

Knowledge and Attitude Towards Sports Injury Prevention and Management Regarding Sports-Playing College Students of South Gujarat: A Cross-Sectional Study

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Abstract: Sports injuries are common among college students participating in sports and can significantly affect athletic performance, academic activities, and overall well-being. Adequate knowledge and a positive attitude toward sports injury prevention and management are essential for minimising injury risks and promoting safe participation in sports. The present study aimed to assess the knowledge and attitude regarding sports injury prevention and management among sports-playing college students of South Gujarat. A cross-sectional study was conducted among 95 students aged 18–25 years who participated in sports activities at least three days per week. Data were collected using the Sports Injury Prevention and Management Scale (SIPM) through a structured Google Form. The findings revealed that 46.3% of participants demonstrated good knowledge, 40.0% had average knowledge, 5.3% had excellent knowledge, and 8.4% had poor knowledge. Regarding attitude, 69.5% exhibited a positive attitude, 26.3% showed a neutral attitude, and 4.2% demonstrated a negative attitude toward sports injury prevention and management. The study concludes that sports-playing college students possess generally good knowledge and positive attitudes; however, educational interventions are required to address existing gaps and improve safe sports participation.

Keywords: Sports Injury, Injury Prevention, Injury Management, Knowledge, Attitude

1. Introduction

Participation in sports and recreational activities has increased substantially among college students due to the well-recognised physical, psychological, and social benefits associated with regular physical activity. However, increased sports participation also elevates the risk of sports-related injuries, including sprains, strains, fractures, dislocations, heat-related illnesses, and other musculoskeletal conditions. Sports injuries can adversely affect athletic performance, academic participation, and long-term health if not managed appropriately. Effective injury prevention and management strategies such as proper warm-up and cool-down exercises, use of protective equipment, adequate hydration, first aid knowledge, rehabilitation, and safe return-to-play practices are essential for reducing injury incidence and severity. Previous studies have emphasised that awareness and education regarding sports injury prevention significantly contribute to safer sports participation and improved health outcomes. Studies have reported adequate awareness of sports injuries among young athletes but highlighted deficiencies in preventive practices and rehabilitation adherence.¹ Research has shown that athletes with better knowledge demonstrate more positive attitudes toward injury prevention.² Furthermore, inadequate awareness regarding the long-term consequences of sports injuries may increase the risk of persistent health complications.³ Evidence-based preventive strategies and educational interventions have been identified as crucial factors in reducing sports-related injuries and enhancing athlete safety.⁴

Knowledge and attitude are important determinants of preventive behaviour among athletes and sports participants.

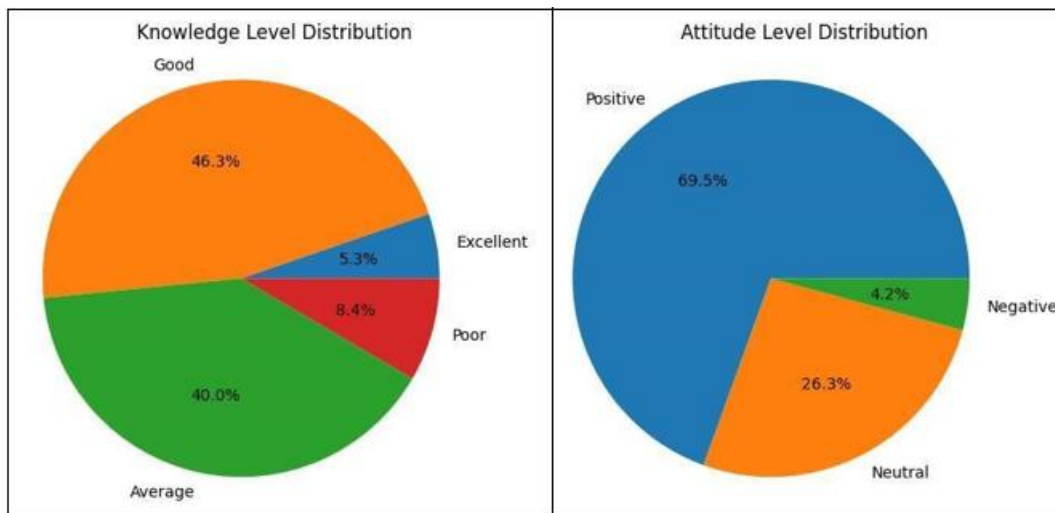
Several recent studies have demonstrated the importance of educational interventions in improving awareness and attitudes toward sports injury prevention and management. Research has reported high levels of knowledge and positive perceptions regarding sports injury management among community participants.⁵ Studies among sports-playing college students have demonstrated generally good knowledge and positive attitudes toward sports injury prevention and management.⁶ Similar findings have also been reported among physical education students.⁷ Previous research has highlighted the importance of injury-prevention awareness and educational programs among athletes.⁸ However, some studies have identified insufficient knowledge and attitudes among university students and emphasised the need for targeted educational interventions.⁹ Greater sports injury knowledge has also been associated with better preventive practices among athletes.¹⁰ Additionally, institutional support and professional guidance have been recognised as important factors for the effective implementation of sports injury prevention programs. Despite growing evidence, limited data are available regarding the knowledge and attitudes of sports-playing college students in South Gujarat. Therefore, the present study was conducted to assess the knowledge and attitude of sports-playing college students regarding sports injury prevention and management and to identify the need for targeted educational interventions to promote safe sports participation.¹¹

2. Materials and Methodology

This cross-sectional study was conducted among sports-playing college students aged 18–25 years from South Gujarat over a period of six months. A total of 95 participants were

included in the study. Students who were actively involved in sports activities at least three days per week, both males and females, and who were able to understand English were eligible to participate. Students who were irregular sports players, participated only in indoor sports, had neurological disorders, or were unable to understand English were excluded from the study. Data were collected using the Sports Injury Prevention and Management Scale (SIPM), a structured questionnaire designed to assess participants' knowledge and attitude regarding sports injury prevention

and management. Participants who met the eligibility criteria were invited to participate in the study through a Google Form. After providing informed consent, they completed a structured questionnaire consisting of demographic information and the Sports Injury Prevention and Management (SIPM) questionnaire. The collected responses were reviewed, organised, and presented using frequencies and percentages to describe the knowledge and attitude levels of the participants regarding sports injury prevention and management.



3. Results

A total of 95 sports-playing college students participated in the study, of whom 77.9% were females and 22.1% were males. Regarding sports injury history, 16.8% of the participants reported having experienced a previous sports injury, while 83.2% had no history of sports-related injuries. Assessment of knowledge regarding sports injury prevention and management revealed that 46.3% of participants possessed good knowledge, 40.0% had average knowledge, 5.3% demonstrated excellent knowledge, and 8.4% showed poor knowledge. Participants displayed strong knowledge in areas such as sprains (84.2%), strains (83.2%), dislocations (92.6%), heatstroke prevention (72.6%), and wound dressing principles (70.5%). However, deficiencies were identified in bandaging techniques, shock management, recognition of heatstroke symptoms, and standard first-aid procedures. Regarding attitude, the majority of participants demonstrated favourable attitudes toward injury prevention, use of protective equipment, warm-up and stretching exercises, hydration maintenance, and seeking emergency medical care when required. Overall, 69.5% of participants exhibited positive attitudes, 26.3% demonstrated neutral attitudes, and 4.2% showed negative attitudes toward sports injury prevention and management.

4. Conclusion

The study concluded that sports-playing college students of South Gujarat possess generally good knowledge and positive attitudes regarding sports injury prevention and management. Most participants were aware of common sports injuries, first-aid measures, hydration requirements, and the importance of protective equipment. However, gaps were

identified in specific injury management practices and emergency care procedures. Therefore, structured educational programs, workshops, and awareness campaigns should be implemented to improve knowledge and enhance safe sports participation among college students.

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