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RESEARCH ARTICLE

RELATIONSHIP BETWEEN TEST ANXIETY AND ACADEMIC ACHIEVEMENT OF MALE AND FEMALE SPORTSPERSONS

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ABSTRACT

The aim of the present investigation was to establish the relationship between test anxiety and academic performance of male and female sportspersons. One hundred and Ten (Males=55, Females=55) sportspersons studying in 11th grade in different secondary schools of Bilaspur region were randomly selected to serve as the subjects for this study. The Test Anxiety Inventory (TAI) (Spielberger *et al.*, 1980), a tool that measures individual differences in test anxiety, was used to measure Test anxiety. Academic achievement was based upon the previous achievement of each level male and female sportspersons in the form of total marks obtained in five subjects and its percentage at 10th level examination. The results of the study concluded that 1. Male and female sportspersons had significant differences on academic performance in different school courses and total academic achievement, but they did not differ on test anxiety. Male sportspersons with high test anxiety achieved lower in social science and with low test anxiety achieved higher in social science. Female sportspersons exhibited the similar results in social studies. Test anxiety was found to be uncertain with academic performance of male and female sportspersons in five school courses. Total academic achievement was found higher in female sportspersons than their counter parts.

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INTRODUCTION

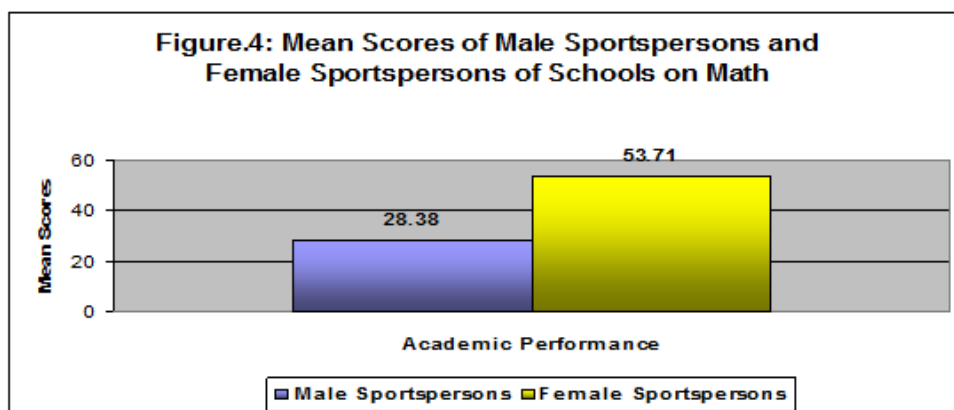
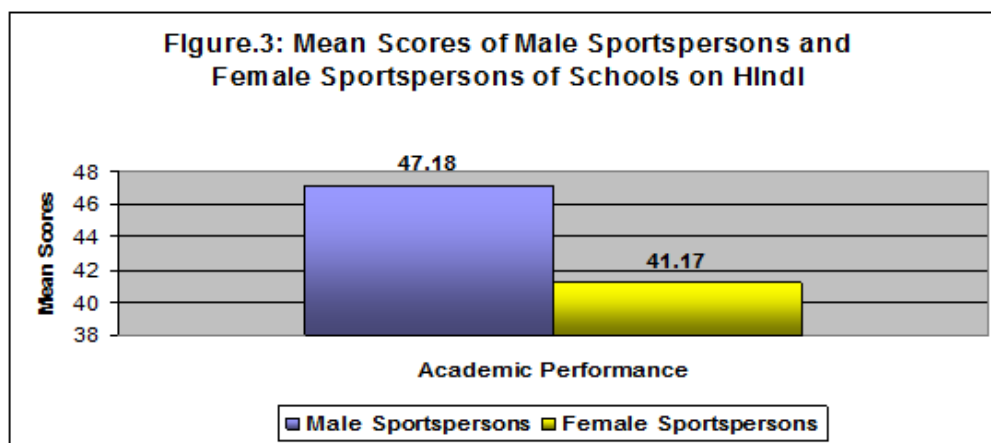
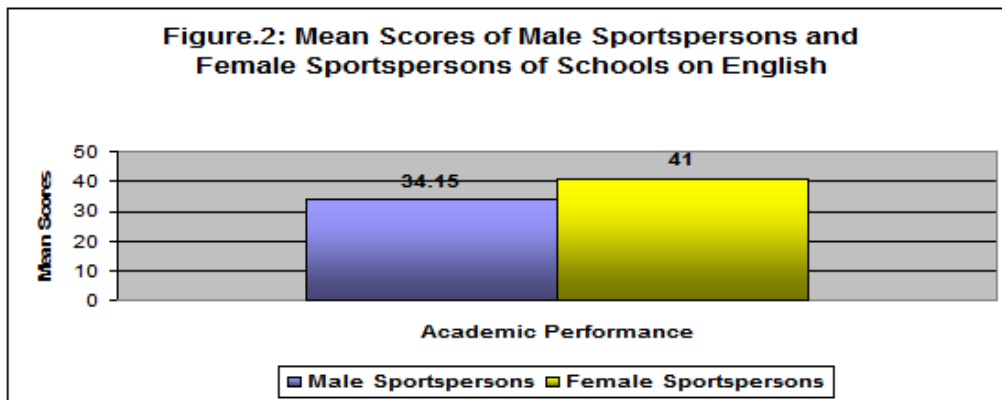
In the present days, every individual feels the importance of educational values in their life. In the process of education, many people follow the concept of education. They think that literacy and theoretical knowledge is the only channel of education, where as, education includes the mental, physical, social, spiritual, intellectual and economical etc., dimension to the process of learning the education. The participation in Sports contributes to building up self confidence, enhance intellectual level, personality development and outgoing tendency or extraversion as such proficiency leads to enhanced success in sports activities which is highly valued in one's group. Differences in academic achievement continues to be one of the most complex and controversial issues in education today. In a competitive society where the level of achievement in high school has associated with it many important and lasting vocational and financial consequences for individuals, this point is of special significance for these concerned about the inequality of opportunity which has so often been

demonstrated in competition may be if the courses are planned and geared according to the needs based on psychological appraisal of the student and training provided through specifically designed psychological inputs topping the affective domain, the problems of academic achievement could be tackled insightfully. It may also help in avoiding the atmosphere of despair and uncertainly in the minds of the students (Gurpte, 1984). Academic achievement and mental health be improved in school settings with support strategies such as educational guidance, counseling and psychotherapy or other psycho-educational program such as teaching life skill. Test anxiety is one of the factors which are responsible for students' under achievement and low performance but it can be managed by appropriate training of students in dealing with factors causing test anxiety (Rana and Mahmood, 2010). Test anxiety is indirectly proportional to the academic achievement. Age has also no effect on test anxiety in the students (Cynthia and Eubank, 1993). Test anxiety and study habits were associated positively with academic success and there was no association with achievement motivation (Ergene, 2011). Bhagat, Patial & Sharma (2015) indicated insignificant difference regarding test anxiety between sportsmen and non-sportsmen.

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Hall (1990) found a significant difference between the grade point averages of athletes and non-athletes, male and female students, male and female athletes, non-athletes at different grade levels, and among the varsity sports. Yousefi *et al.* (2010) investigated the significant correlation between test anxiety and academic achievement among adolescents. significant difference of academic achievement was also found between male and female adolescents, whereby female score higher in their academic achievement. Females consistently reported higher levels of test anxiety than males. The need for school interventions to reduce test anxiety among females and to assist students in developing the thought processes that give them a sense of control over the events in their life, in particular, their academic performance (Moore, 2006).

Gender differences in cognitive test anxiety were documented, but those differences were not related to performance on the course exams. Examination of the relation between the emotionality component of test anxiety and performance revealed that moderate levels of physiological arousal generally were associated with higher exam performance (Jerrell *et al.*, 2002). Major causal factor involved in the gender-related differences in test anxiety among students was a greater role expectation conflict among females than among males (Spielberger, 1980). Despite research reports from different countries and cultures that female differ significantly from male on test anxiety (Spielberger, 1980; Sharma and Sud, 1990) In the current study, some researchers reported insignificant differences in anxiety scores between males and



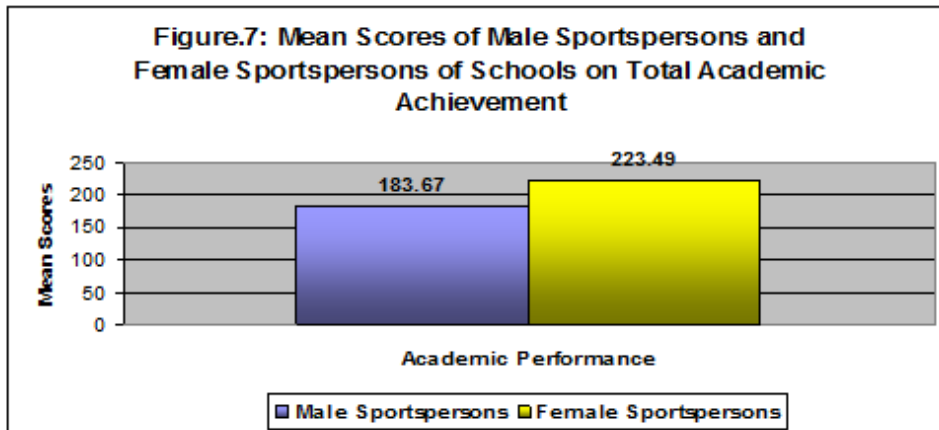
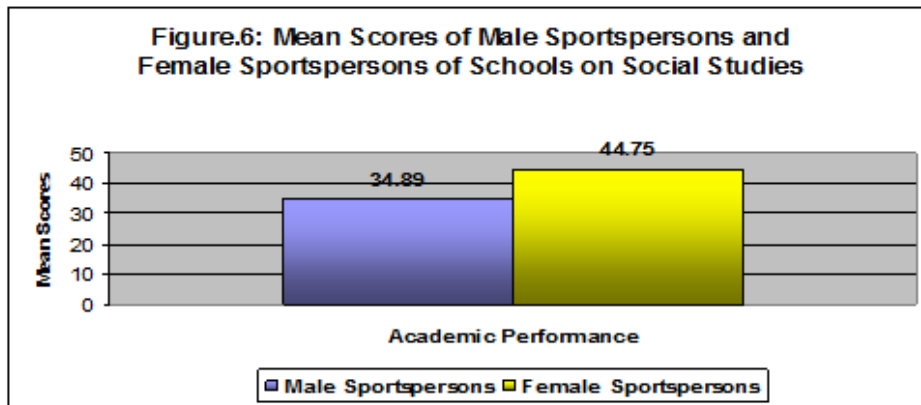
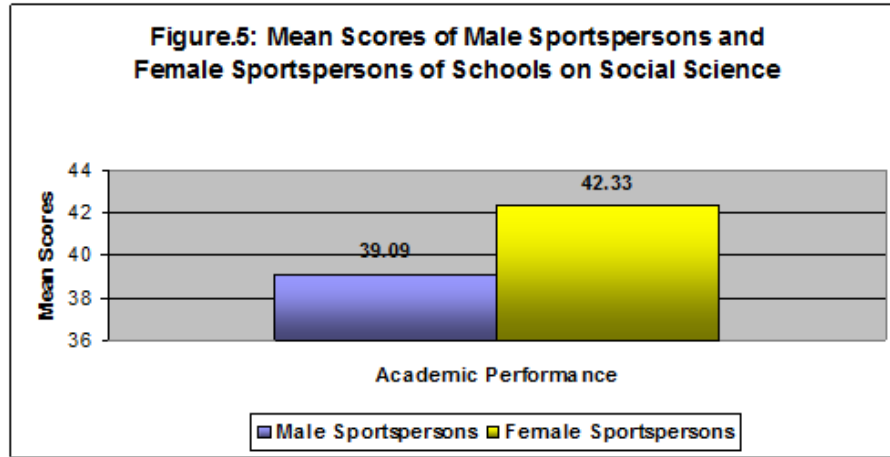


Table 2. significance of difference between mean scores of male and female sportspeople with regard to their test anxiety and academic performance in different school courses

Variables	Sex	M	MD	σ_{DM}	t-ratio
Test Anxiety	Male	40.44	2.4	1.96	1.23
	Female	42.84			
English	Male	34.15	6.85	2.19	3.12*
	Female	41.00			
Hindi	Male	47.18	5.47	2.26	2.43*
	Female	41.71			
Math	Male	28.38	25.35	2.56	9.92*
	Female	53.71			
Social Science	Male	39.09	3.24	1.51	2.14*
	Female	42.33			
Social Studies	Male	34.89	9.86	2.55	3.86*
	Female	44.75			
Total Academic Achievement	Male	183.67	39.82	7.69	5.17*
	Female	223.49			

Significant at .05 level, $t_{.05}(108)=1.98$

Table 3. Relationship between test anxiety and academic performance of male and female sportspersons in different School courses

Courses	Male Sportspersons Coefficient of Correlation (r)	Female Sportspersons Coefficient of Correlation (r)
English	.077	.162
Hindi	.131	.206*
Math	.009	.487*
Social Science	-.066	.074
Social Studies	.028	-.065

*significant at .05 level (Female Sportspersons)
 $r_{.05(108)} = .174$

females (El-Zahhar and Hocevar, 1991; Latas *et al.*, 2010; Szafranski *et al.*, 2012). The aim of the present investigation was to establish the relationship between test anxiety and academic performance of male and female sportspersons.

MATERIALS AND METHODS

Selection of Subjects

One hundred and Ten (Males=55, Females=55) sportspersons studying in 11th grade in different secondary schools of Bilaspur region were randomly selected to serve as the subjects for this study. The subjects were selected from amongst the male and female sportspersons who have taken part in different sports competitions.

Instrumentation

The Test Anxiety Inventory (Sharma and Sud, 1990), a tool that measures individual differences in test anxiety, was used to measure Test anxiety. The TAI is a 20-item paper and pencil test that takes 5-10 minutes to administer and measures two major components of test anxiety: worry and emotionality. The tool requires participants to report how frequently they experience specific anxiety symptoms in test-taking situations. Each item on the tool has a possible score of one (least anxious) to four (most anxious). The subjects were contacted at the site of schools personally and their sincere cooperation was solicited. Respondents were called to a common place, when they will not be busy and had enough time to spare for testing. Necessary instructions were provided to the subject before the administration of test. Confidentiality of the responses will be guaranteed so that the subjects would not camouflage their real feelings. As soon as a group of players completed the test anxiety Questionnaire, These were collected from the male and female sportspersons and verified that no questionnaire was left without being answered. Academic achievement was based upon the previous achievement of each level male and female sportspersons in the form of total marks obtained in five subjects and its percentage at 10th level examination on prescribed Performa.

RESULTS AND DISCUSSION

Mean and SD, Pearson's Product Moment Correlation Coefficients and t-test were computed for the collected from the male and female respondents by using SPSS 16.0 software and data pertaining to this has been presented in Table 1 to 3. The mean scores on test anxiety and academic performance in different school courses of male and female sportspersons have been depicted in figure 1 to 7.

It is quite obvious from Table 3, that statistically significant differences existed between male and female sportspersons on academic performance in different school courses and total academic achievement, as the obtained t-values of 3.12, 2.43, 9.92, 2.14, 3.86 and 5.17 respectively were higher than the required $t_{.05(108)}=1.98$. But the significant difference was not found between male and female sportspersons on test anxiety, as the obtained t-value of 1.23 was less than the required $t_{.05(108)}=1.98$. Table 3 shows that the coefficients of correlation between test anxiety and academic performance of male sportspersons were found non-significant and positive in English, Hindi, Math, Social studies and negative in Social Science, as the obtained r-values of .077, .131, .009, .028 and -.066 respectively were lesser than the required r-value of $r_{.05(108)} = .174$. Hence, it may be concluded that male sportspersons with high test anxiety achieved lower in social science and male sportspersons with low test anxiety achieved higher in social science. It may also be concluded that test anxiety was found to be uncertain with academic performance of male sportspersons in five school courses. Hence the relationship of the two did not seem to be differential.

In case of female sportspersons, the coefficient of correlations between test anxiety and academic performance were found significant in Hindi and Math courses, as the obtained r-values of .206 and .487 respectively were higher than the required r-value of $r_{.05(108)} = .174$. But the coefficient of correlations between test anxiety and academic performance were found insignificant in English, Social studies and Social Science courses, as the obtained r-values of .162, .074, and -.065 respectively were lesser than the required r-value of $r_{.05(108)} = .174$. The positive correlation was also observed between test anxiety and academic performance in English, Hindi, Math, Social Science and negative in Social studies. Hence, it may be concluded that test anxiety was found to be uncertain with academic performance of female sportspersons in five school courses. Hence the relationship of the two did not seem to be differential. It may also be concluded that female sportspersons with high test anxiety achieved lower in social studies and female sportspersons with low test anxiety achieved higher in social studies.

Conclusion

- Male and female sportspersons had significant differences on academic performance in different school courses and total academic achievement, but they did not differ on test anxiety.
- Male sportspersons with high test anxiety achieved lower in social science and with low test anxiety achieved higher in social science.

- Female sportspersons with high test anxiety achieved lower in social studies and with low test anxiety achieved higher in social studies.
- Test anxiety was found to be uncertain with academic performance of male and female sportspersons in five school courses.
- Total academic achievement was found higher in female sportspersons than their counter parts.

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