

A study of scholastic achievement and intelligence among the hosteller and day scholars of Gujjar and Bakerwal of Jammu and Kashmir

Mohd Zia-ul-haq Razaqi*

ABSTRACT

This paper is an attempt to study the scholastic achievement and intelligence of Gujjar and Bakerwal tribal students of the Jammu and Kashmir state. The sample for this study comprises of 200 tribal students comprising of 100 hostellers and 100 day-scholars studying in various government schools of Jammu and Kashmir. The total marks obtained by the respondents were taken as the raw score for the scholastic achievement. The total score obtained by the respondents on the Cattell's Culture fair (SCALE—2, FORM—A) test of intelligence taken as the raw score for intelligence. The results obtained after proper statistical treatment of the data reveal that the scholastic achievement of the hostellers is better than that of the day scholars. A little difference was found in the mean score values of intelligence, with hostellers having a slightly higher value than that of the day scholars. However, the variance shared by the intelligence was found to be higher in day scholars scholastic achievement than in hostellers. The results reveal that the higher scholastic achievement of hostellers are being very much influenced by other cognitive or non cognitive factors. Here it can be inferred that the incentives provided to hostellers play an important role in determining the scholastic achievement of these tribal pupils.

Key words: Gujjar, Bakerwal, Scholastic achievement and Intelligence.

Introduction

The Gujjar and Bakerwal are the cosmopolitan tribal people of Jammu and Kashmir (except Ladakh region), ranking third in terms of their population after Muslims and Hindus of the State (Razaqi, 2015). From the times immemorial these tribal are engaged in animal rearing mainly buffaloes, cows in case of Gujjars and Goats in case of Bakerwals. There are twelve tribal groups enumerated by the constitution of Jammu and Kashmir in 1991. Out of these twelve Gujjar and Bakerwal is the largest ethnic group, comprising with a total population of 1,105,979, sharing a total of 10.9% of the total population of the state which forms nearly 1.3 % of the total tribal population of the country (Razaqi, 2014).

India became independent in 1947 and after that all efforts were made to achieve and regain the round development in every field so that people could take benefits for their betterment. In Jammu and Kashmir a committee for the development of Gujjar and Bakerwal was set up in the year 1974 headed by former Prime Minister of Jammu and Kashmir (Shamas-ud-din). Since then the advisory board has touched notable heights of achievement for the upliftment of Gujjar and Bakerwals. Among them the establishment of Gujjar and Bakerwal hostel, a housing colony for nomadic Dhodi Gujjars, various scholarships for students, and construction and allotment of shops for Gujjar and Bakerwals at different places to boost their economic condition and also to change their profession in accordance with the changing scenario are to be worth mentioned (GOJ&K, 2006)¹.

¹ Government of Jammu and Kashmir.

*Research scholar Department of Education. Aligarh Muslim University, Aligarh.

Significance of the study:

Since independence India has and is making enormous efforts to achieve the set goal of development. For this a number of policies and planning programmes have been introduced from time to time to quench the thirst of every citizen in general and that of tribal's in particular. Despite various efforts satisfactory results are to be achieved yet. Sachchidananda, (1967) blamed the illiteracy of tribals for their meager condition. As to avail benefits of the existing schemes a certain amount of education is necessary, otherwise a class of exploiters among exploited arises within the tribal community. In the state of Jammu and Kashmir a good number of educated youth has emerged because of various efforts made by the government in general and that of Gujjar and Bakerwals in particular. Most among them are the products of Gujjar and Bakerwal hostels. The majority of these hostels is set nearer or in the cities that make access to educational institutions very easy moreover, these hostels provide free boarding and lodging to the residents. Arrangements are made for private tuitions extra classes to boost their scholastic achievement. In this regard, the present study is an attempt to study the intelligence and scholastic achievement of Gujjar and Bakerwal students of Jammu and Kashmir. Attempts are made to study the impact of intelligence on the achievement of hosteller and day scholar pupils of these tribes.

Operational definitions:**School achievement:**

Scholastic achievement refers to the marks scored in 8th class. Total marks obtained in the Eighth class board examination were taken as the standard scores to represent the scholastic achievement of these tribal pupils. In the state of J&K 8th class examinations are held by the state board of school educations (JKBOSE).

Intelligence:

Intelligence for the present study is the total sum of scores obtained by each respondent on the Cattell's Culture fair (SCALE 2, FORM A) test of intelligence.

Hostellers:

The male residents of various Gujjar and Bakerwal hostels of class 9th (pass outs of 8th class) were considered as the hostellers for the present study.

Day scholars:

The male students of 9th standard from various government schools of the state were taken as day scholars for the present study.

Objectives:

1. To study and compare the school achievement and intelligence of hosteller and day scholar tribal students of J&K.
2. To study the impact of intelligence on the scholastic achievement of the total sample, hosteller and day scholars.

Hypothesis:

1. Hostellers and day scholars don't differ in scholastic achievement and intelligence.
2. There is no impact of intelligence on the scholastic achievement of the total sample, hosteller and day scholars.

Methodology:

The population for the present study consists of all Gujjar and Bakerwal students of 9th standard. A sample of 200 male Gujjar and Bakerwal students of Jammu and Kashmir State was obtained by adopting

the convenient random sampling technique. Among these 100 were selected from various Gujjar and Bakerwal hostels and 100 from various government schools operating in the state of Jammu and Kashmir.

Analysis and interpretation:

Objective 1: To study and compare the school achievement and intelligence of hosteller and day scholar tribal students of J&K

In order to achieve the set objective the mean difference of these two samples were calculated by independent t-test and the calculated values are tabulated as under.

Table 1: Descriptive statistics

Variables		N	Mean	Std. Deviation	Std. Error Mean
Scholastic Achievement	Hosteller	100	57.24	9.097	0.910
	Day scholar	100	49.70	8.277	0.828
Intelligence	Hosteller	100	13.58	2.917	0.292
	Day scholar	100	12.26	2.549	0.255

Glance at table 1 reveal that the mean scholastic achievement of the hosteller students is 57.24 with a standard deviation of 9.09 and that of day scholars is 49.70 with a standard deviation of 8.27. The mean value of intelligence for the hosteller sample is 13.58 and that of day scholars is 12.26 with a standard deviation of 2.91 and 2.54 respectively. These values reveal that the students of Gujjar and Bakerwal hostels possess better scholastic achievement and intelligence than their counterparts at government schools. In order to verify this difference a independent sample t-test was carried out and the calculated value are tabulated below.

Table 2: Independent sample t-test

	Sample groups	N	Mean	Sd.	df	t-value	Sig.
Scholastic Achievement	Hosteller	100	57.24	9.097	198	3.40	0.05
	Day-scholar	100	49.70	8.277			
Intelligence	Hosteller	100	13.58	2.917	198	6.12	0.05
	Day-scholar	100	12.26	2.549			

Table 2 candidly reveals that that the obtained difference in mean values are statistically significant at 0.05 level of confidence, with a t-value of 3.40 and 6.12 for scholastic achievement and intelligence respectively. Therefore, the above formulated hypothesis number one is completely rejected.

Objective 2: To study the impact of intelligence on the scholastic achievement of the total sample, hosteller and day scholars.

In order to achieve the set objective, simple linear regression analysis was carried out considering scholastic achievement as the criterion variable and intelligence as the predictor variable. The obtained values are tabulated as under.

Table 3: Simple linear regression analysis between criterion and predictor variable

Model	R	Adjusted R Square	R ² change	df	F-change
Total sample	0.66	0.443	0.443	198	157.753**
Hosteller	0.569	0.317	0.324	98	46.969**
Day scholar	0.733	0.533	0.538	98	114.126**

**Significant at 0.01 level of confidence

Table 3 reveals that a total of 44.3% of variance is shared by intelligence in determining the scholastic achievement of total Gujjar and Bakerwal students of J&K state. For the hosteller sample intelligence shares only 32.4%, while as in day scholars a big chunk of 53.8% of variance is shared by this predictor variable. All these regression models are statistically significant at 0.01 level of confidence.

Discussion:

The scholastic achievement is one of the important determinants of success in the contemporary world as it has become the face index of success and failure. Researchers studying the impact of various cognitive factors on the scholastic achievement have a general agreement that intelligence of an individual has moderate to strong correlation in determining the achievement of an individual. The correlation between intelligence and scholastic achievement usually ranges from 0.40-0.75 (Jencks et al, 1979; Bartels, Rietveld, Van Vaal, & Boomsma, 2002b; Brody, 1992; Jensen, 1998; Neisser et al., 1996; Sternberg, Grigorenko, & Bundy, 2001). In the light of the above results, it can be lucidly stated that intelligence plays an important role in defining the scholastic achievement of this tribal sample as a whole. It determines nearly 44.3% of variance in the criterion variable. But, in case of hosteller sample the role of intelligence shows a decline as it predicts only 32.4% of variance while as in the sample of day scholars a good percentage of 53.8% of variance is predicted by intelligence.

CONCLUSION: As evident from table 1, the scholastic achievement of the hosteller sample is better than that of the day scholars, therefor it can be safely inferred that besides cognitive faculties there are various other factors that are responsible for the better scholastic endeavour of the hostellers. Besides an approximately mean value of intelligence hosteller's are still forging ahead of day scholars. Indicating that there are various other factors or incentives responsible for the better scholastic achievement of the hostellers provided to them at residential hostels. Therefore, hostel facilities should be made accessible to a larger chunk of the tribal students. So, as to upliftment them from the grunge and filth of poverty, as education is universally applauded factor for progressive growth and development.

Acknowledgement: I am highly thankful to Professor Nabi Ahmed, formerly Chairman, Department of Education Aligarh Muslim University, Aligarh, for providing timely guidance and valuable suggestions that led to the development of this paper.

References:

- Bartels, M., Rietveld, M. J. H., Van Baal, G. C. M., & Boomsma, D. I. (2002). Heritability of educational achievement in 12-year-olds and the overlap with Cognitive Ability', *Twin Research*, 5 (6), 544-53.
- Brody, N. (1992). *Intelligence* (2nd Edition). New York: Academic.
- Cattell, R. B., and Cattell, A. K. S. (1957). (Ed. Singh, R. N., and Kapoor, S. D. (1999). *Test of 'g': Culture Fair, Scale 2, Form A*. Institute for personality and ability testing, Illinois—61820. (National Psychological Corporation, Agra)
- Government of Jammu & Kashmir, GOJK. (2006). *Compendium of Rules, Circulars, Guidelines*. Vol, 1. Published by: Gujjar and Bakerwal Advisory Board.
- Jencks, C. (1979). Who gets ahead? The determinants of economic success in America. P. 102, New York, NY: Basic Books.
- Jensen, A. R. (1998). *The g Factor: The Science of Mental Ability*. New York: Praeger
- Neisser, U., Boodoo, G., Bouchard, T. J., Boykin, A. W., Brody, N., and Ceci, S. J., Halpern, D. F., Loehlin, J. C., Perloff, R., Sternberg, R. J., Urbina, S. (1996). Intelligence: Knowns and unknowns. *American Psychologist*, Vol 51 (2), Feb 1996, 77-101.
- Rafaqi, M. Z. (2014). "A Study of Socio-Economic Status among the Gujjar and Bakerwal Tribal Clans of J&K" *Asian Journal of Multidisciplinary Studies*, 2 (7).
- Rafaqi, M. Z. (2015). A Study of School Achievement among the Gujjar and Bakerwal Tribes of Jammu and Kashmir. *Bangladesh e-Journal of Sociology*. Volume 12 (1).
- Sachchidananda, (1967). *Socio-economic Aspects of Tribal Education*. Report of The National Seminar on Tribal Education in India, New Delhi: NCERT.
- Sternberg, R. J., Grigorenko, E. L., & Bundy, D. A. (2001). The predictive value of IQ. *Merrill-Palmer Quarterly*, 47 (1), 1-41.
- Yawan, L., & Linshu, L. 'Construct Learning Support System for Distance Education in China'. A paper presented at 10th Cambridge International Conference on Open and Distance Learning, 2003.
- Zuhairi, A., Pribadi, B., & Muzammil, M. 'Quality assurance as continuous improvement in distance higher education: we write what we do, and we do what we write!' A paper presented at the seminar of the Association of the Southeast Asia Institutions of Higher Learning. 9-11 December 2003. Jakarta, Indonesia.
- Knapper, C. 'Lifelong Learning and Distance Education'. *American Journal of Distance Education*, 2(1):1988, 63-72.
- Knowles, M. *The Modern Practice of Adult Education: From Pedagogy to Andragogy*. Chicago: Follett Publishers, 1980.
- Kukulka-Hulme, A. and Traxler, J. 'Designing for mobile and wireless learning'. Eds. Beetham, H. & Sharpe, R. *Rethinking Pedagogy for a Digital Age: Designing and Delivering e-learning*. London :Routledge, 2007. 180-192.
- Meacham, D. & Evans, D. 'Distance Education: The Design of Study Materials'. *Journal of Higher Education* 44:1989, 661-679.