



Role and Relevance of Gender in Psychological Skills of Sports

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Abstract

The paper attempts to quantify the level of psychological skills, namely anxiety management, concentration, confidence, mental preparation, motivation and team emphasis and make a gender-based comparison of thirty male and thirty female Indian national-level hockey players. The data was collected through the administration of the Psychological Skills Inventory for Sports (PSIS), developed by Mahoney et al. in 1987. The PSIS is composed of forty-five Likert type items designed to assess an athlete's psychological skills. It was hypothesized that there would be a significant difference between male and female players in psychological skills based on the 't' ratio. The findings show that there is no significant difference between male and female hockey players in psychological skills.

Key Words: *Anxiety Management, Concentration, Confidence, Mental Preparation, Motivation, Team-emphasis, Gender, Psychological Skills.*

Introduction

It was in the last quarter of the twentieth century only, the psychological skills received much-needed attention in order to enhance the peak performance of elite players (Lucas, 2015). The coaches and trainers were searching for tools to address the players increasing strain, anxiety and nervousness during the competition as it adversely affects their performance. Hence making a confident mindset through psychological skills is needed for ensuring a positive impact on the athlete (Asamoah, 2013). Psychological skills are those techniques that are either given or self-made, like thoughts, notions or movements to apply deliberately for making a positive mindset while participating in a competition. They are relevant as researchers identified anxiety, lack of concentration and self-motivation, absence of mental presence and self-confidence are common among players very naturally (Ohuruogu, Jonathan, & Ikechukwu, 2016). As the requirements and applications of psychological skills are specific to players, they also differ according to the nature of the sport and the tactical position of an individual player in a particular game. Gender wise also they are distinguishable. Hence, the researcher is taking the case of field hockey exclusively to compare the gender-based differences in psychological skills.

Background of the Study

Hockey is considered to be one of the oldest games in the world. As hunters and gatherers, the ancient man will try to kick small objects from place to place with a stick. This can be the beginning of today's hockey. There is archaeological evidence to prove that hockey-kind games were played in Egypt, Ireland, Greece and Mongolia since ancient times. Nowadays, there are several forms of hockey, like field hockey, ice hockey, bandy, roller hockey, beach hockey, and others. The sport is prevalent in most

countries, and it is the national sport of Canada, Pakistan, Latvia and India. Even though Cricket was replaced later, hockey is one of the most followed games, along with football, kabaddi, and wrestling. 'The Hockey India' is the chief governing body of the game in the country. The country has several hockey championships throughout the year and senior, junior and sub-junior teams besides national, in both genders. Once India was the best competing country in the game with several trophies, but now it became one of the least performing teams continuously. The experts point out several issues, including non-application of anthropometric tools while selecting players, lack of advanced training facilities, absence of sufficient supporting members like dietician and physiologist, and others as the reasons for such poor performance in the competitions. Non-exposure to psychological skills is a general lacuna of Indian sports, including hockey.

Statement of the Problem

There are many attempts to employ psychological tools to prepare elite players these days after recognizing its importance. However, such an application of tools demands in-depth knowledge of the player's specific requirement, sport, and player's position in a particular sport. As a sport that demands intense and continuous rushes, turning, twisting, stopping, sprinting, passing and shooting, the hockey players are expected to esteem in physical, physiological, technical, tactical and mental skills. Any weakness affecting these will also add to mental anxiety; hence they are consistently exposed to many mental challenges and physical demands. As a highly intense team sport, one player's weaknesses can affect his fellow player's confidence and performance in hockey. In such a context, exposing to and learning psychological skills has supreme importance in playing hockey. The researcher attempts to understand the sports-specific psychological skills of Indian national level hockey players using the above-mentioned Psychological Skills Inventory for Sports (PSIS) to assess and compare their gender-specific differences.

Objective, Research Questions and the Hypothesis

This paper aims to evaluate the gender-based differences in sports-specific psychological skills of Indian national level hockey players using the PSIS variables in the context of the above arguments. The research question is,

1. What is the level of selected psychological skills among male and female hockey players of India?
2. Whether there are any differences in the level of psychological skills between male and female hockey players of India?

The present study hypothesized that there would be a significant difference between male and female hockey players in anxiety management, concentration, confidence, mental preparation, motivation and team emphasis.

Literature Review

Athletic performance is determined by many factors (Hanin, 2012, Kubaik, 2012); hence as the involvement, competitiveness and financial investment in the sports industry increased manifold the holistic incorporation and utilization of all these diverse but inter-related factors became necessary for bringing out the elite performance of each of the athlete. Until the beginning of the present century, it was popularly believed that master athletic performance solely depended on improving physical fitness (Maharam, Bauman, Kalman, Skolnik, & Perle, 1999). Along with the fall of such a belief, the importance of psychological skills was realized and started to apply deeply in player's training. As each athlete is addressing some psychological issues at varying levels (Begel, 1992), there were attempts to deal with them but not in a systematic manner (Ikulayo, 2003). There were several studies since the second half of the last century in order to understand the role and relevance of psychological skills with different sports (Post, 2012; Smit & Louw, 2011; Katsikas, Argeitaki, & Smirniotou, 2009; Thelwell, Greenless, & Weston, 2006; Sheard & Golby, 2006; Goudas, Theodorakis, & Karamousalidis, 1998; Daw & Burton, 1994; Mahoney M. J., 1989). There were attempts to compare the level of psychological skills in different games

(Kajbafnezhad, Ahadi, Heidarie, Askari, & Enayati, 2011; Elferink-Gemser, Visscher, & Lemmink, 2005). Similarly, researchers attempted to identify the gender-specific psychological skills (Schaal, 2011), gender differences in psychological skills (Katsikas, Argeitaki, & Smirniotiou, 2009; Nicholls, Polman, Levy, Taylor, & Cobley, 2007) and their comparison (White, 1993).

In order to study the degree of psychological skills among players, it is vital to develop a sharp, in-depth and holistic research questionnaire like the Sports Competition Anxiety Test (Martens, 1977), Group Environment Questionnaire (Brawley, Canon, & Widmeyer, 1987), Competitive Sport Anxiety Inventory (Martens, Vealey, & Burton, 1990), Sports Anxiety Scale (Smith, Smoll, & Schutz, 1990), and Psychological Skills Inventory (Wheaton, 1998). Among them, the expanded versions of the Athletic Coping Skill Inventory developed by Smith and others (Smith, Schutz, Smoll, & Ptacek, 1995) and the Psychological Skills Inventory for Sports developed by Mahoney and others (Mahoney, Gabriel, & Perkins, 1987) were widely used later. As each player's psychological conditions are unique, it is not advisable to apply psychological skills universally. Similarly, it differs according to the nature of a player's sport and position in a team sport. So that a defined and distinctive package of psychological skills are needed for each player (Jooste, 2012; Birrer & Morgan, 2010). A comprehensive and sustained observation of each player is required to make a fitting set of psychological skills to enhance his performance (Vipene & Emeribe 2007). In addition to all, the researcher attempted to identify the advantages of exclusive exposure and training in psychological skills to players like improvement in inter-personal communication (Vipene & Emeribe 2007) and stress management (Cohen, Nordin, & Abrahamson, 2010; Hanton, Thomas, & Mellalieu, 2009). There were studies about the need for psychological skills in athletes with reference to anxiety (Graham 2009), cognitive anxiety (Woodman 2011), on one side and by taking different psychological skills together (Moran, 2012; Gardner & Moore, 2006).

Research Methodology

The objective of the present investigation is to calculate and compare the gender-based psychological skills among hockey players. The researcher selected thirty male and thirty female as the subjects for the study. Among them, some are international, and others are senior national level players. The survey was conducted at Bengaluru and Chennai. Their age ranged from twenty-one to twenty-eight. No subject was forced to answer any question as it was voluntary. The researcher tried to ensure all India representation as far as possible among subjects. The data was collected through the administration of the Psychological Skills Inventory for Sports (PSIS) developed by Mahoney et al. The PSIS assesses anxiety management (AX), concentration (CC), confidence (CF), mental preparation (MP), motivation (MV) and team emphasis (TM). To calculate whether the difference in psychological skills between male and female hockey players is significant or not, the 't' ratio was used.

The researcher interviewed only active athletes for data collection. Several of them participated in international competitions too. Even though not exclusively trained, all of them had some exposure to psychological skills. The data collection was conducted according to the convenience of respondents only. Similarly, to make them comfortable, the medium of communication was not fixed to English only, so that the help of translators was used. As the researcher was present throughout all data collection, the possibilities of errors in data collection were minimum.

Analysis and Findings

The researcher calculated the mean, standard deviation and maximum and minimum scores of PSIS of sixty hockey players to determine the level of psychological skills. The 't' ratio was calculated to find out whether the difference in the level of psychological skills between male and female hockey players are significant or not. The following table shows the mean of selected variables with standard deviation and 't' value.

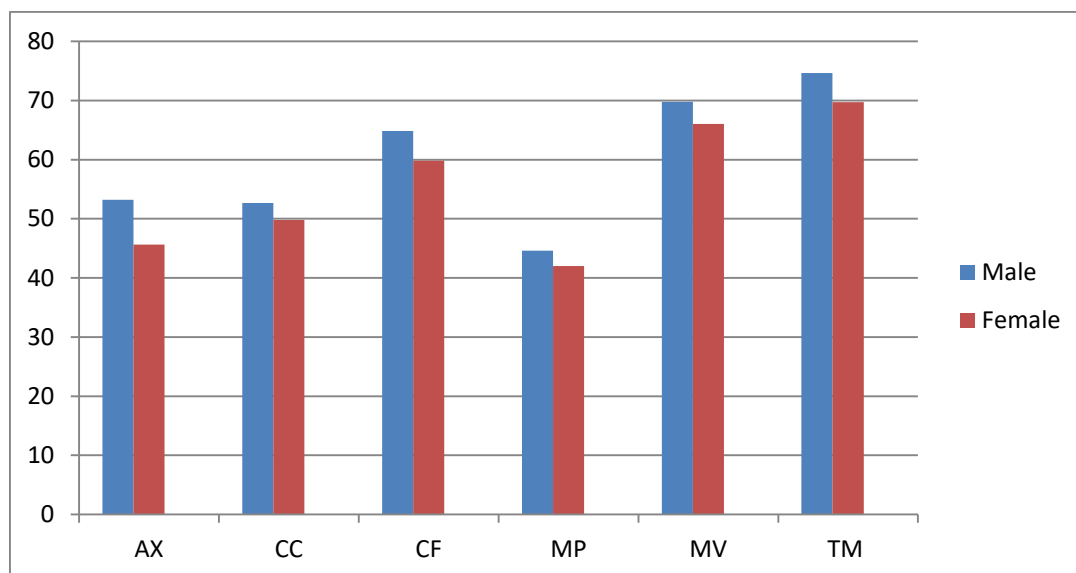
Table 1: Mean, Standard Deviation, and Maximum & Minimum scores, and ‘t’ value of PSIS of Thirty Male and Female Hockey Players

| | Male (N=30) | | | | Female (N=30) | | | | ‘t’ ratio |
|---|-------------|-------|------|------|---------------|-------|------|------|-----------|
| | Mean | SD | Max. | Min. | Mean | SD | Max. | Min. | |
| AX | 53.23 | 9.94 | 70 | 28 | 45.63 | 5.83 | 55 | 33 | 3.66* |
| CC | 52.70 | 11.25 | 67 | 33 | 49.80 | 12.18 | 83 | 25 | 1.02 |
| CF | 64.87 | 9.71 | 86 | 50 | 59.83 | 9.06 | 75 | 47 | 1.90 |
| MP | 44.60 | 8.59 | 63 | 29 | 42.00 | 6.46 | 54 | 29 | 1.35 |
| MV | 69.80 | 10.08 | 86 | 54 | 66.03 | 11.30 | 82 | 39 | 1.49 |
| TM | 74.67 | 10.09 | 93 | 54 | 69.73 | 9.12 | 86 | 50 | 2.13* |
| Significant at 0.05 level; t 0.05 (58) = 2.01 | | | | | | | | | |

Source: Calculated figures

The table shows very poor anxiety management among male and female hockey players, even though the male had a marginally better mean score. The differences in mean scores among male (53.23) are more than among female (45.63). As the calculated ‘t’ ratio (3.66) is higher than the tabulated 2.01, there is a significant gender difference between male and female players’ anxiety management skills. The mean value of concentration among players is as meagre as the male has 52.70, and the female has 49.80 only. But the difference between male and female hockey players’ concentration skill is not so significant as the calculated ‘t’ ratio (1.02) is less than the tabulated value. In the confidence level, the male’s (64.87) mean value is higher than that of the female (59.83), but the difference is not significant as the ‘t’ ratio is only 1.90. The mean scores of mental preparation show a similar trend. The male’s mean value is 44.60, whereas the female is 42.00, and the calculated ‘t’ ratio is only 1.35, so the differences in mean value are insignificant. Similarly, the mean scores of motivation show insignificant differences (calculated ‘t’ ratio is 1.49) between the mean values of the male (69.80) and the female (66.03). But the case of team emphasis is different. The gender difference between the mean values of male (74.67) and female (69.73) is significant here, shown by the higher calculated ‘t’ ratio of 2.13 than the tabulated ratio.

From the table, only anxiety management and team emphasis had significant gender differences in their mean values. In both cases, males have a comparatively higher level of scores than female. The above table is graphically illustrated below. The mean scores of males and females in given psychological skills of anxiety management, concentration, confidence, mental preparation, motivation and team emphasis are given in the vertical axis, whereas the variables are given in the horizontal axis.

Diagram 1: Bar Diagram of Mean Scores of Male and Female Hockey Players on PSIS

Source: Calculated from collected data

Discussion on Findings and Hypothesis

The findings show significant differences between male and female hockey players in anxiety management and team emphasis but insignificant differences in concentration, confidence, mental preparation and motivation skills. So the hypothesis stated that there would be a significant difference between male and female hockey players in PSIS is accepted in the case of anxiety management and team emphasis, whereas rejected in the case of concentration, confidence, mental preparation and motivation. Even though the scores of PSIS variables are very ordinary here, it is difficult to judge whether they are better or worse because of the non-consideration of any international or national performance scale. In this study, the researcher found that male performs better than female in all variables, but they are significant only in anxiety management and team emphasis. It shows the gradual progress of women players in more factors of performance in hockey along with men.

The significant higher performance of male players in anxiety management is in accordance with several previous studies (Schaal et al., 2011). Their upper hand may due to achievement level, experience and outlook to the competition. But there is no significant difference in concentration, confidence, mental preparation, and motivation. The equality of motivation may be attributed to the increasing recognition of women's participation in sports. It should be noted that psychological skills are developed in female competitors is similar to that of male athletes. More than that, female sportspersons have positive incentives such as prestige, status and recognition for their success in the competition nowadays instead of criticism and negative branding earlier. But researches indicate that gender differences in psychological skills were relevant and applicable only on a collective basis, i.e. on the team rather than on the individual (Karamousalidis, et al., 2006; White, 1993). In the case of team emphasis, significant differences were observed based on gender. So the hypothesis related to team emphasis was accepted. In the case of team emphasis, the fact that the hockey players were required to effectively interact with each other for success like team events, and it is effectively doing by the male hockey players. Still, the scores of team emphasis show that all these sportspersons were above average on the scale. In contrast, some studies found no gender-based variations in any psychological skills (Skourtanioti & Bebetos, 2008; Kamalesh, 2005; Bebetos & Antoniou, 2003; Vealey, 1988).

Conclusion

Performance in sports is the amalgamation of various factors. Similarly is the training too. Without addressing the intellectual, psychological and social requirements of performance, making an elite athlete is not feasible these days. Among the above, the psychological skills ensure to attain the most suitable employment of physical fitness; sports strategies and tactical efficiency at the most needed time. As psychological skills deliver a viable ambience of efficient and effective movement of body parts, systematic training in it is a prime key to ensure the zenith of athletic performance.

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