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EXPLORING THE PROCESS OF CAPACITY BUILDING IN TEACHERS OF A SLUM SCHOOL IN INDIA (A Qualitative Study)

Subhashini Passi

Background

In the nineteenth century, the holistic perspective of universal education was a dream. In the twentieth century, it was a promise, and it has become a challenge for realization in the twenty-first century. This challenge can be achieved only if we develop the capacities of the teachers to retain the children in schools and give education of appropriate quality. The quality of an institution is dependent upon the capacities of its teachers. Capacity-building of teachers is a very challenging task especially for improving the quality of education in the schools of the poor. I find that some of our teachers do not know how to handle the issues of pedagogy, how to handle change, how to resolve conflict, how to manage institutional pluralism, how to enhance coordination, and how to foster communication. The preparation of teachers using conventional training techniques is not very effective. Perhaps, we need to find out more effective methodology like informal methods of training.

Methodology: Having seen the current scenario of training and the teaching environment of teachers in the poor slum schools I developed in me an intense desire to find out the present capabilities of the teachers and then to orient them to improve their communication skills. As an HRD (human resource development) consultant I was fully motivated. I have had a number of opportunities to train people from the upper strata of the society. I saw that this work would be a big challenge. I designed a training program for these teachers of a slum school called Jeevanshala. This school is located in the premises of Visarjan Ashram in Indore. The school admits kids from the nearby slums and other localities. There are about 300 children coming from poor families. The

school has nine teachers. The methodology had to be simple, low cost, short term, on the campus, and had to be effective.

My readiness: Keeping this in mind, I took up the challenge of exploring the possibility of bringing attitudinal and personality changes in teachers of this slum school, while using the contents of personality and the skills of listening, speaking, reading, and writing. Having seen the current scenario of education and the teaching environment of teachers in the poor schools I had an intense desire to reach out to them and orient them in the communication skills.

Joint agreement: On the first day we just introduced ourselves and decided on the interactive teaching-learning strategy. Fixing the time and date with the management and the principal of the school was not a problem as I personally knew them. Once the teachers confirmed their desire to learn and interact with me we started on 8th August 2003 in right earnestness. **We** decided to meet every morning from 9.25 to 9.55am leaving the last five minutes for the teachers to settle down before the school bell rang. **We** decided that I would come each day and teach a small point like: what is assertiveness or proaction or *po' or capability and copability or risk taking or creativity and so on. We left with warm feelings and a keen desire to learn something new in the days to follow.

Trust building: I must add at this stage that the teachers were initially docile, passive listeners, quiet and unassuming. Their faces exhibited **fear and doubt** about self and the purpose of interactions. Once **I made** myself clear that **Lwas**

Program schedule: A brief of what and how				
Week	My activity	Teacher's activity	My observations about teachers	Outcomes
Week One	taught (30 mins)	listened and barely interacted (30 mins)	quiet -and passive to begin with; good listeners	rapport building
Week Two	learnt and taught (10 + 20 mins)	taught (10 mins); listened and interacted (20 mins)	opening up slowly; developing listening and speaking skills	confidence and faith developing
Week Three	listened (30 mins)	taught (30mins)	speech development	self actualization through reading and. teaching
Week Four	highly interactive sessions (30 mins)	taught plus wrote 'positive thinking' related articles for the newspapers	bold and confident	enhanced self esteem
Week Five	project discussion and contribution (30 mins)	collected data and wrote books	very happy; productive with positive attitude	9 books of 50 pages each; smiling, confident faces

there just to help them find their capacity in communication skills to be able to face the immediate environment and the problematic teaching-learning milieu they accepted me wholeheartedly. Gradually, we developed trust in each other and hence, started co-operating: Before we began our interactive sessions I set time punctuality guide-lines and freedom to ask questions and clarifications at any time and stage of our interactions. The table below gives a brief of what and how we communicated with each other.

Rapport building: In the first **week**, as planned, I began teaching one small unit. Clarifications and doubts were simplified. First I introduced the learning point supporting it with examples thus, striking a balance between learning and live experiences. Initially, there was passivity and a kind of unco-operative behaviour as far as academic interactions was concerned. I spoke and they just listened. This however, got automatically reversed in days and weeks to follow. Towards the end of the first week when I saw them opening up an idea struck me and I suggested that from the following Monday they would start teaching **me** something of their choice for the first 10 minutes. These 10 minutes of teaching by them would be followed by the usual learning point discussions by me for the next 20 minutes. I told

and what. As always, the first resistant **aches** and moans could not be denied but! was determined not to give in and they had no option but to obey. This may look like a lose/win situation.

Confidence and faith developing: The **second week** marked the beginning of the realization of 'If she can do it, I can do it too', achievement by these nine teachers. The senior teachers prearranged the situation in such a way that the youngest teacher was to teach on the first day. Vibhuti, as she is called came up with needle work stitches on a piece of hanky. I could-eye her skill and confidence when she taught me those complex stitches with ease and fervor. Surrounded by all the other teachers she felt like a 'queen bee' with the, drone bees just accepting her skillful talent. This was followed by my usual 20 minutes short communication. The next day was highlighted by a teacher who came up with a recipe for breakfast-precooked from home'to save time. However, the process along with the dish was elaborately explained. Very often to help them speak with confidence I put them questions as to 'how to do this' **or** 'what if we do not have a particular ingredient', and so on. I could mark their confidence level when it came to their specializations in cooking and other leisure activities. I was internally happy and did not mind

being a novice in their presence. Some others taught me craft work with colored paper, embroidery on a sari, flower making and the like. Two teachers preferred to share their spiritual reading experiences by way of brief discourses. One teacher went to the extent of sharing vocally that 'I am practicing *po' and speaking rather than negating myself. This significant change in the teacher was a booster to my confidence too.

By the time the first round of teaching-learning was over I could distinctly notice the 180 degree turn in them. During this time I also started preparing them with announcements that after the nine teachers had had their teaching turn I would stop teaching and that they would teach me then. This came as a bolt from the blue for them. Nevertheless, they were aware of the fact that there was no escape from it so the next assignment was made known. I gave them a copy of a book written by my friend. It is called 'positive thinking'. They were to **Teach** and discuss only one chapter at a time and pass the book to the next teacher. Here too, I gave them the freedom to decide their turns to read and share their knowledge with the rest the next day. Later, a copy of the book was given to each teacher as a token of appreciation of their changing attitudes.

Self-actualizing: The third week started without any hassle as it was clear to the teachers that it was now their turn to teach. By now they were pretty self-assured about their capabilities and hidden potential so they took reading and teaching sportingly. One by one they started sharing their readings and it all became wonderfully natural and optimistic. Slowly these reading-sharing sessions got converted into an activist movement, advocating team spirit and interdependence. As a matter of fact, they were now applying into practice all those learning points I had taught them in the first and the second weeks. By now the teachers were displaying their confidence in the class with their students and outside the class with the parents, management, social groups and other acquaintances.

Enhancing self esteem: By this point the teachers had developed poise and self-reliance in reading, speaking and listening skills. For the **fourth week** therefore, I added article writing on the topics they had mutually deliberated during these short morning meetings. Now there was no cribbing or groining like they had demonstrated in the initial stages. They were more proactive in their thought and behavior. That they were interested in these morning meetings became evident from the fact that they all came much before the daily scheduled time. This was a pleasant accomplishment for me. Reassuring each other in their inbuilt potential and bringing them to a stage of independence and willingness to do any activity was not a tedious or long process for us together. We had unconsciously tapped education as (a) leaning to learn, (b) learning to do, (c) learning to be, and (d) learning to live together. Education is a means of actualizing one's potentials and this is exactly what we had aimed at and attained. We were heading towards a win-win situation. These progressive changes **in attitudes** in the teachers evolved with leaps and bounds. It is just a matter of giving challenging opportunities to a person to enable her/him flourish into a psychologically stable and devout personality.

Outcomes in the form of books: The teachers of this school completed nine projects under the leadership of nine teachers. Each teacher was the leader for one project though all the others formed a part of the team. These projects were in the form of books not exceeding fifty pages. These projects are:

- **'Learning from the world of nature'**- here we tried to think of qualities which we can learn from nature and its elements e.g.- we learn depth, gravity, intensity and penetration from an ocean; or patience and tolerance from mother earth and so on
- **'Differences between human beings and animals'**- in this project we have tried to find out the differences between human beings and the animals e.g.- giraffe has a long neck

but we don't; or new born of animals start walking immediately whereas, we can walk only after nine months or more and so on

- * **'The miracles of nature'**- in this we have compiled the natural miracles of nature e.g.- in the Amaranth temple every year an ice 'shivlingam' is formed drop by drop and which gets completed by the 'raksha bandhan' day; or the water of river Ganges never gets spoilt and so on
- **'Low-cost, no-cost breakfast recipes for the slum children'**- in this book delicious recipes are created from left over food or low cost ingredients e.g.- left over 'rod halwa'; or 'sabudana khichari' and so on
- ***Bal geet'**- here the teachers have written small but interesting songs for little kindergarten children. They are all self-composed and mark the teachers' expertise at writing
- **'Rashtriya geet'**- this project gives songs related to the nation imbibing the patriotic feeling in a person who recites them. These again are self written and mark the wisdom and the insight of the teachers
- **'From the world of superstition'**- we have compiled here more than 200+ superstitions which are prevalent in the society
- **'Chandu ke chacha ne'...and-** this is an interesting highlight of the series of projects we have undertaken- all the Hindi alphabets are taken to write the anupras alankar
- **'Nav ras in action'**- this is a collection of skits, stories, poems, jokes and so on related to the 'nav ras' in Hindi language

My Observations: I experienced in this work that social whole is more than the sum of its individual components. Social capital can be developed. The social capital needs informal interactions. The quality of the social processes and relationships within which learning interactions take place is

especially influential on the quality of the learning outcomes in collaborative approaches. Taken one step further, this suggests that social capital plays an important role in fostering the social networks. I have developed seven principles out of this informal experiment of training. These principles are: (i) encourage open-ended exercises; (ii) create serious-happiness; (iii) introduce unique privacy yet social cohesion; (iv) introduce informal discussion; (v) communication skills are useful; (vi) practice helps to learn the skills; and (vii) introduce comprehensive support.

- Encourage open-ended exercises- teachers or for that matter any human being can generate original ideas if they are encouraged to undertake open-ended exercises as done during these interactions
- Create serious-happiness- an environment full of active enthusiasm, yet, devoid of tensions will be useful for the overall growth of teachers. It is an important component of teaching. Happy environment should be coupled with seriousness of goals. We should create the joint and simultaneous presence of "serious purposes and happy means"
- Introduce unique privacy yet social cohesion- creative teachers might develop a tendency to, by and large work alone as did the 'bal geet' or the 'rashtriya geet' teachers. This may not become a general tendency and then persist over many other tasks and group settings. In that form, it may become a habit. Counter-check planning against this tendency has to be introduced with caution. Behaviors like direct aggression, open rejection and/or subtle indifference can cripple the personality of the teachers. Defense mechanisms can creep in. We have to watch against the habits of counter-aggressiveness, indomitable persistence, clowning, silence and apathy, inconsistent performance, filling the gaps when others

falter and/or fail, and solitary activity

- **Introduce informal discussion:** these nine teachers have shown that they have understood the importance of communication skills for improving their own thinking styles, and thinking power. They liked these short informal discussion interactions
- * **Communication skills are useful:** communication skills are useful for cognitive development, changing the attitudes, improving self-image, and altering the personality. They also claimed that informal interactions are useful for improving their social interaction in schools, homes, and other life situations. The teachers hope that better

communication skills might help them to improve the economic status of the family by getting better job opportunities

- **Practice helps to learn the skills:** the teachers, however, believe that communication skills require constant and sincere practice. They do not see a difficult scenario of introducing communication skills in the school system and
- **Introduce comprehensive support:** teachers hope that the required support will be available from the principal, management, parents and others if they assure full responsibility to play their role

TEACHER EDUCATION IN MEGHALAYA

Sumana Paul

INTRODUCTION

Traditionally, the teachers have enjoyed the great respect in our country. The principal role of the teachers is teaching and guiding their pupils, not only through the classroom instruction and tutorials but also by personal contact. A teacher is expected to influence the life of students positively for the art of living. Today's teacher has a great challenge as today's children come to school bearing the imprint of a informative world constructed by media. The teacher has lost the monopoly of instruction. In the past, the pupils largely accepted whatever the teacher offered without a word. Today, the community wants a greater involvement in deciding what is taught to the students. This in fact is a great task and only the professionally qualified teachers can meet this demand of the community. The powerful relationship between the teacher and the learner is central to the teaching profession. Teaching is not merely transmitting information and knowledge but presenting it in context and perspective so that the students learn to apply the solution of problems taught into broader contexts, and which makes teaching meaningful. In fact, teaching should help the students to foresee the challenges and adjust to them. So training of school and post-school teachers is an important responsibility of higher education.

In Meghalaya, teacher education has a long history. As eady as in 1867, Normal school to train teachers was established at Nongsawlia, a village near Charapunjee by the pioneer missionaries. But the ratio between trained and untrained teacher did not show marked improvement. As in 1997-98," out of 10637 primary teachers, 4025 were trained and 6612 were untrained. At the upper-primary level, out of 4441 teachers, 1000 were trained and 3441 were untrained. At the Higher and Higher secondary level, out of 5320 teachers 2191 were trained, 3129 were untrained.

STATUS OF TEACHER TRAINING INSTITUTES

Table given next page shows the present status of teacher training institutes in Meghalaya.

CERTIFICATE COURSES

The DIETs have been setup to train field inspecting staff and teacher educators at the elementary level, cater to the need of formal and non-formal education and serve as a resource centres for adult and non-formal education. It is expected that all the seven districts of the State will have DIETs in a phased manner in the near future . One of the functions of the DIET is to strive towards excellence in training teachers. The DIETs are expected to provide academic support and educational leadership at the district level, effecting linkages with the school and community: They are responsible for academic improvement through efficient teacher training, conduct of educational studies and surveys , development and transaction of teacher education curriculum and acting as eyes and ears for the Education Department in its efforts to reach quality education to all children and to make learning a joyful experience. Besides the three functioning DIETs in the state, the DIETs at a) Baghmara, South Garo Hills District, b) Nongpoh, Ri-Bhoi District , c) Nongstoin, West Garo Hills District will be operational very soon.

Though no work has been done regarding DIET in Tura, West Garo Hills till now, but it is expected that towards the end of 2004, even the DIET at Tura will become operational, fulfilling the dream of a DIET for each of the seven districts of the State. The presently working DIETs have started one year in-service and pre-service training programs (which from 2006 , will become two year courses according to NCTE norms). The

SL No.	Name of Institute	Year of Est	Administration & Financial Management
A	Basic-Training Centers for Elementary Teacher-training (One year course)		
1	Centre training Centres (Cherrapunjee)	1867	Government
2	Guru Training school, Tura	1960	Government
3	Basic training Centre, Shillong	1942	Government
4	Basic Training Centre, Rongkhon.West Garo Hills	1955	Government
5	St. Mary Mazareloo Training Centre, Jowai, Jaintia Hills	1961	Deficit
6	Basic Training center, ThadLasKein Jaintia Hills.	1967	Government
7	Basic Training Centre, Resubelpara East Garo Hills	1974	Government
8	Lumjingshai Junior Teacher training Centre, East Khasi Hills	1976	Deficit
B	Upper Primary Teacher Training Institutes (Two year course)		
9	Normal Training School, Cherrapunjee	1968	Government
10	Normal Training School, Garo Hills	1968	Government
C	Secondary Teacher Training Institutes (One year BJEd course)		
11	St Mary's College of Teacher Education	1937	Private
12	College of Teacher Education, Shillong	1964	Deficit
13	College of Teacher Education, Rongkhon, Tura	1993	Government
D	District Institute of Education and Training (DIET) for Primary School Teachers.		
14	Thadlaskein, Jaintia Hills District	2000	Government
15	Resubelpara, East Garo Hills District	2000	Government
16	Cherrapunjee, East Khasi Hills District	2000	Government

minimum academic qualifications for admission into these' course is +2. With the operationalisation of all the seven DIETs, the problem of a huge backlog of untrained teachers in the state is expected to ease out in the next few years.

The curriculum Framework for DIET covers: Principles of Education ; Educational Psychology; Educational Planning; Educational Technology; English; Language (Khasi/Garo); Health and Physical Education; Mathematics; Science - a) Physical Science and b) Life Science; Social Science - a) History and Civics & b) Geography; Work Experience; Creative Expression

For the elementary school teachers there are A) Junior Teacher Training Certificate Course (JTTC) and B) Normal Training Schools (NTS).

A. Junior Teacher Training Certificate Course (JTTC):

For the primary stage, there is one-year certificate course known as Junior Teacher Training Certificate Course. All the government-managed institutions for JTTC are known as the Basic Training Center (BTC). The function of the BTC is to train the departmental untrained lower primary-school teachers who were eligible for getting training.

B. Normal Training Schools (NTS)

For the middle or upper primary stage there are two government Normal Training Schools (NTS). The course is of two years durations. The function of the NTS is to train the departmental upper primary/middle schools untrained teachers. HSLC/SSLC and PU passed candidates are eligible to be recruited for teaching.

The main function of both the above mentioned levels of teacher training course is to clear the backlog of untrained teachers and so they are mostly in-service teacher training centers. The curriculum framework for junior teacher training course and normal training schools are as follows;

Junior Teacher Training Certificate Course

Methods in Child Psychology or Pedagogic Method; Teacher education in Emerging Indian Society

Mathematics; Environmental Studied(Science and Social Studies); Language (Hindi/Khasi/Garo/English).elective; Health and Physical Education; Work Experience; Art Education

Normal Training School

Principles of education and educational psychology; School organization and management; Social Science; Science; Mathematics; Language (Hindi/Khasi/Garo) elective; English; Craft and work experience; Art education

BACHELOR OF EDUCATION COURSE

Out of three B.Ed Colleges in the State , two colleges viz. College of Teacher Education Shillong and College of Teacher Education, Ronghknong, Tura are recognized by NCTE. College of Teacher Education, Shillong was started in March 1964 as one of the first institutions for training teachers, besides the BT course run by St. Edmund's College and St. Mary's College. In fact, the College of Teacher Education, known as Post-Graduate Training (PGT) then, was the first full-fledged teacher training institution of

Meghalaya .From 1986, the college was brought under the deficit system of grant in aid by the government of Meghalaya . It was upgraded to the status of College of Teacher Education by the MHRD. Government of India in 1996. Recognition from the NCTE, New Delhi came in 1997. College of Teacher Education, Tura was opened on 26th June 1993 under the name Government B.Ed college. The present name was given on 20th March 1996. The college is recognized by NCTE.

St. Mary's College, Shillong was opened by the catholic society of nuns. The college was founded in 1937. The professional BT course was changed to-B.Ed in 1976.

The St. Mary's college was bifurcated in 1999 .The B.Ed section is hence- forth to be known as the St. Mary's college of Teacher Education.

Teaching Specialization

Any two paper from the following ;

Life science
Physical science
History
Social studies
Mathematics
English
Geography
Home science
Health and physical education
Indian Language

Each paper carries 80+20 = 100 marks.

Teaching practical

Every student is required to deliver minimum 20 lessons in each of the two teaching specialization subject. Some (at least 5) of these lessons may be given under simulated situation. A board of examiner is appointed for evaluating teaching skills. The evaluation is under taken through viva-voce , review of practical work which includes psychological tests like :

Course Outline of B.Ed Programs

Course structure of NEHU, B.Ed course is as follows :

SLNo	Area	Total Marks	External	Internal
Paper 1	Education in Emerging India	100	80	20
Paper-2	Educational Psychology	100	80	20
Paper -3	secondary Education and the teachers	100	80	20
Paper-4	Problems of Education in India with special reference to NER	100	80	20

Special course

A	School organization and Management (Compulsory)	50	40	10
B	One optional paper from the following -	50	40	10

1	Education of Exceptional Children			
2.	Adult and Non-formal educadon			
3	Environment Education			
4	Education and Rural Development			
5	Educational Guidance and Counselling			
6	Population Education			
7	Educational Technology			
8	Computer Education			

Learning by verbal conditioning ,
 Motivation tests,
 Concept formation ,
 Effect of frustration,
 Memory and forgetting , and
 preparation of teaching aids and one project work.
 Grading in a 4-point scale is adopted for the purpose : Grade 0 - Outstanding (80 and above)
 Grade A- Good (70-79), Grade B - Average (60-69),
 Grade C- (50-59),Grade F-(below 50)

A candidate in order to pass, must get a minimum of C grade in the combined grade on practical.

In case of theory , a candidate in order to pass has to get a minimum 25% marks in each paper both in external and internal

Besides this regular B.Ed course, the two year B.Ed program of IGNOU is also active in the state and the College of Teacher Education , Shillong , has IGNOU B.Ed program center

However , there is no facility in the state of Meghalaya to undertake a post -graduate degree in teacher education (M.Ed)

CONCLUSION

There is an urgent need to open post graduate course (M.Ed) in Meghalaya and this should be taken care of by NEHU immediately.

The NIEPA survey made the following three suggestions on teacher education :

Training should be considered a necessary prerequisite for teaching at all levels.

Only trained teachers should be recruited.

Untrained teachers already in the job, should be disallowed from the entitlement of increment until they get trained.

Keeping in mind these suggestions, the State education dept. should seriously think of appointing only pre-trained teachers at all level for improving the quality of teaching.

NOTES FOR CONTRIBUTORS

Manuscripts are to be typed on one side of the paper double spaced with ample spaces. For anonymity in the reviewing process, paper title, name(s) of the author(s) and address for correspondence should be placed on a separate sheet. Each manuscript must accompany the undertaking of the author(s) that the said manuscript has neither been sent to any other journal or to any other publisher. Two copies of the manuscript are to be sent to the editor- Dr Sunil Behari Mohanty, Sri Aurobindo Ashram, Pondicherry- 605 002 E-mail:aiaer@rediffmail.com. If the manuscript has been prepared on a word processor, a copy of the floppy and programme specifications would be helpful. Rich text format shall be of much help. An abstract of 150 words should accompany each manuscript. A manuscript should not normally exceed 6,000 words. The reference style should be as follows:

Books: Banerjee, N. P. (1993) Strategies of Educational Research. The Associated Press, Ambala Cantt.

Articles: Lomax, P. (1993) Management of training for education: an action research. Journal of All India Association for Educational Research 5, 2, 1-7, June

Chapter in books: Passi, B. K. (1997) Non-formal innovative strategies for basic and primary education in India. In Lynch, J., Modgil, C. and Modgil, S. (Eds.) Education and Development: Tradition and Innovation, Vol.3, Innovations in Developing Primary Education, 45-66. Cassell, London.

WELFARE-SCIENCE EDUCATION FOR THE DEVELOPMENT OF HUMAN BEING

D. A. Uchat

INTRODUCTION

Scope of education has been increased along with the flow of time, Horizons for knowledge have been expanding., Many new subjects are being opened to acquire knowledge In addition, depth in knowledge of each subject is increasing. There comes a good speed in the spread of knowledge due to development in information technology. In short, vastness and depth in knowledge and spread of knowledge is increased. But along with the development of knowledge, it is a fact that the feeling of satisfaction in living the life has not been developed. On the contrary, some negative attitudes have been developed to some extent. Material happiness has been increased, but human element has not been developed completely. There is much increase of problems in human-life and social life. Stress has been increased than it was earlier, Warmth and love are probably decreasing in the relationship between the men. People have become more selfish than they were earlier. It seems that the development of education has made the people self-interested instead of benevolent. Vision towards great welfare of society is not practised. Due to competition, present education develops ignorance and disliking in the welfare of others. For rational people, today's education is not adequate. Everybody feels that there is something missing. The people express their dissatisfaction towards present education. It is necessary to think in this direction. With reference to the development of human being, it is required to find out the missing hooks and then join them. So that present education system becomes more effective, useful and satisfactory to the people of each class of the society. A student is admitted in a school and acquires necessary knowledge through the syllabi of different subjects. The student, with the advance study, acquires the

knowledge, deeply in the subject desired by him/her and becomes free from the study of some other subjects. Such arrangement should be made in the present system of education as each person essentially gets education of such a subject which is useful to entire human life and blissful to each. This education should be given scientifically. For this purpose, the provision of welfare - science education has been thought over.

WELFARE - SCIENCE

To understand what the education of welfare - science should be, meaning of welfare - science should be Clarified. Some definitions of welfare - science can be developed as under. It may be stated as: "Knowledge explaining meaning and importance of the welfare of self and others means welfare science." It also can be stated as "A systematic and objective knowledge regarding welfare". Welfare science does not mean achieving welfare by means of material science but it is a science to make our own or others life happy. It can be presented in this form : Essential knowledge to attune welfare = welfare - science = welfarology. Unlike material sciences such as Chemistry, Physics, Biology and Social Sciences such as Sociology, Psychology, Economics, History - an attempt has been made to consider 'welfare - science' as a branch of knowledge.

CONCEPT OF WELFARE SCIENCE EDUCATION

Keeping in mind the meaning of welfare science, an operational definition of welfare science education can be given as under : "Scientific education which (i) helps the learner to understand the meaning and importance of welfare of self and others, and (ii) can develop necessary skills and commitment to attain it can be called as welfare science education. A new term is suggested[^] in order to make the above mentioned definition more

clear. Some characteristics of welfare science education are described here.

- L This education is for the learner who can make his/her life and life of others blissful. Thus, through this education, the learner should clearly understand the meaning and importance of welfare.
- 2 Its target should be at the complete development of human being.
3. Such things should be there in welfare science with which the learner may make his/her life full of qualities.
- 4 Teaching of welfare science should be neutral and unbiased.
- 5 Such things should be included which are accepted by all.
6. Such education should not be based on false religious beliefs.
- 7 Education of welfare science should be beneficial to all. Instead of only theoretical discussion, practical usability should be one of its important base.
- 8 It should be specifically kept in mind that it is given scientifically and effectively. This is why the word "science" has been attached to its name.
- 9 It should be a kind of education that connects different human beings with one another, which means the learner should be attached heartily with other people.
10. It should be made possible by this education that the learner, takes interest in the development of others. In other words, this education is for the development of all.
11. The learner can clearly understand through this education that it is wrong way to do something good for himself/herself by destroying interest of others.
12. It should be one of the important aspects of welfare science education that the learner

acquires necessary skills for achieving his/her own welfare and welfare of others.

13. Commitment for attaining welfare of own and others should be developed in the learner of welfare science education.
14. Whatever the skills and qualities needed in common life practices found missing in present education are missing, should be included in welfare science education.

OBJECTIVES

Welfare science should have the following objectives:

1. To develop understanding for own welfare and welfare of others and to get knowledge of essential things.
- 2 To understand seriously that welfare of himself/herself and others is very important and one should be committed to that.
- 3 To develop in the learners the essential virtues and characteristics which are necessary for the development of human being.
- 4 To attain appropriate skills for the achievement of welfare.
- 5 To develop proper personality.
- 6 To understand seriously the problems affecting social life and contribute himself/herself to solve them.
- 7 To get some successful experiences with which one can perform social life practices skillfully.

Course Content

On the basis of concept and objectives of welfare - science education, some points regarding what can be the course - content of welfare science, are discussed here. These points have been presented in three components.

Component -1: Appropriate Behaviour Development

Such points are included in this component so that common balanced personality of the learner may be developed. Such characteristics *of* a effective personality are as under

- Positive Attitude
- Qualities like Sincerity, Honesty, Hard working nature, Honouring to elders
- Tolerant Nature
- Tendency to Cooperate
- Democratic Life - style
- Nature, of working cooperative in a group
- Tendency to accept the views of other, which may, be different from own views
- Ethical / value-oriented necessities
- Participation in household functions
- Work Commitment
- Scientific Approach

Component - 2: Awareness towards common problems

Problems affecting to ail and learner's awareness towards them are included in this components. Such points are as under

- Necessities to healthcare
- Balanced food for nutrition
- Knowledge, of diseases like diabetes, cancer, heart-attack, AIDS, thalassemia
- Matters that cause stress
- Population problems
- Traffic rules
- Sexmil knowledge
- Protection of customer's interest
- Different discordances and diversities of the society ;
- Human rights of the people of different, classes
- Essential duties at the time of natural calamities such as drought, flood, storm, earthquake

Component -3: Acquisition of Individual Skills

Such things are included in this component through which the learner may develop some skills and with which he can become independent in day-to-day working and can help other too. Such points are as under :

- Skills for the use of some home-appliances Such as gas, cooker, TV, tape, refrigerator, stove, electrical instruments etc.
- Functioning skills with reference to working with common shopping post-office, bank, railway, insurance, hospital etc.
- Ability to face conflict
- Communication skills
- Enough self-confidence to get own work done successfully and easily
- Skills for. polite behaviour and good manners
- Discriminative ability to identify right-wrong, good-bad, proper-improper etc
- Skills regarding physical exercise and Yoga.

More can be added to the course - content of welfare - science education on the basis of opinion of the experts.

QUESTIONS PERTAINING TO WELFARE SCIENCE EDUCATION

If one accepts the necessity of the education of welfare- science, it is also important to think over some questions related to it.

1. Whether it should be taught as a separate subject or it should be included in other subjects. However it becomes a burden to the students if included as a separate subject. Today students are having burden of numbers of subject. If it is included as one more subject, it will be a burden. To solve this problem, some elements of welfare science can be included in languages, some in science, and some in social study.

2. It is also an important question that from which standard it should be taught, in which standard it should be taught how much, and up to which

standard it should be taught. Actually its main topics should be included in related subjects from standard I to 10, so that each student educated up to 10 may possibly get complete education of welfare science.

3. In comparison to other, subjects if the importance of content of welfare science is not accepted, both the teacher and the student will not accept it seriously. To avoid this, special care should be taken in its teaching and assessment.

4. It is also an important thing how welfare science should be taught or what should be its teaching methods. It should have methods in which involvement and active participation of the learner. Only then necessary understanding can be developed, some essential skills can be attained and commitment to welfare of life can be created.

5. It should also be clear that how the teacher of welfare science should be. The teacher of welfare science must be completely familiar with the subject matter. In addition to this, s/he should (i)

have broad vision, (ii) have ability to see human life entirely, (iii) have tendency to help others, (iv) be desirous to complete development of the student, (v) be familiar from social interactions and different aspects of social life, and (vi) be socially matured person.

For this special training of the- (a) subject matter, and (b) necessary skills to teach it, should be given to the teacher of welfare science.

CONCLUSION

Education of welfare science has been formally discussed here. However, it is not necessary that all the points can be accepted. Some points may be controversial. But it doesn't mean that all the points regarding education of welfare science are irrelevant, useless and improper. Seminars and workshops for provision of welfare science education should be held, in which a model package for practical implementation can be prepared.

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ATTITUDE OF HIGHER SECONDARY SCHOOL STUDENTS TOWARDS THE STUDY OF ENGLISH.

S. Lilly Epsy Bai

INTRODUCTION

English has been playing an important role in the Indian national life in general and its educational system in particular. English continues to be a powerful unifying factor even now in India's national life. Without English, both private and official communication between parts of the country will be completely cut off, as it is the only language, which is understood by all the educated people all over the country. Even within India English still continues to be the link language, an important tool for the national integration. But English, as the medium of instruction in higher secondary and many professional courses has become a thorn in the flesh of many students, who are unable to understand teaching in English and to express their ideas in English. In this study an attempt has been made to study the Attitude of Higher secondary students towards the study of English.

OBJECTIVES

To find out: the extent to which the* Higher secondary students are favourably or otherwise disposed towards the study of English.

The difference, if any, between male and female students in respect of their attitude towards the study of English. ' *

The difference, if any, between urban and rural students in respect of their attitude towards the study of English.

The difference, if any, between English medium and Tamil medium students in respect of their
• attitude towards the study of English.

HYPOTHESES

The following null hypotheses were formulated.

There is no significant difference between male

and female students in respect of their Attitude towards the study of English.

There is no significant difference between urban and rural students in respect of their Attitude towards the study of English.

There is no significant difference between English medium and Tamil medium students in respect of their attitude towards the study of English.

METHOD

A scale to measure the attitude of higher secondary students towards the study of English was administered to a sample of 217 higher secondary students in Chidambaram town. In this scale there are 28 items in all. Among these 14 are favourable items and the remaining 14 are unfavourable items. An individual's score in this scale is the sum of the scores for all the 28 items. An individual who gets a score of .56 and above may be said to have a favourable attitude towards the study of English and one who gets a score of below 56 may be said to have a unfavourable attitude towards the study of English.

STATISTICAL TREATMENT OF THE DATA

The attitude towards the study of English scores of the entire sample of 217 higher secondary students and its various sub-samples were computerized and their means and standard deviations were calculated.

In the present study, it is found that 79.67% of the entire sample of higher secondary students have favourable attitude towards the study of English and only 19.43% of them have a relatively unfavourable attitude towards it. In respect of the mean of male and female students the critical ratio value is found to be 1.28 and it is not significant at 0.01 levels. There fore the null hypotheses formulated is to be retained. In respect*

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of the means of i) rural and urban students and ii) English medium and Tamil medium students the critical ratio values are found to be 5.01 and 3.62 respectively and they are significant at the 0.01 level. Therefore the null hypotheses formulated are to be rejected.

FINDINGS

Male and female students do not differ in their attitude towards the study of English.

Urban and rural students differ in their attitude towards the study of English.

English medium and Tamil medium students differ in their attitude towards the study of English.

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IMPACT OF SEX, CASTE AND TYPE OF SCHOOL ON SOCIAL INTEGRATION OF RESIDENTIAL SCHOOL STUDENTS

R. Siva Prasadh

INTRODUCTION

In the context of present study, Classroom is a heterogeneous group having different caste sub-groups. Naturally, there are many degrees of differentiation within the groups. For group cohesions interdependent relationship are to be established. These relationships are possible only in terms of degree of integration. New Comb and others (1969) opined, "... what ever the level of integration of a particular group, it has to do with the role relationship of all the group members with one another. The more closely interdependent the role relationships, the more integrated the group". Therefore social integration is the degree of sharing and cooperative inter-member relationships that are present in group members. The main function of any schooling system is to make the child undergo, complete and judicious process of socialization to gain better social integration. This provokes several research questions, such as, what is the role of school to bring out social integration among children? Do the residential schools promote social integration? Do sex, caste and type of school affect social integration of students? Children of residential schools are away from their home; they live together sharing their feelings, which facilitate to enhance their social integration. Hence the present investigation is an attempt to find out impact of sex, caste and type of school on social integration of students.

OBJECTIVES

To find out the impact of type of school on social integration of residential school students.

To find out the impact of sex on social integration of Residential school students.

To find out the impact of caste on social integration of Residential school students.

HYPOTHESES

There is no significant difference between different types of schools on social integration.

There is no significant difference between both sexes on social integration,

There is no significant difference between various caste sub-groups on social integration.

METHODOLOGY

Tools used

In order to measure social integration of students, a social integration scale has been developed for the use of students of residential schools. The final scale consists of 28 items.

Sample

The sample consists of 877 students of A.P. Residential and A.P. Social Welfare Residential schools of Visakhapatnam, Vizianagaram and Srikakulam districts of Andhra Pradesh. Both boys and girls belonging to different caste sub-groups are included in the sample.

Statistical Techniques

In order to find out significance of difference of means between various categories of sex, caste and type of schools, F values are calculated.

RESULTS AND DISCUSSIONS

IMPACT OF TYPE OF SCHOOL ON SOCIAL INTEGRATION

It is found that in respect of social integration, there is a significant difference between students of A.P. Residential School and A.P. Social Welfare residential Schools; A.P Residential Schools for General and A.P. Residential schools for Backward Castes; A.P. Residential Schools for General and A.P. Residential schools for Schedule Tribes; A.P. Residential Schools for Boys and A.P Residential schools for Girls and A.P. Social Welfare Residential

Schools for Girls. Significant difference in social integration are observed between schools which constitute all the casts sub-groups and schools which are meant for only some caste sub-groups.

As regards social integration, students of A.P. Residential schools for girls are superior and the students of A.R Residential schools for Back ward castes are inferior, when compared to total sample mean. It is further observed that the mean values of students of A.R Residential schools; A.R Residential schools for general, A.R Residential schools for girls and A.R Residential schools for boys, are above the total sample mean of social integration. This shows that all the students of A.R Residential schools except A.R Residential schools for backward castes and scheduled Tribes are better in social integration.

IMPACT OF SEX ON SOCIAL INTEGRATION:

It was inferred that boys do differ significantly from girls in their social integration. It is further found that girls are possessed with more social integration than boys.

IMPACT OF CASTE ON ACHIEVEMENT

Other caste students do differ significantly from backward castes, Scheduled castes and Scheduled tribes in respect of their social integration. Significant social integration differences are also found between backward castes and scheduled tribes; and Scheduled castes and scheduled tribes.

When the students of same castes, studying in different schools are compared, a significant social integration differences are found between students of backward castes, scheduled castes and scheduled tribes.

As regards social integration, it is found that scheduled caste students in A.P. Residential Schools for general are far superior and students of Scheduled Castes students in A.P. Social Welfare Residential Schools are far inferior. This is an interesting observation that scheduled caste students occupied both first and last position in social integration. This may be the reason that scheduled caste students in A.R Residential schools for general are widely exposed to different caste sub-groups than their counterparts in A.R Social Welfare schools.

NATIONAL SEMINAR ON TEACHING TECHNIQUES IN HIGHER EDUCATION

All India Association for Educational Research (ALAER) Special Interest Group, in collaboration with the Department of Education, Cotton College, Guwahati, is organizing a National Seminar on "Teaching Technique in Higher Education" on 23rd & 24th September 2004. Scholars interested in participating and presenting paper in the Seminar may send their abstracts within 250 words on or before 15 of August 04 and full paper by 1st September along with Registration fee. Papers may cover any teaching technique such as Individualised Instruction, Programmed Instruction, Personalised System of Instruction, Computer Assisted Instruction, Team Teaching, MicroTeaching etc. The manuscript may be sent with a copy on a Floppy disk on MS word, Computer typed duplicate form and also Poster Card form. Registration fees for each participant will be Rs. 1000/- (one thousand for two days only).

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A STUDY OF EXISTING STATUS OF RURAL GIRLS IN HOSHIARPUR DISTRICT OF PUNJAB

Ritu Mahal, S.Thind, Vandana Kanwar, Seema

INTRODUCTION

The rural girl child in India is the most disadvantaged since her very birth. She constantly faces discrimination on the grounds of health, education and overall development in a typical patriarchal family (Srivastava, 1998). Despite, being discriminated, the contribution of girl child in household activities is the maximum. Beside helping her parents in all domestic chores, care of siblings and engaged in remunerative work she is not considered as an asset but a burden who has to be married off as early as possible. There is a constant fear by parents that the longer they stay with them the greater would be the dowry demand. The girl child has always led a life inferior to that of her male counterpart, but now because of the diabolical misuse of technology, she is not even allowed to be born.

Girls are considered a liability because of the emphasis that is laid upon the protection of the girls' honour and they are imagined to be an unproductive human resource- because their contribution to the family and community is "invisible" although it is substantial (Shah, 1998). Consciously and unconsciously our society, teachers, parents and media have been reinforcing the stereotypes of gender roles and expectations, with the result that girls find it almost impossible to break out of the mould that has been cast for them by society. The childhood and adolescence of our daughters is marred by neglect, discrimination, lack of opportunities and limited employment options.

Patriarchal societies have deeply internalized the ideas of male supremacy and female dependency. The notion that girls and boys have equal rights seem to be a concept that is only read in books

and practiced by a small handful of educated elites. Thus, the present study is under taken to study the existing status of rural girl child in villages of Hoshiarpur district of Punjab with the following objectives

OBJECTIVES

- To study the existing level of schooling status, household responsibilities, and upbringing practices of rural adolescent girls aged 13-18 years
- » To study the existing level of economic, social, health, marriage and legal aspects of rural adolescent girls aged 13-18 years.

METHODOLOGY

A multi-stage random sampling method was employed for the selection of the sample. A sample of 300 adolescent girls attending schools was drawn from the villages of Hoshiarpur district of Punjab. Three blocks of Hoshiarpur district namely Mahilpur, Hoshiarpur II and Bhunga were identified for the study. From each block, two villages were selected randomly. Focus group discussion was conducted with the girls (13-18 years) studying in 7th, 8th, 9th, 10th, 11th and 12th standard. The data was pooled in percentages.

DISTRICT HOSHIARPUR

<i>Block: Mahilpur</i>	<i>Villages: Mukho Majara and Bambeli</i>
<i>Block: Hoshiarpur II</i>	<i>Villages: Ajram and Nasrula</i>
<i>Block: Bhunga</i>	<i>Villages: Mengrowal and Bhunga</i>

TOOLS

Self- structured interview schedule was prepared for girls to assess the existing levels of schooling

status, household responsibilities, upbringing, practices, and existing knowledge regarding economic, social, health, marriage and legal aspects etc.

RESULTS

SCHOOLING STATUS

- The girls from all villages were very much interested to study no matter how far they had to travel. Majority (90%) of the girls from all the villages went to school on cycles in other villages, covering a distance of 6-8 kms as there is no school in the village, where they reside, whereas a few of them went on foot covering the distance of 2 -4kms approx. from their house to their school.
- Majority (80%) of the girls reported that they spent one hour at home for studies, as they had to complete the household responsibilities such as sweeping, mopping, washing clothes etc. whereas a few girls (20%) spend three hours for study along with the household work.
- All the girls (100%) reported that both their parents encouraged them to study and brought books/stationary items for them. The rest (20%) themselves brought books/stationary items; from the village karyana / stationary shop.
- Girls (100%) reported that they did not have access to newspaper /magazines. They did not know what was happening on in the outer world, as newspaper was not available in their homes. Ninety percent of the parents did not make any effort to know the progress of their daughters in studies and only 10% girls reported that their parents visited the school to know about their progress.
- Majority the girls (90%) were allowed to read books/magazines available in the school library whereas a few of them (10%) were not allowed to read any other books/magazines apart from their school syllabus.

" All the girls were of the view that educational expenditure of boys and girls is equal. The girls were provided the similar educational facilities like boys such as tutorials, personal time to study etc. One thing very clearly reported by schoolgirls that they had to study hard; otherwise parents would make them sit at home. Their brothers did not work hard in school and usually spend two years in one class. No parental pressure on them like their sisters had was seen.

ECONOMIC ASPECTS

- Girls of middle and high schools reported that they were interested in skill-oriented training and wanted to pursue as a career. Most of them were interested in taking training in cooking, stitching etc.
- Girls were not aware of any vocational facilities in relation to their qualifications or any type of course to be chosen in relation to the available vocational avenues. None of the girl had ever gone to Bank/Post office nor was familiar with the type of transactions or activities performed there.

SOCIAL ASPECTS

The social activities, occasions and places to be visited by daughters are defined by the elders in the family

- Girls were not allowed to be members of any youth club /society/cooperative body in the village whereas boys were given
- All the girls attended marriages /fairs ceremony within the village accompanied by their family members. But boys could go either alone or with their friends.
- The girls were not allowed to go for movies in the city. Altogether, the girls and even their mothers were not allowed to go to theatres, as this would bring bad name to the family.
- The girls were allowed to chat with their friends in the household premises but were not

permitted to go to friend's house alone, for going to friends house they were to take either their sibling or grandmother along with them. Even for going to school they were required to go in groups but no such restrictions seen for boys.

- Girls were not allowed to receive any phone call in their homes. If they want to talk to anyone or their friend on the phone, they had to seek the permission of elderly members of the family.
- The girls were not given freedom to interact with the members of opposite sex.

HOUSE HOLD RESPONSIBILITIES

Girls were asked the time spent on various house hold responsibilities like sweeping and mopping, washing clothes, cooking food, collecting water etc.

- Girls reported that they usually spent one hour in sweeping and mopping the house in early hours of morning, took $\frac{1}{2}$ hour for cleaning vessels, $\frac{1}{2}$ -one hour for washing clothes in the evening or on weekends and one hour for cooking meals which included cutting vegetables and making chapattis etc. In case of girls household responsibilities were more important than their studies.
- * Majority of the girls (90%) reported that their male siblings did not help in performing the above activities whereas a few (10%) reported that male siblings helped them in some of the activities as cutting vegetables, milking the cow etc.
- In addition to the household responsibilities, the girls spent 2-3 hours in the field just to collect fodder in their own fields.

UPBRINGING PRACTICES

- Girls (20%) reported that discrimination existed regarding feeding practices in the families. As their brothers /fathers were served food first, whereas they and their mothers were last ones

to eat, whether or not there was enough food left for them. Their brothers in the family were given more milk, milk products and non-vegetarian food than girls, thinking they were future responsible persons of the home.

- * Girls (80%) reported that expenditure on clothes was more for boys than girls. "Boys clothes were much expensive and they buy them quite often. Boys go for ready-made clothes; jeans, pants and even the stitching charges were more. They were choosier about their clothes, whereas girls were satisfied by what ever their parents brought for them to wear. They could stitch their own clothes themselves.
- All the girls reported that time spent on recreational activities were more for boys than girls. The boys were given more freedom to watch television at home, roam about in the market, fairs, watching a movie and gossiping with their friends. The girls on the contrary were barred from such freedom.

RITUALS PERFORMED

Number of rituals performed at different occasions related to the birth of a baby boy were as

- Distribution of sweets at the time of birth, celebrating *TEHRVAAN* (when the child is of 13 days), naming ceremony, celebration of *Lohri festival* and celebrating first birthday. No such rituals were observed for girls.

MARRIAGE

- The ideal age of marriage for girls in Hoshiarpur district was above 18 years and for boys it was 25 years and a gap of less than five years was generally accepted between boy and girl as marriage partners.

The girls had little choice in selection of marriage partner, and as they felt satisfied to what their elders had decided for them. Boys had all the liberty to say 'No' to any girl as her life partner. The expenditure in girl's marriage was more than boys as lot of money was spent

for preparing the dowry items, hospitality of the in-laws, gifts and jewellery for them and many more items.

- When asked about the criteria of selection of marriage partner, the girls emphasized that they wanted their partner should be educated, employed, and should not be under the influence of any kind of drug, whereas 5% considered astrology as the main criteria for mate selection.
- All the girls were well aware of the dowry practices. They knew that giving and taking dowry is crime but still this practices existed. Basically no one wants to do away with dowry as a custom.

WORK PATTERN

- Twenty five percent of girls from selected villages went to fields to earn wages during vacations while others started working in their own fields at the age of 10-12 years. It was reported that girls got lower wages than boys, the reason being that girls did not work in the evening hours or for long hours/Oke'other household responsibilities girls were expected to work in fields, though for a shorter duration.

LEGAL ASPECTS

- All rural girls were not aware of their rights and other legal aspects regarding girls
- Girls of 18 years of age reported that they had no knowledge of voting rights, voting pattern. Even their mothers did not know about this. Only male members guide the females to vote a particular person

HEALTH ASPECTS AND PUBERTY

- All the girls had access to medical facilities such as availability of medicines in the village, visiting hospital and other home treatment for ailments like boys.
- Girls were aware of the food related deficiencies and reported that long hours of fieldwork reflect their health.

- According to the girls age at menarche was 13-14 years. None of the girls had prior knowledge regarding menstruation. The sources of information about the onset of menarche were mothers and friends. During this period girls were restricted on taking dry fruits, sour foods (pickle, curd, lassi), not allowed to go religious places such as Temple, Gurudwara and not much involved in religious activities.

- Girls did not know the puberty changes occurring in their bodies' i.e primary and secondary sexual characteristics.

CONCLUSION

Girls did not have access to newspaper/magazines and are not aware of bank/post transactions. The expenditure on clothes and recreational activities was more for boys than girls. They were not aware of legal aspects and a few did not know that child marriage is an illegal offence.

^COMMENDATIONS

The girl child needs more assistance and encouragement for building up self-esteem and enhancing her contributions to the family and community. Thus ensuring her retention in school, better facility for immunization and health and in developing vocational skill for employment.

MOTHERS

No. of Participants[^] 30

CHILD REARING PRACTICES

- The girl child is considered as a burden by the mothers
- All children are immunized as per the schedule.
- The duration of breast-feeding for both boys and girls is till 1 year of child's age.
- Weaning for both boys and girls starts from 6-7 months of age.
- Few of the mothers 20% reported that fathers and grandparents spend time with children in playing.

- * Children are rarely taken to fairs/picnics/Zoo's/ Friend's house.
- Girl child is sent to the anganwadi when she is 3-4 years of age.

UPBRINGING PRACTICES

Feeding Practices

- * The food was first served to the elderly person in the house followed by young children and other members of the family whereas the mothers were the last ones to eat.

Clothing

- * Thirty three percent of mothers reported that expenditure on clothes is more for girls, Thirty three percent of mothers reported that expenditure on clothes is more for boys and rest of the mothers(34%) reported that expenditure on clothes is equal for girls and boys and mothers do have selection in choice of clothes.

EDUCATION

- Girls are given same facilities like, notebooks, textbooks, tutorials, privacy for studies like boys.

RECREATION

- Mothers do not permit their girls to go for movies, read magazines, go to friend's house, but they are permitted to chat with their friends, listen to radio, and watch T.V etc.
- Girls (75%) are permitted to write and spend on letters to their friends.

HEALTH

- All the girls get the medical facilities like medicines, visit to hospital and home treatment for ailments like boys.

RITUALS PERFORMED

- The rituals performed at the birth of a baby boy are naming ceremony, distribution of sweets, *Lohri* celebrations, first birthday. Hair

cut function (only in Hindu community) etc whereas no such functions were performed on birth of a baby girl.

MARRIAGE

- The ideal age of marriage for girls is above 24 years and for boys it is 24-25 years
- The boys and girls are not permitted to remain unmarried.
- The girls have their choice in marriage.
- Expenditure on marriage of girls is more than the boys.
- Gap of less than five years is generally accepted between boy and girl for their marriage and a few mothers were of the view that a gap of 5-10 years should be between a boy and a girl.
- It is not accepted if girl chooses boy for marriage on her own.
- * Inter caste marriage and Inter religious marriage of daughter is not permitted in 80% of the families. Whereas 20% of the families allowed their daughter for inter caste marriage.
- The important criteria for mate selection -
According to mothers employment of boy is an important criteria in mate selection followed by land, education and good looks.
- Mothers would like their girls to work outside after marriage.
- Aim of the marriage is procreation of the race

SOCIAL ASPECTS

- Only 20% of girls are member of a society named "Jai Lakshmi Vikas society". Most of the mothers allowed their girls to gather with their friends occasionally. They are allowed to attend marriages, fairs or any social functions only in their villages or in their relatives staying outside the village.

- Insurances of neither boys nor girls are done.
- Girls are not allowed to go wherever they like and there are restrictions on specific behavior like laughing, speaking loudly, and talking to members of opposite sex.-

LEGAL ASPECTS

- The mothers are not aware of the rights of girl child
- » All the mothers know that giving and taking dowry is crime and that child marriage is an illegal offence.

REPRODUCTIVE HEALTH

- Mothers are of the views that a girl should become mother after six months- 1 year of marriage and few of them (10%) considered 24-25 years as an ideal age for becoming mother.

PUBERTY

- » There are restrictions on food for girl child entering puberty stage like not eating sour foods, dry fruits, curd etc. "
- " Mothers do believe in specific rules for girls during menarche like not to touch pickle, going to religious places etc.

CARE DURING PREGNANCY

- The age span for child bearing should be 20-40 years
- Majority of the mothers have undergone test to detect the gender during pregnancy.
- The usual place of childbirth is hospital.
- All of them had knowledge about family planning methods.
- The ideal birth spacing as reported by the mothers was 2-3 years.

BEHAVIOURAL ASPECTS

- * Mothers observe behavioral disorders like thumb sucking, aggressive behavior, clinging to parents among the children.
- According to mothers the reason for such problems is jealousy, fear, poor control by adults.
- Remedial measures taken are explaining to the child, physically controlling the child (putting chillies around his thumb), threatening and scolding the child.

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AN INTERACTIONAL STUDY OF SCIENTIFIC CREATIVITY AND SOME OF ITS RELATED FACTORS

RJS.Yadav

Habiba Hussain

INTRODUCTION

Every child is unique and possesses some inherent talent to think divergently. This is the reason why our students in the class sometimes come up with so called silly and wild queries. This characteristic to bring out some novelty or originality is referred to as creativity. In spite of the several views on the nature of creativity (Sternberg, 1988), there is some agreement that the creative process involves the application of past experiences or ideas in novel ways. Guilford has used the term divergent thinking ability for creativity, which involves continuity, flexibility and originality.

Scientific creativity also requires free thought and freedom to explore and may be considered as specific creativity expression, unique production in science and technology. It may be a unique scientific process responsible for some creative contribution in the field of science, technology or otherwise. Kamra, Raj nee sh & Gakhar (2001) held the view that scientific creativity is significantly correlated with intelligence, problem solving and science achievement.

It is often found that adolescent boys and girls face problems in adjusting themselves to their environment. On this basis psychologists have identified two types of personality-healthy and sick. An individual with healthy personality is able to adjust properly with his/her environment than an individual with sick personality. People with healthy personality are able to be well adjusted. Cavan opines that 'a well-adjusted person is able to satisfy his needs quickly and adequately within the system of controls and outlets provided by his culture'. Studies have shown that besides the personality typology, there are certain other factors that further contribute towards adjustment by an adolescent. These may be the home environment of the individual influence of the peer group, school atmosphere, locale, sex, etc.

Mohanasundaram & Murugesan (2000) carried out a study on personality, scientific creativity and achievement of higher secondary students and concluded that personality types differed significantly in terms of scientific creativity with respect to extroversion and introversion.

In the present study, the two factors, locale and sex, have been considered along with personality typology.

OBJECTIVE

To study the interactional effects of personality typology, locale and sex on scientific creativity of students at plus two level.

RATIONALE

The proposed study was undertaken to study the effects of some of the independent variables on scientific creativity. The variables under consideration are personality typology (healthy vs sick), locale (urban vs rural) and sex (male vs female). To find out the relative effects of their interaction, the following assumption was made in the form of an interactional hypothesis.

HYPOTHESIS

"Personality typology will show the maximum main effect and sex would show the minimum main effect on the criteria of scientific creativity. The variable locale will show the main effect in between these two extremes on the criteria of scientific creativity."

DESIGN OF THE STUDY

The sample under study was randomly selected and comprised 1200 students at plus two level of Bilaspur District.

The school environment was categorized into urban and rural. The schools under the jurisdiction of Municipal Corporation were considered as urban

schools and others, the rural schools.

Tools Used

The following tools were used to measure the different (dependent and independent) variables:

Verbal Test of Scientific Creativity (VTSC) -Prof. V. P. Sharma and Dr. J. P. Shukla.

The scale is a standardized scale in Hindi Version and measures the scientific creativity of students. Alongwith the manual, this test has a test bookie and a separate answer sheet in Hindi version. This test has been implemented successfully in Indian situation by many research scholars; therefore, this scale is considered the most suitable for students under study.

Adolescent Personality Test-Dr. (Smt.) A. Pandey:

This test, also in Hindi version, measures the personality type of adolescent students. Many research scholars have applied this scale successfully.' It consists of a question booklet and a separate; answer sheet alongwith the manual for guideline. Hence, this scale has been used to measure the type' of personality of the subjects under study.

ANALYSIS AND INTERPRETATION

The research problem was analysed by calculating the "F"-ratio and the results were obtained.

The following inferences were made:

1. Only personality typology seems to have a main effect on scientific creativity.(F= 176.041, df=1; 1192,p<.01)
2. Variables like locale and sex, which have been taken, as the second and third main variances respectively do not depict any significant effect on the scientific creativity. However, the main effect of variable sex is estimated to be the lowest • (F=0.0046, df=1; 1192, NS),.that of variable locale " being slightly on the higher side (F=Q.011, df=1; 1192, NS), though both are insignificant,
3. Among the interactional effects it is seen that:
 - a) The interaction of variables-" personality type" and " locale" has the greatest effect on scientific

creativity and is highly significant (F= 493.9589, df=1;1192,p<01).

- b) Interaction of variables like "locale" and "sex" has no significant effect (F=0.0051, df=1; 1192, NS) while that of "personality type" and "sex!" is quite significant (F=6.9944,df=1; 1192,p<.01).
4. The interactional effect of all the three variables i.e, personality typology, locale and sex is also considerably significant (F=474.6971, df=1; 1192,p<01).

CONCLUSION

It is very obvious from the present study that personality typology has a remarkably significant main effect on scientific creativity of students. However, locale and sex of students do not show any such effect. One reason for this could be that the students of rural areas taken in the sample are much aware of their outside world owing to advances in technology (mainly media). Most of the teachers teaching them are also from urban and sub-urban areas who further help in transferring such knowledge and bringing the outside world closer to them through interactions. As such, rural and urban students are not found to differ significantly in their scores of scientific creativity.

The interactional effects of personality type & locale and .personality .type & sex were again quite significant, this is equally true for the interactional effect of all the three variables, i.e., personality type, locale and sex of students. This finding leads to avenues for further research.

On the basis of the findings as given in 6.0, the hypothesis framed is accepted and it is therefore, concluded, that in the present study personality typology shows the maximum main effect and sex shows the minimum main effect on the criterion of scientific creativity. The variable locale shows the main effect in between these two extremes on the criterion of scientific creativity.

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A STUDY OF PERSONAL, PROFESSIONAL AND SOCIAL ADJUSTMENT OF THE TEACHERS WORKING IN PRIMARY SCHOOLS OF AGRA DISTRICT

Arun Kumar Kulshrestha
Pratima Dave

INTRODUCTION

The role and responsibility of a teacher at a Primary level are infinite and limitless, since he is an instructor, an unobtrusive arranger of self directed activities, a therapist, a guarantor of happiness, an engineer of warm personal relationships in which none shall feel the draught of disapproval. But with the attainment of independence new goals, demands and responsibilities necessitated far reaching changes in the System of education. There was 'Explosion of Expectations' in every walk of life including education. Article 45 of the constitution recognised that Elementary Stage, which is terminal stage for a large number of children, was of an immense importance for building up a responsible citizenry for a democratic, secular and socialistic Society. A Teacher can not discharge his duties properly if he is reasonably satisfied with himself and his environment. A well adjusted teacher is a source of inspiration to his students and a boon to the society. On the other hand a maladjusted teacher can create havoc with his students and his own mental health. Thus, the adjustment or maladjustment of a teacher casts more depending effect on the community and the nation than that of any other profession. In no other work, a satisfactory adjustment is as essential as in teaching which is one of the four traditional professions along with Law, Theology and Medicine. Therefore, if we wish to bring about improvement in education we have to identify poorly adjusted teachers, because only a friendly, enthusiastic, secure and well-adjusted teacher can contribute much to the well being of his pupils. On the other hand, the irritable, depressed, hostile,

tired and neurotic teacher can create tensions which are disturbing to pupils and which may permanently alter their outlook on life. Higher level of adjustment of the teacher is directly linked with his efficiency in his work, and a vital necessity for the welfare of the students and nation in general. Thus a maladjusted-teacher cannot be allowed to spread the virus of his disease to the students or the society. In this way, the fate of the pupils as well as the success or failure of an educational programme hangs on the degree of adjustment of the teacher himself.

OBJECTIVES

To study the personal, professional and social adjustment of the primary teachers/following objectives have been laid down.

1. To study the status of personal professional and social adjustment of the Primary School teachers.
2. To study the status of personal, professional and social adjustment of the teachers with reference to their locale.
3. To compare the personal professional and social adjustment of the rural and urban primary school teachers.

HYPOTHESES

To achieve the objectives of the study following null hypotheses were tested:

1. No significant difference exists between the personal professional and social adjustment areas among primary school teachers.

2. No significant difference exists between the personal, professional & social adjustment of the rural and urban teachers of the primary school.

DELIMITATION OF THE STUDY

The present study was confined to the primary teachers working in the primary schools and has the permanent job of at least five years of teaching experiences, the primary school were considered which are governed by Basic Shiksha Parishad and are situated in Agra district.

SAMPLE AND ITS SIZE

The sample of the study was drawn from the parameter of the primary teachers of both the sexes working in primary schools situated in rural and urban areas of Agra district.

The sampling units of 187 teachers were selected by accidental method. In the sample there were 85 teachers from rural areas and 102 teachers were selected from urban areas.

TOOL

S.K. Mangal's Teachers Adjustment inventory (MTAI) was used, to measure adjustment of the teachers of both the sexes. The test consisted of 253 items classified in "five categories viz: *Adjustment with academic and general environment of the institution * Socio - Psycho Physical Adjustment *Professional relationship Adjustment *Personal life Adjustment *Financial Adjustment & Job Satisfaction. The reliability and validity of the test is 0.97 and 0.95 respectively. Thus the scale has the capacity to bring into focus the teachers who are reasonably satisfied and adjusted and thus may be entrusted with the task of bringing efficiency and improvement in education.

STATISTICAL TECHNIQUE

Both Descriptive and Inferential Statistics were used as per the nature of the data.

Administration of the Test

After getting the permission from the principals of selected schools the researcher has administered the test on the sample selected. The separate answer sheet was distributed by the researcher and the teachers were instructed to fill in the required information in the proper spaces. The investigator read the main directions given on the cover page, to make the examinees acquainted with the uses and purposes of this inventory. The teachers were shown the space on the inventory for marking responses to statements. No time limit was enforced but the respondents were requested to return it as early as possible according to their own convenience.

Scoring of the Test

The subject has to select only one answer, the mode of response to each of the item of the inventory is in the form of 'Yes', 'No' OR '?' indicating complete agreement, disagreement or neither agreement nor disagreement with the proposed statement respectively. In the inventory 41 items are such where the response 'Yes' shows adjustment. For the remaining 212 items the response -No' shows adjustment. In the scoring scheme it has been planned to assign score 2 for the response indicating adjustment, score 1 for the Undecided (?) response and zero for the response indicating lack of adjustment or maladjustment. Scoring may be done by hand or scoring stencils. The areawise scores as well as total adjustment scores are computed separately with the help of the key provided in table of the manual. Total adjustment score of a subject may thus range from 0 to 608. Number of tick marks for correct answers should be added together to get a composite score.

ANALYSIS AND INTERPRETATION OF DATA

To ensure whether the condition of basic assumptions were satisfied or not some of the statistical techniques like M, S, D, Sk and Ku were

sued in the study. The distribution of the adjustment scores are congenial one. The magnitude of Sk and Ku are comparatively very low and can be considered negligible. The kurtosis in all the adjustment scores of the teacher is *leptokurtic* in nature (i.e. $Ku < .263$) or the distribution is more peaked than the normal distribution, thus it can be inferred that nature of the personal, professional and social adjustment scores are almost normally distributed in the Universe. Whatever skewness and kurtosis occurred may be due to the sampling fluctuation or due to chance factor.

A careful study reveals that the distribution of the adjustment scores of the teachers are congenial one. the magnitude of the skewness and kurtosis are comparatively very low. there is a slight negative skewness in the case of rural teachers. The curve is leptokurtic except in case of professional adjustment of the ural teachers. Thus, it can be inferred that the adjustment scores of all the three areas of both rural and urban teachers are almost normally distributed in the universe, whatever SK & Ku occurred may be due to the sampling fluctuation or due to chance factor.

Comparison of the adjustment scores of rural and urban teachers of the primary schools

There is a feeling that primary school teachers particularly those working in rural areas in our country have to face adjustment problems. Hence empirical evidence was gathered in order to study and compare the adjustment problems of the rural and urban teachers of the Agra district. To ascertain the significance of difference between rural and urban teachers in respect of their adjustment problems mean scores, t-test was applied.

The obtained results show that rural and urban primary teachers do not differ significantly in their adjustment scores, and so the null hypothesis is accepted. Primary teachers are, by and large

satisfied & adjusted. Though the climate in the rural schools is reported to be more congenial than the urban schools.

FINDINGS AND DISCUSSION

- (i) The distribution of adjustment scores of the teachers working in primary schools was found normal in nature with slight divergence, may be due to sampling fluctuation.
- (n) Difference was observed in the mean values of adjustment scores of the teachers working in primary schools. The mean value indicated that primary teachers are highly adjusted in social life and least adjusted in professional life.
- (iii) Distribution of the teachers according to the level of adjustment in different areas revealed that majority of teachers have average level of adjustment. They seem to be satisfied or very satisfied with their personal, professional and social life.
- (iv) The distribution of adjustment scores of the teachers of rural and urban primary schools was found almost normal with negligible negative skewness and leptokurtosis.
- (v) The status of rural and urban teachers revealed that urban teachers are least adjusted in social life and better adjusted in professional life than their rural counterpart. Similarly rural teachers are highly adjusted in social life, better in personal life than their urban counter part but least adjusted in professional life.
- (vi) The slight difference observed in the mean values of adjustment scores of the teachers working in rural and urban areas primary schools, indicated that rural teachers are better adjusted than urban teachers in personal and social life except in professional life.

CONCLUSION

On the basis of findings of the study it can be concluded that teachers teaching in primary schools and belonging to rural areas are better in social adjustment while the teachers belonging to urban areas and working at the primary schools are found better adjusted in personal areas. The difference in the adjustment of the primary school teachers of rural and urban areas may be due to the following reasons.....

- (a) Rural teachers believe in co-operative life, mutual contact with each other, preserving the bonds of friendship among fellow members of the society. Whereas in urban life, teachers are running after material and economic gains so much, that they find little time to gear up their social life. The urban teachers have made themselves too busy in tuition and coaching etc., that they are unable to maintain their social life.
- (b) Urban teachers are better in their personal adjustment because they face lower level of emotional disturbance, temperamental instability, unhappy married life, other family relations, too much responsibilities & lack of security feelings due to unacceptance as compared to their rural counter part.
- (c) Secondary professional adjustment of urban teachers working in primary schools is better

than rural teachers working in primary schools because working conditions of teachers in urban area schools are decidedly better than their rural counterpart may be due to the following reasons..

- (d) Urban teachers have lower professional anxiety because in urban schools interpersonal relationships between head teachers and teachers and among teachers seem to be better than in rural schools, thus urban teachers take more initiative by providing extra support to their pupils and instilling in them values of punctuality and discipline. Urban teachers also seem to have attended more in service programmes than their rural counterparts.

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EFFECTIVENESS OF INFORMATION PROCESSING MODEL OVER TRADITIONAL TEACHING METHODS FOR TEACHING ENGLISH AS SECOND LANGUAGE IN SECONDARY SCHOOLS

D. Mukhopadhyaya
Shyamasri Ghosh

INTRODUCTION

Learning is a cognitive developmental process and depends on biological maturation (Vygotsky, 1987). According to Vygotsky, child's learning and cognitive development also depends on social maturation and the culture of the family of the child. In second language (L2) learning and teaching this is very important both for the teachers and the family of the child. It has been experimentally found that the 'Zone of Proximal Development' in learning increases with the increase of teachers' activities, students' group activities and social-interactions. The 'Zone of Proximal Development' defines functions that 'will mature tomorrow, but are currently in an embryonic state. These functions could be termed as 'buds' or 'flowers' of development rather than the 'fruits of development' (Vygotsky, 1978).

Language teaching/learning could be traced back to the origin of human communication. The number of languages spoken throughout the world was estimated to be 6,000 (Grimes, 1992). According to Spolsky (1986), "language is a core factor in any education", as education depends on communication and verbal coding of human knowledge". Looking at different languages from the point of view of language instruction, certain languages had been labelled as *mother tongue* (MT), certain others as *second languages* (L2), and some others as *foreign/other languages* (OL). Mother tongue, according to Skutnabb-Kangas (1986) was, "..... the language with which education could be made more meaningful,

effective and easy". Second language (L2) was broadly divided as any language other than the learner's 'native language' or 'mother tongue'. They encompassed both languages of wider communication encountered within the local region or community (e.g., at the work place or in the media), and truly, foreign languages, which had no immediate local users or speakers.

So for moving from actual development to the level of potential development, it requires sufficient guidance from teachers who would structure problems so that pupils can develop their ability in second language (L2). Again second language learning depends on several factors and the individual learner, in his primary group, remain at the centre. The following figure is self explanatory:

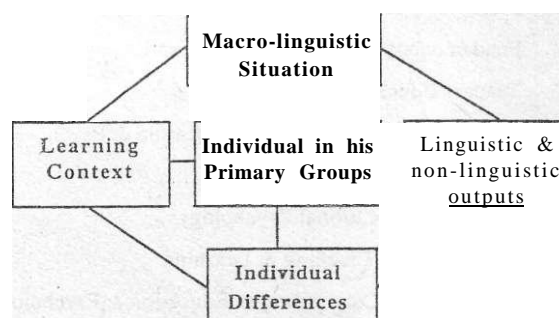


Fig1. A Dialogue Model of Second Language Learning (Landry & Allard, 1994)

Researches on language teaching methods can be

traced back to the 1950s. But by the mid-1980s, the field of second language (L2) learning research matured into a much more autonomous field of enquiry and was no longer subordinate to the immediate practical requirements of curriculum planning and language pedagogy. There is a significant difference between the process of acquiring mother tongue (MT) and learning of second language (L2). While instruction in mother tongue (MT) is both *informal* and *formal*, instruction in second language (L2) is primarily *formal*. Here the role and responsibility of the teacher becomes all the more important. He/she constantly carries on experimentation with newer methods and models of teaching to find out which of them are most suitable and effective in maximising learning in his/her students of second language (L2) in a given situation. But the problem remains elsewhere. It is complex and a highly technical matter to convert the curriculum into a suitable instructional model, especially for teaching second language (L2). All spoken languages have some differences. But they also have some common aspects, sound, structure and meanings. Again, language consists of four sub-systems: phonology, semantics, grammar and pragmatics. In becoming competent speakers, children should be competent in each of the four sub-systems, to combine them into flexible and effective communication and develop metalinguistic awareness.

In India, English is the medium to acquire economic power whereas the Indian languages are means to social power. English still remains the language of international relations, as a *link language* and as a *library language* in science and technology.

Several studies were made in India and abroad on language learning. Hakuta and Garcia (1989) studied American school children in learning second language (L2). Reich (1986), Goodz (1989) worked on bilingual children. In this case the concept of Chomsky (1976) on Language Acquisition Device is unique and important. There are several studies in India on the acquisition of second language (L2). Among them the studies of Khanna and Agnihotri (1982), Sahgal (1992), Khanna, Verma, Agnihotri and

Sinha (1990), Mukherjee (1980), Satyanath (1982), Mathur (1991) are important. The present study tries to find out the effectiveness of Information Processing Model (IPM) over Traditional Teaching Methods (TTM) for teaching English as second language (L2) in secondary schools.

OBJECTIVE

To compare and determine experimentally, the relative effectiveness of Information Processing Model (especially combined form of Concept Attainment Model and Advance Organizer Model) and Traditional Teaching Methods in English as L2 at the secondary level of education in West Bengal (India).

HYPOTHESIS

No difference would exist between Information Processing Model (combined form of Concept Attainment Model and Advance Organizer Model) and Traditional Teaching Methods for teaching English as second language (L2).

SAMPLE

Initially 85 pupils (boys), from class seven of a secondary school of West Bengal, were selected by considering their achievements in two successive previous examinations (Annual Examination of Class VI and Half Yearly Examination of Class VII). All the students had English as L2. The average of the two scores, their mean and SD were computed for final selection of the sample. The students whose scores were in between Mean + 1SD were taken. In this way only 63 students were considered and finally an achievement test in English was administered on them to assess their knowledge of L2. The test was prepared by the researchers according to the syllabus and only those portions were selected which were covered by the school at the time of starting the experiment. 60 students were selected for final step of the test and they were then divided into *Experimental Group (EC)* and *Control Group (CG)*. Each group had equal number of students (30 in each group) selected according to the scores obtained in the above by even-odd method.

TOOLS USED

Four *lesson-plans (LPs)* were prepared for the EG considering IPM and four others for the CG using TTM. All the tools for measuring achievement of the students were developed and standardized by Mukhopadhyaya and Ghosh (2002). The IPM in the process included Concept Attainment Model and Advance Organiser Model, suitable for teaching/learning of L2.

FINDINGS

Classroom teaching was conducted according to the previously planned strategy. The EG was taught according to the LPs prepared with the help of IPM and CG was taught by the LPs of TTM. The time; of teaching was second period, since it was considered to be the best time in which the pupils were found to be most attentive to their studies and learning process. The LPs for both the groups contain similar topics divided into four units for four LPs. But the mode of presentations were different.

The LPs for the EG had four phases. In the first phase, Advanced Organisers were presented. In the second phase, identification and presentation of the concept were made. In the third, testing of the concept was developed according to the previously planned strategy. Finally in the last phase, analysis of learning in the cognitive level was made and its strengthening was ensured by proper evaluative method through IPM by applying advanced organiser and concept attainment model.

LPs for the CG was also prepared and standardised properly. It too had four stages. In the first stage, objects were determined in behavioral terms (General and Specific). The second stage was the preparatory stage where some questions were asked to evaluate their related previous knowledge (known to unknown, simple to complex, concrete to abstract etc.). The third stage was the presentation stage (explaining, demonstrating and questioning) and the final stage was the evaluative stage.

The test for measuring the final output of the students (for both the groups) in L2 comprised of 21

items and was standardised properly following proper procedure. Mainly two domains (cognitive and affective) were considered. The Test- Retest Reliability coefficient of the test was found to be 0.98 (by Spearman-Brown formula) and it was found to be significant at 0.01 level.

After completion of the lesson plans of both groups, the final test for measuring the achievement of students were applied. The answer sheets were scored according to a predesigned scoring schedule. The t-test was applied. The value of CR was found to be 8.72 (which was significant at 0.01 level). Thus the null hypothesis was safely rejected.

CONCLUSION

In case of teaching/learning of English as second language (L2) in secondary schools, it was finally concluded that the experimental group (EG), taught through Information Processing Model (IPM) did much better than the control group (CG), taught through Traditional teaching Methods (TTM). This shows a positive trend towards implementation of this model in our schools.

Due to certain limitations of the present study (e.g., shortage of time, limitation of the content areas of English lessons, small sample size, etc.), some recommendations for further study were made :

1. This experiment may be replicated in a number of schools to see whether the Information Processing Model of teaching was free from school variance.
2. The present experiment may be replicated by different teachers to see whether the Information Processing Model of teaching was free from teacher variance.
3. The possibility of introducing Information Processing Model (IPM) in remedial instruction may also be investigated.
4. The present experiment may be investigated in a number of groups which would be grouped according to their merit, in order to see the effect of Information Processing Model (IPM) and what type of groups or pupils were more benefited from this model.

5. Experiments may be undertaken to test the efficacy of other types of models of teaching.

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EDUCATION FOR AUTONOMY OF THE GIRL CHILD

Kaipana Vengopai

INTRODUCTION

Over the past few decades, a positive change in perceptions of women's rightful place in society has taken place. There is now a great deal of concern over eliminating gender-role-stereotypes, which propagate inculcation of sex-type behaviours in socializing girls and boys. Recent developments in education have been accompanied by many initiatives at the government level to introduce gender-neutral components in curricula, transaction "of instructional material and other aspects of Education. Emphasis in education has moved from Equality of Educational Opportunity '(NPE, 1968) to Education for Women's Equality and Empowerment' (NPE, 1986). As a result, the NCERT in its latest National Curriculum Frame-work for School Education (NCFS.E -2000) has reiterated the need to pay more Attention to the curricular and training strategies for the education of girls. Besides, making education accessible to more and more girls especially rural girls, attempts are being made to remove all gender bias and gender discrimination in school curriculum, textbooks, the process of transaction-and education as a whole. Attempts are being made to provide scope for deliberate action on the part of teachers and school functionaries with regard to the education of girls (NCERT 1984).

HELPING GIRLS DEVELOP A HEALTHY SELF CONCEPT

A mature, competent and self-fulfilled woman is not only an asset to herself, her home and family, but also to the society at large.' When children's social horizons broaden and they come more and more in contact with people, their attitudes of those who are especially significant to them - members of the peer group, teachers, etc. begin to have an effect on their self concept (NCERT, 1996).

Self concept is the single most important factor affecting behaviour of the individual. Self concept as a construct has many dimensions. a) The bodily self - physical experiences, body boundaries, sensations of pleasure and pain, b) Self-recognition - awareness of one's appearance, c) Extensions of the self - skills & talents, d) The Reflected Self - important objects, space or people, e) Personal competencies - opinions, comments or actions of others toward the self, f) Aspiration and goals - meaningful life goals that give a sense of purpose to the self and g) Self-esteem - evaluation of the self as worthy or unworthy.

Influence of the school

Some of the positive school practices directed at helping develop the self-concept of girls are: a) A healthy pupil-pupil relationship, b) Eliciting positive response in social interactions, c) Necessary moral support to a child facing a crisis, d) Positive feedback in case of success experiences, e) Co-curricular activities encouraging talents of children, f) Teaching effective time-management methods, g) Teaching effective space-management methods, h) Opportunities for "hands on" experiences, i) Opportunities for self-evaluation, j) Opportunities for self-exploration, k) Opportunities for raising awareness about surroundings, l) Help in distinguishing between 'self and not self and m) Use of curriculum and co-curriculum in disseminating self-related and not self-related information about interests, values, attitudes etc. both individually and in groups; etc. (NCERT, 1990-92).

Broad intervention strategies for schools

Appropriate intervention strategies need to be planned by the school in developing personalities and potentialities of girls. Two types of strategies are visualized. Those strategies, which are helpful in counteracting the attitudinal barriers in the way

of girl's development. Positive concrete measures at various levels which foster development of individuality among girls and women.

Suggested interventions

1. Creation of awareness among parents and community about the potential, special needs and changing role of women and girls through:
2. Use of multi-media.
3. Establishment of parent - teacher association.
4. Preparation of materials and dissemination of information (displays, lectures, talks)
5. Development of favourable attitudes towards non-traditional careers for girls and women through provision of in-service programmes for all educational administrators.
6. Production of non - sexist career information materials.
- 7. Introduction-of Education and Vocational guidance as a subject in school curriculum and in teachers - training curriculum,
8. Promotion of search on girls and women in education and employment.
9. Creation of special out-of-school guidance programmes for girls and women.
10. Establishing and /or strengthening of educational and vocational guidance services at primary and secondary level.
11. Removing gender bias from curriculum.
12. Increased participation of girls in wider subject areas
- 13. Promotion of a more positive image of women and the value of women's contribution to society through relevant materials (text books, teaching aids, reading material for parents and teachers).
14. Pre-service / In-service training of teachers to develop skills in (NCERT, 1996).
15. Raising consciousness about the role of women in society.
- 16 Enhancing self-esteem and self-confidence in girls.

17. Promoting equal participation in classroom interaction.

18. Increasing problem solving and special skills.

19. Using positive role models.

20. Increasing career awareness.

Motivation -vis-a-vis Teaching learning situation: Development of an educational environment that is supported by attitudes of respect, care and concern give positive strokes to girls, and promote their relationships with teachers (NCERT, 1984).

ROLE OF TEACHERS

Teachers' faith in students 'ability'

Teachers show initiative by involving themselves personally and professionally with students.

Giving them experiences to assume a sense of responsibility.

When teachers have a positive and realistic view of themselves it make it easier to perceive students as valuable, able and responsible (NCERT, 1991). Teachers own self-regard is related to their evaluation of students self regard (NCERT. 1982). Some pre-requisites to motivate girls to learn: In order to use motivational devices in teaching learning situations, the teacher need to be sensitized to the following: (NCERT; 1982).

Goals should be at the development level of the pupils.

Previous learning experience.

Pay attention to individual learner's self-expression.

Appropriate levels of aspiration.

Familiarity with pupil's interest

Knowledge of performance in learning.

Setting exact and clear goals for each pupil.

Completion of tasks to achieve goals.

Use reward and punishment meaningfully as reinforcement.

ENHANCING MOTIVATION THROUGH ACTIVITY AND RECOGNITION DRIVES

Activity Drive

The activity drive is simply an urge for action which is existent in all children and common in all human beings.

Activities

Teachers can assign a few failed students to one passed student to help in class work during recess (inculcating a sense of being able)

Work at the black board, manual class-work, dramatization etc. (Inculcation of a sense of being valuable)

Involvement in community work (inculcate a sense, of responsibility)

Group activity like planning and organizing activities (inculcate a sense of involvement).

Recognition Drive

Recognition" drives like appreciation by the teachers, peers and parents for small achievements serve as reinforcers for motivation.

Activities

Teacher is liberal with praise and rewards.

Regular positive feedback

Recognize student contribution

Encourage greater student* enthusiasm and participation.

Making Girls Assertive

The concept of Assertion:

A truly assertive girl possesses-the following assertive qualities (NCERT, 1996).

An assertive girl feels free to "reveal" herself through words and actions.

She can communicate effectively with people, strangers, friends and family.

She has an active orientation to life and makes things happen, instead of leaving things to happen.

She acts in a way she respects herself.

Many people have an erroneous concept of

assertion, confusing it with aggression. Assertion means that one learns to respect one's own goals & rights and also those of others.

Goals of Assertive Training

High Self-Esteem

Effective Conflict Management

Improved-Decision Making

Improved Interpersonal Relations

Effective Coping in Negative Situations.

While training girls in assertiveness the teacher should observe the following steps

Make certain that the girls understand the assertion concept.

Help them realize that when people do not assert, they rationalize by putting up an excuse of an event which has very low probability of happening. Or when the excuse is genuine, it is given more weightage than is necessary.

Help the girls identify areas where they generally have problem of assertion e.g.:the assertion may be lacking in personal, social, school, work, situation.

Identify the specific forms of fear such as anger, rejection etc. due to which they are unassertive (NCERT, 1984).

Training for Assertiveness

Enhance a positive self-esteem.

Help girls identify their future position in life, imagine themselves in the position, assess themselves and identify qualities they lack and as to how they would build on it.

Role Play

Dramatising a situation, which requires them to be assertive and see how they act there in and guide them accordingly.

Brain Storming

Making girls discuss and debate upon various situations created imaginatively by the teacher which requires assertive behaviour on their part. (NCERT, 1982).

Use of Audio-visual Media including Books

These may include illustrative stories and biographies of great women, their struggle for their rights and their contributions.

Through the use of any of these techniques, the girl must be made to get in touch with her own feeling of enhanced self esteem as an outcome of becoming assertive. She can repeatedly go in for self - analysis ,a.s. she acts on the guiding-points provided.-accordingly.

Dealing with Gender Abuse in School

Sex education must be imparted at the puberty period in school.

(NCERT has prepared material for this - DPE. NCERT 1999; REM, NCERT 2000).

Workshops, and/.lectures by experts may be arranged on sex-education where- in parents are also called in

Teacher^ too can -counsel female students regarding sexual exploitation and relief from guilt feelings.

The biology teachers can easily acquaint the students :with. the. development of human reproductive system in a scientific way and also bring in the concept of moral and social curbs.(NCERT, 1991).

School authorities should severely punish moral turpitude. Forums like Parent-Teacher Associations and Student Council can create awareness and change attitudes regarding the same.

*

CONCLUSION

Thus it may be concluded that autonomy for a woman through education should begin right from

when she is a little girl in school. The school as a fertile garden and the teacher as an able gardener can surely help the little girl to bloom into a woman with autonomy.

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EFFECT OF TEACHER COMPETENCY ON STUDENTS ACHIEVEMENT AT MINIMUM LEVELS OF LEARNING

Madhusudan J. V.
R.S. Yeli

INTRODUCTION

The National Policy on Education (NPE) 1986 and its Programme of Action (POA) 1992 have given stress to lay down Minimum Levels of Learning (MLL) for each stage of education to rectify the issues of quality and equity. The need to lay down MLL emerges from the basic concern that irrespective of caste, creed, location or sex, all children must be given access to education of a comparable standard. The major focus of the policy formulation behind the MLL exercise is upon equity and reduction of existing disparities. The effort is to combine quality concerns with concerns for equity keeping in view the developmental needs of children from the disadvantaged and deprived sections of the society, the dropouts, working children, and girls, who constitute the majority of school-going age population in this country, and to whom, in all likelihood, at least for some time to come. Primary Education will be the only opportunity for structured learning.

Attempts have been made by researchers to prpbbe into factors that influence the academic performance of the children in the school. The surveys of research in education (Buch 1974,1979, 1984 and 1991) and fifth survey refer to a fairly good number of studies, which attempt to correlate various school factors with academic achievement of students. In this paper an attempt is made to study the influence of teacher's competency on the student's achievement at MLL in important school subjects like Mathematics and Language (Kannada).

OBJECTIVE

To study the effect of teacher competency on students' achievement at MLL in Mathematics and Kannada of IV class children.

HYPOTHESIS

The students MLL based achievement scores in Mathematics and Kannada will show significant difference between two groups when classified as above and below average on the basis of teacher competency with the help of general teaching competency scale scores.

PROCEDURE

Sample

The study was conducted in the district Guibarga of Karnataka. The population of the study included IV class children between 8-10 years of age, who are studying in primary schools in various localities of the district. Gulburga district includes 10 educational blocks and four blocks were selected randomly. On the basis of lists of schools obtained from the District Education Office, 60 sample schools were identified. Purposive sampling method was used to select the schools. The sampling criteria were, a minimum of 20 students of IV class should be attending schools regularly and school should not be a private one. Teachers teaching Mathematics and Language were observed for their teaching competence.

Tools

1. The MLL based achievement test in Mathematics and Kannada for IV class were developed which measure 25 and 19 competencies in Mathematics and Kannada respectively. These competencies were selected for the test on the basis of expert opinion and content analysis of IV class Mathematics and Kannada textbooks with reference to competencies meant for the class (NCERT, 1991, PP, 20-40).

2. Generai Teaching Competency Scale: This was developed by Passi et.al. 1976. Scale consists of

21 items related to teaching skills, which encompass the entire teaching process in the classroom. It is a seven-point scale ranging from not at all with a scale point 1 to very much with scale point 7. The inter observer reliability coefficient for the scale between trained observer range from 0.85 to 0.92 (Passi and Lalitha 1979).

Method

The achievement test in MLL in Mathematics and Kannada were administered to IV *class* children selected as sample towards the end of the academic session. Two tests were administered separately with two-hour interval in-between. Mathematics and Kannada teachers were observed while teaching in the classroom and observations are recorded using teaching competency scale." The data so collected has been subjected to analysis as per the need of the study. Analysis involves, evaluation of MLL based test scores for Mathematics and Kannada, and computation of mean and standard deviation for each of the classes. General teacher competency scores of each teacher (Mathematics and Kannada) were analysed and teachers were categorized as below average teacher and above average teacher. To test the hypothesis t-test is applied, to find out the significant difference between the groups.

Limitations of the Study

The study covers variables like teacher competency as the independent variable and the MLL based achievement in subjects of Mathematics and Kannada for IV class children as prescribed by NCERT as dependent variables. The schools of Gulbarga district have been taken as the study area. The study is limited in scope with reference to certain specific type of variables, limited geographic locale and limited types of schools.

TEACHER COMPETENCY AND ACHIEVEMENT IN MLL

Out of 60 mathematics teachers observed for their teaching competencies 19 teachers are found to

be high and remaining 41 teachers to be low on general teaching competency scale scores. Similarly out of 60 Kannada teachers observed for their teaching competencies 29 teachers are found to be high and remaining 31 teachers to be low on general teaching competency scale *scores*. The groups are tested for their significant difference with 't' test. The Y calculated value 3.562.64 (for maths and kannada) is higher than the *t' table value 2.52, which implies that there is a significant difference between two groups when classified on the basis of general teaching competency scale scores at 0.01 levels. Thus the hypothesis, IV class children's achievement at MLL in Mathematics and Kannada will show significant difference between two groups when classified on the basis of general teaching competency scale scores is retained.

CONCLUSIONS

Students' achievement at MLL in Mathematics and Kannada belonging to two groups when classified on the basis of general, teaching competency scale showed a significance difference between students' achievement belonging to two groups was found. The finding of the present study match with other researchers' findings like Singh (1995), Singh & Sexena (1995), Jain & Arora (1995), Heyneman & Loxley (1983) and Fuller (1987). Though majority of the teachers are trained and had undergone some, training in education, as the certificate in teacher training is the prerequisite for teachers' job in government schools, still there is urgent need to orient teachers for better competencies in respective school subjects. Teacher competency is found to be significant determining factor in students' achievement in MLL in Mathematics and Kannada in the present study. Out of 60 teachers, teaching Mathematics only 19 teachers are found to be high and out of 60 teachers, teaching Kannada only 29 teachers are found to be high on teacher competency scale.

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ASSOCIATE GROSS-IMPACT ON SCHOLASTIC PERFORMANCE

Imtisungba

INTRODUCTION

Education is meant for all and there is provision for all and there is provision for equal opportunity to get according to ability. Educational planners set the goals to achieve maximum teaching-learning processes; expected the teachers to impart curricular content and students to learn at mastery level. Curricula have been framed selecting the course contents after judicious validation and testing reliability objectivity for the norm groups. Designers of the curriculum optimistically *expected* for transaction and implementation of the course content at maximum level, provided that all the other things (teachers, materials, *processes*, environment) are normal. At the same time students are believed to be capable of learning, abilities to master curricular content; *expected* that curricular materials are made available; teachers are capable of teaching and committed for instructional excellence; whereas a comprehensive evaluation procedures is followed. Educational decision-makers were hopeful to utilise proper methods, *skills*, suitable feed back and reward systems; positive social climate and discipline are also maintained in a scholarly quality institution. As a result of all these it is expected to attain cent percent (100%) successful performance outcome at the time of evaluation. Every thinker is talking about quality education. In order to maintain quality education competency and excellence through curricular transaction is important. However it is to be kept in mind that there are individual differences, which has great impacts in education. Intelligence is the original higher level of ability. It is the ability to be kept in mind that there are individual differences, which has great impacts on education. Intelligence is the ability to adjust oneself to new situation. Intelligence is the ability to learn and analyse what has been learned, and to deal effectively with new situations. It is

considered to be the main factor of learning. It refers to mental power for performance of works in degree of speed. Intelligence varies from person to person. The power, speed and accuracy of individual performances can be expected on the basis of their mental abilities. Some psychologist suggested three types of intelligence -general, *special* and performance, so it can be determined from person to person unequally. Mental capability can be improved through regular academic practices. Therefore it is necessary to study scholastic performances of the students relation to their intelligence. Such kind of study can help to bring implementation of curriculum, application of methods by the competent manpower.

Present study focuses to investigate the system of education, their practices, attainment of success and failure; their related problems and causing factors for; academic performance. Despite of educational objectives and efforts many institutions have narrow concept and no concern about educational processes, methods, instructional designs and academic programs; they also do not fulfill the objectives of educational excellence or quality education. Many institutions give emphasis on theoretical transactions, certification and high pass percentages. In the long run such things may lead to misfits, mismatch or misfortune irrespective of high or low mental abilities. Therefore the present study aims to investigate, analyse the systems of education and causing factors of the problems which hinders academic achievements; then to suggest some measures for more academic program orientation.

OBJECTIVES

The present study had the following working objectives: -

1. To identify and classify the students in terms

of their intelligence (IQ's)

2. To investigate, assess and categorise the students as over-achievers, normal-achievers and under-achievers on the basis of their scores.
3. To find out the various factors that effects on academic achievements.
4. To bring out suggestions for remedial measures and improvement.

HYPOTHESES

Following hypotheses had been set for the present study:-

1. That the IQ's of students will be normally distributed.
2. That there will be normal distribution of the students (subjects) under OA, NA and UA.
3. That there are many other variables (factors) contributing towards success and failure of the students.

METHODOLOGY OF STUDY

Method

This study followed a descriptive-cum-experimental independent study method. This section involved sample, tools, and procedure for data collection.

Sample

The sample of the study consists of 340 boys and 310 girls with a total of 650 students of classes XI and XII. The investigation followed a random sampling method and drawn from 20 institutions from all districts of Nagaland.

Tools

The investigator used "standard progressive matrices (SPM) for data collection." SPM is a non-verbal intelligence test scale developed by Raven in U.K. It measures mental ability of individual through non-verbal items. It is equally useful as

verbal test for all age groups, education and nationality. The scale contains 60 items consisting of geometrical figures, grouped into five sets. The investigator, selected this SPM as most relevant scale to measure IQ's. Therefore this SPM was administered to the sample of 650 students. In order to, obtain scholastic marks of the students, investigators collected the examination marks from the record books, and taken the aggregate of seven subjects for the purpose of the study. A self study- prepared questionnaire was administered.

ANALYSIS

In order to analyse the test scores and academic marks, statistical techniques have been computed and found the mean=49, s.d. =9.35 for the test scores of intelligence and mean =46, s.d.=7.48 for Academic marks. Correlation coefficient have been worked out and further calculated t-test for testing of significant of correlation's between SPM scores and academic marks and found $r=0.49$, $t=14.30$ respectively. -

The two variables has positive correlation coefficient. Again the t-test score also indicate that the correlation of the two variables are significant both at .5 and .1 levels. Secondly, in order to classify the students on the basis of their IQ scores a stanine scale was used. Using this scale following percentages and Ideal Cumulative percentages had been worked out as shown herewith.

Different achievers were identified with the following criteria

- (a) A difference of three marks lower and upper placed under NA
- (b) Score of four and beyond at the lower extremes placed under UA
- (c) Score of four and beyond at the upper extreme placed under OA.

As a result of these criteria, students were classified OA=205, NA=255 and UA.190 from a

total of 650. In addition to the administration of standardized test, the investigator used a self-prepared questionnaire to collect more information from the scholastic under-achieving. Students regarding various factors that causes academic failures. The-questionnaire was administered to 190 under-achievers and 255 normal-achievers. The data were properly analysed and discovered the following factors which interfered and hindered academic success. The obstacles and barriers are as listed in the findings.

FINDINGS

1. Analyses of the data revealed that the number of individuals have been normally distributed with the largest population of average group declining uniformly towards both sides of extreme ends. There were persons of low IQ, and IQ groups which have great impact on academic performances and achievement variations.
 2. In comparison with their intelligence, academic achievers were found distributed as over-achievers, normal-achievers and under-achievers. It indicates that there are many other variables contributing and effecting the degree of achievements.
 3. The study revealed 29.23% UA could score below the expected level, 39.23% NA could perform as expected to do, and 31.53% or could do better or more than the level of expectation. This shows the needs of relevant and special educational programmes, proper guidance and counseling for improvement of the students potentialities to bring to the expected levels as well as to help to do better.
 4. It was also identified that intellectual capacities have significant relationships with academic works, and as a result IQ's has great impact on examination performances.
 5. Intellectual capacities are varied. Using the SPM scale, the intelligence of the students were categorised into different groups as 4.92% (low IQ), 21% (below average), 55% (average IQ), 15% (above average IQ) and 3% (high IQ).
- Thus, if educationally analysed, such variation indicates the presence of problems and necessity for diverse educational programmes with relevant facilities.
6. Following syndrome of problems were explored from the school authorities, teachers and students, which interfere and hinder against scholastic achievements and intellectual development: -
 - Personality problems of the students such as critical nature, inactiveness, aggressiveness, uncontrolled or emotionally unstable nature etc.
 - immaturation of characters, and adjustments problems
 - Lack of achievement motives or interest for advancement.
 - Lack of sincerity, hard work and proper study habits.
 - Lack of problem solving intellectual ability and low memory power of some students.
 - Immatured value system and no appreciation to aesthetic social values.
 - Non-establishment of self-concept.
 - Indiscipline and inadequate behaviour, irregularity, poor study habits and no attention to teaching etc.
 - Lack of motivation, desire, and interest among the students and no seriousness for failure.
 - Many institutions have less number of teachers.
 - Used of irrelevant teaching methods.
 - Lack of innovative teaching programmes.
 - Low standard of teaching by unskilled and untrained teachers. And lack of untrained teachers.
 - Poor school activities such as seminars, conferences, workshops etc.
 - Lack of proper supervision, guidance and counseling programmes and absence of special educational programmes for exceptional students,
 - Poor quality or lack of laboratory, library

intellect, mind, intelligence, reasoning power, creative thinking senses etc. Exercises of these will keep on constant alert active. But when the goals or the systems are thwarted, tension, frustration, inferiority may start leading to self-devaluation. Hence non-mastery learning in education may cause failure and retreat to use drugs and alcohol, adopting truancy, dropouts and anti-social behaviors.

9. Memorization (rote memory) is a trial and error method of study without understanding and appreciation. This will not help to widen the horizon of intellect, visionary and imaginative power or inner self. It is necessary to develop scientific study habits rather than rote memory.
10. Most of the institutions have wrong policy of management, ignorance to human rights, devaluation to students kindering to academic development. Similarly the present system af

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EFFECT OF INVOLVEMENT OF PARENTS IN THE EDUCATION OF CHILDREN: AN EXPLORATION

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Sutapa Bose**

INTRODUCTION

Since independence, our country has been striving hard to provide Universal Elementary Education (UEE). However, there are several challenges that are yet to be overcome in order to fulfil the target. One such challenge is the high rate of drop out. There are several factors that affect retention. One of them is poor scholastic achievement. It de-motivates students as well as their parents. Apart from the potential of the students, the environment of the home and the school greatly determine the scholastic achievement. The home environment is determined to a great extent by the outlook of the parents. i.e. if they have a favourable attitude towards the education of their children then enrolment as well as retention will be ensured.

OBJECTIVE OF THE STUDY

In view of the important role the parents can play in the education of their children, this study was taken up. The objective was to determine the effect of home environment or to be more specific the effect of parental involvement in the education of the children on their academic achievement.

METHOD OF THE STUDY

The study was conducted through the method of case study. In view of the objective, the home environment of the children was first determined. This was done by a study of some of the factors constituting the home environment. These factors were: if the child

had proper diet and rest, caregiver at home, how the leisure time was spent, possession of school bag and uniform and if the child was sent to school regularly. The effect of these factors was studied on the general behaviour and academic achievement of the children.

Sample

The sample was selected from the grade II of a primary school run by the MCD. The school catered to the needs of the children from the neighbouring areas i.e. colony of migrant labourers that were slums with shacks and shanties and resettlement colonies with *pucca* houses. Thus the school catered to the needs of the children whose parents were neither financially well off nor very educated. Students were chosen from the second grade as it has been reported that 46% of the children enrolling in the Municipal Corporation of Delhi have pre school experience. Therefore, it can be expected that experience of schooling in grade I levels off to some extent the difference caused among children by preschool experience. As the method of case study was adopted, which required an in depth study of the units selected, the sample size was limited to only nine students. Schooling no longer remains an entirely novel experience for those deprived of pre school experience. Since data collection was convenient during the afternoon shift (meant for boys), hence the sample comprised only of male students. The sample was selected randomly from a group of thirty eight students

comprising the second grade of the school.

Tools Used for Data Collection

Following tools used for data collection:

Interview

With the help of a schedule, unstructured interview was conducted to elicit in depth information.

Observation: The class teacher carried out non-participatory observation of the students on a regular basis.

Checklist

A checklist was prepared to mark the presence or absence of items like school bag and uniform.

Apart from these tools, records and registers of the school were studied to acquire information on aspects like attendance of the students, general health and preschool experience, etc. Triangulation of the data was done by collecting data through different tools. This helped in cross checking the reliability of the data.

Data Collection

Data were collected on issues pertaining to three dimensions, which were: 1. General Information about the student- name, age, address, occupation of father; 2. Home environment of the student- diet, rest, care giver at home, spending of leisure time, possession of things necessary to go to school- school bag and uniform and 3. School: Attendance, general behaviour, scholastic achievement

Limitations of the Study

Since the method of case study was adopted, the sample size was restricted to only nine students. Therefore generalization could not be done. However conclusions have been drawn

for the group from which the sample had been drawn.

INTERPRETATION OF THE DATA

Interpretation of the data was done case wise i.e. separately for each student

Data from Students Residing in a Resettlement Colony with Pucca Houses.

Case 1

Seven years old A was the son of a labourer. He had regular meals. He overslept and was a late riser. He had no one to look after him when he returned from school. He watched television in his leisure time but did not play. He possessed neither a school bag nor a uniform. He enjoyed good health and attended school regularly. Lack of any sort of physical exercise coupled with too much watching of television probably led to behavioural problems like inattentiveness and talkativeness in the classroom. His performance in scholastic activities was below average. This was in spite of the fact that he had preschool experience. The facts that he overslept, had no one to care for him when he returned home, had no physical exercise, did not possess school bag or uniform indicate that he was not looked after properly at home and that his parents were not adequately involved in his education. This perhaps led to his unsatisfactory performance at school.

Case 2

Seven years old B was the son of a labourer. He had proper meals and adequate rest. His mother looked after him when he returned home from school. He participated in outdoor games and watched television in his leisure time. He enjoyed good health and attended

school regularly. He possessed a school bag as well as a uniform. His class teacher was full of praise for his behaviour as well as his performance in scholastic activities. From the data collected, it appears that he led a disciplined life at home. His parents took proper care of him. They had provided him with the things necessary to attend school and ensured that he attended school regularly. This probably led to his academic excellence.

Case 3

Seven years old C was the son of a labourer. His mother took care of him at home. He had proper meals and rest. He spent his leisure time watching quiz programmes, soaps and films on the television. He had a school bag and a uniform. He enjoyed good health and attended school regularly. His teacher reported that he was an active child with sharp intellect and quick grasping power. However, he was also reported to be an aggressive child. The quiz programmes he watched on the television perhaps sharpened his intellect but the regular diet of soaps and films had a negative impact on him. The fact that he did not play and therefore was deprived of physical exercise, coupled with his addiction to soaps and films nurtured his aggressiveness. In the absence of physical exercise as a means of catharsis for his pent up aggression, he vented it out on his classmates. His parents were concerned about his education but they did not monitor his television viewing habit and how he spent his leisure time. Thus the involvement of his parents in his education appeared to be inadequate.

Case 4

Seven years old D was the son of a labourer. He was not provided with proper meals and

overslept (ten hours). He had no one to look after him when he returned from school. He played and watched television in his leisure time. He often had health problems and was irregular in attending school. He wore school uniform but did not possess a school bag. He was reported to be a well-behaved child but his scholastic achievement was below average. It appears that the child was neglected at home. Lack of basic requirement like proper diet and care led to health problems and poor attendance at school. This in turn could have been the cause of his poor performance at school.

Case 5

Six years old E was the son of a labourer. He had proper diet but he overslept. His mother looked after him at home. In his leisure time he did not play but watched cartoons and other children's programmes on the television. He attended tutorial classes. He enjoyed good health but attended school irregularly. He possessed both a school bag as well as a uniform. He was reported to be a well-behaved child but his performance at school was below average. The fact that E attended tutorial did not help him in improving his performance at school. His habits of being a late riser and attending school irregularly, not going out to play but watching TV for long durations remained unchecked. This in turn could have had a telling effect on his academic achievement.

Data Collected from Children Staying in Migrant Labourers Colony (Slum) with Shacks and Shanties

Case 1

Seven years old F was the son of a labourer. He had proper meals and adequate rest. His

sister looked after him at home. He spent his leisure time playing and watching television. He also attended tutorial classes. Although he did not suffer from any major health problems, his attendance at school was irregular. He possessed neither a school bag nor a uniform. He was a well-behaved child but his performance at school was below average. Although F lived in a slum but the facts that he had proper diet, watched TV and attended tutorial classes indicate that financial constraints did not affect his education. Probably the absence of an adult to take care of him at home led to his leading an undisciplined life. The consequence was his poor performance at school. Even tutorial classes could not come to his aid and overcome such neglect.

Case 2

Six years old G was the son of a government servant. He had proper meals and adequate rest. His mother looked after him at home. He possessed both, a school bag as well as a uniform. During his leisure time he played and did not watch TV. He enjoyed good health and regularly attended school. He was reported to be a well - behaved child who was also good at his studies. G lived in a slum, in a shack. But the fact that he led a disciplined life with proper food, rest and physical exercise, attended school regularly and had the things necessary to attend school led to his doing well at school. It appears that the physical environment in which he lived did not come in the way of his academic achievement since his parents were involved in his education.

Case 3

Seven years old H's father was a driver. He had proper diet. He overslept. His mother took

care of him at home. He watched quiz programmes and cartoon shows on the TV in his leisure time. He possessed neither a school bag nor uniform. He enjoyed good health but attended school irregularly. He was reported to be a talkative child who failed to complete his work in time. His performance at school was below average. It appears that at his home it was not ensured that he led a disciplined life. The facts that he overslept and missed school were also ignored. He was also not provided with the things necessary to attend school. Too much viewing of TV was not discouraged. Lack of parental involvement in his education coupled with his habit of talking incessantly could have led to poor academic achievement.

Case 4

Six years old I was the son of a labourer. He had proper meals and adequate rest. His mother looked after him at home. He played and watched TV in his leisure time. He was provided with a proper school bag and uniform. He enjoyed good health and attended school regularly. He was reported to be an active, intelligent, well behaved and sincere child. He lived in a shack in a slum but the fact that his parents ensured that he led a disciplined life and were involved in his education led to his academic achievement at school.

CONCLUSIONS

Following a case study of nine students it is not advisable to make generalisations. However, for the particular group from which the sample had been drawn certain conclusions could be drawn. This is because the group is homogenous in several aspects. The children were in the age group of six to seven years.

The children were all the students of the second grade of a primary school run by the MCD. The bread earner (father) of the children were unskilled or semi skilled workers (labourers, mechanics, drivers, etc.) who lacked a sound academic background. The children were all from families that belonged to the economically poorer section. The children resided in either pucca houses or shacks but the residential area in which these were located was either slums or resettlement colonies. Only two children in the entire group had preschool experience. Moreover experience gained during the first year of schooling levelled off too some extent the difference caused by preschool experience.

Due to the above-mentioned facts it has been assumed that the children, studying in the second grade of an MCD, had more or less similar potential and schooling facilities. From the discussion of the data collected it has been observed that certain factors led to academic achievement while the absence of these factors led to unsatisfactory performance at school. These factors are related to the care the child received at home. It also reflected the involvement of parents in the education of their children. Involvement of parents does not imply that the parents would reinforce or supplement the things taught at school by teaching them at home or by helping them with their homework. Involvement of parents implies that they would ensure that the child had proper meals and adequate rest, led a disciplined life at home and was provided with the things necessary to attend school. It has been observed that the children whose parents were involved in their education led a disciplined life at home and had better academic achievement at school. Disciplined life at home meant the

child went to bed at time and rose early in the morning, attended school regularly and played outdoors. Besides this, involvement of parents was also reflected in the activities that a child pursued in his leisure time. Whether a child played and watched TV or only watched TV and the programmes that a child watched could be monitored by the parents.

All the children had adequate rest and except in one case all the children had proper food. However difference was noted in the time at which the children got up in the morning. Some of the children overslept and were late risers. Difference was also observed in the possession of school bag and uniform, attendance at school and the manner in which a child spent his leisure time and the programmes they watched on the TV. Some children in spite of enjoying good health were irregular in attending school. This had a telling effect upon their academic achievement. Those who did not possess either school bag or uniform or both were found to be lagging behind in their studies. The children who watched TV and did not have any physical exercise were found to be exhibiting behavioural problem like aggressiveness and talkativeness. It was found that although quiz programmes helped in providing intellectual stimulus but watching soaps and films daily without being monitored by the parents resulted in behavioural problems. It was found that parents could not reinforce the things the children learnt at school and some children attended tutorials. However tutorials did not help the children in performing better in the school. Rather the children who attended school regularly and received proper care at home fared better. Similarly the child with preschool experience but whose parents was not involved

in his education, failed to perform satisfactorily at school. It may be inferred that preschool experience could not complement the dearth of care at home. It was thus found that concern of parents for their children's education led to academic achievement. Involvement of parents in their children's education can motivate them to perform better. Following this study it has been found that a home environment that indoctrinates children into a disciplined life and healthy life style ensures that they have better academic achievement. As Rao and Islam (1997) had stated parental involvement aims at the total development of the child. They are the first and most consistently available teachers and provide emotional base of security and motivational roots that nourish exploratory curiosity. It supports and facilitates a child's learning. Thus, with this study the statement that parental involvement supports and facilitates learning appears to be quite true.

IMPLICATIONS

This study reflects that involvement of parents in the education of their children is essential for their academic achievement. So as to ensure better performance of the children at school, it is necessary to get the parents involved. For this the parents have to be motivated first. They have to be convinced that merely enrolling children in schools is not enough. They have to be provided with the necessary learning materials and emotional support to ensure their academic achievement. Even parents without academic background can be involved in the education of their children. This in turn can go a long way in stemming the problem of dropout since academic achievement motivates children as well as their parents. It will thus help in the retention of children enrolled in the primary schools and aid in fulfilling the mission of Universal Elementary Education.

A few Useful Indian Websites

MHRD, Departments of Education http://www.education.nic.in Ministry of Tribal Affairs http://www.tribal.nic.in Ministry of Social Justice & Empowerment http://www.socialjustice.nic.in Ministry of Labour http://www.labour.nic.in Association of Indian Universities http://www.aiuweb.org Rehabilitation Council of India http://www.rehabcouncil.nic.in National Council of Educational Research & Training http://www.ncert.nic.in National Council for Teacher Education http://www.ncte-in.org National Institute of Educational Planning & Administration http://www.niepaonline.org National Institute of Open Schooling http://www.nios.org	National Literacy Mission http://www.nlm.nic.in National Assessment & Accreditation Council http://www.naac-india.com University Grants Commission http://www.ugc.nic.in Planning Commission http://www.planningcommission.nic.in Indian Council of Social Science Research http://www.icssr.org Census http://www.censusindia.net Institute for Social & Economic Change, Bangalore http://www.isec.nic.in Indian Council of Philosophical Research http://www.icpr.nic.in National Informatics Centre http://www.nic.in Economic & Political Weekly http://www.epw.org.in Journal of All India Association for Educational Research http://www.aiaer150m.com
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LITERACY LINKED WOMEN DEVELOPMENT PROGRAMMES - ATTEMPTS MADE IN ERODE DISTRICT IN TAMIL NADU

M N Usha

INTRODUCTION

According to Census 2001, there are 531 million males and 496 million females giving rise to an overall sex ratio of 933 females per 1000 males. The adult literacy rate has nearly tripled since 1951. The central focus of this paper is to present the literacy linked women development programmes which are being attempted in south Indian states. At the same time a few cases of success stories, which are narrated in various documents, articles and studies, are presented. Even though all the States used the Campaign mode to achieve greater female literacy, the strategies adopted differed. Literacy as a tool was used in all the programmes to empower women. This resulted in collective empowerment of women leading to collective action, co-operative efforts and participation in development programmes. Similarly, female literacy figures for States in South India, as per 1991 Census are 32% in Andhra Pradesh (ranked 25th. among 31 states), 86% in Kerala (highest in the country), 44% in Karnataka and 51% in Tamil Nadu. Reasons attributed to these dramatic changes in female literacy are Mass Literacy Campaigns organized at District level across the country, implementation of poverty alleviation programmes and empowerment of women programmes at grass root level. Literacy Campaigns focused on women and gender issues using a triangular approach, namely, decentralized and region specific programmes, multi-media approach and library movement, besides literacy linked women development programmes (especially during Post Literacy Campaigns).

IMPACT OF LITERACY CAMPAIGNS IN A NUTSHELL

Literacy campaign aims to bring tangible changes in the lives of illiterates, neo-literates, women and people. Its co-ordinated efforts hope to bring fragile literacy to a stable literacy, guided learning to self learning, use knowledge and skills to application and attainment / achievement of other development goals. The impact has been both short term as well as long term. An offshoot of literacy Campaign and emergence of female Neo-literates was seen in the increased enrolment of children (next generation) in primary schools. Through literacy programmes in health and legal awareness, the ill effects of early marriage among girls have been realized and the Age at marriage has been raised. Literacy programmes and government incentives have played important role in population control. Adopting small family norms and practicing family planning methods was a desired impact. Improved nutritional status in children and pregnant women gained through literacy and government's integrated nutrition programme. Entrepreneurial skill developments along with financial support by the state government were attractive incentives for female and male neo-literates. Several small enterprises emerged. Neo-literates produced and marketed food products like pickle, sambar and masala powder, curd (Madurai district); Household products such as washing powder, liquid blue, agarbathis (incense sticks) (Gobbichettipalayam); Preparation of readymade Garments; Rugs from Waste

Banyan material; Weaving of Baskets (by Kani tribals of Kanyakumari district);Setting up Tea/ Coffee canteens (Thovalai Block, Kanyakumari district; Opening of Grocery shop; Raising vegetable/kitchen garden in urban areas; Making of envelopes from newspapers; Weaving ; Preparation of Gur/Jaggery; Gem polishing; m) Weaving baskets from banana fibre (Kanyakumari district); Colour dye making. The Saving scheme introduced by the literacy programme and adopted by neo-literates through their women's group has been popular and opened extensive avenues - exposure and access to banking and micro credit, elevated their status in the community, sustained group bonding and collective action. Women's groups all over Madurai district functioned with monthly meetings where savings-cum-manufacturing were planned. The 300 odd groups had more than Rs.5 lakhs in savings kept in banks or post offices. Sambar powders prepared by these women's group were bought by the government for use in their noon meal centres. A group of secluded Muslim women (neo-literates) in Sathyamangalam approached the Collector and were instrumental in getting a deep bore-well dug at an accessible distance from their residences , a feat which earned them respect and goodwill in their community.

Another group of women in T.N. Palayam, Gobichettipalayam learnt to repair the hand pumps and were responsible in maintaining them in their locality. Neo literates participate in rally against child labour. 'Neo-literate turns teacher' - an enthusiastic illiterate learner after completion of the three primers started to teach other illiterates in his locality in Coimbatore district. Neo-literate teaches literacy to illiterate

husband who was elected to the panchayat in Gobichettipalayam Block. Neo-literates contribute to newspapers (special supplement for learners). Village adopts library and makes it a people's library. Vidyasagar Reddy(1994) found that women who attended literacy classes became aware of health and sanitation (80.39%), water borne diseases (73.53%), nutritional food to be given to children (87.75%), how best one could utilize leisure time (76.35%), the exact age of marriage for boys and girls (81.37%), social welfare related activities (91.38%). Reddy and Reddy (1999) found that the Literacy Campaign yielded better results in Nellore district of Andhra Pradesh. The Jana Chitanya Kendras had played a pivotal role in sustaining the literacy attainments of neo-literates. Especially significant is the Anti-Arrack movement by women neo-literates that brought about a closure of arrack shops and shut down trade and auction of arrack.

A STUDY IN ERODE DISTRICT IN TAMIL NADU

Erode District is located in the extreme north of Tamil Nadu State and is spread over 8,209 sq. kms. It had a total population of 23,20,263, out of which the male population was 11,85,256 and female population was 11,25,007. Urban population was 5,73,270 and rural population was 17,46,993. The Total Literacy Campaign (TLC) was organized in the District from March 1993 to 1995. The Tamil Nadu Government presented the 'Dr. Malcolm Adiseshiah Award' to Erode District in 1995, for its performance in the field of TLC. After this PLC programme had the programmes such as :CDD/WATSAN, Intensive Sanitation Programme, DWACRA, CBCSS, Nutrition, Family planning, Aids Awareness, Civic

Literacy, Consumer Forum, Legal literacy, Small savings Scheme and Traffic sense. PLC adopted a triangular approach to make the masses literate. Multi media approach was a package programme utilizing both print and non-print media. Library movement had three layers of administration, wherein, libraries were set-up in urban and rural areas which were administered by librarians, circle guides and Voluntary instructors. These libraries carried nearly 100 books which focused on girls' education, empowerment of women, Aids awareness, and health related titles. Planning was undertaken to link many programmes and activities to literacy campaign in order to motivate people to participate in women development programmes in general and to create awareness among women in particular. Methods adopted were many and include a) training, b) formation of women's groups c) demonstration d) competition e) discussions f) network/liaison with govt. officials and resource persons in the field and g) media. Literacy linked Women development programmes were numerous and the significant areas focused were: i) income-generation activities/entrepreneurial skills development training; ii) small savings; iii) rural development and participation in panchayats; iv) water and natural resource management; v) nutrition, health, hygiene and sanitation, and vi) leadership training. Link with agencies, departments conducting development programmes were established. In association with government officials like the Block Development Officers, Municipal Commissioners and Extension Officers, Literacy Campaign functionaries provided information, support and guidance to women's groups (neo-literates) to avail schemes (such as DWACRA, MSY, CBCS, ISP, etc.)

offered by the various governmental departments like the Social Welfare, Rural Development, Health etc. Social welfare officers in 25 Blocks networked with the functionaries to publicize women's welfare schemes. Different types of training regarding women's development (such as leadership, empowerment, capacity building, etc.) were given to functionaries as well as neo-literate women who were beneficiaries. Government Health camps with medical examination, supply of medicine and referral services were arranged for neo-literates and public as part of literacy campaign. Eye care camps and treatment were also organized with support from Voluntary organizations like the Lions Club for neo-literates by the functionaries. Training on health was arranged by medical officials from the Department of Health. This was conducted for Librarians (at Vellakoil) on topics such as malaria eradication, family planning and Aids awareness. Rallies and processions by neo-literates brought awareness on ill effects and abuse of drugs. Baby shows were also held in a few Blocks. Protest against Child labour and protection of children's rights were publicised by neo-literates through rallies in Erode. Women's Groups from Kundadam Block were engaged in nearly 20 varieties of small enterprises- gem cutting, spinning yarn, weaving silk, saris, bed sheets, garment making, growing mushroom, rearing buffaloes, weaving palm leaf and baskets, fishing, preparation of jiggery, making footwear, dealing in cut-piece business and milk co-operative enterprises. Neo-literates were made aware of Voter's rights and mobilized to participate in electoral process. Besides the above activities, celebration of 50 years of India's Independence, Republic Day, Human Rights

Day, International Women's Day, World Population Day, National Integration Day and festivals were organized.

Media Support

The contribution of the media (print, non-print and electronic) towards the support and success of the Literacy campaign was immense. Its role has been tremendous throughout - from publicity and propaganda during the environment building phase of the literacy campaign to beyond the post literacy stage. Three Newspapers in the regional language Tamil carried a regular, weekly, two-page supplement, exclusively for the Literacy Campaign. Two pages carried a) news items on various activities of the literacy campaign (functions, achievements and participation of learners) b) contributions from neo-literates and learners c) articles and information useful for learners d) special features on women development e) weekly editorial column by the District Collector f) special features on significant occasions such as Independence Day, Literacy Day, International Women's Day, Human Right's Day etc., g) letters to the editor and views from the public h) contributions of stories, poems, puzzles, riddles, etc. Features, news items on activities involving women and participation by them were given extra coverage. An exclusive editorial committee was responsible for collection and collating the contents and monitoring it. These newspapers were made available in the PLC libraries for learners. It attracted neo-literates, users of the library and interested population in villages, towns and urban agglomeration. These newspapers have been popular among all types of neo-literates and the masses. It was a relatively recently introduced tool of media for

education and entertainment and has been gaining popularity among the masses. Doordarshan was the government controlled national television broadcasting organization which telecast some literacy programmes. Although the reach of the television (audience coverage) was definitely greater, this media was not fully exploited for the Literacy campaign. TV time allotted for literacy competed with more remunerative commercial and popular programmes. Yet its (television) contribution has been significant. Literacy Campaign related programmes from several districts were given time slots and coverage every week and this provided variety, opportunities, ideas and exposure to improve and stimulate motivation among neo-literates/learners, functionaries, resource persons and the public. The telecast covered various activities, functions and programmes involving learners, functionaries, officials and public associated with the literacy campaign. The broadcast included news, interviews, talk, cultural programmes, etc., by learners, volunteers, librarians, other functionaries, officials etc. The topics and themes (related to literacy linked development) ranged from significance of literacy, female literacy, women's development and participation, self-reliance, leadership, patriotism, civics and citizen's role and responsibilities. Radio continues to have significant audience despite increasing popularity of television. All India Radio has over decades provided learning programmes and distance education regularly and it has spread its programmes to cover Literacy Campaign activities. Neo-literates, Volunteers, functionaries and officials have participated in Radio programmes which are aired from Coimbatore Station five days a

week. They include interviews, talks, song and drama, discussions, quiz, listener's letters, Villupattu and variety programmes on literacy. Audio-Video Cassettes have been prepared by functionaries, artists, officials at Block level to create awareness about PLC, importance of literacy and developmental programmes. Programmes that have been video-graphed range from the environmental building campaign, training programmes of functionaries, cultural troupes' programmes, conferences, and rallies, inauguration of centres, libraries, and functions held in connection with literacy, etc. Several songs were created and set to music for the literacy campaign. They were printed and also recorded in audio cassettes and were used in training programmes and during functions. Photographs : Thousands of photographs had been taken and they record almost every activity arranged by the functionaries in connection with the literacy campaign programmes - inauguration of library, book distribution, prize distribution, training programmes, conferences conducted and functionaries celebrating Literacy Day,

Exhibition stall, Cultural programmes, etc. Besides these the literacy tests conducted by evaluation team revealed that nearly fifty six percent of women were able to read, write and calculate simple sums.

CONCLUSION

Literacy programmes organized in South Indian States included literacy linked women Development programmes. These programmes empowered women to participate in almost all programmes to improve their life styles.

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Web Sites of A Few Teacher Education Organizations

National Council for Teacher Education, India
<http://www.ncte-in.org>
 National Board for Professional Teaching Standards, USA
<http://www.nbpts.org/>
 National Council for Accreditation of Teacher Education, USA
<http://www.ncate.org/>
 Teacher Education Assessment Council
<http://www.teac.org/>
 Interstate New Teacher Assessment and Support Consortium
http://ccsso.org.red.doceus.com/projects/interstate_new_teacher_assessment_and_support_consortium/

Association of Teacher Educators
<http://www.ate1.org/>
 FEA-Future Educators of America
<http://www.pdkintl.org/studser/sea.htm>
 National Commission on Teaching and America's Future
<http://www.nctaf.org/>
 National Council for Teacher Quality
<http://www.nctq.org/>
 National Board for Professional Teaching Standards/ Early Childhood Generalist Group
<http://teachers.net/mentors/ec-gen/>
 National Board for Professional Teaching Standards/ Elementary-Secondary Generalist Group
<http://teachers.net/mentors/es-gen/>

EFFECTIVENESS STUDY AND CRITICAL EVALUATION OF A COMPUTER ASSISTED INSTRUCTIONAL PACKAGE DEVELOPED FOR TEACHER EDUCATORS

Mridula D. Ranade

INTRODUCTION

Variety in teaching methods adds spice to learning. Teachers need a repertoire of teaching methods to make their teaching more interesting, and therefore, effective. Since teachers teach as they are taught, teacher-educators have an added responsibility. They should present content through a variety of methods and techniques that is passed down to the student-teachers. An effective method of teaching-learning, namely, Computer Assisted Instruction (CAI) has now begun to show promise due to availability of computers in Indian schools. Several researches done abroad to test the efficacy of CAI have mostly revealed positive results in terms of achievement, attitude towards the subject, interest, retention of subject matter, etc. I myself have guided over 25 school-level researches related to effectiveness of CAI in various settings, for different subjects, and under different conditions of comparison. Each of these researches has revealed that CAI is effective in bringing about learning. Although CAI has not always been found to be significantly better than regular classroom teaching, it has never been inferior to it. In addition to it being effective, students have also liked CAI, as shown by their overwhelmingly positive response to it. Most urban, and even some rural schools have computer labs today. Yet a survey carried out by our B.Ed. students revealed that computers were rarely used for teaching-learning even in urban schools. The day is not far off, when every classroom can

sport its own computer and a large-screen display. The question is: Will good quality software and quality teacher-training keep pace with available hardware? It is necessary to be proactive on two counts: 1. Developing positive attitudes among teachers for acceptance of computers as a valuable aid in their teaching and 2. Developing their skills in preparing high quality CAI material for use in classrooms. With these two objectives in mind, a CAI package was prepared for teaching of a newly introduced topic, the theory of Multiple Intelligences. This package was intended to serve as an exemplar to provide new techniques to teacher-educators. It was also intended to provide teacher-educators with a first-hand learning opportunity and to give them valuable insights regarding the strengths and weaknesses of teaching-learning through CAI. CAI packages can be used in different ways, such as in self-learning mode, peer-group learning mode, or, as an audio-visual aid by the teacher. In the present research it has been used as a *visual aid for teaching*.

OBJECTIVES OF THE STUDY

1. To prepare a Computer Assisted Instructional (CAI) package on "Multiple Intelligences"
2. To study the effectiveness of the package in terms of achievement.
3. To analyse critical comments obtained from participants viewing the presentation.
4. To study the reactions of participants towards future use of CAI by them.

SAMPLE

The Incidental sample consisted of 25 teacher-educators from both rural and urban regions of Maharashtra, Goa, and Tamilnadu, attending a refresher course in Baramati. With regard to the use of computers, experience of the participants ranged from very little to completion of short training courses in the use of computers for teaching.

PROCEDURE

With regard to Objective No.1, the collection of content-related information from various sources began in the Harvard University's Library of Education, in Boston in 1999. Since the idea of Multiple Intelligences originated in this university through the work of Dr. Howard Gardner, the researcher studied the books and documents available on the topic in this library. Subsequently, substantial material that became available on the Internet was also incorporated. Once the content was selected and sequenced, the process of slide preparation began. Some of the features introduced to increase the effectiveness of the CAI package for learning are:

- Use of Advance Organizers
- Colour-coding of information
- Provision of a format for note-taking
- Thought-provoking questions
- Opportunity for intermittent self-evaluation
- Use of appropriate imagery
- Pair-and-share exercises
- Use of appropriate animations

The CAI package contained 93 slides, of which 84 were based on content. Nine slides contained a short test for generating a Multiple Intelligence profile of the learner. The viewing time was about one and a half hours. The presentation was entirely in English. With

regard to objective No.2, a pre-test post-test single group experimental design was used. The Pre-test was administered a day before the presentation. The CAI package, comprising of a PowerPoint™ Presentation, was projected on a large screen, and I provided commentary where required. To enable the participants to provide critical comments on the presentation (Objective No.3), another presentation regarding preparation of PowerPoint for teaching-learning, prepared by the researcher, was shown to the participants a day before the Multiple Intelligences presentation. This provided information regarding the criteria on the basis of which a presentation could be evaluated. The participants were then asked to view the presentation on Multiple Intelligence from two angles (a) For learning the content and (b) For evaluating the presentation. Next, participants were asked to give their evaluative comments. Finally, they were asked to give an introspective report regarding their reactions to the package in terms of their readiness to use CAI in their own teaching (Objective No.4).

ANALYSIS AND INTERPRETATION OF DATA

In case of study the efficacy of the package in terms of achievement the 't' Test, indicated that there is a significant increase in achievement in the post-test than in the pre-test, thus proving the directional hypothesis. The pre-test scores indicate that the topic was entirely new for most participants. In case of analysis of evaluative comments, the participants were requested to give both positive and negative comments. They gave comments such as:

Positive Aspects

1. Since information on Multiple Intelligences is not readily available in books, the content of the presentation was very useful.
2. The slides were well organized.
3. Pictures used were cleverly selected and well related to the content.
4. Clip Art used was well selected and the changes made in Clip Art pictures made them much more effective.
5. The backgrounds used were good, with pleasing colour-combinations.
6. Each sub-topic was clearly delimited.
7. Colour coding was effective in helping one to remember the type of intelligence one was reading about.
8. Animation was very effective.
9. Use of formative evaluation slides broke the monotony of passive viewing and good questions helped to learn effectively.
10. Imaginative and artistic presentation.
11. Tremendous time and effort must have been put into the making of the presentation, with attention to detail, which can be seen from the quality of the presentation.

Negative Aspects

1. There were plenty of visual effects, but no musical effects that could appeal to the 'musically intelligent'.
2. A few words need more contrast with the background.
3. Some animations were distracting. They should have been hidden after a short while.
4. White background of one slide hurt the eyes.
5. Some participants faced difficulty in understanding the presentation since it was entirely in English.

Suggestions

1. Add more hyperlinks to provide a branched programme effect.
2. Add music and sound effects to make the presentation more attractive.
3. Add an icon to indicate end-of-slide (especially when the background doesn't change on the next slide)
4. Content-related suggestions were:
 - i. Provide more information regarding Naturalistic and Existentialist Intelligence.
 - ii. Try to link emotional intelligence with these intelligences.
 - iii. Add a note on 'Spiritual Intelligence'.
 - iv. Emphasize the fact that people have these intelligences in varied proportions.

Finally, many participants requested a CD of the presentation for their reference. There was one contradictory issue, in that some participants found animations distracting while some others wanted more animations.

Spontaneous comments from most participants suggest that they felt much more positive about using computers for teaching-learning, after viewing this presentation. Many, who were almost totally computer-illiterate, felt motivated to learn computers after seeing their usefulness in teaching-learning. Those who were already computer-literate commented that they learnt a lot of new techniques that they would use in their own presentations.

CONCLUSION

The findings, both quantitative and qualitative, reveal that the presentation was effective in bringing about learning. It was also effective in evoking positive reactions towards use of CAI in teaching-learning.

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- Gardner, H. (1991) *The Unschooled Mind: How Children Think and How Schools should Teach*. Basic Books Inc., New York.
- Gardner, H., & Hatch, T. (1989) Multiple intelligences go to school: Educational implications of the theory of multiple intelligences. *Educational Researcher* 18, 8, 4-9.
- Lazear, D. (1991) *Seven Ways of Teaching: The Artistry of Teaching with Multiple Intelligences*. IRI Skylight Publishing Inc. Palatine.

A FEW TEACHER TRAINING WEB SITES

Sites Related to Lesson Planning

<http://www.eduref.org/cgi-bin/printresponses.cgi/Virtual/Qa/archives/Teaching/lessonresp.html>

<http://www.eduref.org/Virtual/Lessons/Guide.shtml>

<http://www.ncrted.org/tl/lp>

<http://www.globalclassroom.org/lessontemp.html>

<http://www.ibinder.uwf.edu/steps/>

<http://www.adprima.com/lesson.htm>

<http://www.adprima.com/mistakes.htm>

<http://www.sasked.gov.sk.ca/docs/ela/planning02.html>

http://www.muskegon-isd.k12.mi.us/language/mi_standards/unitplan.htm

<http://www.awesomelibrary.org/special-ed.html>

<http://www.specialednnews.com/educators/lessonplans/lessons.html>

Mentoring

<http://www.city.londonmet.ac.uk/deliberations/mentoring/index.html>

Teaching Portfolios

<http://www.city.londonmet.ac.uk/deliberations/portfolios/index.html>

Peer Support & Study Skills

<http://www.city.londonmet.ac.uk/deliberations/peersupport/index.html>

Related to Foreign Teacher Education Programmes

http://www.printresponses.cgi/Virtual/Qa/archives/Teaching/Preservice_Teacher_Ed/teacherd.html

<http://www.nea.org/tomorrowsteachers/>

http://ocrl.ed.unic.edu/Update/sp02_3.asp

http://www.ncate.org/recognized_programs/m_institutions-programs.htm

<http://cie.ed.asu.edu/volumes6/number1/index.html>

<http://www.iste.org/standards/index.cfm>

<http://curry.edschool.virginia.edu/aace/site/>

<http://www.ncrel.org/sdrs/areas/issues/educatrs/preservice/pe300.htm>

<http://www.aace.org/pubs/cite/default.htm>

http://www.mff.org/edtech/projects.taf?_function=detail7Content_uid1=148

http://teachers.net/mentors/student_teaching

<http://education.indiana.edu/cas/tt/v#iltoc.html>

EFFECTIVENESS OF VIDEO RECORDED TEACHING SKILLS DEVELOPMENT PROGRAMMES IN HIGHER EDUCATION

Panch. Ramalingam

INTRODUCTION

Teaching is a dynamic and complex process. The teaching learning process is a challenging one. The teacher has to deal with this teaching task both as an artist and scientist. Teaching is proved to be a complex skill which can be resolved into a number of simple components which may be called as set of teaching skills. There have been no fixed numbers of teaching skills. The Skill of Set Induction is required to be exhibited by a teacher during the first phase of the class just to arouse the interest of students and create a sense of preparedness for the lesson. This can be done by checking the previous knowledge of the students through questions, narrating an experience of the teacher to arouse curiosity, performing a simple experiment, relating the topic to what has already been taught and so on. The Skill of Stimulus Variation is related to procedures by which the attention of the class can be secured. This involves deliberate changing of various attention-compelling behaviours of the teacher in order to gain students' attention. The behaviours corresponding to the skill can be stated as follows: Teacher movement, Gestures and Body language, change in speech pattern, Focusing, Change in interaction style, Oral-visual switching, pause. The Skill of Explaining is a set of interrelated statements made by the teacher related to a phenomenon in order to increase understanding in students. In order to be a good explainer, the teacher has to develop

certain desirable behaviours. They are beginning statement, Explaining links, fluency, concluding statement. The Skill of using Chalkboard is one of the most widely used visuals in a classroom. Very often, it is also one of the misused or rarely used medium. The components of the skill are: Writing legibly, Neatness in the chalkboard work and Appropriateness of written work in respect of meaning, brevity, simplicity, developing the necessary and proportionate diagrams using different colour chalks. The Skill of Achieving Closure is as important as Set Induction. It is the skill of the teacher which makes him recapitulate the teaching points covered in the class so that the students are reinforced and help them assimilate the parts into a meaningful whole. A review, a quick summary, an assignment and similar activities form part of this skill.

Skill Development through Micro Teaching Technique

Micro teaching is a scaled down teaching encounter in class size and class time. It is a teacher education technique which allows teachers to apply clearly defined teaching skills to carefully prepared lessons in a planned series of five to ten minutes encountered with a small group of students.

Development of Mastery in Teaching Skills of Higher Education Teachers through Micro Teaching

In order to develop the teaching skills of the teachers in higher education, the UGC-Academic Staff College of Pondicherry University has been taking help of micro teaching technique supported with Video Recording of Lessons.

Planning Session

The participant lecturer plans a micro lesson taking a single concept or the teaching points based on the components of important skills that are going to be practised for 5 - 10 minutes taking guidance from the resource person.

Teaching Session

The participant lecturer delivers the lesson before a small class of about 15 participants (peer group). The second group of teacher participants will act as students. The teaching is observed by the third group of teacher participants with the help of specially prepared observation schedule. Simultaneously, the teaching is recorded on video tapes for effective feedback.

Feedback Session

After the teaching session the resource person gives the feedback based on his observation with the help of video recording. This is the most important stage as it replays the teaching of the student-teacher. The sources of feedback are the self, resource person, peer group members, video tape, LCD, and observation schedule.

Application of Micro Teaching Technique in Orientation of Higher Education Teachers

Micro teaching has a number of advantages

over the traditional teacher training programme. It is more effective in changing classroom behaviour of the teacher. Micro teaching performance and experience increase corresponding performance in real teaching experience. Micro teaching as an innovation and scientific laboratory teacher training technique needs to be utilized in orientation courses organized for fresh teachers in higher education.

OBJECTIVES OF THE STUDY

- 1.To explore the effectiveness of video recorded training skills in development of skills of the teachers in the orientation courses conducted by the Academic staff college of the Pond cherry University.
- 2.To enable the teacher participants to gain confidence in skills based teaching and mastering a number of skills in teaching.
- 3.To find out whether there is a significant difference between various groups such as sex, subject, experience in teaching, educational qualifications in case of video recorded teaching skills.

HYPOTHESES

- 1.Effectiveness of video recorded training skills in development of skills of the teachers in the orientation courses conducted by the Academic staff college of the Pondicherry University is significantly high.
- 2.Teacher participants have gained confidence in skills based teaching and mastering a maximum number of skills in teaching under the controlled conditions.
- 3.There is no significant difference between various groups such as sex, subject, experience in teaching, educational qualifications with regard to their teaching skills.

SAMPLE

The sample for the present investigation has been selected as teachers of colleges/universities, those who were undergone orientation courses in the Academic Staff College of the Pondicherry University. In order to collect data from the teachers it was decided to administer the instruments to all the teacher participants (N=147) who have attended in three IT based orientation courses conducted during the academic year 2002-03.

TOOLS

To measure the effectiveness of video recorded teaching skills training in the orientation courses for the teachers of colleges and Universities, the following standardised instruments were identified and used to collect data. The instruments are teaching competency schedule and observation schedule for teaching skills. These were designed and validated by the author in 2002 to measure the effectiveness of video based teaching skills training in the orientation courses for the teachers of colleges and Universities. The teacher participants were asked to indicate how they felt about making decision by ticking the response which was most applicable to them. All the responses were counted for individual score. The maximum score for an individual is 90 and the minimum is '20'

PROCEDURE

In case of Orientation programmes, ten sessions are devoted to workshop on lecturing skills and teaching techniques which include participants' micro teaching so as to give scope for development of some skills. In case of present study, the instruments were distributed to the

participant teachers, and clear instructions were given to them with regard to the purpose of the test. No time limit was fixed for the test. They were instructed to put a tick mark against each item according to their first reaction. After the instructions were given, the teachers were allowed to fill in the schedules during the micro teaching session. They were also asked to fill the personal information such as name, sex, age, discipline, educational qualification, and years of experience in teaching. They were assured that their responses would be kept in strict confidence and used only for the research. The filled-in schedules were collected from them. Ultimately, the information furnished by 147 respondents was used in the present study. Major teaching skills to be practiced were explained to the participants and all the chosen seven major skills were demonstrated. Micro lessons were carefully planned on the basis of the model. Each of the participants taught for five minutes to a small class of 10-15 students (peer group teacher participants). Each lesson was observed by the resource person and other participants using a specially developed observation schedule. The lesson was video taped with a skilled videographer. The participants were divided into three groups of about equal in numbers such as teacher group, student group and observer group. During the first phase of micro teaching session, teacher group of participants presented their mini lectures for five minutes as per their micro lesson. Student group of participants acted as students and observer group of participants observed the teaching with help of observation schedule. In the second phase second group presented their mini lectures, third group acted as students

and first group observed and in the third phase third group presented their mini lectures, first group acted as students and second group observed. Immediately after the video recording was over qualitative and quantitative feedback was given for the three groups one by one with the help of observation schedule and video play through LCD projector by the resource person..

RESULTS

Analysis of Data Received from Participants

- Out of the 147 who responded to our instruments 84% have asserted that they derived specific benefits in the areas of development of teaching skills, as a result of attending the orientation programme. This clearly shows that this sort of teaching skills development based on video recording in the orientation programmes should be continued to be given to all young teachers in colleges and universities.
- 71% of the teacher participants expressed their opinion that they are first time making use of the teaching skills in their lectures.
- 77% of the teacher participants have practiced and made use of more than five skills out of the seven major skills demonstrated.
- 68% of the teacher participants have gained experience in making use of more than 14 sub skills out of the 28 sub skills demonstrated. The above results clearly shows that effectiveness of video recorded training skills in development of skills of the teachers in the Orientation Courses conducted by the Academic Staff College of Pondicherry University is significantly very high and the participant lecturers got used to some teaching skills
- There was no significant difference between male and female teacher participants with regard to their teaching skills
- There was no significant difference between male and female teacher participants with regard to their teaching skills.
- There was no significant difference among different subjects such as humanities, arts and sciences of teacher participants with regard to their teaching skills.
- There was no significant difference among different groups of experience in teaching of teacher participants with regard to their teaching skills. However, teacher participants who have more than five years of teaching experience made use of more than five major skills and more than 15 sub skills in teaching.
- There was no significant difference among different groups of educational qualifications of teacher participants with regard to their teaching skills. Thus, there was no significant difference between various groups in respect of sex, subject, experience in teaching, and educational qualifications with regard to their teaching skills. Besides knowing the specific benefits derived from the micro teaching session. The general out comes of the study were as follows:
- Video recorded teaching skills are planned well in advance and made effective through the use of LCD projector.
- Observation of teaching skills and evaluation methods learnt during the

programme helps to improve the performance of teaching.

- The orientation programme gives enough awareness and understanding to learn many teaching skills relating to any subject.
- The teacher participants learnt as how to present ideas in a skill based novel way.
- There is a definite improvement in the

methods of video recorded teaching which helps to make the teachers more effective and participate.

CONCLUSION

Orientation Programmes of higher education teachers should include video recording of micro lessons for development of teaching skills of participant lecturers.

A Few Useful Websites

Quality Assurance

<http://www.qaa.ac.uk/revreps/subjrev/assessingquality.htm>

Subject Review

<http://www.city.londonmet.ac.uk/deliberations/subj-rev/index.html>

Subject review handbook - England and N.Ireland (September 2000 - December 2001)

<http://www.qaa.ac.uk/public/srhbook/contents.htm>

Professional Development in Higher Education

<http://www.city.londonmet.ac.uk/deliberations/teachers/index.html>

Staff and Educational Development Association

<http://www.city.londonmet.ac.uk/deliberations/seda-pubs/index.html>

Assessment

<http://www.city.londonmet.ac.uk/deliberations/assessment/index.html>

ERIC Digests

<http://www.ericfacility.net/ericdigests/ed424212.html>

<http://www.ericfacility.net/ericdigests/ed429054.html>

<http://www.ericfacility.net/ericdigests/ed426986.html>

<http://www.ericfacility.net/ericdigests/ed424231.html>

<http://www.ericfacility.net/ericdigests/ed436486.html>

New Directions in Teacher Evaluation 1998

<http://www.ericfacility.net/ericdigests/ed429052.html>

Journal List

<http://www.city.londonmet.ac.uk/deliberations/journals/index.html>

<http://ultibase.rmit.edu.au/Resources/journals.htm>

**ANALYSIS OF CASE STUDIES PERFORMED BY B.ED. TRAINEES
(2003-2004) DURING THEIR TEACHING PRACTICE PERIOD**

Kiruba Charles

INTRODUCTION

Case study is a generally accepted, widely used method for collecting and analyzing data regarding human behaviour. It is also an "In-depth Study" of one individual. It involves careful examination of all vital factors for the diagnosis and interpretation of the individual conduct and behaviour. Case study of individual students is an exercise given to the B.ED trainees during their teaching Practice. From the case studies performed by the B.Ed. trainees, 200 case studies (higher secondary students) were selected for analysis of aspects such as: Subject of interest; Subject of aversion; Dominant emotion; Aspiration; Specific problems; and Fruitful remedies. The individual variables were studied in detail. Based on the data collected the analysis was performed and the real learning attributes were assessed.

FINDINGS

Subject of Interest

Students willingly learn a subject when they are interested in the subject. 200 students were selected as sample. It is construed that the subject of interest topping the list is Mathematics and also Biology. The subject of least interest is found to be Chemistry. Interest leads to attention and attention leads to perfect understanding and so if the subject of interest is identified, its achievement can always be studied in detail.

Subject of Aversion

Aversion comes as a result of lack of aptitude and attitude and if checked early it could be

treated appropriately with proper counselling. It is found that again Mathematics even though found as the subject of interest in the earlier analysis is found here as the subject of aversion in the highest range. Next in the list comes English followed by Chemistry. English being a foreign language it may be accepted but Chemistry as found in the earlier analysis as the subject of least interest demands concerns.

Aspiration

Learners have different aspiration and at the higher secondary level they get motivated through their peer group and environmental demands. The Table 3 reveals the aspirations of the sample chosen. The most aspired profession is found to be Doctor followed by Engineer, Teacher, Police Man, Lawyer and Nurse. 10% of the sample has aspiration to do higher studies and 6% of the sample has not decided about their future profession

Dominant Emotions

Learners have different dominant emotions which have control over their performance. The adolescent period is a combination of stress, strife, struggle and strain and the resultant emotion .It is concluded that 19% of the sample are calm, 12.50% of the sample are stable, 11.5% are highly active and 2% of the sample are ambiguous in nature. In contrast the dominant emotions identified are, perturbation, Impatience, Over Emotional and Emotional; clearly proving the adolescent picture.

Specific Problems

Learners have their own specific problems. B.Ed trainees have identified these specific problems in their case studies. The table gives a clear picture about the specific problems prevalent amongst the students in the sample selected. Poverty and Carelessness are the specific problems falling at the highest level. Undesirable behaviour of the father is the least specific problem. Collectively the individual nature namely, Inferiority complex, Shy nature, Stagnation in education, Loneliness, Lack of memory, Language problem and Mischievous nature make the individual learners retarded in achievement. The B.Ed. trainees have identified the above specific problems amongst the higher secondary students.

Fruitful Remedies

Remedial measures have a role to play in the learning process. B.Ed trainees through their appropriate counselling and guidance had affected fruitful outcome in their cases selected during their teaching practice. The students had shown improvement through their advice, through relevant exercises, through their involvement, through their encouragement, through their clarification of doubts, through development of rapport and through improved communication efforts. Consequently students had developed confidence in their teachers, shown progress against interferences and also improved in regularity, courage, interest and self-motivation.

MAJOR FINDINGS

Analysis for 200 Case Studies (higher secondary students), done by B. Ed trainees, reveal the following.

1. Subjects of interest were identified, namely Mathematics, Biology, Computer Science,

Tamil, English, Botany, Zoology, Economics and Chemistry.

2. Subjects of Aversion were also identified, namely Mathematics, English, Chemistry, Physics, Accountancy and Tamil.

3. The aspired professions are Doctor, Engineer, Teacher, Policeman, Lawyer and Nurse. Even at the Higher Secondary stage 6% are yet to decide about their profession.

4. The sample reveals that most of them are calm, stable and dominant; it is found that impatience, ambiguity and hyper activeness also exist.

5. There were 15 specific problems namely mischievousness, indiscipline, inferiority complex, shy nature, language problem, lack of memory, loneliness, carelessness, poverty, poor health, inability to understand, stagnation, inattention of parents, family quarrel and undesirable behaviour of father distributed in the sample selected.

6. Appropriate counselling and guidance have increased the learner's interest, confidence, regularity, courage and performance.

CONCLUSION

Thus the analysis of the case studies done by B.Ed trainees during their teaching practice period had given the vital areas of concern in the teaching learning process namely, subject of interest, subject of aversion, aspiration, dominant emotion, specific problems and also the areas of improvement through remedial measures. Hence case study has an important role to play in the planning, performing and progress of the learning population under the guidance of the teaching faculty. The teacher educator has realized the significance of case study and hence utilized the analysis for immediate implication and further research as variables have been clearly identified.

EFFECT OF CHILD-REARING PRACTICES ON CHILD'S PERSONALITY

T.C. Gyanani
Archana Kapoor

INTRODUCTION

The role of a mother in the development of her child's personality is very vital. A child usually spends maximum time with its mother. It is, therefore, the mother alone who leaves a strong and a long lasting impact on the child and lays the foundation for its future development. Since ancient times the mother has been entrusted the task of bringing up the children. The mother's interaction with the child during postnatal life has profound impact contributing to its optimum development. She acts as a model and the way in which she is perceived by the child determines many of the behavioural choices the child will make later. The early warmth and affection of a mother is associated with calm, happy and cooperative behaviour of children throughout the years prior to adolescence. The mother is the only person who responds to the child's call and provides it her protection. She disciplines the child and guides it towards a carrier. The personality building of a child is entirely in the hands of the mother and childhood is the foundation stage of the future life. The mother is the chief architect shaping and reshaping the child's personality by adopting the proper child rearing practices primarily in the infancy and pre-childhood period. A mother has more opportunities than the father to influence the offspring's growth and behaviour. In the absence of a mother a child feels lonely and unwanted and this adversely affects not only its initial activities but also social behaviour and development. A child brought up under an

institutional care has all the ill effects similar to those arising out of lack of maternal care. The child is found to be emotionally disturbed, socially aloof and academically wanting. The children who have lived under institutional care showed delay in walking, talking and toilet training and after leaving the institution they displayed problems both in work habits and in social adoption. It is in the above background that two questions arise: 1. How far do the child rearing practices influence the various personality factors? and 2. How far does the child rearing practice interacting with gender difference influence the various personality factors of a child? Thus to have an answer to these questions the following objectives of the study were framed.

OBJECTIVES OF THE STUDY

1. To compare the various personality factors of children in relation to gender differences.
2. To study the effect of child rearing practices on various personality factors of children.
3. To study the interaction effect of child-rearing practices and sex of children on their various personality factors.

HYPOTHESES

1. Personality factors of children are independent of child-rearing practices.
2. Personality factors of children are independent of the gender differences.
3. There is no interaction effect of child-rearing practices and gender difference on the various personality factors.

METHOD

In the study the Ex-Post-Facto method of research with 2x2 factorial designs was used.

Variables

According to the factorial paradigm of the study classification of variables are as under:

Independent Variables

1. Child Rearing Practices (Good vs. Poor)
2. Gender (Boys vs. Girls)

Dependent Variables

1. Various Personality Factors

Control Variables

1. Socio-economic Status
2. Intelligence

Tools

1. Child's Personality Questionnaire: An Indian adaptation of the Cattell's Child's Personality Questionnaire (1963) developed by Kapoor and Rao.
2. A self-made child rearing practices schedule.
3. Group test of intelligence developed by Tandon.
4. Socio economic status scale (urban form) prepared by Kulshreshtha.

Sample

The study was confined to 1150 students of 6th and 7th standard studying in secondary schools of Agra city, of which 300 average intelligent boys and 300 average intelligent girls belonging to middle socio-economic status families were taken into consideration. The sample was divided on the basis of median into two groups, viz, mothers adopting good or poor child rearing practices.

RESULT

It was found that child-rearing practices adopted by the mothers have significant effect

on the personality factors A, D, E, F, I, J, O and Q3. The children who are getting good child-rearing practices are found to be highly participating, warm hearted, active, obedient, mildly assertive, happy, less realistic, vigorous, zestful, placid, self assured, self disciplined and controlled while on the other hand the children who are reared poorly are found to be reserved, active, taciturn, realistic and vigorous. Sex also affected the child's various personality factors. The boys were found to be emotionally less stable, active, mildly assertive, dominating, sober, restrained, forthright, natural, self-assured, placid and relaxed. While girls are found to be emotionally less stable, less active, relaxed, energetic, worrying and shy. The results are indicative of the fact that child-rearing practices influence the various personality factors of boys and girls differently. The interaction effect of child-rearing practices and sex is found significant in relation to the personality factors. The boys and girls who were reared under good child rearing practices differ significantly in their various personality factors. It indicated that the boys who are getting good child-rearing practices are found to be emotionally less stable, active, aggressive, socially bold, precise, less relaxed in comparison to the girls who are getting good child rearing practices. The girls who are getting poor child-rearing practices are found to be emotionally less stable, serious, shy, slightly tender minded, unwilling to act, shrewd and socially controlled in comparison to the boys who are getting poor child rearing practices. The boys of such mothers are found to be careless, untidy, aggressive, and stubborn and of low integrity whereas the girls are submissive, shy, timid, restrained, tense and self-disciplined. It is observed that there is no significant effect of

child-rearing practices on the personality factors of boys but personality factors are found to be statistically significant. This shows that boys who are getting poor child-rearing practices are found serious, careless and tense in comparison to the boys who are getting good child-rearing practices. In case of girls, the personality factors are found to be statistically significant which indicates that girls who are getting poor child rearing practices are found to be submissive, serious, unwilling to act, individualistic, slightly restrained and calculating in comparison to the girls who are getting good child-rearing practices.

CONCLUSION

The above results lead to the conclusion that the development of child's personality is greatly dependent upon the child-rearing practices adopted by mothers. Mothers can consciously adopt the following child-rearing practices for the healthy personality development of children.

- # Breast-feed children for one year (instead of feeding for too short or long period)
- # Starting toilet training at about two years instead of early training.
- # Use of attention diversion techniques to prohibit autoerotic sex plays of children instead of direct prohibition or spanking.
- # Approval of children's leadership activities and encouraging these activities instead of disapproval or indifferent towards these activities.
- # Use of praise for obedience instead of showing indifference.
- # Use of praise and reward to teach desired behaviour instead of showing indifference.

- # Giving responsibility to do any regular work instead of not giving it. Explaining not to be aggressive towards parents instead of scolding and punishing or making children ashamed of themselves.

These are a few selective good rearing practices, which have profound positive impact on the personality of a child.

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TEACHING READING

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INTRODUCTION

What is reading? Reading is about understanding written texts. It is a complex activity that involves both reception and thought. Reading consists of two related processes: word recognition and comprehension. Word recognition refers to the process of perceiving how written symbols correspond to one's spoken language. Comprehension is the process of making sense of words, sentences and connected text. Readers typically make use of background knowledge, vocabulary, grammatical knowledge, experience with text and other strategies to help them understand written text. Much of what we know about reading is based on studies conducted in English and other alphabetic languages. The principles we list in this booklet are derived from them, but most also apply to non-alphabetic languages. They will have to be modified to account for the specific language. Learning to read is an important educational goal. For both children and adults, the ability to read opens up new worlds and opportunities. It enables us to gain new knowledge, enjoy literature, and do everyday things that are part and parcel of modern life, such as, reading the newspapers, job listings, instruction manuals, maps and so on. Most people learn to read in their native language without difficulty. Many, but not all, learn to read as children. Some children and adults need additional help. Yet others learn to read a second, third or additional language, with or without having learned to read in their first language. Reading instruction needs to take into

account different types of learners and their needs. Research has shown that there is a great deal of transfer from learning to read in one language to learning to read in a second language. The principles outlined below are based on studies of children and adults, native speakers as well as those learning to read in a second or foreign language. They deal with different aspects of reading that are important in the planning and design of instruction and materials. The practical applications are based on general learning principles, as well as on research. Briefly stated, these learning principles start with the learner in mind. The type of learner will affect the type of methods and materials to be used. The context of learning is also important. For instance, children and adults who are learning to read in a language different from their native language will also need to learn about the culture of the second or foreign language. Because texts are written with a specific audience in mind, cultural knowledge is present in texts and it is assumed that the reader is familiar with such knowledge. Both research and classroom practices support the use of a balanced approach in instruction. Because reading depends on efficient word recognition and comprehension, instruction should develop reading skills and strategies, as well as build on learners' knowledge through the use of authentic texts.

References: Bernhardt, 1991; Bernhardt, 2000; Hulstijn, 1991; Kamil, Mosenthal & Pearson, 2000; Snow Burns & Griffin, 1998.

1. ORAL LANGUAGE

EARLY PROGRESS IN READING DEPENDS ON ORAL LANGUAGE DEVELOPMENT

Research findings

Normally developing children raised by caring adults develop speech and language abilities naturally and without effort. Learning to read is a different process because it involves learning about a symbolic system (writing) used to represent speech. Before children begin to learn to associate the written form with speech, they need to learn the vocabulary, grammar and sound system of the oral language. Research has shown that there is a close connection between oral vocabulary and early reading ability. The ability to attend to the individual sounds within words (phonological and phonemic awareness) is also an oral skill that is closely associated with reading ability.

Practical applications

- The home is the ideal place where young children develop language skills in their interactions with adults and other children.
- Teachers can provide opportunities for children to develop their oral language through story-telling and show-and-tell activities.
- Young children should be encouraged to use oral language to express themselves while learning about print and books both at home and in school.
- Shared book reading to groups of students using Big Books is an effective instructional strategy that introduces books and reading to children, while encouraging them to talk about what is being read.
- Class dictated stories make use of children's oral language in structured reading and writing activities with the help of the teacher. First, the children tell a story in their own words. The teacher writes this down on the blackboard for

the children, and then reads their story back to them. Students take turns practising reading the story as well.

- For older students and adults learning to read in a second or foreign language, developing proficiency in the target language is very important. This means having opportunities to speak and use the language extensively.

Suggested readings: Snow, Burns, & Griffin, 1998; Bernhardt, 2000.

2. PHONOLOGICAL AND PHONEMIC AWARENESS

PHONOLOGICAL AND PHONEMIC AWARENESS ARE CLOSELY ASSOCIATED WITH READING ABILITY

Research findings

Phonological awareness refers to the ability to attend to the sounds of language as distinct from its meaning. Studies of both alphabetic and non-alphabetic languages show that phonological awareness is highly correlated with reading ability. For alphabetic languages, phonemic awareness is especially important because the letters of the alphabet map onto individual sound units (phonemes). Children who are able to attend to the individual phonemes in alphabetic languages are much more likely to learn the alphabetic principle (how letters map onto phonemes) and, therefore, learn to recognize printed words quickly and accurately. For alphabetic languages, many studies have shown that phonemic awareness is closely associated with reading ability in the early and later years of schooling. Furthermore, reading instruction and phonological awareness mutually reinforce each other. Phonological awareness helps children to discover the alphabetic principle. At the same time, learning to read alphabetic script also develops phonological and phonemic

awareness. For non-alphabetic languages, such as Chinese, research has shown that phonological awareness is also associated with reading ability. Regardless of the writing system, there appears to be a universal phonological principle in reading.

Practical application

- Phonics is based on the systematic teaching of sound and letter relationships, as well as sound and spelling patterns. This is helpful in beginning English reading instruction. Children who have learned to read prior to formal schooling do not need such instruction. Older readers do not benefit as much from phonics instruction.
- Teaching students to identify phonemes with or without the use of letters is effective.
- Teachers can develop students' phonological skills through a wide variety of activities. Rhymes, alliteration (words which start with the same sounds) and poetry can be used to draw children's attention to individual sounds in the language.
- Teachers can focus on individual syllables and sounds in language in the context of book reading. It does not have to be taught in total separation from other reading activities.

Suggested readings: Adams, 1998; Cunningham, 1990; Juel, 1991.

3. FLUENCY

FLUENT READERS READ WITH ACCURACY, EASE AND UNDERSTANDING

Research findings

Fluency is important because it is closely related to comprehension. Fluency in reading means being able to read text accurately, quickly and with expression. Fluent readers can do this because they do not have problems with word recognition. As a result, they can focus on the meaning of a text.

Recent research shows that fluency also depends on the ability to group words appropriately during reading. This means fluent readers recognize words quickly, but also know where to place emphasis or pause during reading. Word recognition is necessary but not sufficient for fluent reading. The reader must construct meaning from the recognized words. Fluent readers can do both tasks at the same time. They can do this because of efficient word recognition and oral language skills. Guided practice in reading generally increases fluency.

Practical applications

- Teaching word recognition skills is an important first step. The second step is to ensure that students can develop speed and ease in recognizing words and reading connected text.
 - To assess fluency, teachers need to listen to their students reading aloud. They should provide feedback to the students about their reading. They also need to determine how much is understood.
 - The reading of texts with high frequency words will encourage fluency if the texts are interesting and meaningful to the reader.
 - For non-native speakers of a language, word recognition ability must match their oral language development.
 - Repeated reading and paired reading (also called buddy reading) are examples of activities that promote fluency through practice. (See Part 12: Practice, for more suggestions.)
- Suggested readings:** Clay, 1985; Allington, 1983; Pinnell, et al., 1995.

4. VOCABULARY

VOCABULARY IS CRUCIAL TO READING COMPREHENSION

Research findings

Many studies have shown that good readers have good vocabulary knowledge. In order to understand a text, readers need to know the meanings of individual words. They construct an understanding of the text by assembling and making sense of the words in context. Vocabulary knowledge is difficult to measure. It is, however, very important in learning to read and in future reading development. Words that are recognized in print have to match a reader's oral vocabulary in order to be understood. This is important for children who are developing oral proficiency, as well as for non-native speakers of a language. In later reading development, when students read to learn, they need to learn new vocabulary in order to gain new knowledge of specific subject matter.

Practical applications

- Vocabulary should be taught directly and indirectly. Direct instruction includes giving word definitions and pre-teaching of vocabulary before reading a text. Indirect methods refer to incidental vocabulary learning, e.g. mentioning, extensive reading and exposure to language-rich contexts.
- Repetition and multiple exposures to vocabulary items (e.g. through speaking, listening and writing) are important. This should ideally be done in connection with authentic learning tasks.
- Vocabulary learning should involve active engagement in tasks, e.g. learning new vocabulary by doing a class project.
- Word definitions in texts aid vocabulary development.
- Multiple methods, not dependence on a single method, will result in better vocabulary learning.

Suggested readings: Nagy, Herman & Anderson, 1985; Nagy & Scott, 2000; Shu, Anderson & Zhang, 1995.

5. PRIOR KNOWLEDGE

READERS USE PRIOR KNOWLEDGE TO UNDERSTAND TEXT

Research findings

Having more prior knowledge generally aids comprehension. There are many aspects to prior knowledge, including knowledge of the world, cultural knowledge, subject-matter knowledge and linguistic knowledge. A reader's interest in a subject matter will also influence the level of prior knowledge. All of these factors are important to different degrees, depending on the reading task. A reader's knowledge of the world depends on lived experience. This is different in different countries, regions and cultures. Reading tasks and reading instruction should be sensitive to the types of prior knowledge that are needed for the reader to understand a text.

Practical applications

- When choosing books, it is important to consider the students' interests, as well as the subject matter of the text.
- In the classroom, teachers can focus on words and concepts that may be unfamiliar. This is especially important for nonnative speakers.
- Discussing new words and concepts with students before reading a text is generally helpful. It helps to activate prior knowledge and improve comprehension.
- Asking students to tell everything they know about a topic is a useful way to begin to get students to activate their prior knowledge. They should then begin to think about what they don't know. After reading, they should summarize what they have learned about the topic.

Suggested readings: Afflerbach, 1990; Droop & Verhoeven, 1998; Stahl, Jacobson & Davis, 1989; Ogle, 1986.

6. COMPREHENSION

COMPREHENSION IS AN ACTIVE PROCESS IN THE CONSTRUCTION OF MEANING

Research findings

Comprehension is the process of deriving meaning from connected text. It involves word knowledge (vocabulary) as well as thinking and reasoning. Therefore, comprehension is not a passive process, but an active one. The reader actively engages with the text to construct meaning. This active engagement includes making use of prior knowledge. It involves drawing inferences from the words and expressions that a writer uses to communicate information, ideas and viewpoints. Recent studies have focused on how readers use their knowledge and reasoning to understand texts. The term 'comprehension strategies' is sometimes used to refer to the process of reasoning. Good readers are aware of how well they understand a text while reading. Good readers also take active steps to overcome difficulties in comprehension. Students can be instructed in strategies to improve text comprehension and information use.

Practical applications

- Instruction can improve comprehension by focusing on concepts and the vocabulary used to express them.
- Comprehension can also be enhanced by building on students' background knowledge, e.g. by having a group discussion before reading.
- Teachers can guide students by modeling the actions they can take to improve comprehension. These actions include: asking questions about a text while reading; identifying main ideas; using prior knowledge to make predictions.
- Teaching a combination of different strategies

is better than focusing on one.

• Different methods have been found to be effective in teaching text comprehension. Teachers can use combinations of the following:

- * Co-operative or group learning;
- * Graphic organizers (e.g. flow charts, word webs);
- * Asking and answering questions;
- * Story structure;
- * Summarizing;
- * Focusing on vocabulary.

Suggested readings: Durkin, 1993; Block & Pressley, 2002; National Reading Panel, 2000.

7. MOTIVATION AND PURPOSE

THERE ARE MANY DIFFERENT PURPOSES OF READING

Research findings

A reader reads a text to understand its meaning, as well as to put that understanding to use. A person reads a text to learn, to find out information, to be entertained, to reflect or as religious practice. The purpose for reading is closely connected to a person's motivation for reading. It will also affect the way a book is read. We read a dictionary in a different way from the way we read a novel. In the classroom, teachers need to be aware of their students' learning needs, including their motivation for reading and the purpose that reading has in their lives.

Practical applications

- By talking to students about the different purposes for reading, they will become more aware of what to focus on as they read.
- The use of different types of texts (stories, news articles, information text, literature) promotes different purposes and forms of reading.
- The use of authentic texts and tasks will

promote purposeful reading.

- Books and reading materials that are interesting and relevant to students will motivate them to read more.
- Make connections between reading and students' lives.
- Develop a love for reading, because it extends beyond academic success.

Suggested readings: Turner & Paris, 1995.

8. INTEGRATED READING AND WRITING

REINFORCE THE CONNECTION BETWEEN READING AND WRITING

Research findings

Reading and writing are closely related. Developing reading skills through writing is an effective strategy. For young children, learning to write and spell helps to develop their awareness of print conventions. It also makes them aware of the symbolic nature of print. Writing also helps to establish the connection between oral and written language. Research has shown that it is helpful to guide children through the process of writing down what they can say about what they have experienced. Language experience makes concrete the connection between reading and writing through oral language. Teachers and parents often complain that students do not adopt the goals they hold for them, and that they do not follow up on their well-meant advice. For example, Stefano's father tries to prevent him from doing his homework with the radio on, believing that music affects motivation and performance negatively. Current research does not support this view. Yet, such conflicts of interest lead to the frustration of Stefano's need for autonomy. Often, teachers (and parents) try to push their own goals along, thus fueling

the child's struggle for autonomy. For decades, schools, teachers and researchers narrowed educational goals to learning and achievement, which only frustrated students' social goals.

Practical applications

- Language experience: An adult writes down a child's words as she talks about something she has experienced (e.g. a family celebration). The child then learns to read what the adult has written down. This form of language experience establishes the oral and written connection.
- In cultures with a rich oral tradition, children can be encouraged to write down stories, myths and traditions.
- For adults, developing reading and writing skills for specific purposes means focusing on specific language (e.g. academic language) and text types (e.g. scientific reports).
- Allow time to work with the results of pilot projects to plan expanded efforts and/or new pilot projects.

Suggested readings: Clay, 2001.

9. TEXTS

CHOOSE TEXTS OF THE RIGHT DIFFICULTY AND INTEREST LEVEL

Research findings

Texts of the right reading level are neither too easy nor too hard for a particular reader. Choosing texts of the right difficulty and interest levels will encourage children to read and to enjoy what they are reading. Vocabulary, word length, grammatical complexity and sentence length are traditionally used to indicate the difficulty level of a text.

The subject matter of a book is also an important factor. For instance, readers with substantial prior knowledge of a subject will be able to use their knowledge to read more

difficult texts. Cultural factors are important when choosing books for non-native speakers. Some children's books may contain references to situations, objects and experiences that are unfamiliar to non-native speakers. For both children and adults, native and non-native speakers, it is important to use authentic texts. This means materials written with readers in mind, not texts constructed to illustrate specific vocabulary or word forms. It is also important to use a variety of authentic texts, including both information texts and narrative or story texts. Students often have an easier time reading information texts when they can use their knowledge of the topic.

Practical applications

- When assessing the difficulty level of a text, it is important to consider the language used, as well as its subject matter, interest level and assumed cultural knowledge.
- Apart from text difficulty, choose books that are well-written in terms of style and language.
- Choose reading materials that utilize students' local context. For instance, books about what students enjoy doing would be a good starting point.
- Use information texts that contain topics with which the students are familiar. This will allow them to use their prior knowledge and to learn more about the topic.
- Introduce reading materials of different types (genres) and topics. A lack of variety of materials leads to a limited reading and language experience.

Suggested readings: Alexander, Jetton & Kulikowich, 1995; Bormuth, et al. 1970; Carver, 1994.

10. ASSESSMENT

USE ASSESSMENT TO PROVIDE FEEDBACK

AND MEASURE PROGRESS

Research findings

There are two forms of reading assessment. The first is to find out how well children are reading in order to help them improve (diagnosis). Diagnostic assessment is about giving feedback and assistance to learners. The second is to measure how much progress has been made. Both forms of assessment are needed for effective reading instruction. In beginning reading, assessment is normally done by listening to students reading aloud. Teachers assess word recognition and fluency in this way. Beyond this stage, assessment should focus primarily on text comprehension. Text comprehension is usually assessed through questions. Questions should focus on main ideas and viewpoints, not minor details. These are called higher order questions. Methods of assessment vary with the types of responses students make to the questions. The students' responses can be spoken or written. Written responses can be in the form of a multiple-choice response, short answers or extended pieces of writing. Materials used for assessing reading should ideally be authentic. They should reflect the type of reading normally encountered in daily life.

Practical applications

- Use assessment to find out how well students are reading, and also how to help them read better.
- Choose a method of assessment appropriate for the level and type of student.
- Higher order questions take the form of 'how' and 'why' rather than 'what'.
- When choosing materials for assessing non-native speakers, be mindful of words and concepts that might be unfamiliar. (See Part 11: Cultural factors.)

Suggested readings: Clay, 1985; Caldwell, 2002; Garcia & Pearson, 1994.

11. CULTURAL FACTORS

CULTURAL KNOWLEDGE AFFECT READING COMPREHENSION

Research findings

Reading comprehension is about relating prior knowledge to new knowledge contained in written texts. Prior knowledge, in turn, depends on lived experience. Topics that are familiar and openly discussed in one culture may be unacceptable in another. Children growing up in rural communities will have different experiences from those from urbanized, developed countries. Because having more prior knowledge generally facilitates comprehension, having more cultural knowledge has the same effect. Having rich but different types of cultural knowledge will also affect our understanding and appreciation of written text. For example, jokes and humour depend on shared cultural knowledge between the writer and reader.

Practical applications

- Choose reading materials that are culturally appropriate. However, it is also important to remember that television, movies and pop culture may be widespread in many places, except for remote, rural communities. This may broaden the choice of appropriate materials.
- Choosing reading materials that draw on students' lives, experiences and interests is a good starting point.
- Some common, high-frequency words in one culture may refer to unfamiliar concepts for students from another culture.

Examples of American English words include: *prom snowboard*; *spam (food)*; *dirt (soil)*; *potluck*.

• Sensitivity to cultural factors also means taking time to discuss and explain unfamiliar concepts and vocabulary.

• In foreign-language teaching, it is helpful to present cultural information in the students' native language. This serves as background knowledge before the students attempt to read in the foreign language.

Suggested readings: Abu-Rabia, 1996; Gee, 2001; Steffensen, Joag-Dev & Anderson, 1979.

12. PRACTICE

READERS MAKE PROGRESS BY READING MORE

Research findings

It is well established that good readers read with ease, accuracy and understanding. Good readers also read more, and by reading more, they increase their vocabulary and knowledge. This in turn helps them to make further gains in reading and learning. Once children can recognize written words in their language with relative ease, they need to develop fluency in reading. Fluency develops with both oral language development and print exposure. The more children read, the more vocabulary and knowledge they acquire, and the more fluent they become in reading. Having opportunities to write will also improve reading ability.

Practical applications

- Students should have access to plenty of books and reading materials at home and at school.
- Sustained silent reading programmes can be used to promote reading practice.
- Encourage students to read independently and extensively.
- Encourage students to read different types of texts.
- Teach students how to choose books of the appropriate reading level.
- Develop students' interest in reading by

connecting reading with their interests, hobbies and life goals.

Suggested readings: Shany & Biemiller, 1995; National Reading Panel, 2000.

CONCLUSION

There are many considerations in teaching reading. What we have presented in the preceding sections is a set of what we believe are the most important principles. However, each of these principles must be adapted for a specific context, for a specific language, and for students of differing abilities. Teaching reading and writing is difficult work. Teachers must be aware of the progress that students are making and adjust instruction to the changing abilities of students. It is also important to remember that the goal of reading is to understand the texts and to be able to learn from them. Reading is a skill that will empower everyone who learns it. They will be able to benefit from the store of knowledge in printed materials and, ultimately, to contribute to that knowledge. Good teaching enables students to learn to read and read to learn.

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IMPACT OF COMMUNITY PARTICIPATION ON SCHOOL EFFECTIVENESS

Debendra Nath Dash

INTRODUCTION

There is a saying in Sanskrit, “*Yatha Lokaaha, Thathaa Sikshana Kramaaha*” - As the people are, so is the education system. If the community is indifferent towards its teacher, its school and the education system, it has no reason to expect its children to get good/quality education. If people want their children to be educated properly, they should be willing and ready to put in their own efforts towards the all-round development of the education system beginning with their immediate neighbourhood. Community participation is one of the main issues in the improvement of the quality of education, not only in western countries (Moles, 1992; Crispeels, 1996) but also or especially in developing countries (Lockheed & Verspoor, 1991; Levin & Lockheed, 1993). Creemers & Werf (1998) found that there is a positive effect of community participation in management, evaluation, and monitoring and teachers’ professional development. The study also remarked, it is important that parents and the community support schools to prevent student absence and to motivate students to learn, to do their homework and to use their time efficiently. Kothari Commission (1964-66) recommended the close involvement of school with their local communities as a principle of great educational significance and suggested to move in this direction. Further, the NPE (1986) and POA (1992) also emphasised that the community whose are the kingpin in the educational enterprise, have to be a clear thinking and inspiring personality member with an honest and sincere commitment towards

society. Particularly, the community in rural, remote areas with poor infrastructure, may have to accept responsibility for looking after the living needs of the teachers and schools.

As a result of this concern, DPEP guidelines (1994) clearly lay emphasis on the participative process whereby the local community would play an active role in promoting enrolment, retention, achievement and school effectiveness. The studies based on community effort in enhancing school effectiveness and learning achievement revealed that empowering communities could improve relevance and efficiency in primary schools in order to attract and keep more children in school as well as for effective management and development of schools (Agarwal and Harding, 1995; Jalali, 1995; Seetharamu, 1995). Jayashree (1996) found that involvement of the community is necessary to strengthen the schools as better learning places for students. Some other studies also pointed out that the participation of community increases the enrolment, retention and achievement of students in the primary schools (Ambasht and Rath, 1995; Barpanda, 1997). The findings of some studies on community participation and school effectiveness also revealed a positive relationship of community participation in the functions of the school management committee and its formation, getting financial support to the schools from the community (Kumar, et al., 1998; Rao, 1998).

Research Questions

The overall discussion above on School Effectiveness and Community Participation in schools provides us with many valuable insights into the diverse aspects of the problem. All these efforts indicate the desire of educationists to have community participation in the field of education. But the question arises, *to what extent community participation is there in our education system? In what form do the schools obtain community participation? Does school effectiveness have some relation to community participation?* To find out the answers to such questions the present study is undertaken. Since, Primary education is a corner stone of social development and a principal means of improving the welfare of individuals (World Bank, 1990&1993), the researcher delimited his study on primary education.

School Effectiveness

The term School effectiveness is a very comprehensive term to define in its actual shape. Most of the School Effectiveness studies have focused on academic achievement in terms of basic skills in reading and mathematics, or examination results (Goodlad, 1984). However, there is hardly any study that provides evidence of combination of school environment, students' performance and teacher performance for school effectiveness. Therefore, here the school effectiveness has been defined/measured in terms of combining the existing infrastructural (including physical facilities in and out side the school) facilities, HM and teachers' performance (including qualification, experience, outstanding performance etc.) and students' performance (including curricular and co-curricular activities)

in the school.

Community Participation

Community participation and parental involvement can refer to assisting children with homework at home and engaging in learning activities (Moles, 1994). Indicators of community participation are the intensity of contacts between schools and parents, contributions of parents to schools, involvement of parents and others in the community into educational matters and involvement of parents with homework. In the present study Community Participation has been conceived and measured in terms of the involvement of the community members/parents in the development of the school activities such as: School Complex; Resource Mobilization; Organising Socio-Cultural Activities; Management of the School and Improving Academic Environment of the school.

Hypotheses

To get the answers for the aforesaid questions following hypotheses were formed.

- 1) There exists a real association between school effectiveness and community participation (overall and dimension-wise).
- 2) School effectiveness and community participation are essentially unrelated or independent.

Methodology

The present study utilizing descriptive survey method endeavours to select the more-effective and less-effective primary schools and find out the relationships with regard to Community Participation. For this purpose a two-phased study was planned. In the *first phase* the more-effective and less-effective schools were

identified from the rural area on the basis of highest and lowest scores with the help of school effectiveness schedule. In the *second phase* with the help of Community Participation Interview Schedule the data were collected from the sample (community members) to know their participation on different activities in the school. The levels of community participation were studied at three levels i.e. low, moderate and high. This grouping of community members was done by applying the formula i.e., $\text{Mean} \pm \frac{1}{2} \text{SD}$ to the score values, i.e., community members scoring $\text{Mean} - \frac{1}{2} \text{SD}$ were included in Low Level of participation group, those scoring $\text{Mean} + \frac{1}{2} \text{SD}$ were included in the High Level community participation group, and those scoring between these two limits were included in Moderate Level of community participation group.

Sample and data collection

In the first phase to find out more-effective and less-effective schools, a total number of 42 rural primary schools from the Thaneshar block of Kurukshetra and Kaithal Block of Kaithal district of Haryana State were selected randomly. Further, the School Effectiveness Schedule was administered to the Headmasters/ Headmistresses of all the schools. The School Effectiveness score of each school was calculated. The schools were thus arranged in descending order according to their school effectiveness score. Finally, the top 14 as more effective and bottom 14 schools as less-effective on the basis of getting highest and lowest score were selected for the final sample. 15 community members from each locality of these schools were selected to investigate their participation in school activities. A total number of 420 community members

were selected for the final sample.

Instruments used

In order to collect data from the selected samples, following tools were developed and used.

1. **School Effectiveness Schedule:** For Headmaster/ Headmistress. The School Effectiveness Schedule consists of three major dimensions such as: *Physical Facilities; HM and Teachers' Performance; and Students' Performance.*
2. **Community participation Interview Schedule:** For Community Members: This Schedule contains five major areas/ dimensions where community members participate such as: *improvement of school complex; resource mobilization; organizing socio-cultural activities; management of the school; and improving academic environment of the school.*

ANALYSIS

All the 42 sample schools have got the score ranges of 34 to 89 from the School Effectiveness Schedule (SES). The top 14 and bottom 14 schools getting highest and lowest score were selected for the final sample as more-effective and less-effective schools respectively. Therefore, the scores on school effectiveness range between 70-89 have been selected as more-effective schools and the scores on school effectiveness range between 34-48 were selected as less-effective schools.

School Effectiveness in Relation to Different Dimensions of Community Participation

In case of Dimension i.e., Community participation in *Improving school complex*, the calculated χ^2 value 75.08 is greater than the table value at .01 levels. It is significant beyond .01 level significance. Hence, Null Hypothesis of the present study that School effectiveness and community participation are essentially unrelated or independent is rejected for improving *school complex dimension* of community participation. It is also observed that the observed results are not close to those expected on the null hypothesis of independence and there is evidence of real association between school effectiveness and community participation. Therefore, the Hypothesis of the present study that there exists a real association between school effectiveness and community participation is retained for improving *school complex dimension* of community participation. This can be interpreted to mean that higher community participation is associated with increasing the school effectiveness for improving school complex.

Community Participation in Resource mobilization

It is observed that in Dimension II i.e., Community participation in *Resource mobilization*, the calculated χ^2 value comes out to be 8.30. Since, it is greater than the table value at .05 level of significance, it can be said that it is significant beyond .05 level. So, Null Hypothesis of the present study i.e., school effectiveness and community participation are essentially related or independent is rejected for *Resource mobilization Dimension* of community participation. It is also observed that the observed results are not close to those expected on the null hypothesis of

independence and there is evidence of real association between school effectiveness and community participation for resource mobilization. Therefore, the Hypothesis of the present study that there exists a real association between school effectiveness and community participation for *Resource mobilization Dimension* of community participation is retained. This can be interpreted to mean that higher community participation is associated with increasing the school effectiveness for resource mobilization.

Community Participation in Organising Socio-cultural Activities

It indicates that in Dimension III i.e., Community participation in *Organising socio-cultural activities*, the calculated χ^2 value comes out to be 13.98. Since, it is greater than the table value at .01 level of significance. It can be said that it is significant beyond .01 levels. Hence, Null Hypothesis of the present study i.e., school effectiveness and community participation are essentially unrelated or independent is rejected for *organising socio-cultural activities Dimension* of community participation. It is also observed that the observed results are not close to those expected on the null hypothesis of independence and there is evidence of real association between school effectiveness and community participation in organizing socio-cultural activities. Therefore, the Hypothesis of the present study that there exists a real association between school effectiveness and community participation in *Organizing socio-cultural activities Dimension* of community participation is retained. This can be interpreted to mean that higher community participation is associated with increasing the school

effectiveness for organizing socio-cultural activities.

Community Participation in the Management of the School.

It indicates that in Dimension IV i.e., Community participation in the *Management of the school*, the calculated χ^2 value comes out to be 102.97. Since it is greater than the table value at .01 level of significance, it can be said that it is significant beyond .01 level. Therefore, the Null Hypothesis of the present study i.e, school effectiveness and community participation are essentially unrelated or independent is rejected for the *Management of the school Dimension* of community participation. It is also observed that the observed results are not close to those expected on the null hypothesis of independence and there is evidence of real association between school effectiveness and community participation in the management of the school activities. Therefore, the Hypothesis of the present study that there exists a real association between school effectiveness and community participation in the *Management of the school activities* Dimension of community participation is retained. This can be interpreted to mean that higher community participation is associated with increasing the school effectiveness for management of the school activities.

Community Participation in Improving Academic Environment of the School

It is evident from Table 6 that in Dimension V i.e., Community participation in *improving academic environment of the school*, the calculated χ^2 value comes out to be 60.57. Since, it is greater than the table value at .01

level of significance, it can be said that it is significant beyond .01 level. Hence, the Null Hypothesis of the present study i.e., school effectiveness and community participation are essentially unrelated or independent is rejected for *Improving academic environment of the school activities Dimension* of community participation. It is also observed that the observed results are not close to those expected on the null hypothesis of independence and there is evidence of real association between school effectiveness and community participation in improving academic environment of the school. Therefore, the Hypothesis of the present study that there exists a real association between school effectiveness and community participation in *Improving academic environment of the school activities* Dimension of community participation is retained. This can be interpreted to mean that higher community participation is associated with increasing the school effectiveness for improving academic environment of the school.

DISCUSSION OF RESULTS

In this section an attempt is made to discuss the results obtained in terms of community participation as overall and dimension-wise on school effectiveness. The findings in regard to community participation on school effectiveness revealed that there is a real association between school effectiveness and community participation as overall and in all the five dimensions such as: *Community participation in improving school complex, Community participation in resource mobilization, Community participation in organizing socio-cultural activities, Community participation in the management of school*

and Community participation in improving academic environment of the school. The findings also show that in more-effective schools, there is a higher community participation in all the activities covered under all the five dimensions. The findings of the present study are similar to the findings of Crispeels (1996) study that the support and participation of families, community members and agencies, and school staff in the community or at school, in activities and efforts that directly and positively affect students' outcomes. Cooper (1989) remarked that the homework could be considered to be school practice, which links the role of parents and teachers.

In India, studies conducted in relation to the community participation variable, revealed that involvement of community in school activities develop the achievement of their students. (Agarwal and Harding, 1995; Ambasht and Rath, 1995). The research findings of Kumar, Patel & Mehta (1998) related to the community participation variable of the present study found that there is a positive relationship of community participation in the functions of the school management committee and its formation, getting financial support to the school from community. This also falls in line with the present study. The findings of the present study get almost a direct support from the findings of Rao's (1998) study. One of the findings of his study revealed that there is a significant positive relationship between community participation and school effectiveness. Therefore, the administrators and HM should involve the community members in organizing the school activities. The schools should also organize community awareness programmes for their active participation and co-operation in

improving the schools in terms of infrastructures and functioning. The findings of the present study also revealed that in decision-making process such as: taking decision on financial matters, improvement of physical facilities etc., particular emphasis should be laid on participation of community members in the decision-making processes of the schools. Therefore, the present study has implications for state government, educational planners, administrators, researchers, and others entrusted with the task of improvement of school effectiveness through empowering the community members for their active participation in school education.

SUGGESTIONS FOR FURTHER RESEARCH

Generally one of the outcomes of conducting any research study is to generate avenues for further researches. The present study is confined to know the "Impact of community participation on school effectiveness at primary level of education in two Districts of Haryana State". Similar studies can be conducted in other parts of the country in different socio-cultural contexts. The results of the present study throw a valuable light on the improvement of school effectiveness through community participation. But the present study is based on a sample drawn from a limited geographical area and is confined to primary school only. It would be appreciable if similar research efforts are put in with a sample drawn from wider geographical areas and on other levels such as: upper primary and secondary level education. Results of the present study indicate the importance of community participation for school effectiveness at primary level of education, similar studies may be conducted for

variety of factors influencing school effectiveness such as: professional leadership, shared vision and goals, a learning environment at home and school, high expectations etc. Result of the present study also only confined to the overall and dimension wise participation of the community members on the school activities. Therefore, further study may be undertaken for each of the items/activities where the participation of the community members is higher as compared to the other items/activities. The present study is delimited to rural schools only. Similar efforts can be made to conduct studies in urban areas. Also a comparative study of rural and urban primary schools can be ventured

CONCLUSION

Thus, the above discussion reflects that school effectiveness has emerged as related to community participation in different shades. Although some tall claims on the basis of a humble research effort based on a mere adequate sample cannot be made, yet it can be said in all modesty that the study has implications for improving the school effectiveness at primary level of education in Haryana. The outcomes of this study are at least a small pointer in the direction of improving the state of primary education in the country, provided efforts are made in the right direction.

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FACTOR ANALYSIS OF TEACHER EFFICACY SCALES

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INTRODUCTION

Teacher efficacy is a motivational construct defined by Bandura (1994) as the teacher's belief in his/her capabilities to successfully bring about positive student outcomes. At the group level the concept is known as Collective Teacher Efficacy and signifies the belief of a group of teachers about their conjoint capability to successfully teach under a variety of constraints, viz. difficult students, stressful situations and unsupportive climate. Among the several psychometric scales that try to effectively capture both constructs, viz. individual Teacher Efficacy and Collective Efficacy, the measurement scales (TE and CE scales) devised by Schwarzer et.al (1999) were used in this study.

STATEMENT OF PROBLEM

This research aims to employ Factor Analysis to understand the factors that underlie Teacher Efficacy and Collective Efficacy of groups of teachers in government schools in a semi urban setting in south India.

OBJECTIVES

In this study, Factor analysis is applied on the TE and CE scales –

- Using Principal Components for the purpose of reducing the number of variables
- Using Principal Axis Factoring for detecting structure among the extracted factors

DESIGN, SAMPLE AND INSTRUMENTATION

The populace chosen for the study was all teachers teaching the tenth standard in 59 Government Higher Secondary Schools in the Tirunelveli District of Tamil Nadu. Using random sampling, 312 teachers were drawn as the final sample (two to ten teachers per school). The study used the teacher efficacy (TE) scale (ten items) and collective teacher efficacy (CE) scale (twelve items) devised by Schwarzer et. al and translated into Tamil. A 4-point response format was provided for both scales, viz. **not at all true, barely true, moderately true** and **exactly true**. Corresponding scores assigned in this research were 0 to 3.

ANALYSIS, METHODS AND PROCEDURES

Correlation matrices were calculated for the Teacher efficacy items and Collective efficacy items. Sufficient correlation existed between the items for proceeding with a Principal Components and Factor Analysis. The data were then subjected to the Kaiser-Meyer-Olkin Test and Bartlett's Test of Sphericity. The KMO measure of .838 for the TE items and .803 for the CE can be considered as adequate. The observed Chi-Square value for both scales in the Bartlett's test fell outside the range of the table value indicating that one could proceed for Factor Analysis.

Principal Components method

The Factor analysis technique was used and the principal components extracted for the TE and CE scales. The factors with eigenvalues above 1 (Kaiser Criterion) were extracted and submitted to the varimax rotation procedure. The results are presented in the Rotated

Component Matrix (**Fig 1 and Fig 2**). For the TE scale, item 3 and 6 correlated high with the first and second component. These two factors accounted for 22.95% and 19.0 % of the variance with factor loadings .738 and .816 respectively (**Fig. 3**). The alpha reliability coefficient (Cronbach's α) was .73.

Fig 1. Rotated Component Matrix –TE scale

	ITEM DESCRIPTION	COMPONENT	
		1	2
ITEM 1	I am convinced that I am able to successfully teach all relevant subject content to even the most difficult students.	.613	8.130E-02
ITEM 2	I know that I can maintain a positive relationship with parents even when tensions arise.	.142	.667
ITEM 3	When I try really hard, I am able to reach even the most difficult students	.738	-5.16E-02
ITEM 4	I am convinced that, as time goes by, I am able to reach even the most difficult students.	.407	.191
ITEM 5	Even if I get disrupted while teaching, I am confident that I can maintain my composure and continue to teach well.	.203	.728
ITEM 6	I am confident in my ability to be responsive to my students' needs even if I am having a bad day.	8.352E-02	.816
ITEM 7	If I try hard enough, I know that I can exert a positive influence on both the personal and academic development of my students.	.509	7.352E-02
ITEM 8	I am convinced that I can develop creative ways to cope with system constraints (such as budget cuts and other administrative problems) and continue to teach well.	.497	.295
ITEM 9	I know that I can motivate my students to participate in innovative projects.	.605	.196
ITEM 10	I know that I can carry out innovative projects even when I am opposed by skeptical colleagues.	.517	.286

For the CE scale, item 10, 11 and 12 correlated high with the first, second and third components. These three factors accounted for 25.35%, 18.408% and 17.626% of the variance

with factor loadings .723 and .830 and .799 respectively (**Fig. 4**). The alpha reliability coefficient (Cronbach's α) was .85.

Fig 2. Rotated Component Matrix – CE scale

	ITEM DESCRIPTION	COMPONENT		
		1	2	3
ITEM 1	As teachers of this school, we are able to reach even the most difficult students because we are all committed to the same educational goals	.661	.270	1.976E-02
ITEM 2	I believe in the potential of our school's faculty to establish innovative approaches to education even when faced with setbacks.	.361	.699	.118
ITEM 3	I am convinced that we, as teachers, can guarantee high instructional quality even when resources are limited or become scarce.	3.634E-03	.414	.801
ITEM 4	I am certain that we, as teachers, can achieve educational goals because we stick together and do not get demoralized by the day-to-day hassles of this profession.	.443	.266	.483
ITEM 5	Our team of teachers can come up with creative ways to improve the school environment, even without support from others.	8.074E-02	5.950E-02	.799
ITEM 6	We are definitely able to accomplish something positive at school since we are a competent team of teachers that grows every time we are challenged	.764	8.633E-02	.207
ITEM 7	As teachers, we can learn from our mistakes and setbacks in the classroom as long as we trust our shared competence.	.628	.250	.186
ITEM 8	Since we are a competent and experienced team of teachers, we can improve the instructional quality of our school in spite of system constraints.	.404	.675	.137
ITEM 9	I am confident that we as teachers can develop and carry out educational projects in a cooperative manner even when difficulties arise	.347	2.423E-02	.655
ITEM 10	We are able to lay out our educational goals in a convincing manner to even the most difficult parents because we present ourselves as a cohesive and competent team of teachers.	.723	9.197E-02	.141
ITEM 11	I am certain that we can create a positive school climate through our shared efforts, even if this causes a tremendous workload for us.	8.668E-02	.830	.173
ITEM 12	We can deal effectively with even the most critical events because we are able to draw upon the social network that exists within our faculty.	.694	.421	.116

Principal Axis Factoring Method

The TE and CE scale items were then subjected to Principal Axis Factoring for the purpose of structure detection. The Rotated

Factor Matrix for the TE scale revealed that the item 10 links the two extracted components (**Fig 3**)

Fig 3. Rotated Factor Matrix for TEscale

	ITEMDESCRIPTION	Factor	
		1	2
ITEM1	I am convinced that I am able to successfully teach all relevant subject content to even the most difficult students.	.492	.183
ITEM2	I know that I can maintain a positive relationship with parents even when tensions arise.	.254	.430
ITEM3	When I try really hard, I am able to reach even the most difficult students	.642	.110
ITEM4	I am convinced that, as time goes by, I am able to reach even the most difficult students.	.380	.212
ITEM5	Even if I get disrupted while teaching, I am confident that I can maintain my composure and continue to teach well.	.294	.566
ITEM6	I am confident in my ability to be responsive to my students' needs even if I am having a bad day.	.117	.795
ITEM7	If I try hard enough, I know that I can exert a positive influence on both the personal and academic development of my students.	.509	.162
ITEM8	I am convinced that I can develop creative ways to cope with system constraints (such as budget cuts and other administrative problems) and continue to teach well.	.411	.292
ITEM9	I know that I can motivate my students to participate in innovative projects.	.573	.210
ITEM10	I know that I can carry out innovative projects even when I am opposed by skeptical colleagues.	.443	.266

The Rotated Factor Matrix for the CE scale revealed that for each pair of the three

components extracted, items that bridge or link the pairs are item 4, 3 and 12 (**Fig 4**).

Fig 4. Rotated Factor Matrix for CE scale

	ITEM DESCRIPTION	Factor		
		1	2	3
ITEM 1	As teachers of this school, we are able to reach even the most difficult students because we are all committed to the same educational goals	.552	6.996E-02	.278
ITEM 2	I believe in the potential of our school's faculty to establish innovative approaches to education even when faced with setbacks.	.379	.150	.585
ITEM 3	I am convinced that we, as teachers, can guarantee high instructional quality even when resources are limited or become scarce.	1.162E-02	.920	.363
ITEM 4	I am certain that we, as teachers, can achieve educational goals because we stick together and do not get demoralized by the day-to-day hassles of this profession.	.440	.376	.268
ITEM 5	Our team of teachers can come up with creative ways to improve the school environment, even without support from others.	.164	.609	5.140E-02
ITEM 6	We are definitely able to accomplish something positive at school since we are a competent team of teachers that grows every time we are challenged	.696	.201	.121
ITEM 7	As teachers, we can learn from our mistakes and setbacks in the classroom as long as we trust our shared competence.	.561	.169	.259
ITEM 8	Since we are a competent and experienced team of teachers, we can improve the instructional quality of our school in spite of system constraints.	.412	.178	.570
ITEM 9	I am confident that we as teachers can develop and carry out educational projects in a cooperative manner even when difficulties arise	.342	.442	9.464E-02
ITEM 10	We are able to lay out our educational goals in a convincing manner to even the most difficult parents because we present ourselves as a cohesive and competent team of teachers.	.613	.132	.157
ITEM 11	I am certain that we can create a positive school climate through our shared efforts, even if this causes a tremendous workload for us.	.158	.186	.679
ITEM 12	We can deal effectively with even the most critical events because we are able to draw upon the social network that exists within our faculty.	.656	.131	.419

RESULTS

- The Factor Analysis of the individual Teacher Efficacy Scale (ten items) and Collective Teacher Efficacy Scale (twelve items) by Principal Components Method yielded two and three components respectively.
- The two items for Teacher Efficacy scale represented only 42% of the variance. Any attempt to use these components in lieu of the original variables would result in a 58% loss of information.
- The three components for Collective Efficacy scale represented 61% of the variance. Use of these components in lieu of the original twelve variables would signify an information loss of 39%.
- The Factor Analysis of by Principal Axis method yielded two and three components for the TE and CE scales respectively. Item 10 provided the link between the two components for the TE scale and three items, viz. 4, 3, 12 revealed the linkages between the three components for the CE scale.

CONCLUSION AND DISCUSSION

Principal Components Method in Factor Analysis reduced the number of variables of the TE Scale from ten to two. The two components explain 42% of the total variance. The factors were named

- ❖ Individual Potential Factor
- ❖ Individual Resilience Factor

The first factor corresponded to the teachers' belief in their ability to strive hard and teach students even if the students were uncooperative. The second factor indicates the teachers' resilience to continue to teach even under difficult circumstances such as physical and mental exhaustion, problems with parents

or the administration, etc. Similar analysis reduced the number of variables of the CE Scale from twelve to three. The three components could explain 61% of the variance. The factors named subsequently, viz.

- ❖ Group Cohesiveness Factor
- ❖ Group Creativity Factor
- ❖ Group Resilience Factor

The first factor corresponded to the ability of teachers to present themselves as a cohesive team having well defined goals and sufficient competence to achieve those goals. The second factor extracted represented the teachers' belief to innovate in an unsupportive environment. The third factor corresponded to the ability of teachers to continue to teach even under trying and difficult circumstances.

It can be stated that the Teacher Efficacy Scale and Collective Efficacy Scale administered to teachers teaching tenth standard students in Government Higher Secondary Schools in Tirunelveli District measured the degree of the teachers' belief

- in their individual potential and resilience
- in the cohesiveness, goal setting and the innovative capability of their corresponding teacher groups

Principal Axis Factoring of the TE scale revealed that the teachers who believed in their individual potential and resilience were more likely to believe that they could be innovative despite peer disapproval. Similar analysis of the CE scale revealed that groups of teachers who believed in their group cohesiveness and creativity were more likely to believe that they could guarantee high teaching standards despite resource constraints. Similarly, teachers who believed in their group cohesiveness, resilience and goal setting were more likely to believe that they could depend upon the social network

of the group to help them overcome difficult situations. Teachers who believed in their group resilience and innovative capability were more likely to believe in the certainty of achieving their teaching goals.

RECOMMENDATIONS AND SUGGESTIONS

Factor analysis provides by way of data reduction, fewer variables for use in further analysis, and by indicating the structural relationships an easy way to interpret the measurement by the scales. A component score matrix can be computed by multiplying each case's original variable values by the component's score coefficients to provide a component score for each case and each component. The resulting component score variables can be used in the place of the original variables with a loss of information equal to the remaining variance since these components are representative of all original variables, and the components are not linearly correlated with each other. It must be noted that the loss of information would tantamount to 58% for TE and 39% for CE.

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PROBLEMS AND PROSPECTS OF EDUCATION FOR THE MENTALLY HANDICAPPED IN THE NORTH EAST

Azibur Rahman

INTRODUCTION-

Mental handicap is a condition which may occur to any individual during the developmental period especially before the age of 18 years. In the classification of exceptional children, mentally handicap person belongs to the lower end of the scale of intelligence and scholastic aptitude quite opposite and contrary to the gifted children who lies at the high end of this scale. Mentally handicapped person can not contribute equally for the development of society as is done by normal individual rather they need social support for their survival. It is a fact that the societal attitude has been unfavourable towards mentally handicapped persons and their families and as a result they are ignored and discriminated. Consequently they are deprived of education, human rights and social justice. In India nearly 60-70% of the major towns do not have any facilities of education for mentally handicapped. Among the existing institutions, majority of them are located in big cities and in bigger towns. The inadequacy of services is clear as the current services do not cover even 1% of the mentally handicapped persons. There is another service lacuna observed in the disabilities act 1995 (Act 1 of 1996) which is silent towards education and rehabilitation of mentally handicapped. In this act there is no provision of employment and reservation scheme for mentally handicapped persons. It is also stated in the National Policy on Mental Handicap (1988) that there are little more than 200 institutions in India with a facility of or care of about 10,000 mentally retarded individuals out of 16 million mentally retarded

in India. The policy also stated that special school facilities are unevenly distributed and large part of the country does not have any special schools. There is shortage of manpower for the services of mentally handicapped. The professionals who are working with mental health field has been giving services for the care of mentally handicapped. At present there are about 100 departments of psychiatry, 400 clinical psychologist, 400 psychiatric social workers, 500 psychiatric nurses and 1500 psychiatrist in India. It can be noted that mental retardation is not the chosen area among the above professionals and often from part child mental health care

Significance of the Study

In the North East States there are about 14 special schools for mentally handicapped and some of the institute have the provision of education for multiple disabilities. There is no single study conducted on mental retardation with the complete coverage of the region. It is the right time to intensify our efforts to the services of mentally handicapped. It is a social obligation to foster the growth of philanthropic institutions for education and rehabilitative services to lead useful and meaningful life. Modern science and technology including modern drugs can bring a revolution for the care and treatment of mental ailment including mental retardation. In democratic and secular state everybody expects the opportunity to grow and learn according to their capabilities. Mentally handicapped person should also get the same rights to enjoy and equip them for

survival and to maintain a normal life. But there are many hurdles in the way of their development which has to be overcome and these crucial issues related to the welfare of mentally handicapped need to be dealt in a caring and sympathetic way. The present study undoubtedly would have practical bearing for the retarded persons and their families. It may also help teachers, educational administrations and social workers who are involved for the sake of education and welfare of the mentally handicapped persons.

OBJECTIVES OF THE STUDY:

To know the educational problems of mentally handicapped who are enrolled in special schools of the North East.

To know the educational programmes in special schools

To study the future prospects need to be developed in the North East for the development of mentally handicapped persons.

PROCEDURE

The study followed the sample survey to investigate the educational problems and existing facilities related to mentally handicapped children of the North East. The major problems of the study were the quantitative and qualitative and structural and functional aspect of academic, vocational infrastructure facilities of the schools.

Sample

The study covers 9 special schools from 5 states of the North East. The researcher also selected 9 principals and 20 special teachers within the institutions. The purposive sampling method was chosen for data collection.

Delimitation

The study was delimited to nine special schools of the 5 states in the north east namely Meghalaya, Manipur, Mizoram, Assam and Tripura.

Tools

Self development questionnaire and interview schedule were used to translate the objectives into a reality. The questionnaire consist close and open ended questions. The concern of the questionnaire was curriculum, teaching learning methods, teaching staff infrastructure facilities, information about admission, and financial conditions. In addition to that guidance and counselling, medical service and Co-Curricular activities were also covered.

Statistical Treatment

Collected data were analyzed, edited and processed into tabular forms wherever necessary. Finally data were revealed in terms of percentages and ratios.

RESULTS

Educational Problems: The study conducted in the special schools of the northeast for mentally handicapped revealed that out of nine special schools seven had no residential facilities. It means that 78% of the institute were lacking residential facilities for students. 33% of the institute had no permanent site and building of their own, 11% institute had no sanitation facility and water supply, 66.64% schools had no student's common room and library facility. There was no major wastage in the education process but stagnation was found major problems in special schools. Stagnation was found among 87.50% students. Some institute suffers badly financially and as a result

22% of the schools of the northeast could not get salary regularly. The teachers of these schools used to get salary after a gap of 4 - 5 months. Some state government are indifferent to help the mentally handicapped. It was indicated that 67% special schools had no grants from respective state govt. 22% of the schools were deprived of central govt. assistance and from voluntary organization. Local self government have a major responsibility for the promotion of Education of mentally handicapped. It was found that role of local self government i.e. Panchayat, town committee / municipality was not so encouraging as a result 44% institute did not get assistance from them; the same no. of institution had no playground and parent teacher association. The study also indicated that 100% of the schools had no playground and parent teacher association. The study also indicated that 100% of the schools had no permanent health centre. Part time medical services are given to 67% institutes.

Educational Programmes and Existing Facilities:

The number of seats available in institutes of Northeast was 696. The institute individual figures of students were as Sahayika 60, Shishu Sarothi 70, Mon Vikash Kendra 110, B.B Paul mental development home 75, Chumkhum Ibohal Institute 100, Dwarjinkyrmen 50, Marry Rice Centre 60, Swabalamban 56, and Gilead Special School 115. The student's total enrolment was 575. The male student's strength was 338 and the female number was 237. Male students composed 58.78% and female students 41.22%. This means that male students number surpass the female number. The total number of mentally handicapped

enrolled in special schools of Assam are 216, Manipur 146, Meghalaya 107, Tripura 56, and in Mizoram 50. The highest number of mentally retarded children enrolled in Assam (216) and the lowest in Mizoram (50).

Enrolment of Students Based on Sex

There are 83 special teachers discharging in special schools for mentally handicapped in the Northeast. Some of the teachers working in special schools found untrained and not well qualified. But most of them were well qualified and trained by professional institutions. It was observed that the number of male teachers was 20 and female teachers were 63. There were 24% male teachers against 76% female teachers. It clearly indicates that out number of women teachers are providing dedicated services for the cause of mentally retarded persons. The number of teachers involved in special education in the north east can be stated as in Assam 31, Manipur 25, Meghalaya 14, Tripura 6 and Mizoram 7. The highest number of teachers' enrolment was found in Assam and the lowest in Tripura.

Enrolment of Teacher

The teacher student ratios also assessed in the special schools which indicate that the teachers student ratio in Sahayika was 1:9, Shishu Sarothi 1:5, Mon Vikash Kendra 1:7, B.B Paul Mental Development Home 1:6, Chumkhum Ibohol Institute 1:5, Dwarjinkyrmen 1:7, Marry Rice Centre 1:8, Swabalamban 1:9 and Gilead special school 1:7. According to National Policy on Mental Handicapped (1988) the optimum teacher student ratio should be 1:6 in the special schools for mentally handicapped persons. From this point of view it can be stated that out of 9 special schools covered under this study,

only 3 institutes have the ideal teacher-student ratio which composed 30% institute. The institute which fulfilled the ratio was Shishu Sarothi, B.B. Paul Mental Development Home and Chumkhum Ibohol Institute. Institution wise teacher student ratio are shown in the following table.

Institution wise Teacher Student Ratio

State wise analysis of data indicates that in average 1 teacher appointed against 7 students, in Manipur 1 teacher against 6 students, in Meghalaya the ratio was 1:8, in Tripura 1:9 and in Mizoram there are 7 students against 1 teacher. The teacher student ratio is also found 1:7. The admission of retarded children begins from 3 to 6 years in nursery or pre-primary class and for higher classes even from 16 to 25 years old students are also admitted. Here it refers to chronological age. It can be noted that the mental age of M.R children is always less than the chronological age. In this study 10 students mental age and chronological in terms of I.Q was found from the standardised medical test data which indicated that 30% M.R children comes between 59-71 I.Q, 50 student comes between 29-46 I.Q and 20% students come below I.Q 17. It means educable mentally handicapped were 30%, trainable were 50% and 20% custodial. The mental age and chronological age of 10 students in terms of I.Q is shown against the categories of mentally handicapped persons in the following table.

Age, I.Q and types of M.R students

It was found that special schools of mentally handicapped used both normal school curriculum and special curriculum simultaneously. The normal curriculum is

modified and adopted according to the local needs and the need of the students. The special curriculum is prepared by National Institute for mentally handicapped (Secunderabad), Madras Developmental Programme Scheme (MDPS) is also followed by some special schools. Normally the curriculum is academic and vocational. The pre primary academic groups are trained in pre-writing, pre-reading knowledge and self skills. Self-help skills are related to dressing, undressing, eating, drinking, toilet training and bathing etc. Pre primary vocational groups involves in paper cutting, paper folding-unfolding, paper pasting, threading the beans and needles. Similarly primary class consist of primary academic and primary vocational group. For primary academic group the emphasis is given for sense-perception and conception. Students are trained in terms of time conception, conception of money, number, name and colour. Primary vocational class consist of handloom training, knitting, making file exercise book and envelop. They also involved in the activities like cleaning, washing, burning candle, preparing tea, cleaning and washing etc. secondary academic group gets education on 3Rs and concept formation. The secondary vocation group followed the tailoring programme and rest of the things are similar to primary vocational class. The teaching learning methods widely used in special schools of the north east were music and songs, reward and punishment, individualized instruction, learning by doing and also the group teaching to make the retarded persons socialized. Devotional and group patriotic songs were practiced in schools. It was found that reward and mild nature of punishment have significant influence on mentally handicapped children especially in discipline, punctuality and behaviour

modification. The nature of punishment usually used were withdrawing, ignoring, discouraging, shedding and slapping. Sometimes MR students are also punished by climbing the steps and up and down by picking their ears. Cent percent of the schools practised these methods. In the north east there was only one teachers training institute named north eastern teachers training institute located at the same campus of Mon Vikash Kendra, Dakshingaon (Kahilipara, Guwahati). Trainees from all over the North east come for training on education and rehabilitation of mentally handicapped.

FUTURE PROSPECT OF WELFARE

There are a lot of problems of mentally handicapped students in the north - east. It may be finance and infrastructure, man power or supportive services, role of govt. and non governmental organization, organization or management of the institution and resource mobilization, supply of special equipment academic and vocational programmes for M.R children.

- 1) Finance is the root cause of any problem related to the development of mentally handicapped person. Where from or by whom money will be allocated to develop the scheme of education.
 - i) Central government has the Ministry of social Welfare to finance or take care of services for handicapped persons. The institution can approach for financial support from it.
 - ii) State government also have the department of social welfare to support such institution financially.
 - iii) Local self government -Municipal / town committee or Panchayat need to help the institution or can build such

institution.

- iv) Voluntary organizations or associations, lions club, rotary club, OXFAM, Hindusthan petroleum and other local, state, regional and international organization can help
- iv) There should be a north east trust which should be established by central and state government.
- v) There should be cooperation and share in financial matters between the centre and the north eastern states. The major voluntary organization need to participate in this process of resource mobilization and implementation of the developmental schemes. This trust may take all steps for mobilization of resources.
- 2) The centre and state should take joint responsibilities as the state governments alone can not do it. Each school should have well equipped school building with residential facilities, sanitation, water supply, playground, health centre, classroom, students common room and also need to have permanent site of building,. It can be stated that no single institute of the North east have permanent health centre.
- 3) Professional teachers training should be compulsory requirements for a teacher to get appointment and placement in special schools. The service condition of the schools should be improved and for outstanding service teachers should be awarded annually. Man power development is a crucial need and hence more teachers training institute should be established in the region. It is suggested to establish at least one training institute in each state to fulfil the requirement of

education of mentally handicapped children.

- 4) Implementation of any welfare scheme/ programme either it is education or rehabilitation is not possible without the involvement of parents of mentally handicapped. Proper coordination and cooperation between school and parents of mentally handicapped is necessary for the development of services for them. Parent-teacher association may be helpful to fulfil this need. The school management may ensure this in all the special schools of the northeast.
- 5) Mentally handicapped persons are dependent on parents for support and maintenance. Parents can be supported by the government in all ways providing them the social security, tax benefits in the areas of income tax, donation, gift tax, import and custom duty and sale tax. This is significant in view of the financial burden of the family. Other steps like tax exemption can also be given to the person who donates to any recognized institutions engaged for education and training of mentally handicapped person. Levy of import and customs duty may be waived on goods and equipments imported by recognized institute

for the education of mentally handicapped persons.

- 6) Maintenance allowances should be provided by the state to all the families whose income is very low per annum. In the north eastern states travel concession should be made available on production of identity card issued by the competent authority. Mentally retarded persons who have also physical problem equipment should be supplied freely by the government in support of transportation.

CONCLUSION

Mental Handicap is such an important field of disability which need to have immediate attention from the society for the upliftment of education and rehabilitation in northeast state. This study revealed that the educational institutions existing in the northeast suffering from multi dimensional problems which requires holistic and practical approach with sincerity and dedication. These problems can not be solved by the government alone or by the voluntary organisations. The crucial problems faced by the institutions can be resolved by joined effort of government, NGO, and parent's participation is a must to make this programme success.

A Few Web Sites on Learning

<http://www.city.londonmet.ac.uk/deliberations/eff.learning/index.html>

Flexible Learning

<http://www.city.londonmet.ac.uk/deliberations/flex.learning/index.html>

Problem Based Learning

<http://www.city.londonmet.ac.uk/deliberations/pbl/index.html>

Resource based Learning

<http://www.city.londonmet.ac.uk/deliberations/rbl/index.html>

C&IT in Education

http://www.city.londonmet.ac.uk/deliberations/inf_tech/index.html

INTEGRATING DIGITAL TECHNOLOGY INTO CONSTRUCTIVIST LEARNING ENVIRONMENT

H. K. Senapaty

INTRODUCTION

In recent years we have seen the birth of Information Age. The Information Age has largely been made possible by the advent of digital technology, and it has resulted in an explosion in number of sources of information and images, which are available to us. But teaching, and the world of education more generally, have not taken the advantage of these changes. We have largely failed to capitalize on the potential of the new technologies, and particularly digital technology as a teaching tool. Our education system must respond to the transformations that are being brought by technology and by digital technology in particular. Such technology has the ability to revolutionize the way our children and we learn and also can revolutionize the whole teaching learning system. As society moved from the Industrial Age to the Information Age, the technology was applied to teaching. Visual presentation moved from the chalk-board to transparency projectors, media moved from filmstrip to video and access to internet enhanced communication worldwide. But it is important to keep in mind that this technology is merely a learning medium. It can ever be a bridge, never a destination. Computers may help the students learn but it cannot make the students learn. It is the imagination and creativity of the professionals within education and the digital world that will determine the pace and the quality of change. In this new age of digital technology the creativity and the imagination of teachers will remain as critical as they have always been. If learning is the

heart of new digital world then teacher its lifeblood. In fact teacher not technology is the key to the future. Without good teachers we have no future. A good teacher needs to have the ability to inspire and arouse curiosity and need to be a coach, colleague and friend. It is feasible only in a constructivist-learning environment. Constructivism implies that effective learning does not occur when students read a chapter, listen to a lecture, take notes and prove their knowledge in a testing situation. Real learning occurs when student investigate a concept, find information, discuss it and create something with it. The integration of technology facilitates this investigation, discussion and creation; it allows the teacher to be the guide. Students become empowered and spend more time in active construction of knowledge when using technology. Technology provides more resources for student use in problem solving, thinking and reflection. Students spend more time collaborating with other students and communicating with teachers.

WHAT IS CONSTRUCTIVISM?

Constructivism is basically a theory — based on observation and scientific study — about how people learn. It says that people construct their own understanding and knowledge of the world, through experiencing things and reflecting on those experiences. In the classroom, the constructivist view of learning can point towards a number of different teaching practices. In the most general sense, it usually means encouraging students to use active techniques

to create more knowledge and then to reflect on and talk about what they are doing and how their understanding is changing. Constructivism does not dismiss the active role of the teacher or the value of expert knowledge. Constructivism modifies that role, so that teachers help students to construct knowledge rather than to reproduce a series of facts. The constructivist teacher provides tools such as problem-solving and inquiry-based learning activities with which students formulate and test their ideas, draw conclusions and inferences, and pool and convey their knowledge in a collaborative learning environment. Constructivism transforms the student from a passive recipient of information to an active participant in the learning process. Always guided by the teacher, students construct their knowledge actively rather than just mechanically acquiring knowledge from the teacher or the textbook. Students become engaged by applying their existing knowledge and real-world experience, learning to hypothesize, testing their theories, and ultimately drawing conclusions from their findings.

OUR PAST EXPERIENCES ABOUT LEARNING

Mayer (1992) has shown how three views of learning have emerged during the past 100 years of research on learning (i) learning as response strengthening (ii) learning as knowledge acquisition (iii) learning as knowledge construction.

According to the first view, learning occurs when learner strengthens or weakens an association between a stimulus and a response. This first view i.e. **learning as response strengthening** developed in the first half of

20th century and was based largely on the study of animal learning in artificial laboratory settings. The role of learner is to passively receive rewards and punishments, whereas the role of instructor is to administer rewards and punishments, such as drill-and-practice. The instructional designer role is to create environments where the learner repeatedly is cued to give a simple response, which is immediately followed by a feedback.

The second view, **learning as knowledge acquisition** is based on the idea that learning occurs when a learner places new information in long-term memory. This view developed in 1950s, 1960s and 1970s and was based largely on the study of human learning in artificial laboratory settings. The role of the learner is to passively acquire information, and the teacher's job is to present information, such as in textbooks and lectures. According to this view, information is a commodity that can be transmitted directly from teacher to learner. The instructional designer's role is to create environments in which the learner is exposed to large amount of information through textbooks, lectures and computer based multimedia programmes.

The third view, **learning as knowledge construction**, is based on the idea that learning occurs when a learner actively constructs a knowledge representation in working memory. This view emerged in 1980s and 1990s and was based on largely on the study of human learning in increasingly realistic settings. According to this view, the learner is a sense maker, whereas the teacher is a cognitive guide who provides guidance and modelling on authentic academic tasks. The instructional designer's role is to

create environments in which the learner interacts meaningfully with academic material, including fostering the learner's processes of selecting organizing and integrating information.

HOW CONSTRUCTIVISM IS DIFFERENT FROM TRADITIONAL IDEAS ABOUT TEACHING AND LEARNING?

The classroom is no longer a place where the teacher pours knowledge into passive students, who wait like empty vessels to be filled in. In the constructivist model, the students are urged to be actively involved in their own process of learning. The teacher functions more as a facilitator who coaches, mediates, prompts, and helps students develop and assess their understanding, and thereby their learning. The table below compares the traditional classroom to the constructivist one.

WHAT THE CONSTRUCTIVIST TEACHER HAS TO DO IN HIS CLASSROOM?

Constructivism teacher has to use many techniques in the teaching process. For example, he may:

- prompt students to formulate their own questions (inquiry)
- allow multiple interpretations and expressions of learning (multiple intelligences)
- encourage group work and the use of peers as resources (collaborative learning)

Its primary goal is helping students learn *how to learn*.

In a constructivist classroom, learning is Constructive: Students are not blank slates.

They come to learning situations with already formulated knowledge, ideas, and understandings. This previous knowledge is the raw material for the new knowledge they will create.

Active: The student is the person who creates new understanding for him/herself. The teacher coach, moderates, suggests, but allows the students to experiment, ask questions, try things that don't work. Learning activities require the students' full participation (like hands-on

Traditional Classroom	Constructivist classroom
Curriculum begins with the parts of the whole. Emphasizes basic skills	Curriculum emphasizes big concepts, beginning with the whole and expanding to include the parts
Strict adherence to fixed curriculum is highly valued	Pursuit of student questions and interests is valued
Materials are primarily textbooks and workbooks	Materials include primary sources of material and manipulative materials
Learning is based on repetition.	Learning is interactive, building on what the student already knows
Teacher's role is directive, rooted in authority	Teacher's role is interactive, rooted in negotiation
Assessment is through testing, correct answers	Assessment includes student works, observations, and points of view, as well as tests. Process is as important as product.
Knowledge is seen as inert	Knowledge is seen as dynamic, ever changing with our experiences
Students work primarily alone	Students work primarily in groups

experiments). An important part of the learning process is that students reflect on, and talk about, their activities. Students also help set their own goals and means of assessment.

Reflective: Students control their own learning process, and they lead the way by reflecting on their experiences. This process makes them experts of their own learning. The teacher helps create situations where the students feel safe questioning and reflecting on their own processes, either privately or in group discussions. The teacher should also create activities that lead the student to reflect on his or her prior knowledge and experiences. Talking about what was learned and how it was learned is really important.

Collaborative: The constructivist classroom relies heavily on collaboration among students. The main reason it is used so much in constructivism is that students learn about learning not only from themselves, but also from their peers. When students review and reflect on their learning processes together, they can pick up strategies and methods from one another.

Inquiry based: The main activity in a constructivist classroom is solving problems. Students use inquiry methods to ask questions, investigate a topic, and use a variety of resources to find solutions and answers. As students explore the topic, they draw conclusions, and, as exploration continues, they revisit those conclusions. Exploration of questions leads to more questions.

Evolving: Students have ideas that they may later see were invalid, incorrect, or insufficient

to explain new experiences. These ideas are temporary steps in the integration of knowledge. For instance, a child may believe that all trees lose their leaves in the fall, until he/she visits an evergreen forest. Constructivist teaching takes into account students' current conceptions and builds from there.

HISTORY OF CONSTRUCTIVISM

The concept of constructivism has roots in classical antiquity, going back to Socrates's dialogues with his followers, in which he asked directed questions that led his students to realize for themselves the weaknesses in their thinking. The Socratic dialogue is still an important tool in the way constructivist educators assess their students' learning and plan new learning experiences. Jean Piaget and John Dewey developed theories of childhood development and education, what we now call Progressive Education that led to the evolution of constructivism. Piaget believed that humans learn through the construction of one logical structure after another. He also concluded that the logic of children and their modes of thinking are initially entirely different from those of adults. The implications of this theory and how he applied them have shaped the foundation for constructivist education. Dewey called for education to be grounded in real experience. Inquiry is a key part of constructivist learning. Among the educators, philosophers, psychologists, and sociologists who have added new perspectives to constructivist learning theory and practice are Lev Vygotsky, Jerome Bruner, and David Ausubel. Vygotsky introduced the social aspect of learning into constructivism. He defined the "zone of proximal learning," according to which students solve problems beyond their actual

developmental level (but within their level of potential development) under adult guidance or in collaboration with more capable peers. Bruner initiated curriculum change based on the notion that learning is an active, social process in which students construct new ideas or concepts based on their current knowledge. Ausubel introduced the concept of meaningful learning, which constitutes an important part of constructivist learning. Seymour Papert's groundbreaking work in using computers to teach children has led to the widespread use of computer and information technology in constructivist environments. Modern educators who have studied, written about, and practiced constructivist approaches to education include John D. Bransford, Ernst von Glasersfeld, Eleanor Duckworth, George Forman, Roger Schank, Jacqueline Grennon Brooks, and Martin G. Brooks.

SOME CRITICAL PERSPECTIVES OF CONSTRUCTIVISM

Constructivism has been criticized on various grounds. Some of the charges that critics level against it are: It's elitist. Critics say that constructivism and other "progressive" educational theories have been most successful with children from privileged backgrounds who are fortunate in having outstanding teachers, committed parents, and rich home environments. They argue that disadvantaged children, lacking such resources, benefit more from more explicit instruction. Social constructivism leads to collaboration. Critics say the collaborative aspects of constructivist classrooms tend to produce a "tyranny of the majority," in which a few students' voices or interpretations dominate the group's conclusions, and dissenting students are forced

to conform to the emerging consensus. There is little hard evidence that constructivist methods work. Critics say that constructivists, by rejecting evaluation through testing and other external criteria, have made themselves unaccountable for their students' progress.

BENEFITS OF CONSTRUCTIVISM

- Children learn more, and enjoy learning more when they are actively involved, rather than passive listeners.
- Education works best when it concentrates on thinking and understanding, rather than on rote memorization. Constructivism concentrates on learning how to think and understand.
- Constructivist learning is transferable. In constructivist classrooms, students create organizing principles that they can take with them to other learning settings.
- Constructivism gives students ownership of what they learn, since learning is based on students' questions and explorations. Engaging the creative instincts develops students' abilities to express knowledge through a variety of ways. The students are also more likely to retain and transfer the new knowledge to real life.
- By grounding learning activities in an authentic, real-world context, constructivism stimulates and engages students. Students in constructivist classrooms learn to question things and to apply their natural curiosity to the world.
- Constructivism promotes social and communication skills by creating a classroom environment that emphasizes collaboration and exchange of ideas. Students must learn how to articulate their ideas clearly as well as to collaborate on tasks effectively by

sharing in group projects. Students, therefore, exchange ideas and so learn to negotiate with others and to evaluate their contributions in a socially acceptable manner. This is essential to success in the real world, since they will always be exposed to a variety of experiences in which they will have to cooperate and navigate among the ideas of others.

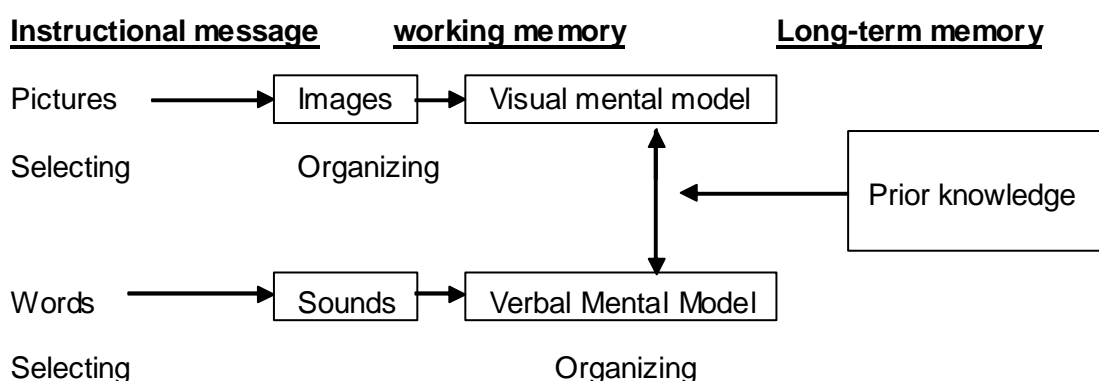
MODEL TO HIGHLIGHT THE THREE CRUCIAL PROCESSES IN CONSTRUCTIVIST LEARNING

Constructivist learning depends on the activation of several cognitive processes in the learner during learning, including selecting relevant information, organizing incoming information, and integrating incoming information with existing knowledge. This is called as the **SOI model** to highlight three crucial cognitive process in constructivist learning: S for selecting, O for organizing, and I for integrating (Mayer, 1996). Constructivist theory focuses that knowledge is constructed by the learner in working memory. In this construction process the learner used both incoming material from the environment and

prior knowledge from long-term memory. The SOI model is a theory of learning that can be used to generate instructional implications. prior knowledge from long-term memory. The SOI model is a theory of learning that can be used to generate instructional implications.

Selecting relevant information: The first process is the selection of relevant information for further processing. When words and pictures are presented to learn in an instructional message, the learner represents them briefly in sensory memories, because of the limited capacity of the human information-processing system. Only some of these representations can be retained for further processing in working memory. *Organizing incoming information:* The next process involves organizing the selected auditory representation into a coherent verbal representation and organizing the selected images into a coherent pictorial representation. In this process the retained visual images are connected by appropriate links (such as cause and effect) and retained verbal representations are connected by appropriate links (such as cause and effect). This activity takes place in

SOI model



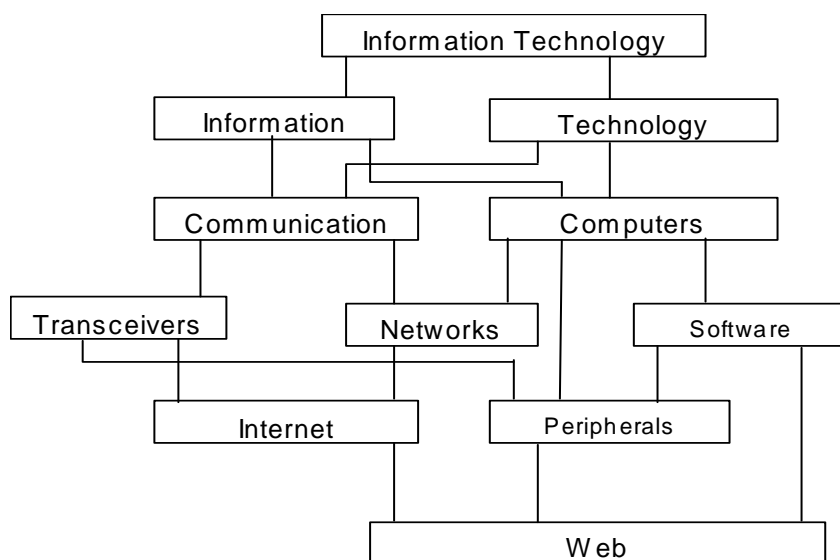
working memory. The outcome of this process is the construction of a coherent pictorial representation and a coherent verbal representation. *Integrating incoming information:* In the third process, students make one-to-one connections between corresponding elements of the pictorial and verbal representations they have constructed using prior knowledge. A final step in learning process is encoding, in which the mental representations constructed in working memory are stored in long-term memory for permanent retention.

INTERNET TECHNOLOGY AND CONSTRUCTIVIST LEARNING

Internet technology has made a substantial contribution to education. The emphasis now continues to shift from Computer Based Learning (CBL) and its related methods such as Computer Assisted Instruction (CAI) to Internet Based Learning. There appear to be two main options. One is a form of distance learning in which a teacher places course-

materials on a web server, which can be accessed by remote students. This approach follows a prescriptive pattern. It allows all the teaching materials to be validated at source and integrated into the course. However, it may be an expensive way to provide enough software to meet the demands of complete syllabus. The alternative is a type of independent study in which learners search the internet for material that are relevant to their interests. This is a more constructive process that can provide access to a media range of course-ware and multiple views of a subject area but the suitability of the material for a taught course cannot be guaranteed.

These two modes can be combined to form a more general approach that may be described as Internet Based Learning (IBL). It includes any process in which a learner is provided with access to course-materials stored in the Internet. It requires a model of teaching that combines the advantages of both prescriptive and constructive learning by selecting appropriate materials and admitting a wide



range of views of a subject. It should facilitate a learning style that has been described as **guided discovery**. This new approach allows the learners to have more control over their own learning to think analytically and critically, and to work collaboratively. This constructivist approach is an effort at educational reform made easier by technology. In this process the learner has access to global rather than local software and maintains a direct link to the teacher. This interactivity may take the form of a direct e-mail link, electronic conferencing or an automated connection to a server programme. Internet information is usually accessed through the hypertext protocols of World Wide Web. Some authors are of the opinion that an unstructured presentation is more conducive to learning by forcing the learner to construct a personal knowledge map. Other prefers to offer more direction in the form of a navigable interface that relates to the structure of the subject. Both views have their merits, but for an open learning system such as the Internet a structured interface appears to be more appropriate. The most widely used information structure is that of object oriented hierarchy, this model is popular because it appears to reflect the way people assimilate and process information. Books have such structures with object forming a hierarchy of chapter, section and smaller components and a user interface in the form of a content page. More appropriately, computer filing system and user interface such as that of Microsoft windows have object-oriented structures. From the point of view of constructivist theory the wide use of concept maps and schemes supports the view that personal knowledge is either object oriented or can be related to information having such a structure. Object

oriented model have been developed for a number of course. These are delivered on an internal network and the Internet. The structure adopted for the course on information technology is illustrated in figure given below. This is derived from a simple list representing the content of a book. It can be regarded as concept map that might be drawn by the course designing in which the objects correspond to the nodes and the link describe the relationships between them. It is described how as a study map. It represents the same view of the subject area as the book treatment but the some additional fitness in the form of navigational information indicating the sequence in which the objects may be studied. This is necessary to complete the hierarchical logic. Other peripheral objects can be added to show the entire course linked to entire knowledge.

In developing the hierarchy, it is inferred that an object at one level should be logical component of another at the level immediately above. This principle of composition is easily satisfied at the higher levels but break down at the lower ones. However, it generates a paradoxical relationship in which one object is seen as a component of another, which is a component of a first one. Each object is recognized as a complete treatment of its associated topic rather than a component of a more abstract one. The links between the adjacent objects describe a more subtle relationship than simple composition. In object oriented theory they can be related to a hierarchical model based on composition and another property known as inheritance.

CONCLUSION

In the present context, it is sufficient to accept

the empirical conclusion that the objects are complete treatments of the topics and the links define two-way relationship between adjacent topics in which each can be viewed as a component of other. The result may be described as constructivist information system. Any object can be expanded in this way. This is firmly in line with the constructivist principle and it is a format that is readily available on the Internet. The constructivist revolution offers a new vision of the learner as an active sense-maker and suggests new methods of instruction. It facilitates presentation of materials in a constructivist way and engage students in an active explorative learning. This new approach allows the learners to have more control over their own learning to think analytically and critically, and to work collaboratively. This constructivist approach is an effort at educational reform made easier by technology. In this process the learner has access to global rather than local software and maintains a direct link to the teacher. This interactivity may take the form of a direct e-mail link, electronic conferencing or an automated connection to a server programme. This is a revolutionary vision of education.

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NOTICE FOR GENERAL BODY MEETING

From:

General Secretary

To

All Members of the General Body

Sub: Notice for General Body Meeting

Dear Sir/Madam,

A meeting of the General Body of the AIAER shall be held on 27.1.05 at 5 P.M. at Tirunelveli at the venue of the 18th Annual Conference to carry out following activities. You are requested to attend the said meeting and participate in the deliberations.

Confirmation of the Minutes of last General Body Meeting held at Rajkot on 11.1.04

Consideration of the Audit Report for the financial year 2003-04

Elections for the following posts:

General Secretary – 1 for a period of 3 years

Members - 10 for a period of one year

Any other matter

Thanking you,

Yours sincerely,

S.B.Mohanty

General Secretary

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Manuscripts are to be typed on one side of the paper double spaced with ample spaces. For anonymity in the reviewing process, paper title, name(s) of the author(s) and address for correspondence should be placed on a separate sheet. Each manuscript must accompany the undertaking of the author(s) that the said manuscript has neither been sent to any other journal or to any other publisher. Two copies of the manuscript are to be sent to the Editor at the following address:

Dr Sunil Behari Mohanty, C/o Sri Aurobindo Ashram P.O., Pondicherry - 605 002 E-mail: aiaer@rediffmail.com.

If the manuscript has been prepared on a word processor, a copy of the floppy and programme specifications would be helpful. Rich text format shall be of much help. An abstract of 150 words should accompany each manuscript. A manuscript should not normally exceed 6,000 words. The reference style should be as follows:

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Chapter in Books: Passi, B. K. (1997) Non-formal innovative strategies for basic and primary education in India. In Lynch, J., Modgil, C. and Modgil, S. (Eds.) *Education and Development: Tradition and Innovation, Vol.3, Innovations in Developing Primary Education*, 45-66. Cassell, London.

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ASSOCIATION NEWS

Fourth Wave Education

'Responsivism'

A Report of AIAER International Conference

Dr.B.K.Passi

Fourth Wave Education: Responsivism

- L An International Conference having the theme '**Fourth Wave Education': Responsivism** was held at the Saurashtra University India in 2004. The conference was named as the 17th AIAER International Conference of All India Association for Educational Research.
- 1 As many as 452 participants from a few countries attended this conference. As many as 223 participants presented their academic papers covering 4 sub-themes of the conference. The four themes were: (i) approaches: constructivism, cognitivism, behaviorism; (ii) methodology: mass action research by school teachers (MARS); (iii) system: using local wisdom curriculum; and (iv) management of future scenarios of pro-schooling, re-schooling, and de-schooling.
3. The conference was organized in three phases: (i) pre-conference workshops, (ii) main-conference, and (iii) post-conference reflections. During the first phase of pre-conference, two workshops were organized so as to create readiness and to give a flexible environment for unscheduled participants to represent their views related to issues and aspects of education. Apart from the inauguration and valedictory sessions, the second phase of the conference included plenary and memorial lectures, parallel presentations of **223 research papers**. The third phase of the conference was devoted to reflections and resolutions.

Phase I: Pre Conference Workshop

- 4 .As a warm up, the pre-conference workshops were arranged on the theme of Musing Miming & the Present Time. Musing Miming organized for exploring student- relationship through miming.

The activity related to the elements of citizenship as well as developing appreciation across curricular subjects. The second workshop on 'The Present Time' involved the participants in 'creating a happy surrounding' and initiating them to reflect on the importance of living for the present.

Phase 2: Main Conference

5. The international conference on Fourth Wave Education got its synergy from the thought provoking inaugural address. The Honorable Chancellor of Saurashtra University & the Governor of Gujarat traced the development of human society and appraised the opportunities and the difficulties that education had to deal with. He visualized the Fourth Wave Education will have to bring new substance and new challenges into its fold. Society has to make choices and have to design new strategies to create this new wave. Continuing the synergy, the Honorable Governor addressed the gathering referring to one man's initiation in revolutionizing the world. He asked the participants to be open to new thinking.
6. Many other luminaries, dignitaries made their observations about the possible options that are lying in front of us. It was expressed that man has almost become omnipresent, omnipotent and ubiquitous. The industrial / information wave has opened new vistas, created challenges and opened new frontiers. If these powers remain unchecked and unguided then their tools will become a source of our destruction. Virtues of technology can become dangers for the survival of humanity. In fact, we know that our living environment has become non-livable. The human

interactions are becoming worse in many a sense. These twofold problems of environment and human interactions must be attended to with guiding principles of safety and care. The Fourth Wave Education must redefine that positive wealth lies in human relationships rather than goods and services. They argued that Spiritualism and 'Responsivism' are the suitable options for dealing with the problems.

7. The Fourth Wave Education may use the principles: (i) planetary cooperation, (ii) justice, equality, balance, reciprocity, sharing, (iii) redesign of institutions by using spiritual values, (iv) unity and diversity, from an "either-or" logic to a "both-and" logic, (v) distributed networks of power, no rigid organizations or hierarchies, and (vi) multiple models of openness of learning societies..The Fourth Wave Education will have new foundations and a different architecture. While participating in the Memorial Lecture, the speakers and the participants emphasized upon creating a balanced approach to life and ecology.

Academic Papers of Delegates

8. The delegates divided themselves into 9 parallel sessions that covered four sub-themes of the main theme called Fourth Wave Education. Apart from 2 general papers, as many as 40 papers dealt with learning approaches to education, 70 participants focused on action research, where as enrichment of curriculum received the attention of 55 presenters and 56 papers were on the theme of school management. Each day eminent educationist from all over the world chaired the parallel academic session.
9. The presenters explored the effects of increasing international flows of ideas, people, and capital on the transformation teaching learning process. Overall, the 9 parallel paper presentations and discussions focused on 'responsivism' relating to redefining wealth, merging of corporate-personal life, emergence of self-forgetful- service paradigm, and integration of religiousness with science.

10. Sub Theme1- Approaches to Education: The papers related to this sub-theme focused on three interrelated topics: the constructive, cognitive & behavior approach to learning. The delegates highlighted the different aspects of learning such as learning as knowledge acquisition, as strengthening the response & learning by constructing your own meaning. In different approaches the role of teachers & nature of classroom were discussed. The teaching-learning continuum visualized new changes in tune with problem solving, exploration and application.

11. Sub Theme2- MARS-Methodology: The papers related to this sub-theme pursued the role of mass action research by school teachers to solve different problems related to school administration, teaching, learning & evaluation. The delegates recommended that research must be undertaken by students and teachers.

12. Sub Theme3- Enriching Curriculum: Under this theme the participants presented papers on teaching learning process using local wisdom. Local concepts especially local environment & social perspective were considered so as to reach beyond the boundaries of prescribed curriculum. The need to restructure the curriculum was highlighted.

13. Sub Theme4: Management- School Scenarios: In this sub-theme the participants read their papers on the pro-schooling, re-schooling & de-schooling scenarios and its contribution in developing the Fourth Wave Education. The need of changing the prevailing school scenario to provide a quality school education was emphasized. Highlighting the futurological projection of education, the delegates projected to create **responsibility centered management** of education that must ensure safe, happy and a challenging environment in the schools. Finally, the participants covered a range of issues related to problems of schools in a "globalized" world, including the danger that globalization centered

upon institutions, languages, and cultural styles of ordinary citizens in developing nations.

14. The Hon'ble Union Minister of State for Health, Government of India gave the valedictory address at the concluding session of the main phase of the Conference. In his address, he referred to the excellence and achievements in the field of education in India. He and the other speakers at the valedictory session desired to support the actions required for the attainment of spirituality in education/The delegates asserted that 'responsivism' cannot be achieved by education alone, it cannot be achieved by business alone, and likewise, it cannot be attained by governments alone. Perhaps we need to create a synergy by using the joint collaborative efforts of all the three forces together.

Phase3: Post Conference Session

15. During third phase of conference called 'reflections', the delegates of the 17th International Conference arrived at the following general guidelines and academic resolutions: -

General Guidelines

- i. In order to increase the frequency of meetings of AIAER meetings in the field and to synergize the activity of educational research, the idea of City Chapters of AIAER shall be introduced.
- ii. The State Chapters need to organize more and more activities for formulating state policies of education and likewise, support research activities in the district chapters.
- iii. In 2005, the 19th International Conference of AIAER shall be organized in collaboration with other partners in Bangkok from April 18 to 22nd 2005, on the theme of "Learning Organization".
- iv. All our members particularly the office bearers of AIAER must create better networking and linkages with other organization.
- v. In 2004, the 18th Annual Conference of AIAER shall be organized at a suitable place in South India.
- vi. The Journal of AIAER has to attain the international standard in terms of its get up,

editorial members, global circulation, and global contents.

Academic Resolutions

- L In order to create a Caring society, 'responsivism' and spiritualism should guide the conceptual framework, structures and functions of education in terms all the courses and programs at all levels of education including life long education.
- ii Constructivism should be encouraged as the primary approach of learning at all stages and forms of education.
- iii Systems Thinking should be the hall mark of learning, teaching, and researching in the area of school education, teacher educators, parent's education and the management of education.
- iv. The curriculum should be energized through the support of Action Research undertaken by teachers and students at all levels of education.
- v. Synergetic networking for Collaborative Partnership of Educational institutions, Government Departments and - Business Organizations should aim at developing strategies of human development for the Fourth Wave" Education.

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