



Gender Difference on Anxiety and Academic Achievement among Selected Residential High School Children

M. V. Mokashi¹, V. S. Yadav and P. B. Khadi

*Department of Human Development, College of Rural Home Science,
University of Agricultural Sciences, Dharwad 580 005, Karnataka, India*

¹*E-mail: malavika.m17@gmail.com*

KEYWORDS Anxiety. Academic Achievement. Residential Children. Lack of Self-Sentiment. Guilt Proneness

ABSTRACT To assess the gender differences on anxiety and academic achievement, the study was conducted on a purposively selected sample of 330 residential children from VIII, IX and X standards. Anxiety was measured by using Cattell's Anxiety Scale and marks obtained in the previous final examination were considered for assessing academic achievement. Results revealed that residential children were high in their anxiety and also in their academic achievement. Boys were significantly having higher anxiety while girls were higher in academic achievement. Results also reported no significant difference between both boys and girls of VIII, IX and X standards on their anxiety, while there was a significant difference on their academic achievement. A significant negative relationship between lack of self-sentiment, guilt-proneness and overall anxiety with the academic achievement of children was reported. Hence there is a need for counseling residential school children to overcome their higher anxiety and improve their academic performance.

INTRODUCTION

The development of human resources and maximum utilization of the resources are necessary for the growth and prosperity of any society. The institutions of learning, especially the schools are the principal means of socialization to develop children into useful citizens so that they fit into adult roles and also different occupational roles. It is only children who are high in their academic achievement who can be moulded to occupy strategic position in society and thereby determine the destiny of society (Manocha 1993). Academic achievement occupies a very important place in continuing higher education as well as in the selection and placement in any organization and institution.

Academic achievement refers to the degree or level of success attained in school performance. It means the attained ability to perform school tasks, which can be general or specific to a given subject matter. The standard of excellence may be task related (for example, degree of accuracy in the performed act) or in other words academic achievement is the performance

of the pupils' accomplishment in a subject of study (Krishnamurthy 2003).

Academic achievement is considered as the glittering crown which reflects a sense of sincerity, candidness and perseverance on the part of achievers and also parents, teachers and all those helping him to achieve it. Hence, both home and school environment act for the development and effective achievement of the pupil.

The trend in the academic achievement, rate of drop outs, failures and low percentage of students in the examinations was a question for the researchers to probe into the psychological factors that lead to poor achievement. The baffling facts which have come into limelight are that in spite of having similar educational facilities and environment, the academic achievement of students differs from one another. The cause of such problems may have to be located in the intellectual as well as in non-intellectual factors of the students' personality like academic motivation, family and school environment and some psychological factors like depression, anxiety, frustration etc. (Katyal and Bindra 1995).

Anxiety is considered as the major cause of impaired academic performance. It is a fear experience in response to an anticipated threat of self-esteem. Freud, Neo-Freudians and other learning theorists considered anxiety as a conditioned fear and as an inevitable partner of development. It results from many factors like difficult family situation, restricted school en-

Address for correspondence:

Mrs. Malavika Mokashi

C/o V. A. Mokashi

Near Canara Bank

Station Road, Malamaddi

Dharwad – 580 007

Karnataka

E-mail: malavika.m17@gmail.com

vironment, occupational and financial difficulties which in turn affects the performance of the children in the school.

The residential type of school system tends to improve students academic performance. Residential school system prepares students academically, physically and mentally to develop the good qualities of mind, body and character by using high discipline. Complex curriculum, heavy loads of restricted movements in the campus and compulsory participation in extracurricular activities sometimes creates high pressure and anxiety in some students which may in turn affect their academic performance. Some of the researchers reported that gender also contributes significantly to the performance of the children in the school. Vijaylaxmi and Nateson (1992), Pomernatz et al. (2002), Dwyer and Johnson (1997), and Kimball (1989) in their studies reported that girls were superior to boys in their academic performance are less prone to the development of anxiety. So the present study is an attempt to explore the gender difference in the level of anxiety and academic achievement of high school children with the following objectives. 1) To study the gender difference in the level of anxiety and academic achievement of high school children. 2) To study the relationship between anxiety and academic achievement of high school children.

METHODOLOGY

Ex-post facto research design was adopted in the present study to identify the relationship between anxiety and academic achievement. The sample of the study consisted of 330 students, comprised of 165 boys and 165 girls from VIII, IX and X standards of two purposively selected residential schools namely, Kittur Rani Chennamma School of Kittur and Sainik School of Bijapur. Their age ranged between 14-16 years. For assessing academic achievement, marks obtained in the previous final examination were considered. Anxiety was measured by using Anxiety Scale developed by Cattell (1963). 't' – test was used to test the difference between boys and girls on their anxiety components. One-way (2 factor) analysis of variance technique was carried out to compare the respondents of VIII, IX and X standards in relation to their anxiety and academic achievement. Karl-Pearson's product moment correlation coefficient

analysis was carried out to assess the degree of relationship between anxiety and academic achievement.

RESULTS AND DISCUSSION

The results of the Table 1 revealed a significant difference between boys and girls on their anxiety. The mean scores showed that boys (41.64) were more anxious than the girls (37.07). The results also reported no significant difference between the children of VIII, IX and X standards in relation to their anxiety. The interaction between gender and standard also indicated no significant difference in relation to their anxiety. These results are in line with the study conducted by US Department of Justice (1995) which highlighted that boys are more prone to externalizing symptoms such as physical and verbal aggression than the girls which are caused by psychological problems like depression, anxiety, internal distress, etc. This may be due to the fact that girls are hereditarily more prone to mature early. They develop the tendency of high exploration and commitment in their day- to- day activities and they are less prone to conflicting situations and ideas and thus they are less prone to the development of anxiety.

The analysis of difference between boys and girls on the components of anxiety (Table 2) clearly mean that boys were higher than girls in anxiety components as well as on anxiety. A significant difference was observed between the boys and girls in relation to their lack of self sentiment development, ego-weakness, guilt proneness and frustration tension and overall anxiety, whereas no significant difference was observed on suspiciousness. These results related to anxiety conformed that boys are higher in their anxiety than girls and also in lack of self sentiment development, ego-weakness, suspiciousness, guilt-proneness and frustration tension.

To know the difference of boys and girls in relation to their standards, interactional analysis was carried out. The results (Table 3) revealed significant information that there was significant difference between girls and boys of different classes on their academic achievement. It means that girls (85.68) were higher in their academic achievement compared to boys (79.05). Correspondingly as the respondents

Table 1: Comparison between boys and girls on anxiety [N = 330 (Boys = 165; Girls = 165)]

| S. No. | Standards | Boys (Mean) | Girls (Mean) | Total |
|--------|-----------|-------------|--------------|-------|
| 1 | VIII | 40.40 | 36.94 | 38.67 |
| 2 | IX | 41.61 | 37.20 | 39.40 |
| 3 | X | 42.92 | 37.07 | 40.00 |
| | Total | 41.64 | 37.07 | 39.36 |

ANOVA

| Source | 'F' Value | Standard error | Critical difference |
|-----------------|--------------------|----------------|---------------------|
| Gender | 31.96** | 0.57 | 1.57 |
| Standard | 0.90 ^{NS} | 0.70 | - |
| Gender*Standard | 0.74 ^{NS} | 0.99 | - |

Note: ** Significant at 0.01 level NS- Not significant

go to the higher classes the academic achievement has decreased as there was a significant difference between VIII and X, correspondingly IX and X. Further, it was also conformed by the interactional analysis that there was no significant difference among the girls of VIII, IX and X standards but significant difference between the students of VIII – X and IX – X were observed.

These results conformed that academic achievement of girls is significantly higher

compared to boys and also conformed that there were more individual difference among boys compared to girls. These results clearly conformed that gender contributes significantly to the academic achievement. Girls are superior in their academic achievement but boys differ significantly in their academic achievement. All these results are due to the fact that girls nurtured more or less similarly in all the families in the Indian culture and they mature early physically and psychologically. Therefore there is every chance to find individual differences among girls to a minimum extent. Therefore girls are encouraged highly to supersede boys in their academic performance by exploration and commitment.

The results of the present study are in conformity with the results obtained by Bharati (1993) who reported that majority of the girl students belonged to the distinction group with 70-80 percentages than boy students. Subrahmanyam (1986) also revealed that girls score higher percentages in reading comprehension than the boys. Roberts (1991) reported that girls view their performance as being informative about their abilities and thus excel in their studies than the boys. Results of the study

Table 2: Comparison between boys and girls on the components of anxiety [N = 330 (Boys = 165; Girls = 165)]

| S. No. | Components of anxiety | Standards | Boys | | Girls | | 't' value |
|---------|------------------------------------|-----------|-------|------|-------|------|---------------------|
| | | | M | SD | M | SD | |
| 1 | Lack of Self Sentiment Development | VIII | 7.45 | 2.41 | 6.56 | 1.86 | 2.164** |
| | | IX | 7.69 | 2.55 | 6.45 | 2.33 | 2.648** |
| | | X | 7.43 | 2.66 | 5.07 | 2.81 | 4.523* |
| | | Total | 7.52 | 2.53 | 6.03 | 2.45 | 5.452* |
| 2 | Ego Weakness | VIII | 5.85 | 2.07 | 5.09 | 2.09 | 1.921** |
| | | IX | 6.03 | 1.98 | 5.34 | 2.16 | 1.747 ^{NS} |
| | | X | 5.81 | 2.13 | 5.63 | 1.62 | 0.502 ^{NS} |
| | | Total | 5.90 | 2.05 | 5.35 | 1.97 | 2.458** |
| 3 | Suspiciousness | VIII | 4.12 | 1.61 | 4.38 | 1.32 | 0.905 ^{NS} |
| | | IX | 4.40 | 1.72 | 4.25 | 1.58 | 0.459 ^{NS} |
| | | X | 4.32 | 1.73 | 3.92 | 1.76 | 1.200 ^{NS} |
| | | Total | 4.28 | 1.68 | 4.18 | 1.57 | 0.541 ^{NS} |
| 4 | Guilt Proneness | VIII | 12.46 | 2.77 | 10.72 | 2.52 | 3.378* |
| | | IX | 12.10 | 3.04 | 10.96 | 2.91 | 2.018** |
| | | X | 13.01 | 2.71 | 11.49 | 2.76 | 2.923** |
| | | Total | 12.52 | 2.85 | 11.06 | 2.74 | 4.741* |
| 5 | Frustration Tension | VIII | 10.56 | 3.18 | 10.18 | 2.31 | 0.720 ^{NS} |
| | | IX | 11.41 | 3.26 | 10.10 | 3.26 | 2.103** |
| | | X | 12.52 | 2.44 | 11.20 | 3.63 | 2.249** |
| | | Total | 11.50 | 3.07 | 10.49 | 3.14 | 2.940** |
| Anxiety | | VIII | 40.40 | 7.21 | 36.94 | 6.01 | 2.726** |
| | | IX | 41.61 | 8.31 | 37.20 | 8.21 | 2.804** |
| | | X | 42.92 | 6.64 | 37.07 | 7.43 | 4.354* |
| | | Total | 41.65 | 7.45 | 37.07 | 7.03 | 5.66* |

Note: ** Significant at 0.01 level

* Significant at 0.05 level

NS – Not Significant

Table 3: Comparison between boys and girls on the academic achievement [N = 330 (Boys = 165; Girls = 165)]

| S. No. | Standards | Boys (Mean) | Girls (Mean) | Total |
|--------|-----------|-------------|--------------|-------|
| 1 | VIII | 79.81 | 86.31 | 83.06 |
| 2 | IX | 82.37 | 84.92 | 83.65 |
| 3 | X | 74.82 | 85.79 | 80.30 |
| Total | | 79.05 | 85.68 | 82.34 |

ANOVA

| Source | 'F' Value | Standard error | Critical difference |
|-----------------|-----------|----------------|---------------------|
| Gender | 54.18** | 0.64 | 1.75 |
| Standard | 5.17* | 0.78 | 2.15 |
| Gender*Standard | 7.20* | 1.11 | 3.04 |

Note: ** Significant at 0.01 level * Significant at 0.05 level

conducted by Vijayalaxmi and Natesan (1992) and Pomernatz et al. (2002) reported that girls had a higher mean academic achievement than the boys. Dwyer and Johnson (1997) and Kimball (1989) reported that girls out perform boys in terms of grades across the school subjects.

The results of the Table 4 indicated the relationship between the components of anxiety with academic achievement of the selected residential high school children. These results showed that, among the five components of anxiety, lack of self-sentiment development, guilt-proneness and also overall anxiety had the significant negative relationship with the academic achievement of the respondents. These results may be due to the fact that failure of residential high school children to integrate their behavior about a clear self concept and feelings of unworthiness and depression which might have contributed to the negative relationship with academic achievement. There is a need to overcome lack of self-sentiment development, ego-weakness, suspiciousness, guilt-proneness and frustration tension among the residential school children by guiding them.

CONCLUSION

The results clearly indicated that residential high school children were high on anxiety and also on scholastic achievement. Boys were significantly having higher anxiety level than girls while girls were higher in their academic achievement. Strict residential school environment may have generated higher anxiety and

Table 4: Relationship between anxiety and academic achievement [N = 330 (Boys = 165; Girls = 165)]

| S. No. | Components of anxiety | Academic achievement |
|----------------|---|----------------------|
| 1 | Lack of self sentiment development (Q3) | -0.134* |
| 2 | Ego weakness (C) | -0.035 |
| 3 | Suspiciousness (L) | -0.030 |
| 4 | Guilt proneness (O) | -0.157** |
| 5 | Frustration tension (Q4) | -0.106 |
| Anxiety | | - 0.162** |

Note: ** Correlation is significant at the 0.01 level

* Correlation is significant at the 0.05 level

pressure for boys than girls. Majority of the boys had developed lack of self sentiment, ego-weakness, suspiciousness, guilt-proneness and frustration-tension to a higher level and a significant negative relationship was observed between lack of self-sentiment development, guilt-proneness and overall anxiety with the academic achievement of the residential high school children. So there is a need for counseling these residential children to cope up with the highly competitive school environment and to overcome their anxiety. Children must be guided by the school personnel at every stage of their schooling to perform well in their academics.

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