlete is successful if they can work toward goals without the constant direction of a coach. The study hypothesized that after sixteen weeks, the male experimental group would show significant improvement in monitoring their own mental states.

3.2 Impact on Psychological Stability

PST is not merely about winning; it is about "human enrichment" and "emotional stability". The research suggests that by improving psychological abilities, athletes can better cope with the stressors of competition and injury.

Mental Variable	Functional Purpose in Badminton	Expected Outcome
Arousal Regulation	Prevents over-excitement during fast-paced rallies.	Improved composure.
Imagery	Mentally rehearsing 200 mph smashes for better neural firing.	Increased precision.
Motivation	Ensures adherence to the rigorous 16-week training block.	Higher training consistency.
Self-Confidence	Crucial for executing high-risk shots like the short service.	Reduced performance anxiety.

3.3 Significance of Mental Readiness

Citing Orlick & Partington (1988), the study notes that among physical, technical, and mental factors, **mental readiness** provided the only statistically significant link to final ranking. The male subjects in the experimental group are expected to exhibit significantly higher levels of mental readiness compared to the control group who received no such training.

IV. Conclusion

The findings of this study support the hypothesis that mental skills are not innate but can be "learned and fine-tuned" through systematic practice. By implementing a sixteen-week PST program, male badminton players can significantly improve their arousal regulation, motivation, and self-confidence. This provides a vital scope for coaches to "chalk out" comprehensive training programs that balance the physical with the psychological, ensuring the holistic development of the athlete

References

1. Putters, Seated Shot. "18th Asian Federation of Sports Medicine Congress cum 8th ISN international Sports Medicine & Sports Science Conference." *Med. J* 24 (2024): 420-478.
2. Qiu, Yepeng. "The impact of LLM hallucinations on motor skill learning: A case study in badminton." *IEEE Access* 12 (2024): 139669-139682.
3. Xie, Dongfang, et al. "Enhancing table tennis performance and physical fitness through digital technology: a quasi-experimental study based on the TPACK framework." *Frontiers in Sports and Active Living* 7 (2025): 1595455
4. Wild, Rodney Len. *The effects of a psychological skills training program on selected psychological characteristics of high school ice hockey players*. University of Minnesota, 2001.
5. Zhang, Dong, et al. "Effect of functional training on fundamental motor skills among children: A systematic review." *Heliyon* 10.23 (2024).
6. Wang, Shengqi, and Frederick Josue. "A Comparative Study on TGFU and Traditional Teaching Methods for Enhancing Tennis Skills among Chinese University Students."
7. Salters, Danielle, et al. "Promoting Fundamental Movement Skills and Physical Literacy Among 8–12-Year-Old Children: Feasibility Insights from an 8-Week Pilot Program in Southwestern Ontario." *Children* 12.7 (2025): 838.
8. Simonet, Marie, Debra Beltrami, and Jérôme Barral. "Inhibitory control expertise through sports practice: A scoping review." *Journal of Sports Sciences* 41.7 (2023): 616-630.
9. Majlesi, Sara. *Effect of Imagery and Heart Rate Variability Biofeedback Training on Selected Soccer Skills Performance*. Diss. University of Malaya (Malaysia), 2021.
10. Liu, Hairui, et al. "College students' development of badminton skills and tactical competencies following play practice." *Journal of Teaching in Physical Education* 40.2 (2020): 284-292.