

The Quality of Elementary Education: A Case Study of East Kameng District in Arunachal Pradesh

Beori Yabe

Ph. D. Scholar, Department of Education,
Rajiv Gandhi University Rono, Hills, Doimukh, Itanagar A.P.

Abstract: The present study is an attempt to study the quality of elementary education: A case study of East Kameng district in Arunachal Pradesh. The purpose was to study the quality education in respect of infrastructures facilities, physical and social access and academic achievement. The sample consists of 45 government schools. A total of 744 elementary schools going students out of which 346 male and 398 female students of East Kameng district were collected as sample of which from 5th standards were randomly selected for the present study. The researcher intended to measure the level of academic achievement of students towards quality education for which the researcher used the statistical techniques such as Mean, SD and t-test to find out the significance of difference exist among the students with respect to gender, tribes, settlement and levels of schools. From the whole study the result reveals that elementary school level students of male and female students showed significantly the same level of performance towards quality education. In case of urban and rural students also possess moderate levels of performance towards quality education and both the groups of students having same levels of performance. Lastly, the researcher found out that tribal and non-tribal students had significantly moderate and same levels of performance towards quality education.

Keywords: Quality Education, Elementary Education, Gender, Settlement and Tribes.

I. INTRODUCTION

A good quality education is the birth right of every child. Quality education must be open to change and evolution based on information, changing contexts, and new understandings of the nature of education's challenges. In India lots of efforts had been made before and after independence to provide free and compulsory elementary education to every child without any discrimination. In the year 1950, when the Constitution of India was adopted, education was recognized as a basic individual right. Directive Principles of State Policy, Article 45, states that "the state shall endeavour to provide within a period of ten years from the commencement of this Constitution, for free and compulsory education for all children until they complete the age of fourteen years". In line with the commitment of the country to provide elementary education to all children, educational facilities have got tremendously expanded during the post independence period, especially in primary stage. Afterwards various Commissions

and Committees appointed by the Government of India also gave recommendations to universalize elementary education and lots of programmes such as Shiksha Karmi Project, DPEP, and SSA were initiated in this direction. The Right of Children to free and Compulsory Education Act (RTE) 2009 is a detailed.

II. SIGNIFICANCE OF THE STUDY

Elementary Education is one of the basic services offered by governments and other stakeholders to society. Authors like Bray *et al* (1986:40); Miller (2001:30) and Books (1996:3) posit that education is a tool for economic development. If education is to meet this goal, it must be of high quality. In all aspects of the school and its surrounding education community, the rights of the whole child, and all children, to survival, protection, development and participation are at the centre. This means that the focus is on

learning which strengthens the capacities of children to act progressively on their own behalf through the acquisition of relevant knowledge, useful skills and appropriate attitudes; and which creates for children, and helps them create for themselves and others, places of safety, security and healthy interaction. (Bernard, 1999) This definition also takes into account the global and international influences that propel the discussion of educational quality (Motala, 2000; Piphoo, 2000), while ensuring that national and local educational contexts contribute to definitions of quality in varying countries (Adams, 1993). Establishing a contextualized understanding of quality means including relevant stakeholders. Key stakeholders often hold different views and meanings of educational quality (Motala, 2000; Benoliel, O’Gara & Miske, 1999). Indeed, each of us judges the school system in terms of the final goals we set for our children our community, our country and ourselves (Beeby, 1966).

Moreover, the studies have been carried out pertaining to SSA and its impact on the quality of education at the elementary school stage in India such as Technical Support Group (TSG) of Ed. CIL, NCERT, NUEPA, IGNOU etc. Some of the important studies are: TSG of Ed. CIL (2005) conducted All India Sample Survey to estimate the number of out of school children and found that the country had about 19.4 crores children in the age group 6-14 years out of school which comes 6.9 % children out of school and 68.3 % of these children never attended the school where as 31.7 % of them happened to be the drop outs. Further, out of those children who were attending school, 97.3% studied in Government or Private recognized schools (including recognized Madarsas / Sanskrit Pathshalas) and another 1.8 % attended unrecognized schools. The remaining 0.9 % children attended Education Guarantee School, Alternative & Innovative Education centres or recognized Madarsas / Sanskrit Pathshala. The report of the survey was published by Ed. CIL in 2006. It is observed that there is hardly any study that has been conducted by any of the researchers on the quality of education at elementary education in East Kameng district of Arunachal Pradesh in particular. Therefore, the researcher took this study in hand for investigation, which is quite significant in nature.

STATEMENT OF THE PROBLEM

The Quality of Elementary Education: A Case Study of East Kameng District in Arunachal Pradesh

OBJECTIVES OF THE STUDY

The main objectives of the present study have been put as under-

- ✓ To study the physical access of East Kameng District in Arunachal Pradesh;
- ✓ To study the social access of East Kameng District in Arunachal Pradesh;
- ✓ To study the quality enabling conditions at the elementary school stage in selected district of Arunachal Pradesh
- ✓ To investigate the academic achievement of elementary school going learners of East Kameng District in Arunachal Pradesh;

HYPOTHESES OF THE STUDY

- ✓ There is no significant difference in the academic achievement of the boys and girls learners of the district;
- ✓ There is no significant difference in the academic achievement of the rural and urban learners of the district;
- ✓ There is no significant difference in the academic achievement of the tribal and non-tribal learners of the district;

DELIMITATIONS OF THE STUDY

- The study has been delimited to-
- ✓ East Kameng district of Arunachal Pradesh.
 - ✓ Classes V Grade of students under Sarva Shiksha Abhiyan schools of the district.
 - ✓ Primary stage learners of Sarva Shiksha Abhiyan.

III. METHODOLOGY

Learners of the whole elementary schools of the East Kameng district have been considered as the population of the present study. But, the present investigator has been selected 45 elementary schools. A total of 744 elementary schools going learners out of which 346 male and 398 female students of East Kameng district were collected as sample of which from 5th standard were randomly selected for the present study by using simple random sampling technique.

TOOLS AND STATISTICAL TECHNIQUES USED

For the present study, an attitude scale (Likert-type) was used for knowing the attitude of learners towards quality of elementary school stage, learners’ progress reports and Quality Assessment Questionnaire (QAQ) were developed by researcher as tools of the study.

ANALYSIS OF DATA: Both ‘CR’ and ‘t’-test were used to analyse the collected data and verify the hypotheses.

IV. ANALYSIS AND INTERPRETATION OF RESULTS

Objective 1: To investigate the physical access of education at the elementary school stage in selected district of Arunachal Pradesh.

For the purpose of objective-1, the investigator used the tables 1.1 those are put as under:

A-Physical Access:

No. of Schools	Distance from schools	No. of Habitations	No of learners coming to school	
45	0-2 KMs	93	5696	(88.90%)
	2-3 KM	11	454	(7.09)
	3-4 KM	20	178	(2.78%)
	4 KMs and above	5	79	(1.23%)
		129	6407	(100%)

Table 1.1: Showing Distance from Schools, No. of Habitations, and No. of learners of East Kameng District of Arunachal Pradesh (2015)

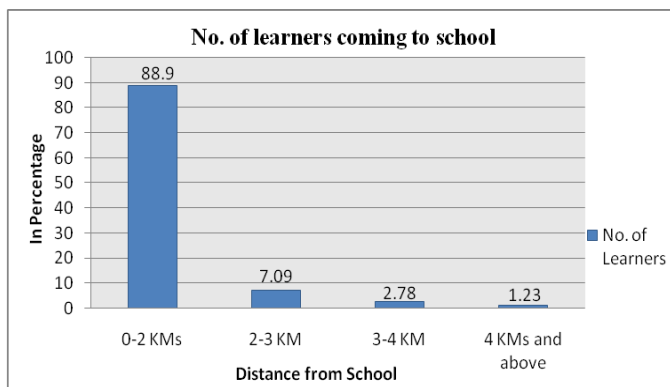


Figure 1: Showing No. of learners coming from difference distance from school in East Kameng District of Arunachal Pradesh (2015)

Table-1.1 shows the distance of habitations from the school and this table indicates that the primary school going 88.90% learners cover the distance 0-2 KMs from their habitations to schools in East Kameng district of Arunachal Pradesh respectively. It means that majority of learners find the school within the radius of 0-2 KMs. The tables show that only 1.23% learners need to cover more than 4 KMs distance to reach to schools from their habitations in East Kameng districts respectively. It shows that the quality of education in Arunachal Pradesh does have its positive impact on the physical access as because of the opening of new schools in view of the requirements of the residents of different remotely located habitations. As the state of Arunachal Pradesh is dominated by mountainous topography, therefore, the school going 2.78% learners cover the distance of 3-4 KMs and which walking to school the learners do face some problems as they are to cross deep valleys, gorges, streams, hanging bridges, forests etc.

Objective 2: To investigate the social access of education at the elementary school stage in selected district of Arunachal Pradesh.

For the purpose of objective-2, the investigator used the tables 1.2 those are put as under:

For the purpose of quality of access, the table 1.2 is put as under;

B – Social Access:

Access	East Kameng	
	Yes	No
Caste	45 (100%)	0 (0.0%)
Religion	45 (100%)	0 (0.0%)
Gender	45 (100%)	0 (0.0%)

Table 1.2: Social Access in Dibang Valley, Lower Subansiri and East Kameng Districts (2015)

The Table-1.2 reveals that there is 100% social access which means that all the learners (100%) are being enrolled in primary/upper primary schools and there is no any discrimination on the basis of caste, religion, of gender in giving the admission in schools/classrooms in the selected sample of district.

Objective 3: To study the quality enabling conditions at the elementary school stage in selected district of Arunachal Pradesh.

To achieve the objective-3 of study, the investigator used the tables-1.3 to 1.5 and these tables have been placed as under;

Information	East Kameng
Total No. of Classroom	294
Total No. of Teachers	361
Untrained	190 (52)
Total enrolment	6243
Students and classroom ratio	Average = 1:21
	Lowest = 1:8
	Highest = 1: 60
Pupil teacher Ratio	1:17

Table 1.3: Showing Quality Enabling Conditions of School Classroom of East Kameng District of Arunachal Pradesh (2015)

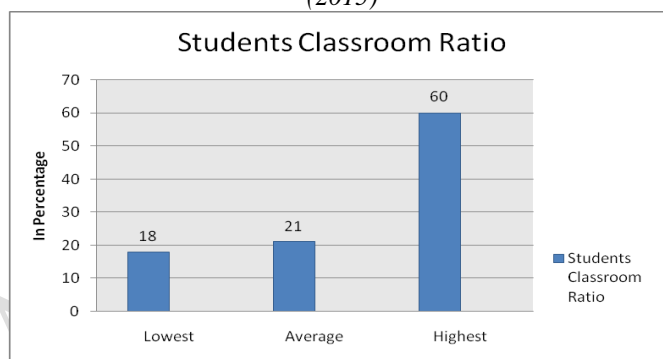


Figure 2: Showing of Students and School Classroom Ratio in East Kameng District of Arunachal Pradesh (2015)

The Table-1.3 shows the status of teachers and students at elementary school stage in East Kameng districts of Arunachal Pradesh. The table-1.3 shows that highest learners and classroom ratios came out to be 1:21 on an average and the lowest ratio of students and classroom was recorded 1:8 whereas the highest ratio was found 1:60. On the other hand, the pupil teacher ratio came out to be 1:17 which is quite satisfactory in nature.

Information	East Kameng
Classroom sitting Arrangement	
Adequate	33 (73.34%)
Inadequate	12 (26.66%)
Government Building	
Government Building	45 (100%)
Rented building	0.0 (00%)
School building	
Pucca	13 (28.88%)
Partially Pucca and Kacha	32 (71.12%)

Table 1.4: Showing Physical Infrastructure of School Building (2015)

The Table-1.4 indicates that 100% schools in East Kameng district have got 100% buildings provided by the Government of Arunachal Pradesh and there is no any such school which is being run in rented building in the district which is under the investigation. Further, it is a matter of satisfaction that 73.34% schools of the selected sample of East Kameng schools have got adequate building respectively. The table-1.4 shows that East Kameng district schools do have 28.88% pucca buildings. In this context, the school buildings

of district need to be improved. This shows that district need a little more fund for the civil work for having the required Pucca buildings in all the schools of this district.

Name of the district	East Kameng	
Total No. of School	45	
Information	Yes %	No. %
Ramp	17.77	82.23
Boundary wall	57.77	42.23
Playground	46.66	53.34
Play materials	40	60
Toilets	55.55	44.45
Kitchen shed	60	40
Electricity	26.66	73.34
Furniture	24.45	75.55
Blackboard	73.34	26.66
School bell	100	0.00
Drinking water	46.66	53.34

Table 1.5: Status of School Infrastructure in East Kameng District of Arunachal Pradesh (2015)

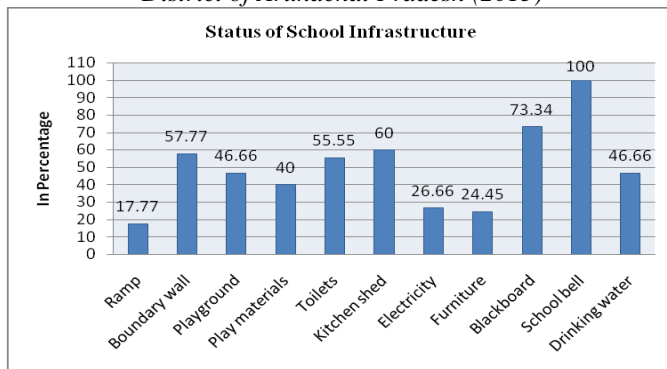


Figure 3: Showing the Status of School Infrastructure in East Kameng District of Arunachal Pradesh

The Table-1:5 indicate the status of other physical infrastructural facilities in the schools of East Kameng district in Arunachal Pradesh such as ramp, boundary wall, playground, play materials, toilets, kitchen sheds, electricity, furniture, blackboard, school bell, and drinking water supply. The master table-1.5 shows that the availability of ramp has been found 17.77% in the schools of East Kameng district. It shows that the ramps need to be provided in majority of schools to facilitate the differently-able children of district. Similarly, the table is quite indicative of the status of play grounds and play materials which have not been found adequately in district under investigation. Therefore, the playgrounds and play materials need to be provided adequately to encourage the learners for extra co-curricular activities. The toilet is considered essential for each school of the district but, the table-1.5 shows that 55.55% schools of district possess the toilet facilities whereas 45.45% schools do not have toilet facility which is a matter of seriousness and there must be some plan of action on this issue. Similarly it has been found that 60% schools of district possess the kitchen sheds for the purpose of Midday Meals (MDM) and rest of the 40% schools need to have the kitchen sheds. At present, the Midday Meals (MDM) is being managed in open on veranda or in some room with great difficulty. Almost same is the situation of furniture blackboard, and drinking water supply as shown in the table-1.5. There is need to provide some new

furniture and old furniture of the schools needs some repairing.

Objective 4: To study the academic achievement of elementary school going learners of East Kameng District in Arunachal Pradesh;

To achieve the objective-4 of study, the investigator used the tables-1.6 to 1.9 and these tables have been placed as under;

Class Interval	f	x	fx	fx ²
360-399	2	+5	10	50
320-159	12	+4	48	192
280-319	29	+3	87	261
240-279	55	+2	110	220
200-239	166	+1	166	166
160-199	226	0	0	0
120-159	205	-1	-205	205
80-119	44	-2	-88	176
40-79	5	-3	-15	45
0-39	0	-4	-0	0
	N =744		∑fx =113	∑fx² =1315

Table 1.6: Frequency Distribution table of Academic Achievement Scores of 5th Grade learners of East Kameng District of Arunachal Pradesh (2014-15)

$$\begin{aligned}
 \text{Mean} &= AM \pm \left(\frac{\sum fx'}{N} \right) \times i & SD &= \frac{i}{N} \sqrt{N \times \sum fx^2 - (\sum fx)^2} \\
 &= 179.5 \pm \left(\frac{113}{744} \right) \times 40 & &= 0.05 \sqrt{744 \times 1315 - (113)^2} \\
 &= 179.5 + 6.07 & &= 0.05 \sqrt{978360 - 12769} \\
 &= 185.57 & &= 0.05 \times 982.64 \\
 & & &= 49.13
 \end{aligned}$$

The computed result of the table-1.6 indicates that the computed academic achievement mean score of 5th grade learners came out to be 185.57 (46.39%) which is lesser than 50% out of the total 400 marks and the academic achievement scores of the 5th grade learners have been treated poor, so, the academic performance of 5th grade learners needs to be improved in general. Further, it was found that 64.51% 5th grade learners obtained less than 50% marks which mean the majority of learners have been recorded poor in their academic performance in the selected sample of districts of Arunachal Pradesh. There were only 13.17% learners of 5th grade who could obtain 60% marks (1st Class) and 86.82% 5th grade learners were recorded below 1st class (60% marks). In view of all these facts and figures, it is interpreted that the 5th grade learners have been found very poor in their academic achievement in the academic session (2014-15). Further the SD has been computed and came out to be 49.13 which indicates the wide variation among the 5th grade learners in their academic achievement.

HYPOTHESIS 1: There is no significant difference in the academic achievement of the male and female learners of the district;

Class V Students	N	Mean	SD	t-value
Male	346	184.58	49.88	0.62
Female	398	186.93	53.39	

Table 1.7: Summary of Results Academic Achievement Mean scores, SDs and t-value of 5th Grade Male and Female

learners of East Kameng District of Arunachal Pradesh (2015)

The table-1.7 shows that the computed t-value came out to be 0.62 which is lesser than the table t-value (1.96) at .05 level of confidence for 742 *df*, therefore the computed t-value (0.62) has not been considered significant and the formulated hypothesis: “there is no significant difference between the academic achievement mean scores of 5th grade male and female learners of East Kameng districts (2015)’ got retained from this, it is interpreted that the 5th grade male and female learners are almost the same in their academic achievement.

Hypothesis 2: There is no significant difference in the academic achievement of the Rural and Urban learners of the district;

Class V Students	N	Mean	SD	t-Value
Rural	336	194.02	52.95	4.26
Urban	408	178.62	43.81	

Table 1.8: Summary of Results Academic Achievement Mean scores, SDs and t-value of 5th Grade Rural and Urban learners of East Kameng District of Arunachal Pradesh (2014-15)

The table-1.8 shows that the computed t-value came out to be 4.26 which is greater than the table t-value (1.96) at .05 level of confidence for 742 *df*, therefore the computed t-value (4.26) has been considered significant and the formulated hypothesis: “there is no significant difference between the academic achievement mean scores of 5th grade Rural and Urban learners of East Kameng districts (2015)’ got rejected from this, it is interpreted that there is significant difference between the academic achievement scores of 5th grade rural and urban learners.

Hypothesis 3: There is no significant difference in the academic achievement of the Tribal and Non-Tribal learners of the district;

Class V Students	N	Mean	SD	t-Value
Tribal	611	178.38	44.15	10.47
Non-Tribal	113	218.59	60.01	

Table 1.9: Summary of Results Academic Achievement Mean scores, SDs and t-value of 5th Grade Tribal and Non-Tribal learners of East Kameng District of Arunachal Pradesh (2014-15)

The table-1.9 reveals that the computed t-value came out to be 10.47 which is greater than the table value (1.96) at 0.5 level of confidence for 742 *df*, therefore, the computed t-value (10.47) has been considered significant at .05 level of significance and the formulated hypothesis: “there is no significant differences between the academic achievement mean scores of 5th grade Tribal and Non-Tribal learners of East Kameng districts (2015)” got rejected. From this it is interpreted that there is significant difference between the academic achievements mean scores of 5th grade Tribal and Non-Tribal learners.

V. EDUCATIONAL IMPLICATIONS

It has been found that the physical and social access improved at the elementary school stage in selected three districts. In view of this, there is need to put more focus on other physical infrastructural facilities like, teaching-learning

materials, projectors, maps, scientific equipments, mathematics kits etc. The academic achievement of 5th grade learners analysed and found extremely poor, therefore, there is need to analyse the course content of each subject taught at elementary school stage and finding out the hard spots. The special focus needs to be put on those identified difficult areas of the subjects. There is a need to take remedial measures for the qualitative improvement in the learning of students at elementary school stage. The slow learners need to be identified and they need to be paid more attention in terms of arranging remedial teaching for this group of students.

VI. SUGGESTIONS FOR IMPROVEMENT OF QUALITY

- ✓ In the present study, the researcher covered one district of Arunachal Pradesh namely, East Kameng districts of Arunachal Pradesh. Similar studies may also be conducted by taking up other districts of Arunachal Pradesh, which have not been covered in the present study.
- ✓ The academic achievement of 5th grade learners of separate subject wise like- English, Hindi, Mathematics, social Studies and Science, also may conducted on the causes of poor performance of learners at elementary school stage in Arunachal Pradesh.
- ✓ The study may also be conducted academic achievement of learners of secondary, higher secondary and higher education levels of Arunachal Pradesh.
- ✓ Study may be conducted on the academic achievement of elementary school going learners in the context of their intelligence level of anxiety, socio-economic status, personality traits and needs, etc.
- ✓ Study may be conducted comparison of quality of education at elementary school stage of Arunachal Pradesh with other neighboring states of North-East India and national level.

REFERENCES

- [1] Adams, D. (1993). Defining educational quality. Improving educational quality project publication. Biennial Report Arlington, V.A. Institute for International Research.
- [2] Annual Work Plan & Budget (2014-15) Annual work plan and budget of SSA Arunachal Pradesh. SSA Rajya Mission Itanagar.
- [3] Begi Joram (2007). Education in Arunachal Pradesh since 1947. Constraints, opportunities, initiatives & needs. Mittal Publications, New Delhi.
- [4] Bhattacharjee D.S. & Lyndem B. (2005). Elementary and mass education in north-east India: A Study of Meghalaya and Sikkim. DVS Publishers, Guwahati.
- [5] Biswas N.B. (2008). Education in North-East India. Shipra Publications, New Delhi.
- [6] GoAP (2015). Statistical Abstract of Arunachal Pradesh Directorate of Economics and Statistics.

- [7] Goswami D. (2009). Literacy and development, with special reference to North-East India. DVS Publishers, Guwahati.
- [8] Grover S, & Singh N.H. (2002). The quality of primary education: A case study of Madurai and Villupuram Districts in Tamil Nadu, India
- [9] Kapoor, K.C. et.al. (2006). Quality improvement at elementary school stage in Lower Dibang Valley & Lohit Districts of Arunachal Pradesh: A critical study. (unpublished) Rajiv Gandhi University.
- [10] Koul, Lokesh, (2007). Methodology of educational research. Vikash Publishing House Pvt. Ltd. New Delhi.
- [11] Kurrien, John, (1983). Elementary education in India: Myth, Reality, Alternative. Vikas Publishing House, New Delhi.
- [12] Mehta Arun C. (2007). Education for all in India, Myth and Reality. Kanishka Publishers, New Delhi.
- [13] Saikia.D. (1994). Development of elementary education in Khasi and Jaintia Hills. B.R. Saikia Prakashan Publishets, Shillong.
- [14] Sharma, S.N. (1995). Elementary education experience and expectations. Kanishka Publishers, Distributors.
- [15] Tewari R.P. (1996). Problems of education in North-East India. Parkash Brother Jalandhar.
- [16] Trivedi M.S. (2013). A comparative study of the status of elementary education of Gujarat with its neighboring states of India. Ph.D Thesis, Kadi Sarva Vishwavidyalaya, Gujrat.
- [17] Utpala Konwar. (2003). Primary Education in North Eastern State. Published by Indradhanush Guwahati.
- [18] Varghese, N.V. (1996). Quality of primary education: What do we learn from research? National Institute of Educational Planning and Administration, New Delhi.

IJIRAS