Predictors of Achievement Motivation Among Kenyan Adolescents

Article · July 2009

CITATION
1

READS
178

2 authors, including:

Immanuel Thomas
University of Kerala
33 PUBLICATIONS **88** CITATIONS

SEE PROFILE

the
Psychespace
Vol. 3, No. 2, 39-44, July 2009.

REPRINT

Predictors of Achievement Motivation Among Kenyan Adolescents

Jessina, M. Muthee* & Immanuel Thomas**

Abstract The present study was carried out to investigate the impact of classroom climate, intelligence, home environment and socio-economic status on achievement motivation of standard eight pupils of Nairobi city, Kenya. A proportionate stratified sample of 101 boys and 99 girls constituted the study sample. Both dependent and independent variables were measured using standardized instruments. Analysis of the data using multiple regressions showed that four independent variables, viz., intelligence, classroom climate, living with relatives and number of sisters jointly and significantly contributed to the prediction of achievement motivation of standard eight pupils (R= . 429; P < . 01). The results further indicated that in terms of magnitude of contribution, intelligence turned out to be the most significant predictor (Beta = .270, t = 3.986, P < .05), followed by class room climate (Beta = .267, t = 3.965, P <.05), living with relatives (Beta = -.156, t = 2.317, P < .05) and number of sisters at home (Beta = 0.148, t = 2.172, P < .05), in the order of significance.

KEYWORDS: Achievement motivation, classroom climate, socio-economic status and home environment.

* Lecturer, Muranga Teachers Training College, Kenya, and ICCR Sponsored Research Scholar

** Professor, Department of Psychology, University of Kerala

INTRODUCTION

Achievement motivation has been defined as self determination to succeed in whatever activities one engages in, be it academic work, professional work, or sporting event, among others (Tella, 2007). Gasinde (2000) observes that the urge to achieve varies from one person to the other, the urge being very high in some individuals and very low in others.

Motivation holds the key to understanding human behavior (Okoye 1985). Human beings can either be intrinsically or extrinsically motivated. Intrinsic motivation is said to be derived internally from the job itself, while extrinsic motivation is seen as incentives or rewards that a person can enjoy after he or she finishes the work. Though achievement motivation is a relatively new concept in the field of motivation (Mangal 2000), it has become very popular in the field of education. Atkinson and Feather (1966) asserts that individuals with high achievement motivation are at their best when they can maintain a high level of involvement in ensuring the excellence of activities under their coordination or control. However they function relatively less well when required to manage excessive tasks or to function in highly stressful environment.

The nature of academic motivation in the classroom has stimulated research over the last thirty years. Most of this research has been designed to understand motivation to achieve in co-educational setting using different models of motivation (Rogers, 2004). A lot of research has been done in Western countries on motivation to achieve. Several attempts have also been done in Indian setting. However, no research to date seems to have been done on

predictors of achievement motivation in the Kenyan setting. It is in this context that the present research was undertaken.

Theorists who study achievement motivation from the perspective of goal orientation argue that social context may play an important role in the setting up of achievement goals (Wilkins, 2006). Dweck and Legget (1988) observe that school setting leads to high valuation by students of those people who control important resources such as grades. Thus, the school context often exerts pressure on students towards maintaining high performance goals. Elliot and Dweck (1988) argue that variations in classroom climate (e.g., teacher emphasis on student's ability Vs. effort) may play a role in shaping students' learning goals.

Research indicate that intelligence is associated with achievement motivation. Carr & Kurtz (1999) reported from their study that children with high IQ and low expectations received low grades.

There are some reports indicating that socio-economic status of the parent is associated with children's achievement motivation. Kuppuswamy (1980) has noted that income of the parents, along with education and occupation are the important factors of socio-economic status of the family. High and middle socio-economic status families provide better facilities such as good home library, newspapers, periodicals, better residential areas, etc. to their children, which lead to high achievement motivation. On the other hand, families belonging to low socio-economic status are unable to provide such type of facilities, and thus, fail to facilitate high levels of achievement motivation. Brown (1977) and Cotton (2001) have observed that family involvement improves achievement motivation in children. Manhas and Dhingra (2009) also reported classroom scores to be low where there was low parental motivation and sharing of parental work with children.

Hypothesis

The study was formulated to test the tenability of the hypothesis that the following set of variables have unique contributions in predicting achievement motivation among primary school students in Nairobi, Kenya:

(a) gender of the pupil; (b) education of the father; (c) education of the mother; (d) monthly income; (e) occupational status of the father, (f) occupational status of the mother, (g) overall socio-economic status of the family; (h) home environment; (i) type of school; (j) number of sisters; (k) number of brothers; (l) living with parents/others; (m) classroom climate; and (n) intelligence.

METHOD

Sample

The participants for the study comprised of two hundred standard eight pupils (101 boys and 99 girls) studying in various primary schools of Nairobi city, Kenya. While selecting the sample, adequate representation was given to aspects like type of school management (public/private). The age of the subjects varied between 12 and 14 years. The break up of the sample on the basis of gender and type of school is presented in Table 1.

Table 1: Break-up of the sample on the basis of gender and type of school

Gender	Type of School		
	Public	Private	Total
Boys	54	47	101
Girls	46	53	99
Total	100	100	200

Tools

The following tools were used in the study:

1. Achievement Motivation Inventory (Muthee & Thomas, 2009): This is a 32 item scale intended to assess the achievement motivation among school students. Cronbach alpha computed for the scale was found to be .749 indicating that the scale has satisfactory internal consistency reliability. Validity for the scale is claimed on the basis of the fact that it is modeled after well known inventories meant for measuring achievement motivation. The scoring of the scale is done in such a manner that high scores indicate high levels of achievement motivation.

2. The Standard Progressive Matrices (SPM; Raven, 1939): Raven's progressive matrices are a popular culture free test of observation, capacity for clear thinking, and accurate intellectual work. Total scores indicate an individual's intellectual capacity regardless of his/ her level of education.

3. Classroom Climate Inventory (Muthee, 2009a): This scale is intended to measure student's perceptions of the psychological atmosphere prevailing in the class room. It is a 36 item scale with response anchors ranging from **always** (4) to **Never** (1). Details of validity and reliability are as follows: Cronbach's alpha computed for the scale was found to be .826 indicating that it has good reliability. Content validity for the scale is claimed on the basis of the systematic procedure followed in the development of the scale. The scoring is done in such a manner that the higher the scores the better the perceived classroom climate.

4. Home Environment Scale (Muthee, 2009b): This scale was developed to assess aspects of parental involvement in the child's school work at home. It is a 30 item scale with response anchors ranging from **always** (3) to **not at all (1).** Details of reliability and validity are as follows: Cronbach alpha computed for the scale was found to be .715 indicating that it has satisfactory internal consistency. Validity for this scale is claimed because of the systematic procedures followed for test construction and also because of the fact that it is modeled after a few well known inventories meant for measuring parental involvement in the child's school work at home.

5. General Information Schedule (Muthee, 2009c): An information schedule was used to collect general information about the subjects gender, age, type of school, number of brothers, number of sisters, educational level of the parents, monthly income of the family, type of house the family lives in, occupational status of the parents, house hold possessions, and the number of employees at home. There were 13 items which were related to various aspects of socio-economic status. These were weighted on a 10 point scale representing the importance of the item in determining the socio-economic status of the respondents. The item scores multiplied by the weights were then summed up to get the total score. The raw scores were converted to Z-scores and then to T-scores. The reliability of the tool was established through cronbach alpha which was found to be .903. It is claimed that the detailed steps followed in the development and standardization of test helped to ensure the validity of the test.

Statistical Techniques:

The statistical procedure employed to analyze the data was multiple "regression which enables identification of independent variables having significant and unique contributions in the prediction of the dependent variable.

RESULTS

The details of the outcome of multiple regression analysis done on the data are presented in Tables 2, 3, and 4.

Table 2: Multiple correlation (R) of the independent variables retained at successive stages of step wise regression with achievement motivation as dependent

Step	R	R Square	Adjusted R Square	Standard Error of the estimate	RSquare change
1	.272a	.074	.069	13.352	.074
2	.377b	.142	.133	12.884	.068
3	.403c	.163	.149	12.764	.021
4	.429d	.184	.166	12.637	. 021

(a) Predictors: (Constant) + Class-climate
(b) Predictors: (Constant) + Class-climate + Intelligence
(c) Predictors: (Constant) + Class-climate + Intelligence + Living with relatives
(d) Predictors: (Constant) + Class-climate + Intelligence + Living with relatives + Number of sisters.

The results of multiple regressions given in table 2 indicate that class-climate was the first variable to enter the regression equation. The multiple R for class- climate was 0.272 and R^2 was 0.074. Here it can be said that the class-climate accounts for 7.4% of variance in achievement motivation. Table 3 shows that the Beta value associated with class climate is 0.267. The positive sign of beta value indicates that there is a positive correlation between achievement motivation and class-climate.

The results further demonstrate that 18.4% of variance in achievement motivation of Kenyan adolescents is accounted for by the linear combination of the four variables. The capacity of the four independent variables to predict achievement motivation could not have happed by chance. The present finding is in consonance with the finding of previous researchers *(Johnson, 1996; Broussard & Garrison, 2004; Sandra, 2002)*. The significant impact of intelligence on achievement motivation is best understood when it is realized that intelligent people also tend to work very hard to sustain their performance.

The finding of the present study that, in addition to intelligence, the class room climate is also an important motivator is also supported by the findings reported by earlier researchers (Walberg, 1976, Haertel, et al., 1981, Fraser & Fischer 1992).

When children are required to stay with people other than their own natural parents for some or other reasons like parental death, separation, or parents being away, it is found to have a detrimental effect on their academic life and motivation. The findings of the present study in this regard are in consonance with that of Jeynes (2002). Children living with their own parents are often emotionally stable. The parents will leave no stones unturned to make sure that they are given the necessary support and that they are motivated to achieve. At the same time, those children living with relatives may develop many problems due to lack of warmth from the guardians, which can demotivate them from achieving.

It is interesting and surprising to find that the number of sisters of the respondents is a significant predictor of achievement motivation among Kenyan adolescents. The finding is in agreement with that of Circirelli (1967), who found that families with two brothers had poorer IQ and reading scores when compared to families with at least one sister. An explanation for this finding may be that the atmosphere of those homes with more female children is likely to be more orderly and calm. The parents are less distracted by the boisterous behavior, more characteristic of male children, and hence, they get more time to attend to the studies of the children and motivate them. This contention is supported by the finding that the variable, 'number of brothers', though not statistically significant, is negatively correlated with achievement motivation (vide Table 4).

With regard to the variables which failed to get included in the regression equation, it is interesting to note that none of the indices of socio-economic status, (e.g., income, occupational status and educational level of the parent) were important in determining the level of achievement motivation of the children. The gender of the respondent and type of school was also found to be unimportant in this regard. This finding is rather unexpected and surprising in the sense that there are research reports indicating the importance of these variables in the academic life of children e.g., Basil, 2007; Foster, 1965; Cligent, 1966). However the results of the present study call for a rethinking about the role of these variables in motivating children in their academics. It is possible that socio-economic status of the parents and type of school loses its relevance when more potent variables like class-climate and intelligence of the respondents are included in the prediction equation for achievement motivation. The finding of the present study that class-climate is the most important predictor of achievement motivation have important implication for the teachers of primary schools. It follows that primary school teachers can play a significant role to motivate learners during the course of instruction. The significance of familial variables is also brought out by the variable living with the parents and number of sisters of the respondents.

References

Atkinson, J.W. & Feather, N.T. (1966). *A Theory of Achievement Motivation,* New York: John wiley.

Bandura, A. (1997). *Self-efficacy: The Exercise of Control,* New York: W. H. Freeman.

Basil, O. A. (2007). Socio-economic factors influencing students academic performance in Nigeria some explanations from a local survey, *Sociology and Social Work Community,* 21,1-13

Broussard, S. C. & Garrison, M.E. (2004). The relationship between classroom motivation and academic achievement in elementary school aged children, *Family Consumer Science Research Journal,* 33(2), 106-120.

Brown, A.L. (1997). Transforming Schools into Communities thinking and learning about serious matters, *The American Psychologist,* 52(4), 399-414.

Carr, M. & Kurtz, C. B. (1999). Is being Smart everything? The Influence of students achievement on teachers perceptions, *British Journal of Educational Psychology,* 64, 263-276.

Circirelli, V. (1967). Sibling Constellation, Creativity, IQ and Academic Achievement, *Child Development,* 38(2), 481-490.

Clignet, R. (1966). *The Fortunate Few, A Study of Secondary Schools in Ivory Coast:* Northern University.

Cotton, K. (2001 j. New Small learning Communities: *Findings from Recent Educational Laboratory,* Retrieved on 10.8.2009. from http://www.nwrel.org/scpd/sirs/ns/cpdf.

Dhingra, R. & Manhas, S. (2009). Academic Performance of Children as a function of interaction with parents and teachers. *Journal of Socio-Science,* 18(1), 59-64.

Dweck, C. S. & Legget, E. L. (1988). A Socio Cognitive approach to motivation and personality, *Psychological Review,* 95, 256-273.

Elliot, E. S. & Dweck, C. S. (1988). Goals on approach to motivation and achievement, *Journal of Personality andSocio-Psychology,* 24, 5-12.

Fisher, J. D. & Fischer, W. A. (1992). Changing AIDS - risk behaviour, *Psychological Bulletin,* 111 (3), 455 - 474.

Forster, P. J. (1965). *Education and Social Changes in Ghana,* London: Routledge and Kegan Paul.

Gasinde, A.M. (2000). *Motivation. InZ.A.A. Omideyi(editor), Fundamentals of Guidance and Counseling,* Ibadan: Kanead Publishers.

Haertel, G. D., Walberg, H. J. & Haertel, E. H. (1991). Socio-Psychological environment and learning, Aquantitive synthesis, *British Educational Research Journal, 1,* 27-36

Jeynes,W. H. (2002). Examining the effects of parental absence on academic achievement of adolescents, The challenges of controlling for family income, *Journal of Family and Economic Issues,* 23(2), 234-243. J

ohnson, O. J. O. (1996). *Child Psychology,* Calaba: Wusen Press Limited.

Kuppu Swamy (1980). *An Introduction to Social Psychology,* Bombay: Asia publishing house.

Mangal, S. K. (2000). *Educational Psychology,* Ludhiana Prakash Brothers Educational publishers, p.197.

Muthee, J. M. (2009 a). *Classroom Climate Inventory,* Trivandrum: Department of Psychology, University of Kerala.

Muthee, J.M. (2009 b). *Home Environment Scale,* Trivandrum: Department of Psychology, University of Kerala.

Muthee, J.M. (2009 c). *General Information Schedule,* Trivandrum: Department of Psychology, University of Kerala.

Muthee, J. M. & Thomas, I. (2009). *Achievement Motivation Inventory,* Trivandrum: Department of Psychology, University of Kerala.

Okoye, N. N. (1985). The Psychology of Motivation, Ibadan: Adebara publishers.

Rogers, V. J. (2004). Males Academic Motivation: Doing a Personal Best, *Academic Exchange Quarterly, Available at http www.the free library.com/mates + academic + motivation + doing + a + personal + best, a 0129973238.*

Sandra, A. (2002). Predictors of University Academic Performance in Columbiah, *Journal of Education Research,* 35,411-4117

Tella, W. (2007). Psychosocial Predictors of Academic Achievement, *Psychology for Everyday Living, 2* (2):155-169.

Walberg, H., Bole, R., & Waxman (1980). School Based Family Socialization and Reading Achievement in Inner City, *Psychology in Schools,* 17, 509-514.

Wilkins, N. J. (2006). *Why Try? Achievement Motivation and Perceived Academic Climate among Latino Youth,* Unpublished Masters Thesis, Georgia State University.

Received June 18, 2009
Accepted June 30, 2009