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The Primary Teacher is a quarterly journal , brought out by the National Council of Educational Research and Training (NCERT), New Delhi. The journal intends to give practicing teachers and concerned administrators authentic information about the educational policies being decided on and pursued at the central level. It also provides a forum for the discussion of contemporary issues in the field of education. The major features of The Primary Teacher are:

- Educational policies concerning Primary Education
- Questions and Answers
- States Round-up
- Illustrated material for classroom use.

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## EDITORIAL

### Dear Readers

One of the aims of education is to inculcate values and attitudes of 'tolerance' among children. In the recent past, there has been sensational media reports about government, political leaders, institutions and constitutional bodies. There has been a tendency in general to pass on this information, often based on unfounded allegation, to next person without filtering it on a screen of truth. It does not do any good to the society and functioning of democratic institutions. The first article "The Need for a Restraint" under 'Impressions' impress upon exercising restraint and being objective in our dealings. It is important for all of us, but more so for teachers, who have the responsibility to transmit values and attitudes in children for building a tolerant society and strengthening democratic institutions. The article suggests, rather than sensationalizing media reports further, we should analyze and discuss social issues like violence against women, rape of girls/women, dowry, female feticide, etc.

Under the section Early Childhood Education (ECE) two articles have been included. The first is on "Fostering Creativity among Young Children" and the second is "Emerging Challenges in Early Childhood Education: A Psycho-social Perspective." The first article highlights how children's own work could be effectively used to foster their creativity. Examples of children's drawings and paintings have been given to prove the point. It provides guidelines for teachers what to do and what not to do for developing creativity among children. The second article analyses programmes of ECE in three sectors, viz. government, private and NGO. The challenges and issues to enhance the quality of these programmes have been highlighted.

There have been numerous feedbacks from the field about the gaps between the theory and practice as far as implementation of Continuous and Comprehensive Evaluation (CCE) is concerned. It has been our endeavour to interact with teachers, educators and other stakeholders to achieve effective implementation of CCE and keep them abreast about the new initiatives and experiences from the field. In this issue we have included three articles on CCE focusing on different aspects of its implementation. The first is titled "Assessment Integrated with Learning of Mathematics at Elementary Stage". It attempts to define assessment, evaluation and grading to make things more clearer and implementable for teachers. It explains through suitable examples how CCE can be implemented in constructivist

paradigm. The article focuses on formative, summative evaluation and integrating evaluation with teaching-learning process at the elementary stage. The second article “Assessment Practices at School Stage: The Case of CCE – A School-based Assessment Implemented by Central Board of Secondary Education (CBSE) in its Affiliated Schools” analyses the existing assessment practices in CBSE-affiliated schools vis-à-vis what is ideally expected from the CCE. It highlights that the basic purpose of CCE is misunderstood and the practices appear to be ritualistic in nature rather than child-centred. The paper suggests that for effective implementation of CCE teacher education has to be more sensitive to emerging demands of school system. It recommends that pre-service and in-service training of teachers need to be reoriented to bring CCE in its right perspective.

The third article “Continuous Assessment in Classroom – Prospects for Improvement” critically analyses how CCE is being practised in schools and what are the gap areas in existing practices in government and CBSE schools. It explains the meaning and purpose of formative and summative evaluation and the role teacher is expected to perform in the learning paradigm of constructivist approach. Suggesting ways how planning for CCE could be done, it visualizes future prospects for improvement in CCE implementation.

Two studies have been included in this issue pertaining to the quality of elementary education. The focus of Right to Education Act, 2009 implemented from 1st April 2010 has been that all children in 6-14 age group have the access to elementary education and all children receive education of comparable quality. To achieve this target it would be necessary to focus on children of urban slums and other disadvantaged sections of society. The first research study “Factors Affecting Learning Outcomes of Children at the Elementary School Level” is an attempt to highlight those factors which influence children’s learning outcomes. It analyses school and home factors which are associated with children’s learning and interpreting the results of the study in the context of slum children’s background. It suggests ways to improve the learning outcomes of children by addressing those issues which influence learning outcomes of children negatively. The second study is on “Gender Discrimination in Primary School English Language Textbooks in Tamil Nadu”. It analyses the English textbooks from Classes I to IV and points out the nature and magnitude of sex stereotypes that have been perpetuated. Gender specific games, toys, dress, school uniform, names of children and gender specific use of language like mankind, manpower used in these textbooks have been

highlighted to indicate the gender biases being practiced. There are two articles related to implementation of RTE Act-2009. The first article 'Right of Children to Free and Compulsory Elementary Education-2009' brings into focus various issues of quality at elementary stage. It emphasizes quality of elementary education as prime determinant of whether 'Education for All' will be achieved by 2015 or not. It suggests various measures to improve teaching-learning process, infrastructure facilities, training of teachers and monitoring of pupils' progress for better learning outcomes. The second article "Understanding the Role of School Management Committees (SMCs) in the context of Effective Implementation of the Right to Education Act-2009 focuses on the urgent need to empower and mobilise community for effective RTE implementation.

The hard work of Ms. Arti Dwivedi, Junior Project Fellow (JPF), for finalising the manuscript of this issue is acknowledged.

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G. C. Upadhyay, Padma Yadav, Kirti Kapur  
Kavita Sharma, Kiran Devendra

# 1

## The Need for a Restraint

Kiran Devendra\*

Most families in India bring up children in a positive surrounding which gives the growing children a feeling that everything would be alright if we practise the power of positive thinking. All problems would have a solution, provided, we made an effort to think objectively about a particular problem. As children, the moment my brothers and I began to crib about the cold, the rain or the snow, our mother used to narrate her own experience of mentally coping with extreme cold when she came to Shimla after her marriage in heavy snow as a young bride. She looked outside the window to find lots of birds and monkeys sitting on the branches of the snow clad trees. Next day she also saw a few stray dogs under the roof of the porch of her house. She said that she thought to herself that if the creatures of nature could survive the cold, surely she would in her home which was kept warm by a fireplace in the living room, warm clothes and hot foods and hot milk and tea to drink.

She decided to arrange for *bajra* and broken rice for the birds, black grams for the monkeys and *rotis* (chapattis) for the dogs every day. During the first two weeks she realised that it was not right to give the food to all of them together. She learnt from her experience that the dogs should be given *rotis* first, then the black grams to the monkeys and lastly the *bajra* and broken rice to the birds. She enjoyed doing it and did it for forty-five years in every house that she moved into. She enjoyed looking at trees, plants covered with snow and learnt from the birds, dogs and monkeys how to face the cold. Whenever we cribbed about heavy rains, she asked us to go out with rain coats and enjoy the rain, when we cribbed about cold and the snow, she encouraged us to wear gumboots, wear our caps, coats, gloves and go out to make statues from the snow or go for sledging on the snow. Both my brothers and I stopped cribbing and learnt to enjoy the snow and the rain. The few months that Shimla

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was pleasant we learnt to appreciate the sunshine, the flowers and the butterflies while we used to go out for enjoying the beautiful weather.

This was my mother at the age of sixteen and fifty-five years later, during her hospitalization in All India Institute of Medical Sciences (AIIMS) when she was critical, she was able to check three of us – me and my two brothers from discussing the surgeon who had operated upon her for removing gall stones about ten years back. Her recent investigations including the ultrasound showed the gall bladder intact. Every doctor disbelieved that the gall bladder had been removed. We kept on saying that it had been, as the surgeon handed over to us the fourteen stones, which had been removed from gall bladder, and as a matter of medical procedure, the gall bladder is also removed. There was no reason for us to believe that it had not been removed. The doctors used to come for rounds and discuss why the surgeon had not removed the gall bladder for three days. The gall bladder now had a big stone which was becoming a threat to her life with pancreatitis and all the parameters going haywire. When the doctors left her room, my mother was angry. She said ‘why are you criticizing the surgeon for just one stone, why are you not remembering with gratitude that he had taken out fourteen. There must have been some reason for the surgeon for not removing the gall bladder’. That brought an end to the

discussion and the focus shifted to the future course of treatment. She kept on telling us that we should not panic as with the passage of time she would surely get better. She added that when one panics in the presence of a patient, the patient who is not strong mentally, can give up.

Our father carried out all his official duties and did everything possible within his limited means to ensure the warmth and comfort of our home. He found time to reach out to all those who worked with him, friends and family members who needed his support. He never expressed his physical fatigue or complained about anything to save us from worrying. He kept on telling us that we have countless blessings. He always led an upright life, seeking undue favours was not right he believed. He taught us by his example by bravely facing physical odds. He repeatedly explained to us that it is not good to expect sympathy or support from others when you face an illness or a physical challenge, do not remain focused on that, instead you can think of Helen Keller who was deaf, dumb and blind. She managed her life and work so well without making a noise about it to seek attention or get favours. She was an author of a great standing. Milton, the poet, never complained about his blindness. My father believed and said that now a lot of benefits are available, take them if you really need them, but do not become mentally and physically over dependent on these as then you



will only be thinking of yourself and everything available will be less for you.

As children, we used to go from Shimla to Chandigarh at least once a year. We also used to visit the Rose Garden for experiencing the beauty and colours of roses, the visit to Rock Garden made us appreciate a new concept of making beautiful things out of waste or not so beautiful things. We used to get excited and tempted to go for boating on seeing the Sukhna Lake. My father used to tell us to watch the behaviour of the ducks in the lake for some time, especially, when visitors used to give them something to eat. We discovered that the ducks were peaceful and swam in groups of two; a single duck generally tried to join a group. When they rushed to a visitor who offered pop corns/chips etc., to them, they would squeak and gather in a formation happily. Those who joined late would quietly and patiently find place for themselves without pushing or disturbing those who were already there. Some flew to take place on the steps while the new ones adjusted themselves. The ones who were already there would show acceptance as there was never a fight, even if, some ducks did not find a place, they would go and join the several other formations holding their heads high to greet as many other visitors who were offering pop corns to them. This was another way of establishing a contact with the visitor, the eye contact, the squeak

made us feel as if they were happy to join, enjoy their food and even convey their sense of happiness through a squeak!

My father continuously reminded us of these ducks, their patience, making a place to adjust in the formation without pushing or fighting and their sense of cooperation. He said we could have a similar attitude towards our families, our studies and later when we would all start working. He said competition against our classmates/relatives/ colleagues was not healthy. One could as an individual do well by meeting the target/deadlines which one sets for one's own self. He said by pushing, rushing, losing patience, getting jealous, trying to take undue credit, we would only be impeding our own performance as a student and later in our work situations. One should avoid giving judgements/negative comments about others as these will dilute one's own focus and sap energies. He said it is natural for every human being to notice the negatives of people around – discuss them with others, take advantage of situations, etc. and then projecting these to gain a favour will become a habit. This will pollute the healthy environment of workplace as well as home. We need to make every effort to check ourselves and become aware of this habit.

My husband used to be terribly upset that in offices, homes, shopping places, social get-togethers it is common to hear petty things

being said about politicians. It has become a hobby with many of us as academicians, media persons and common people to keep on finding the minutest of details about politicians, keep looking for what more can be said or written about them. One must do it to raise issues, not to discuss individuals. It has created so much of monotony on the live/print media. The language we use needs to be decent, sweeping generalisations need to be avoided. We need to exercise restraint and focus on social evils which have shaken the public conscience in recent times. Rape of young girls and women, dowry deaths, female foeticide, corruption in public life and many such issues need to be discussed. And we need to expose and be critical of those who are involved in such crimes and perpetuating them, be it doctor, engineers, public servants, politicians, business people or any other. This will save us from wasting most of our time in passing-judgements and get conscious of doing our own work sincerely and objectively.

I keep visiting the Sukhna Lake in Chandigarh which brings back the old childhood memories. I enjoy the lake, the ducks which were resting on their usual resting place, a small green park a few feet away from the walking track. The moment I shout with the pop corns, they begin to move in a group of two – they all come beautifully in a big row, flock together, look up, squeak and keep on joining the group. The moment the

pop corns finish, a large number of ducks begin to turn back, the others who are at a distance, swimming to join the group automatically turn to get back to their place of rest. It is always an hour of sheer joy and laughter for me. Many a times the bigger ducks walk on the walking track. It gives me a great feeling of joy.

Both my husband and I used to get upset on negative over reporting on Commonwealth Games. Each channel of the live media and most national dailies appeared to be competing with each to report/write on all that was left to be done and not on what had been completed with regard to preparations. While the guilty surely needed to be punished, but we needed to have patience till the games were over. An announcement to this effect had already been made by the Prime Minister of our country. We needed to understand the implications of our reporting negative developments. This must have impeded the progress of preparations, demotivated planners, administrators and workers. It carried a poor image of our country's preparedness outside India. The international media followed the Indian media and discussed developments more negatively.

The way the hike of the Parliamentarians in their salary has been covered is in phrases like 'hike over hike' and many other captions for days appeared to be judgemental. These also had an element of

sweeping generalisations. There is a need to talk about politicians and every strata of our society in an objective rather than sensational manner. What has happened over the years is that while politicians are getting continuously scrutinized by media and public as it has become everyone's hobby to gossip about them. For any and everything going wrong, the blame is conveniently passed on to this category. We must understand that in doing so we are letting the many others – teachers, doctors, bureaucrats, technicians, businessmen who join happily as a matter of right in criticizing the politician, forgetting the many wrongs that they themselves do sometimes, knowingly and many a times unknowingly. It is important to check ourselves from passing judgements on any of these categories in a generalised manner and start

using decent language for everyone. All of us need to do our work more seriously and avoid gossip which have social repercussions on families and friends and ruin the work culture at work place and social environment of homes.

Teachers need to discuss the need for restraint with children in classes, during activities as children carry tales, complain and gossip about their peers, classmates and even teachers. It needs to be shared with children that a habit like this is not healthy, it wastes time and contributes to nothing positive, it impedes learning, healthy interaction and genuine concern for each other. She could discuss the spirit of accommodation, co-operation, patience and tolerance of the ducks as positive values and habits which would help every child in positive learning.

# 2

## Fostering Creativity among Young Children

Padma Yadav\*  
Jyoti Kant Prasad\*\*

### Do You Know

- All children have potential for creativity although they may differ in the degree of creativity that they possess.
- Creativity is not synonymous with intelligence. A highly intelligent individual may not also be highly creative.
- Creativity does not take place in a vacuum. The more knowledge and experiences the children have the better are the foundations on which they will build their creative efforts.
- A stimulating and encouraging environment can, therefore, do a great deal to enhance the creativity in a child.
- Authoritarian and strict atmosphere in the home or school, which places too much value on conformity, can hinder the development of creativity in children.

### INTRODUCTION

The nursery school located in IIT campus, Hauz Khas, New Delhi is an experimental model school of NCERT. It has two year's ECCE programme wherein children between 3-5 years are enrolled and have ample opportunities for play and learn. Activities are conducted in all the aspects of child development. Creative expression and aesthetic appreciation are given due importance.

Children's creative work is frequently misunderstood. At the

foundation stage where opportunities to draw freely is frequently available to children, more stress is given by the parents and the teachers on copying from the board or making of correct shape or writing work rather than communication and creativity. Drawings are one of the many languages children use to express themselves. Devi Prasad ji, a teacher of great eminence in his book "Art: The Basis of Education" had presented his experiences at *Sevagram*, where

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he conceptualized and implemented art education in the *Nayee Talim* programme. Influenced both by Gandhiji and Rabindranath Tagore, he has elaborated the technique of art teaching in a natural and beautiful manner. The book talks about psychogenesis of children's drawing. He said, "children have many more ideas than we teach them."

Art is only one way children can express themselves. It develops before writing or abstract thinking, adults can see creativity expressed in art more easily with young children.

Between 3-4 years, children have maximum ability to draw and express. They spend more time practising motor skills by drawing circles first and then other geometrical shapes. They begin to draw their own world. They like to point to and name parts of their drawings.

### **Development of Creative Expression and Aesthetic Appreciation**

Creative art activities help in development of fine motor coordination. It means developing control over the movement of finer muscles, particularly finger and eye-hand coordination. This prepares children for later activities that require detailed, skilled and precise artistic and professional work.

Provide children with crayons and paper. Let them use the crayons freely by drawing on the paper.

To encourage creativity do not impose your ideas on the children. Let them draw or paint what they like

and the way they like it. Appreciate but not criticize.

Try giving a familiar theme to the children and ask them to draw/paint, for example, "It is raining, you are going to school. Can you draw that?"

Give children crayons and colours and let them use these freely to create their own drawing and paintings.

Give the children themes and let them draw scenes accordingly with their own interpretation.

Encourage 3 to 4 year olds to participate in the celebration of festivals. They do enjoy taking part in the activities.

### **Children's Work**

Some drawings made by children of age group 3+ from IIT Nursery School, an experimental school of NCERT, are presented. Analysing the pattern in these drawings shows how they grow with age.



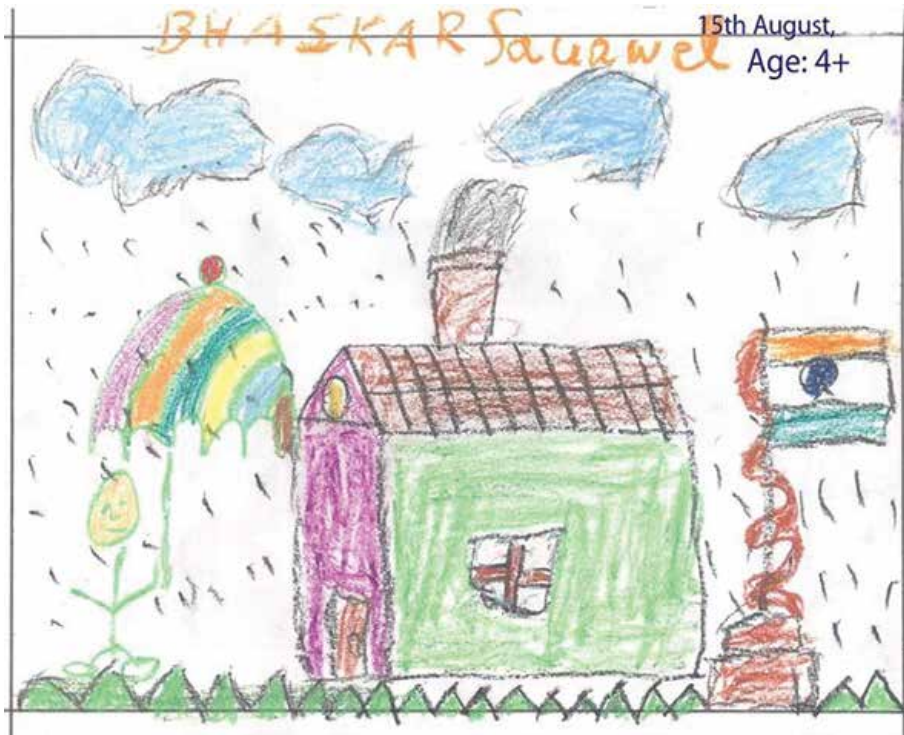


Holding hands is the symbols of love, happiness and togetherness in the family perceived by child and expression of care the mother takes of the family.

As children grow (4-5 age group) they make attempts to represent people and objects. Efforts of children can be easily recognised by adults. Children are fascinated with the large variety of colours. They want to show their work to parents and teachers and they want appreciation. Remarks like “What is this you have drawn?”, “It doesn’t look like that,” “Grapes are not pink,” “Sun is not black” can easily demotivate children and ruin their creativity.

### Drawings of Children between 4-5 Age Group

On Independence Day it rained. Children went inside the classroom. The programme was organised inside the classroom. Next day when the

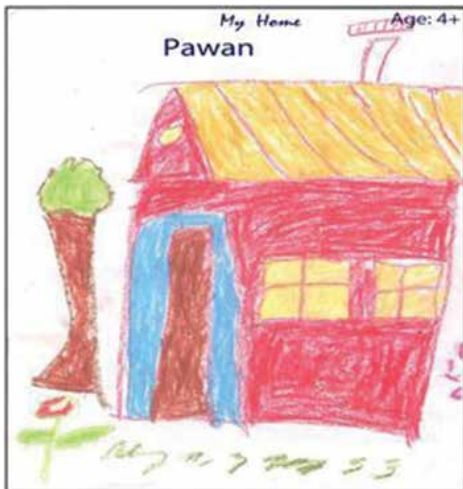


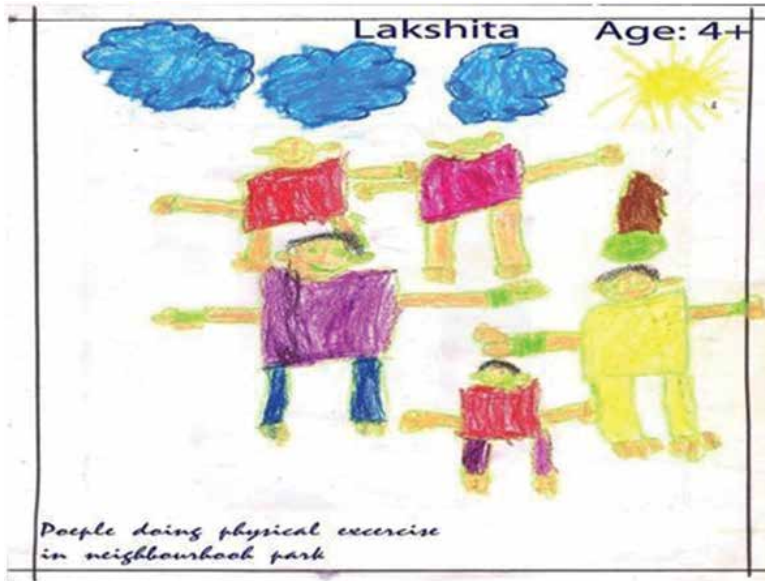
teacher asked to draw how they celebrated Independence Day, the above picture was drawn by the

child. How beautifully the child has drawn what happened!

**Drawings of Children 4-5 age group**

A child has drawn his family. The body parts especially eyes, ears, nose, teeth, hairs etc., are drawn so clearly.





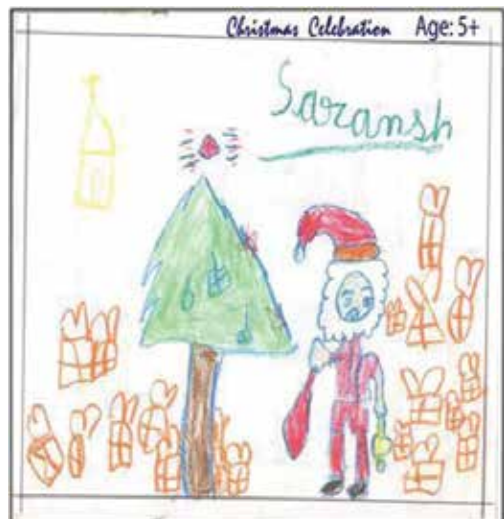
Lakshita enjoys watching people doing exercise in the neighbourhood park. She has drawn what she observes daily.

5-6 age group children can easily communicate their feelings and thoughts through drawing. Celebration of festivals, events liked

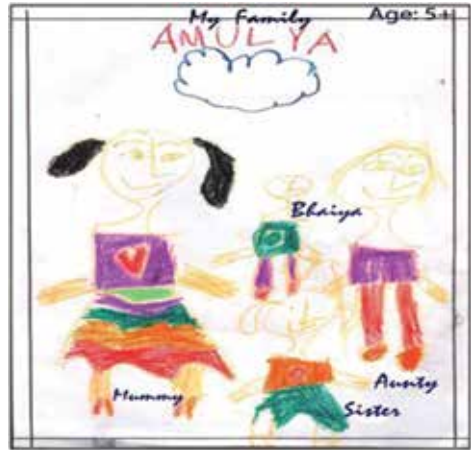
by them etc., can easily be drawn by them and expressed.

### Role of the Teacher in Fostering Creativity

The teacher is the most important factor in promoting creativity in a







young child. She needs to be sensitive, a divergent thinker and a catalyst who ignites the spark of imagination, innovation and participation in the young child.

The teacher should provide opportunities for the on-going participation of all children in all activities. She needs to be aware that every child is creative, that no child is to be compared to other children and encouraged for their own sake.

The teacher's attitude to creativity should be supportive of spontaneity, variety and divergent thinking. Children are versatile in their imagination and they spend much time in imagining all kinds of things, especially from the stories they hear from their parents or other elders and the experience they gather in their lives.

Drawing made by children during early years look like scribbling to adults, but for them they can be people, the sun, the moon, houses or anything that they have in their

mind at a given time. Self-expression is a human necessity. It is natural and goes on all the time.

Art activities are the most effective medium, which allow creative expression for children to express themselves and experience joy in doing so.

"As a pre-school teacher it is always a great satisfaction having children of age group 3 to 5 years coming and describing the contents of their drawing in detail," says a teacher of a nursery school.

Children should be able to develop sensitivity towards colour and beauty in the environment around them. During creative activities, children can be asked to draw a picture of themselves and their family members. A classroom full of samples of individual creativeness (as opposed to 30-35 identical pieces hanging in a row) indicates that the teacher has given children choices and has focused on the process rather than the product.

### **The Role of the Teacher**

<i>Do's</i>	<i>Don'ts</i>
<ul style="list-style-type: none"> <li>• Accept and appreciate individual differences in children.</li> <li>• Encourage children to be spontaneous in their expression of feelings and ideas.</li> <li>• Appreciate every child's effort, even if it requires lot of improvement.</li> </ul>	<ul style="list-style-type: none"> <li>• Avoid providing readymade patterns, cut-outs, etc. for the child to copy. This will block the development of the child's creative potential.</li> <li>• Don't correct, redraw or remake a child's creative product. Remember, it is his way of representing his experiences.</li> <li>• Don't discourage fantasy.</li> </ul>

### **Tips for parents and teachers to help children develop creativity**

- Art activities should be well thoughtout and planned.
- Make a wide variety of materials available to children.
- Suggest but let children take final decision and draw. Don't expect them to copy what you have drawn on the board or notebook.
- Ask children about their art work while they are creating it, not just at the end.
- Praise the effort, use of colour and uniqueness rather than just the final product — the trip is more important than the destination.
- Display children's work at a child's eye level.
- Encourage individual expression.
- Avoid the regimented use of materials and adult-directed projects or themes. Let them draw and express whatever they like.

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### **REFERENCES**

- AUROBINDO, SRI. 1947. "The Significance of Indian Art", Sri Aurobindo Ashram Press, Pondicherry.
- Kaul, Venita. 2009. "Early Childhood Education Programme", NCERT, New Delhi.
- Prasad, Devi. 1998. "Art: The Basis of Education", National Book Trust, India.
- Swaminathan, M. 1989. 'The First Three Years: A Source Book on Early Childhood Care and Education'. UNESCO, Bangkok, Paris.
- Swaminathan, M. and DANIEL, P. 2004. "Play Activities for Child Development: A Guide to Pre-school Teachers". National Book Trust, New Delhi.
- Thakkar, Aruna. 1987. "Significance of Early Childhood Education", NCERT, New Delhi.

# 3

## Emerging Challenges in Early Childhood Education: A Psycho-social Perspective

Dr Krishna Chandra Choudhary\*

The importance of the first six years of a child's life is globally recognised to be the most critical years for life-long development since pace of development in these years is extremely rapid. Studies in neuro sciences have provided convincing evidence of critical periods located within these early years for forming of synaptic connections in brain and for the full development of its potential. Researches have also indicated that if these early years are not supported by, or embedded in, a stimulating and enriching physical and psychological environment, the chances of child's brain developing to its full potential are considerably and often irreversibly reduced. This is also important as a foundation for inculcation of socio-cultural and personal values in children. It is well established that the period of early childhood years lays strong foundation for personality development.

Traditionally, in the past, much of the early care and education of the

child was informal, within the family and largely through the support of elders, be it caring practices or value education. Through stories and traditional games commonly drawn from one generation to the next provided children rich cultural context and heritage. This wealth of developmentally appropriate child care practices is gradually becoming extinct. The child rearing practices have altered since extended families are rarely available to support child care. Given the constant pressures and challenges of day-to-day existence in today's complex society, the possibilities of informal early care and education for the young child at home is becoming less of a reality. It was this changing social context over the years, which laid the seeds for the introduction of the concept of Early Childhood Care and Education (ECCE), which has evolved and has grown in present day times.

It is well known that independence ushered in a new era of child development/welfare in India. The last

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65 years(1947-2012)initiatives testify this commitment. The Constitution of India made it obligatory for the State and society, in general, to protect the child's rights to survival, growth and development. Recognising this, Article 15(3) empowered the State to make any special provision in favour of children. Article 39(e) and 39(f) also lay down that the State shall direct its policy in such a manner that the tender age of children is not abused and children are given opportunities and facilities to develop in a healthy manner, and childhood is protected against exploitation and moral and material abandonment. Article 45 further directed the State to provide Early Childhood Care and Education (ECCE) for all children upto the age of 6 years.

development programmes, enacting legislation and a reaffirmation of global commitments. United Nation's Educational, Scientific and Cultural Organisation (UNESCO) lead the global Education For All (EFA) movement to meet the learning needs of all children by 2015. Ensure that by 2015 all children, particularly girls, those in difficult circumstances, and those belonging to ethnic minorities, have access to and complete, free and compulsory primary education of good quality. The first goal of EFA is to improve and expand quality ECCE, especially for children belonging to disadvantaged sections of society.

It is well known that Early Childhood Care and Education provisions in India are available through three distinct channels,



In order to meet these obligations, concerted measures have been taken at the national level in the field of child development. Needless to mention that the emphasis has been on adoption of relevant pro-child policies, launching of welfare and

i.e., public, private and non-governmental. The public and government-sponsored programmes are largely directed towards the disadvantaged communities. As a sequel to the adoption of the National Policy for Children, Government of

India has initiated the Integrated Child Development Services Scheme.

### **ECE in Public Sector**

So far as governmental efforts are concerned, ICDS is the single largest outreach programme in the country (i.e., 14 lakh AWCs), which caters to ECE requirements of children of socio-economically weaker beneficiary families. Play-way method is adopted for organising various activities for children to facilitate their overall development. These activities include physical and motor, cognitive, aesthetic, social, emotional and language development. In addition, activities are organised for development of moral and cultural values. At the age of 3, when the child enters *Anganwadi* Centre (AWC) for ECE, emphasis is given for the child to have sensory experiences through touch, taste, smelling, hearing and seeing. Under the ICDS programme, ECE is one of the important services. However, it has been found that ECE is one of the weaker components under ICDS. The coverage is less than one-fifth of the target group under the programme. The AWCs have weak infrastructure in terms of adequate space and proper buildings. They also lack suitable pre-school materials.

On the other hand, there is poor monitoring and lack of community ownership. Moreover, problems related to *Anganwadi* Workers (AWWs) also pose threat to ECE service such as inadequate incentives, unrealistic

job charts and mismatch between training and work situations. The AWWs are overburdened with work additionally assigned to them such as work related to National Rural Health Mission (NRHM) other than ICDS health services, unrelated work assigned by district administration of other programmes related to development of women.

It has, however, been observed in some AWCs in the all regions that ICDS functionaries have made some efforts in preparation of toys using locally available no cost/low cost materials. Adequate supply of play materials has been made by the ICDS department and community leaders (Corporators, *Panchayati Raj* Institution (PRI) members, and school teachers) and have supported ECE to some extent. Infrastructures of a few AWCs is found adequate. Due priority has been given to training of AWWs. Parents also lack interest in sending their children to AWCs.

### **ECE in Private Sector**

The private sector is also providing ECE service at par with government and Non-Governmental Organisation (NGO) sectors. The service in this sector has revealed that a majority of schools are of very poor quality and sometimes of a kind that can have damaging consequences for children. There is a marked tendency among parents to shift their children from government sector schools to private sector schools as soon as it becomes economically possible to do so, and

often at great cost and sacrifice, under the impression that their children will benefit from this new environment. This trend is oblivious not only within communities among communities and across regions.

Some of the current practices in ECE in the private sector are surprising. At one end of the spectrum, some children experience great pressure, being burdened with unrealistic and undesirable expectations. At the other end, there are ECE centres where little action takes place; the same routine is repeated and children are required to sit quietly in one place. Children find this routine monotonous, uninteresting and boring. Pressure and tension is built up at the time of seeking admissions due to interview/test procedures adopted for both parents and children. Most ECE programmes today are merely a downward extension of primary education. The heavy curriculum exposes children to very structured and rote learning at an age when they are not developmentally ready for it. The curriculum offered in such pre-schools is developmentally inappropriate. Children are required to sit in one place and write for long durations. Few cognitive skills are taught and holistic development is ignored.

As many as sixty children are grouped in a classroom, giving them neither the opportunity to move within the classroom nor a chance for social interaction with other

children. The teacher is unable to give individual attention to each student. Such an environment is not conducive to all-round development of children. Children spend most of the time writing, working with workbooks or engaged in number work. Limited activities for art, music, Environmental Studies (EVS), or indoor and outdoor free play find place in the daily routine. There is a lack of awareness and concern about the all-round development of children. Children at this stage are not ready for carrying out heavy home work either at pre-school or home. This robs them of playtime. Lack of suitable equipments and play materials is found to be another problem for conducting activities in the private sector. There is a limited supply of these materials and if available, these are used more for purposes of display than actual play. Teachers in the private sector are untrained and lack knowledge about the methodology of working with young children. Their remuneration is low and varies from school to school.

### **ECE in NGO Sector**

A little is known about efforts made and initiatives taken in the NGO sector since there is no proper survey or estimate of actual number of NGOs engaged in ECE or child care or of the kinds of services that they provide. Although there are some outstanding institutions that have played a pioneering role in the development

of innovative programmes, these are only a handful. Among the rest, some make attempts to follow the pattern of private schools while other offer daycare and *Balwadi*/Crèche services.

As regards the innovative programmes, some of the common factors contributing to the quality of these programmes were: flexibility and responsiveness to local needs; community involvement and supportive linkages; diversified funding and mobilization of community resources; workers' training that was process-oriented leading to both competence and confidence and with strong community support leading to heightened self-esteem; strong leadership along with participation in decision-making and internalization of values and good two-way communication (MSRRF, 1994-95).

### **Issues and Concerns**

- Despite the regular expansion of ICDS programme which is continuing to be the main vehicle for Early Childhood Care and Education (ECCE), the coverage of children for ECCE is still quite low. This is an issue of both inadequate access and inadequate quality of service delivery.
- Pre-school education is imparted through nursery, kindergartens, and pre-primary centres which largely caters to urban families. It is estimated that the number of children enrolled in ECE in all

kinds of programmes is around 40 per cent of 3-6 age group population as per the recent estimate. Sixty per cent children are to be enrolled.

- Private pre-schools are oversubscribed and there is competition for seats in these prominent schools.
- The present situation of ECE in the Public, Private and Non-Government sectors has generated the emergence of some major issues and concerns. These are related to curriculum, teachers, teacher-pupil ratio, infrastructure, supervision and monitoring. Curriculum on ECE is to be activities-based, age-specific, and child-centred aiming at all-round development, adapted to context and flexible. There is divide between rural and urban India.
- Motivated and appropriately trained teachers are required to work with young children, which the system lacks at present.
- Teacher-child ratio and group size would help in adult-child interaction varying with the age of children. To maintain 1:25 ratio between teacher-children, we need large number of trained teachers. Supervision and monitoring of ECE should encourage attempt to improve its quality, which is yet to be institutionalized effectively.

The above review on ECE services in different sectors reveals poor quality of ECE programme, particularly



of those in the private sector. It is imperative that the government take up the responsibility of controlling the spread of poor quality ECE programmes through appropriate regulatory processes. Different strategies and approaches will have to be developed to address the issue of quality in the three sectors.

There are quality issues in the government sector mainly related to infrastructure facilities and trained and qualified workers to deal with pre-school children and transact developmentally appropriate curriculum. The restructuring of ICDS

have been done. It is hoped that ECE services in *Anganwadies* will improve in future, as there has been significant increase in the inputs for pre-school education in the restructured ICDS. As far as private sector is concerned, there is need to put in place minimum standard and norms for organising ECE and regulating the sector in terms of infrastructure facilities for children to play indoor, outdoor games, training of teachers as per the prescribed standards of teacher education and organising ECE activities adhering to national guidelines for ECE curriculum.

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## Assessment Integrated with Learning of Mathematics at Elementary Stage

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### ABSTRACT

*A paradigm shift is suggested in teaching processes at school levels in the National Curriculum Framework-2005. It is suggested that teachers should facilitate learning and should be able to create an environment for experiential learning. The learners in this era of technological advances have more number of learning resources in comparison to those just a decade ago. Children not only learn from the interactions that take place in the classroom, but also outside the classroom. So the learning takes place continuously as a result of interactions between the child and the environment provided. When learning is a continuous process and results after each and every experience that a child has, the assessment of learning should also be done continuously. In mathematics learning, it is more important as, by nature, mathematics is sequential, i.e., a concept cannot be learnt without understanding the prior related concepts. In present paper it is intended to give some ideas to teachers of elementary mathematics to integrate assessment with classroom interactions.*

In teaching-learning process, it is pertinent to know how learning is taking place and finally how much children have learnt. For this purpose generally the terms like assessment, evaluation and grading are used. These terms are related but not the same. Assessment emphasises finding out what students know and can do and recording that information in a suitable form. Evaluation refers

to the criteria for judging different levels of proficiency or performance. After gathering and recording students' performance the grading of the performance is required like whether the performance is excellent, satisfactory or needs improvement. Grading involves reporting the result of evaluation in some conventional manner like A, B, C ... or percentages, etc. In general, grades reflect about

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assessment and evaluation, but traditional grading schemes actually say little about what specific skills or concepts the child has learnt.

For a teacher the collection of information about student learning is much more important. When determining grades, teacher should develop grading plans that reflect performance of students on instructional objectives. After students had adequate time and experience to learn concepts and skills, assessment is done to validate that learning. Grading can emphasise the mastery of understanding at the end of instruction because learning is gradual and cumulative.

Assessment carried out during the learning of a skill is referred to as formative assessments. Observations, interviews, daily class and home works, projects done (individually or in groups) are some of the commonly adopted ways of continually checking student skills and understanding. When students have had extensive experience with a skill or concept summative evaluation draw a conclusion about the achieved level of mastery. Summative evaluation is most appropriate to use for making grading and reporting decisions.

The above discussion reflects importance of assessment and also differentiates the three terms used. Ms Anjali, a teacher at primary grades, had designed some tasks for the learning objective — ‘the student understands the strategies of addition of two like fractions’.

As a concrete task she folds a paper to show  $\frac{1}{8}$  and  $\frac{3}{8}$ . Then for addition of these fractions she asked students to count the parts of the whole representing both the fractions to reach at the conclusion that  $\frac{1}{8} + \frac{3}{8} = \frac{4}{8}$ . Similarly she gave a round paper sheet to a group of students and asked them to model  $\frac{2}{6} + \frac{3}{6} = \frac{5}{6}$ . She then asks students if they know a rule for adding two like fractions. Then the students were asked to show sum of two fractions of learner’s choice by paper folding. Ms. Anjali formed this performance task to assess at the concrete level of representation. She then gave pictures of fractions illustrating  $\frac{3}{11}$  and  $\frac{5}{11}$  and asked students to paint another figure divided into 11 equal parts, to show the sum by using the rule and explain the rule. This task she gave to assess the learning through pictorial representation. After such experiences to learners, she provided another experience for learning to students by way of addition sums  $\frac{2}{7} + \frac{3}{7}$ ,  $\frac{1}{4} + \frac{3}{4}$ ,  $\frac{2}{5} + \frac{3}{7}$ ,  $\frac{3}{8} + \frac{2}{6}$ ,  $\frac{5}{13} + \frac{4}{13}$ , etc.

She asked students to circle all the sums that show the rule of adding like fractions. She further asks students to write more sums that show rule. She then goes beyond basic addition facts and ask students

to tell the sum of the other fractions having difficult to be represented by concrete objects or pictures like  $\frac{2}{710} + \frac{305}{710}, \frac{1102}{10000} + \frac{701}{10000}$ , etc.

She also asked questions like: How did you think about this problem? How did you know the answer? and then she asked to give some more examples for the rule. These tasks were designed by her to assess the symbolic levels of representation. In the sequence she asked learners to solve her problem “One day she bought two pizzas of same size for her family. Each pizza was divided into 8 equal parts. Her daughter ate half of the pizza and son took 5 parts. How much of the pizza both children ate?” She allowed learners to use any of the methods they find easier. With this task she wanted to assess the application and problem-solving skill of the learners. At each stage she might get an idea about the performance levels of students, through carefully designed performance tasks at different instructional levels like concrete, pictorial, symbolic and problem-solving.

In framing the performance tasks, the teacher also chooses which ways are to be used to gather information about the performance. Most commonly used ways include observation, interviews, guided or independent practice, quizzes, projects, problem-solving tasks and portfolios.

The teacher watches while children perform a mathematical

task or work on manipulatives. During classroom interaction, teachers observe which children are being successful with skill or concept. Careful observations not only help teachers in assessing the way children learn but also useful in finding the levels of learning at which each child is.

As a common practice the teachers ask children to explain and show what they know, some time casually during instruction. Interviewing is normally conducted in a one-to-one setting. This helps in understanding the child’s thinking process. Structured interviews combined with observation allow students to show and tell what they understand. For example, when a child adds fractions like  $\frac{1}{2}$  and  $\frac{1}{3}$ ,

what process she/he adopted? How she/he reached to the final conclusion? Huinker (1993) described the importance of interviews in assessment of mathematical learning in following words, “Advantage of using interviews includes the opportunity to delve deeply into students’ thinking and reasoning, to better determine their level of understanding, to diagnose misconceptions, and to assess their verbal ability to communicate mathematical knowledge. An additional benefit of using interview occurs as students provide detailed information about what they are thinking and doing.”

Quizzes form another tool for evaluation related to one or more objective, usually toward the end of an instructional unit when children are well prepared to show mastery. Students involved in framing questions, providing solutions and scoring the results of quizzes give a better idea of students' learning.

As students become more extensively involved in problem-solving activities, assessment of individual and group problem-solving skills give a better idea of student learning. These activities should be monitored while the students are engaged in an activity in problem-solving, so teacher can assess and evaluate the process as well as any finished product. A child may be put in situation where they need to use the mathematics they learned. For example, at primary level children may be asked to form games on addition and subtraction of numbers. At upper primary stage children's interest in pets and challenges can be used for problem-solving like the one given below:

"You have to build a kennel for new puppy you brought in. You have an open space of 10m by 15m, and 45m of wire fence. If you use whole numbers what different sizes of rectangular kennels can you make? Which shape will give your dog the most space inside the kennel? Which kennel would you make for your dog? Explain why you selected your kennel."

In this type of problems-solving task teacher can get adequate idea

of students learning about perimeter and area of rectangular shapes. The practice problems that are given to a learner provide more information about learning levels.

Another important way of assessing children's learning during teaching is monitoring of daily class and home work to see if children are being accurate and successful. The focus should not be upon grading, but upon seeing where the problems or misunderstandings are. Analysing students' errors provide a window to look into their learning process.

The assessment portfolios include both student and teacher selected materials like textbook assignments, worksheet, drawings, tables, graphs, designs, description of individual and group problem-solving and project tasks. These provide specific evidence of a student's growth in attitude, reasoning, computational skills, use of problem-solving strategies, written and oral communication, and relationship between mathematics and other topics and events. Moreover, a child's portfolio reflects the way she/he is progressing in learning mathematics.

Self assessment by learners is another commonly used tool during teaching-learning process. Anderson (1993) has mentioned in his treatise *Assessment in the Mathematics Classrooms*. When assessment is perceived exclusively as teachers' domain students willingly wait for the teacher to judge their success or failure. When the emphasis

seem to be on external judgement, learners assume that they cannot and should not be decision-makers. Assessment exclusively by one judge leads children to forfeit their autonomy and self-validation. In contrast, when children continually participate in the assessment process, they learn to recognise their own expertise. As active assessors, they necessarily exercise a more autonomous and decision-making role in their learning. The remarks made by Anderson (1993) support the achievement of the goal of mathematics to help learners believe, they are successful and feel more confident about mathematics. That is why, questions having multiple correct answers are required to be put in while teaching and designing performance tasks. For example, the questions like “what are two numbers whose sum is 27?” has an edge over the questions like “what is sum of 15

and 12?” In the former case there are many correct answers to the problem. The child who answers correctly will have confidence of being discovering the solution and answer. Thus, for any performance task learners may be asked to develop their own evaluation scheme. This will also help teachers to be fairer in assessment and evaluation process.

With the change in teaching-learning process during last few years, it is important to bring change in the nature of assessment in school mathematics. This reliance of assessment and evaluation on assignments from book and information from standardized and textbook tests is no longer sufficient to assess learning. Moreover, in many cases such reliance may be detrimental to learning. This is, therefore, important and necessary to organise assessment as an integrated part of learning process and classroom interactions.

## REFERENCES

- ANDERSON, A. 1993. Assessment: a means to empower children. In N.L. Webb (Ed.), *Assessment in the Mathematics Classrooms: 1993 Yearbook*. Reston, VA, NCTM, p. 103.
- HUINKER, D.M. 1993. Interviews: A window to students' conceptual knowledge of operations. In N.L. Webb (Ed.), *Assessment in the Mathematics Classrooms: 1993 Yearbook*. Reston, VA, NCTM, p. 80.
- National Curriculum Framework. 2005. National Council of Educational Research and Training, New Delhi.

# 5

## Assessment Practices at School Stage : The Case of the CCE – a School-based Assessment Implemented by the CBSE in its Affiliated Schools

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### Abstract

*The aim of education is to prepare citizens for a meaningful, productive life. Evaluation should provide credible feedback on the extent to which this objective is achieved as well as for effecting further improvement in the teaching and learning processes. Current evaluation practices are highly inadequate and do not provide a complete picture of the individual's abilities towards fulfilling the aim of education. In schools, the term evaluation is synonymous with examination which has long been the only measurement of student's achievement. The word examination is associated with stress and anxiety for learners. Thus, the examinations negatively influence the testing and assessment carried out in the schools. On the other hand, if evaluation is integrated with the teaching-learning process, it will be meaningful and lead to diagnosis, remedial action and improvement in learning. There is a need to have a shift in instruction and assessment strategies so that desirable changes can be achieved. Assessment must seek to present a complete picture of the targeted learning. The areas spanning around knowledge, skills and behaviour must be appropriately covered within the curriculum determined as per the actual importance accorded to them in the curricula. Moreover, assessment must be based on clear standards, expressed in terms of learning to be achieved. The purpose of assessment must not only be to measure and judge; it must also help to improve learning as an ongoing process in education.*

The Central Board of Secondary Education introduced the scheme of Continuous and Comprehensive Evaluation in the year 2009 when

it was known that rote learning, memorization, one shot examination and assessment of isolated areas of learning did not yield the desired

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result. Also the emergence of a child-centred curriculum necessitated learner-centred assessment practices. Thus the school based CCE emerged. The scope of CCE was intended to include almost all the areas of a student's personality. It was meant to be comprehensive to include both the scholastic and the co-scholastic areas of assessment. Evaluation should also be continuous in nature to provide regular feedback on the nature of learning so that teachers can modify their teaching strategies and the learners may be provided with more opportunities to learn better and improve their performance.

Well-designed assessment and regular report cards provide learners with feedback and set standards for them to strive towards a better performance. They also serve to inform parents about the quality of learning, progress and the development of their wards.

Credible assessment provides a report or certification at the completion of a course of study providing other schools and educational institutions, the community with information regarding the quality and extent of learning. Any meaningful report on the quality and extent of a child's learning needs to be comprehensive.

While CCE has been cited as the only meaningful kind of evaluation, it places a great demand on teacher's time and ability to maintain meticulous records if it is to be meaningfully executed and reliability maintained as a mode of assessment.

Although CCE is much talked about, it has not been really understood by the stakeholders. In order to make it workable, teacher education must become more sensitive to the emerging demands of the school system, pre-service teacher education as well as in-service training must build the necessary orientation and capacities in teachers so that they can appreciate, understand and meet the challenges related to curricular reforms and evaluation in particular.

Implementation of new practices in assessment as in other areas require the strongest support from systems, States, Boards, Institutions, Heads and community. Encouraging and supporting teachers is the key to successful implementation of the programme.

#### **INTRODUCTION**

Evaluation and its function as a guide to the learner and teachers is an important part of curriculum syllabi. (Eash, 1974). A good evaluation and examination system can become an integral part of the learning process and benefit both the learners themselves and the educational system by giving credible feedback (NCF 2005).

The aim of education is to prepare citizens for a meaningful, productive life. Evaluation should provide credible feedback on the extent to which this objective is achieved as well as for effecting further improvement in the teaching and learning processes. Current processes of evaluation do not provide a complete picture of the



individual's abilities towards fulfilling the aim of education.

### **Evaluation in Schools**

In schools, the term evaluation is synonymous with examination, which has long been the only measurement of student's achievement. The word examination is associated with stress and anxiety for learners. Thus, the examinations negatively influence the testing and assessment carried out in the schools. On the other hand, if evaluation is integrated with the teaching-learning process, it will be meaningful and lead to diagnosis, interventions and improvement in learning. There is a need to have a shift in instruction and assessment strategies so that desired changes can be achieved.

The objective of these changes should be to develop in students the skills, attitudes and behaviours that will enable them to flourish in today's constantly changing world. Conventional teaching methods are inadequate in this regard. Such methods must be replaced by a more dynamic teaching approach in which the learners are actively engaged with the process of building their own knowledge from experiences around. If the changes required in education are to produce the anticipated results, assessment practices must develop in the desired direction.

### **Role of Assessment in the Teaching-learning Situation**

Assessment must seek to present a complete picture of the targeted

learning. The areas spanning around knowledge, skills and behaviour must be appropriately covered in accordance with the curriculum. Moreover, assessment must be based on clear standards, expressed in terms of learning outcomes.

Assessment scheme must include planning, among other things, identifying the responsibilities of the various stakeholders namely the organisation, school management, parents, teachers and students. Assessment planning must also equip stakeholders by giving them indications on the relative importance of curriculum content, appropriate means of assessing them and the criteria for doing so.

Children spend their best part of the young lives with teachers and it is through the teacher's assessment that we can better understand their capabilities. The teachers play a vital role in the assessment of learning among children which is built up over relatively long periods and requires ongoing monitoring as well as appropriate and timely interventions. Because of their close and constant presence, teachers are the best-placed education stakeholders to observe progress and judge the quality of such learning.

Students must be made aware of their responsibilities with regard to assessment. They must be informed of expectations and be able to refer to them at any time; they must be able to position themselves in relation to these expectations. Students who are

able to take stock of their progress are more likely to be benefited in their learning. Assessment by students contributes to a better understanding of the subject and develops tolerance for the views of the others. Training students to engage in self-assessment, to reflect upon the quality of their work and seek to improve upon it constitutes one of the best learning that the school can provide. Assessment must contribute to enhancing students' commitment to their studies and developing positive attitudes, such as self-confidence and the desire to learn. Accordingly, assessment tasks must be stimulating, present a certain challenge to the student, and correspond to the student's tastes and interests. Such tasks must also be authentic and lead to useful results, raise new questions, offer a wealth of possibilities, and permit divergence, diversity, innovation and excellence.

Assessment results must be drawn from a variety of specialised sources. These include formal and informal observation, questioning, interviewing, complex productions ranging from open questions to sophisticated projects, the logbook and the portfolio. These methods, which are more difficult to apply but are also better tailored than conventional methods to the new approach to evaluation, will come into widespread use.

The purpose of assessment must not be only to measure and judge; it

must also help to improve learning. Assessment must be an ongoing concern in education. This does not mean that it should take up all of one's time, but rather that one must remain alert in order to detect opportunities for and signs of progress in students. Formal assessment periods can even constitute excellent learning situations. Among the reference frameworks for judging learning, it is important to choose those that are most favourable to progress. Assessment reports and results must be expressed in concrete terms that are understandable to students and to others concerned. A report of the progress made by the student in the form of a profile is more likely to be useful for the subsequent monitoring of his/her performance than an overall numerical marking presented without any other form of explanation.

Assessment has to be learner-friendly in the context of the child-centered curriculum. Assessment tasks must have scope for nurturing creativity, curiosity, inquisitiveness and must focus on the child's experiences.

Use of technology has a vital role in assessment management. The day is not far away when parents will be able to consult their child's academic record through the internet. This record will be an animated version of the present descriptive report card and, among other things, will include annotated samples of the child's work as well as short-filmed

sequences of the child's behaviour and performance in class.

### **The Introduction of CCE in Kendriya Vidyalayas**

CCE was introduced in the Kendriya Vidyalayas since the beginning. The continuous and the comprehensive part was well addressed as the child's progress in both the curricular areas and co-curricular areas was assessed regularly through a variety of modes and tools lending a holistic approach to the assessment of the child's personality. The curricular areas were assessed by giving numerical marking and the co-curricular areas were assessed by way of grading and descriptive indicators. Personality traits were recorded. Assessment was conducted through a variety of methods such as quiz, debates, seminars, discussions, etc. Project work was carried out by giving topics related to the subject areas.

A host of activities to rouse the creativity of the children are conducted throughout the year which formed the basis for the child's participation to various levels of experiences. *Yoga*, physical education, work experience, value education, art education formed an integral part of the curriculum. NCC, adventures activities, Scout and Guiding gave opportunities for inculcation of life skills among students. Gifted and slow learners are identified and teachers adopt appropriate strategies to teach and assess them. Assessment tasks and tools catered to all levels of

learners. Teacher empowerment has been integral and vital aspect of the system. Teachers are oriented to various methods and tools of teaching and testing. Parent Teacher meeting has been an important aspect in which parents are familiarized with the progress made by the children in the schools. Thus the KVS model of assessment has been a precursor for the CCE introduced by CBSE.

### **The CCE in CBSE-affiliated Schools**

The Central Board of Secondary Education introduced the scheme of Continuous and Comprehensive Evaluation in the year 2009 when it was realised that rote learning, memorization, one shot examination and assessment of isolated areas of learning did not yield the desired result. Also the emergence of a child-centred curriculum necessitated learner-centred assessment practices. Thus the school-based CCE emerged as it was expected to be most suited for the learner-centred curriculum. The scope of CCE was intended to include assessment of almost all the areas concerned with development of the student's personality. It was meant to be comprehensive to include both the scholastic and the co-scholastic areas of assessment. Evaluation should also be continuous in nature to provide regular feedback on the nature of learning so that teachers can modify their teaching strategies and the learners may be provided with more opportunities to learn better and improve their performance.

## Features of the CCE Introduced in CBSE

The 'continuous' aspect of CCE takes care of 'continual' and 'periodicity' aspect of evaluation.

- Continual means assessment of students in the beginning of instructions (placement evaluation) and assessment during the instructional process (formative evaluation) done informally using multiple techniques of evaluation.
- Periodicity means assessment of performance done frequently at the end of unit/term (summative evaluation).
- The 'comprehensive' component of CCE takes care of assessment of all-round development of the child's personality. It includes assessment in scholastic as well as co-scholastic aspects of the pupil's growth.
- Scholastic aspects include subject-specific areas, whereas co-scholastic aspects include life skills, co-curricular activities, attitudes and values.
- Assessment in scholastic areas is done informally and formally using multiple techniques of evaluation continually and periodically. The diagnostic evaluation takes place at the end of a unit/term as a test. The causes of poor performance in some units are diagnosed using diagnostic tests. These are followed with appropriate interventions followed by retesting.

- Assessment in co-scholastic areas is done using multiple techniques on the basis of identified criteria, while assessment in life skills is done on the basis of indicators of assessment and checklists.

## Scholastic and Co-scholastic Assessment

In order to implement Continuous and Comprehensive Evaluation, both scholastic and co-scholastic aspects need to be given due recognition. Such a holistic assessment requires maintaining an ongoing and comprehensive profile for each learner that is honest, encouraging and discreet. While teachers frequently reflect, plan and implement remedial strategies, the child's ability to retain and articulate what has been learned over a period of time also requires periodic assessment. These assessments can take many forms but all of them should be as comprehensive and discreet as possible. Weekly, fortnightly or quarterly reviews (depending on the learning area), that do not openly compare one learner with another are generally recommended to promote and enhance not just learning and retention among children, but their soft skills as well.

## Formative and Summative Assessment

Formative assessment is a tool used by the teacher to continuously monitor student progress in a non-threatening, supportive environment.

It involves regular descriptive feedback, a chance for the student to reflect on the performance, take advice and improve upon it. It involves the students being an essential part of assessment from designing criteria to assessing self or peers. If used effectively, it can improve student performance tremendously while raising the self-esteem of the child and reducing the work load of the teacher. Formative Assessment is carried out during a course of instruction for providing continuous feedback to both the teachers and the learners. It is also carried out for taking decisions regarding appropriate modifications in the transactional procedures and learning activities.

Summative Assessment is carried out at the end of a course of learning. It measures or 'sums-up' how much a student has learned from the course. It is usually a graded test, i.e., it is marked according to a scale or a set of grades. Assessment, that is predominantly of summative nature will not by itself be able to yield a valid measure of the growth and development of the student. It can only certify the level of achievement at a given point of time. The paper-pencil tests are basically a one-time mode of assessment and to exclusively rely on it to decide about the development of a student is not only unfair but also unscientific. Over-emphasis on examination marks focussing on only scholastic aspects makes children assume that assessment is different

from learning, resulting in the 'learn and forget' syndrome. Besides encouraging unhealthy competition, the over-emphasis on Summative Assessment system also produces enormous stress and anxiety among the learners.

### **Evaluation of Scholastic Aspect**

Part 1: Scholastic Areas

Evaluation of academic subjects in Classes IX and X.

Six assessments are proposed:

Total Formative Assessments

(FA) = FA1+ FA2 + FA3 +FA4 = 40%

Summative Assessments

(SA) = SA1+ SA2 = 60%

All across the schools, the most commonly used tools/techniques are those developed by teachers themselves. Among these are paper-pencil tests and tasks, written and oral tests, questions on pictures, simulated activities and discussion with students. Short class tests are used by most teachers as a quick and easy way of assessing the learning progress of children. As these are generally conducted at the end of a unit/month covering the specified content taught during that period, these are no doubt useful but they need to be used effectively.

Similarly, tests can be formal, informal, written or oral, based on specified content desired to be tested. They are diagnostic in nature as they enable the teacher to identify or reveal the strength and weaknesses of students. A test should not create any fear amongst students and

it should be administered in an informal way.

### **Grading Scale**

The nine point grading scale for measuring scholastic achievements is given below:

<i>Grade</i>	<i>Marks Range</i>	<i>Grade point</i>
A1	91 - 100	10.0
A2	81 - 90	9.0
B1	71 - 80	8.0
B2	61 - 70	7.0
C1	51 - 60	6.0
C2	41 - 50	5.0
D	33 - 40	4.0
E1	21 - 32	3.0
E2	00 - 20	2.0

Minimum qualifying grade in all the subjects under scholastic domain is D. All assessments with regard to the academic status of the students shall be done in marks and the assessment will be given in grades.

### **Evaluation of Co-scholastic Areas**

In addition to the scholastic areas, co-scholastic areas like life skills; attitudes and values; participation and achievement in activities involving literary and creative skills, scientific skills, aesthetic skills and performing arts and clubs; and health and physical education will also be evaluated. Most of the schools are already implementing activities involving these areas. The schools have been trained under Adolescence Education Programme (AEP), emphasising upon life skills.

The grading is as follows:

A	4.1- 5.0
B	3.1- 4.0
C	2.1- 3.0
D	1.1 - 2.0
E	0 - 1.0

Minimum qualifying grade in co-scholastic domain is D.

### **Benefits of CCE**

- Well-designed assessment and regular report cards provide learners with feedback and set standards for them to strive towards a better performance.
- They also serve to inform parents about the quality of learning and the development and progress of their wards.
- Credible assessment provides a report or certification at the completion of a course of study providing other schools and educational institutions, the community with information regarding the quality and extent of learning. Any meaningful report on the quality and extent of a child's learning needs to be comprehensive. CCE is non-threatening to children, hence helps them grow in a fearless child-friendly environment.
- Preparing report cards is a way for the teachers to think about each individual child and review what he/she has learnt during the term and what she/he needs to work on and improve.
- Maintaining a daily diary based on

observation helps in continuous and comprehensive evaluation.

- Keeping samples and notes of the child's work at different stages provides both the teachers and the learner herself/himself with systematic record of his/her learning progress.
- CCE provides teacher and parents information about each child's interest and aptitude to help the child to make appropriate choices for future learning.

### Concerns Regarding CCE

While CCE has been cited as the only meaningful kind of evaluation, CCE places a great demand on teachers time and ability to maintain meticulous records if it is to be meaningfully executed and reliability maintained as a mode of assessment.

It increases stress on children by reducing all their activities into items for assessment; thus, the purpose of evaluation is defeated. Unless the system is adequately geared for such assessment, it is better for teachers to engage in limited forms of evaluation by incorporating those features that will make the assessment a meaningful record of learning.

Since the implementation of CCE in its affiliated schools, CBSE has conducted a number of orientation programmes on CCE as well as monitoring undertaken by training groups of experts to act as mentors. Furthermore, through a series of circulars and website information,

CBSE has created a number of ready reference materials online and offline. But to state that these efforts in training the teachers is just a drop in the ocean may not be an exaggeration. The problem areas are as follows:

- Teachers do not have a grasp of the various areas to be assessed other than their subject areas which they had been assessing thus far.
- Teachers are not able to exercise the various tools for assessment proposed other than the conventional means of testing through question-answering.
- The sheer number of students in the class defeats the very objective of assessment directed towards individual learner's needs.
- Constraint on time is yet another problem to be grappled with. A plethora of activities and over-loaded syllabus leaves the teachers with less time for devoting to individual assessment.
- Teachers are often confused about the grades to be awarded to different co-scholastic areas, attitudes and behaviour patterns.
- Due to frequent change of staff due to various reasons, teachers seldom get to know the students, their needs, their styles and capacities of learning and hence are not in a position to engage in assessment of certain co-scholastic areas.
- CCE is the latest concern among educationists, institutions teachers, parents and students.

Although it is much talked about it has not been really understood by the stakeholders in letter and spirit.

### **Road Map for Effective Implementation of CCE**

To make CCE workable and meaningful, the following aspects may be taken serious note of:

Teacher education must become more sensitive to the emerging demands of the school system. Pre-service teacher education as well as in-service training must build the necessary knowledge, skills and capacities in teachers so that they can appreciate, understand and meet the challenges related to curricular reforms and evaluation in particular. No educational scheme can succeed unless the teachers are adequately prepared for executing it and have faith in its worth. This preparation will resume the visualization of a realistic scheme and the development of comprehensive procedures for its operational implementation. Teachers need to be provided with orientation about the scheme. The development of improved evaluation tools and their appropriate use, is an important aspect of these courses. With respect to the scholastic areas, it would require the preparation of objective based questions, balanced question papers, scoring of scripts, analysis and declaration of results. Regarding the co-scholastic areas, it would mean the preparation and use of rating scales, inventories,

checklists, schedules and the procedures of assessing different skill areas. Training in methods of collecting, recording, compiling and interpreting evidences of learners' growth will be other crucial aspects of these training programmes.

Teacher empowerment should be augmented on a continuous basis reaching out to even those teaching in the remote parts of the country has to undertaken aggressively. In-service training in particular, must be situated within the context of the classroom experience of teachers and may be undertaken regularly. Teachers are to be trained to observe student's activities and behaviour and describe them through appropriate indicators for recording performance.

Teachers are to be oriented to collect, analyse and interpret data related to the performances on various measures of assessment so as to have an understanding of the extent and nature of the students learning in different domains. Teacher development groups to be encouraged to guide and share assessment practices among teachers. Training in the use of technology for assessment management to be undertaken on a war footing.

### **CONCLUSION**

Implementation of new practices in assessment, as in other areas, require the strongest support from systems, State Boards, Institutions, Heads and Community. Encouraging



and supporting teachers is the key to successful implementation of the programme. Since we are in an era when schools and teaching programmes are subjected to criticisms for failing to meet societal expectations, we need to rigorously employ ways and methods to internalise the reforms made in assessment to make it workable. It is said that all teachers begin with the values implicit in their personal experiences of school and in the

systems they have come out of, hence new practices must be mediated in terms of the existing methods adopted through deliberations amongst teaching communities within the schools and amongst groups of schools. Such a community of experienced teachers should lead to observe and guide the beginners. It is through these partnerships, the development of improved practices in assessment could be carried forward successfully.

## REFERENCES

- BHASKAR RAO, D. 2001. *Education for the 21st Century*. Discovery Publishing House.
- CBSE. 2010. *CCE Manual for Teachers*, New Delhi.
- LEARNING WITHOUT BURDEN. 1993. Report of the National Advisory Committee, MHRD, New Delhi.
- MURPHY D. F. -(Ed.) 1985. *Evaluation in language teaching: Assessment, Accountability and Awareness*
- NATIONAL CURRICULUM FRAMEWORK-2005. NCERT.
- REA, P. and GERMAINE, K. 1992. *Evaluation*.
- UMA SIVARAMAN. 2006. 'Evaluation of Instructional Materials in English for Secondary Schools with special reference to Class IX Course A: Interact Prackage of the CBSE, ELT Project.

# 6

## Continuous Assessment in Classroom: Prospects for Improvement

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### BACKGROUND

The assessment and examination practices in school education have been the serious concern for several decades in our country. Several national level commissions and committees had pointed out to the need for improvement in the curricular, the pedagogical and the processes in school education. Regarding the assessment practices, the NPE (1986) recommended reduction of emphasis on external examination and introduction of Continuous and Comprehensive Evaluation (CCE) in its place to improve quality of school education. In the context of non-detention policy in order to universalize the elementary education, CCE was highly recommended to ensure the learning attainments by children, thereby enhancing quality of education. The National Curriculum for Elementary and Secondary Education (1988) based on the recommendations of NPE (1986) emphasized on defining minimum levels of learning at all

stages of primary school education followed by the recommendations for implementing CCE in schools. It also stressed on inclusion of the assessment of psychomotor skills; physical, social and emotional development and recording of evidences and using grades instead of marks. Pursuing this, the NCERT and the RIEs played a vital role in implementing CCE in the regions. The centrally-sponsored scheme "SOPT" was implemented to train the teachers on the pedagogical innovations such as minimum levels of learning and activity-based approaches along with the continuous and comprehensive evaluation. Though the scheme had an impact over the pedagogical and the assessment practices of teachers for some period in the States, it waned off gradually over a period of time, as there were no consistent follow-ups and monitoring of the programme in schools. In the year 2000, the National Curriculum Framework for School Education (NCFSE, 2000) had reiterated the

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recommendations made in the earlier Curriculum Framework (1988) with respect to continuous and comprehensive evaluation. It pointed to the learning and the Zone of Proximal Development (ZPD) of the learners. The document expressed the need for comprehensive student portfolios based on observational and situational tests; need for a pedagogical shift by drawing readers' attention to social constructivist approach; continuity of evaluation through periodical assessment; diagnosis of learning difficulties and to providing remedial instruction; shift from 'content' to the 'processes' of learning and evaluation of personal and social qualities.

Based on the recommendations made in this curriculum framework, a scheme called 'School-based Evaluation' with continuous and comprehensive evaluation as its central core was developed and implemented by NCERT at primary level in all Demonstration Schools of RIEs, and in some of the Kendriya Vidyalayas on experimental basis in 2001. The outcomes of the project were found successful and promising, and the above schools continued practising continuous and comprehensive evaluation, even after the project completion. Meanwhile, it was observed that a few States like Kerala and Karnataka in the southern region had ventured into introducing grading to assess students at different levels phase-wise in their schools.

The National Curriculum Framework (2005), which came later, elaborated the need for pedagogical shift highlighting the point that the learners are capable of constructing knowledge on their own, and the teacher's role is that of a facilitator rather than a transmitter of knowledge. With this perspective as the basis, it had reflected some of the recommendations of the earlier frameworks in its document along with certain other measures to improve upon the evaluation system in school education. It recommended the need for a shift from content-based testing to problem-solving; assessment of projects, activities and assignments of various kinds and lab work; assessment of higher thinking abilities; assessment of participation, interest and level of involvement in group work, etc.

Despite the above concerns and emphasis on reforming the evaluation practices, the problems of assessment of learning seemed to have remained perennial due to several inconsistencies and narrowly conceived views and aims of learning and assessment. The assessment practices carried out in different parts of the country in school education raises serious concerns towards quality of learning and assessment. While few States in the country had attempted to bring in some innovation in their assessment schemes which are debatable, and needs an analysis, the CBSE had also made efforts to bring in some

evaluation reforms in its schools. It made continuous and comprehensive evaluation as mandatory in its affiliated schools by formulating formative and summative schemes along with the guidelines for the teachers to implement them. The research projects carried out on the implementation of continuous and comprehensive evaluation in certain states and in the CBSE schools reveal some of the myths and the misconceptions held by the teachers, parents and students as well. The actual purpose of the continuous and comprehensive evaluation and its ways and means seemed to have been totally misconstrued by the practitioners in the field. The assessment practices related to continuous and comprehensive evaluation in schools show clearly that there is a gap between what is intended and what is actually practised in the field. In the absence of clear understanding of the purpose and the implementation procedures, the continuous and comprehensive evaluation ends to become more of a ritual and of an administrative requirement rather than guiding the learners towards better learning and development.

In light of the above, it is intended in this paper, to discuss about the conceptual premises of continuous and comprehensive evaluation, its ways and means to improve the assessment practices that help in the learning process as well as in the overall development of

learners. Some of the observations made in the paper regarding the classroom assessment practices are field based, which necessitates a need for reconceptualising our ideas of assessment, its means and procedures for improvement. The main concern is how the assessment of learners is carried out in classrooms, and its possible consequences on learning and development of learners. The paper also seeks to examine the status and the role of formative assessment in the context of constructivist learning and suggests measures for aligning the assessment with the pedagogical context of present school education.

### **Conceptual Premises of Continuous and Comprehensive Evaluation**

Most of the teachers believe that continuous and comprehensive evaluation is nothing, but a couple of formative and summative assessments of students' learning. The continuous and comprehensive evaluation is based on the principle that learning is a process and a continuous activity which needs to be assessed in order to know how the learner is learning. It implies that there is a need to assess the learner in order to ascertain how much she/he has understood and attained the expected levels. It is a continued monitoring process of students' progress through its formative means and tools in the regular classroom assessment, as well as through

the other formative modes such as assigning projects, assignments, etc. Not only continuously assessing, but it also involves feeding forward for improvement in an area of learning. While the students' progress is monitored at regular intervals, the progressive or retrograde changes are estimated and teacher's support and guidance is provided. The continuous and comprehensive evaluation shifts its focus from the notions of 'passing' and 'failing' to the idea of ongoing 'growth' or 'improvement'. The shift in assessment can also be understood from the de-emphasis of comparing one individual with another, to re-emphasis on developing knowledge and competencies. The continuous evaluation is holistic in its aims, wherein, it recognises the need of encouraging development through its formative procedures not only in academic subjects but also in cross-curricular and co-curricular skills.

The comprehensive evaluation involves a holistic assessment of cognitive understanding, application and other higher order thinking abilities, as well as the assessment of health habits, work habits, cleanliness, co-operation, and other social and personal qualities through simple and manageable means of tools. It not only helps in checking the standards of performance in both scholastic and co-scholastic areas, but also in decision-making regarding various aspects of teaching-learning process, improving the learning performance of students, increasing

quality, efficiency and accountability. It covers a whole range of learners' experience in the context of total school activities which include physical, intellectual, emotional and social-personal qualities, interest and values. Because of this, it also necessitates a need to use a wide range of assessment techniques such as individual and group assessment procedures, performance assessments, self and peer assessments and multiple assessment tools in addition to certain conventional ones. Since continuous and comprehensive evaluation is also based on the assumption that the teacher knows her/his students best, so she/he should only be entrusted with the responsibility of assessment. In this perspective, it becomes the responsibility of the teacher to select the most appropriate technique depending upon the situations and to determine what to assess and why and develop the necessary tools accordingly, rather than depending upon certain rigid and conventional modes of assessment. The continuous and comprehensive evaluation implies that there should be congruence between the expected levels of performance, teaching-learning process and assessment, thus making it an integral part of the teaching-learning process.

Planning of various learning experiences and creating learning contexts that help in the attainment of desired performance of learners,

and providing continuous feedback and feed forward should be an inbuilt part of the teaching-learning process. It should also yield a basis for planning the next educational steps in response to students' needs and learning problems. Unfortunately, the continuous and comprehensive evaluation in our schools is perceived to be simply giving an account of students' performance on formative and summative assessments. The identification of learners' learning problems and difficulties in attaining the desired performance levels and facilitating learners' improvement by providing alternative learning experiences seemed to be totally out of focus. The basic point to be remembered is assessment provides information on children's strengths and weaknesses, in relation to expected curriculum goals, which teachers could use in planning what to do next. The formative and the summative assessment procedures used under continuous and comprehensive evaluation help to maintain desired standards of performance, thus maintaining quality control. The British Educational Research Association (BERA) policy task group on assessment defines formative assessment in terms of monitoring learning and informing teaching decisions on a day-to-day basis. It also means that teachers using judgements of children's knowledge or understanding to feedback into the teaching process and to determine

for individual children whether to re-explain the task/concept to give further practice on it, or move on to the next stage. The focus should be on 'how learning can be improved', and on the progress and achievement of learners rather than their failure. The assessment becomes a worthless activity, if the results do not have an impact on the learning process.

The continuous and comprehensive evaluation necessitates the role of teachers and students as partners in the process of reflection, dialogue and decision-making. But the present scenario of CCE in schools shows lack of understanding of these purposes, and tends to be more ritualistic and teacher-centred. The present assessment situation also shows that there are many problems related to formative assessment which necessitates a need for discussion in order to understand its purpose, so that it can be used constructively for the development of learners.

### **Continuous Assessment— the Existing Realities**

Formative assessment which is continuous in nature, during the course of instruction provides feedback to both the teachers and the learners for taking decisions regarding the modifications to be brought in the transactional approaches and improving learning. Very little of such activity seemed to be taking place in classrooms at least within the context of teacher

assessment. The continuous assessment is treated more as a ritual and a mechanical process in those schools where it is implemented. The teachers do not know why they assess learners, what they ought to assess and how to assess. The assessment is been treated as an isolated activity far from teaching-learning process just to fulfil the rituals of scheduled formative and summative assessments. The formative assessment is merely looked upon as assessing the projects, assignments and some activities which are randomly chosen and given, without feedback mechanisms to improve learning. In case of learners who have problems in learning certain concepts are totally left to themselves without any academic assistance or guidance. The demands of grading and fulfilling the administrative requirements seemed to be outweighing the potential for providing helpful feedback. The learners' characteristics, their prior experiences and abilities seemed to be not the concerns of teachers, either while teaching or assessing. Emphasis is seemed to be given more to the assessment of learning outcomes, rather than the learning processes – how children learn.

It can also be said that the projects and assignments are not preceded by specifications of tasks; determining the durations at which the progress has to be monitored; identifying the processes, skills and abilities to be assessed and so on. Besides

this, the assessment questions and items are poorly planned without any presupposed set of objectives or standards of attainment, which tend to assess mainly the lower cognitive outcomes rather than the higher cognitive abilities such as applying, analyzing, inferring, evaluating and so on. The assessment questions do not have flexibility and accommodating scope for the multiple responses of learners which may be close to the right answers. Above all, the analysis of report cards show that the marks or grades used to report learners' performance do not reflect what has been learnt and what has not been learnt.

It is also important to recognise some of the problems and the constraints that seemed to come through in many teachers' accounts of their current practice. In some of the teachers' view, the indicators provided in the guidelines for the assessment of curricular areas as well the other areas lack clarity, and some of them do not have scope for assessment. Some of the misunderstandings and problems of workload and support that have been reported needs to be considered seriously. There is a need to reflect on the intense anxiety expressed by some of the teachers. There seemed to be two main problems parallelly emerging from the teachers' responses. One is related to the learner-centered instruction, where the teacher's motivation is demanded to get to know the students' prior

experiences and knowledge, and plan appropriate learning experiences. Second is concerned with measurement, categorization and accountability where the focus is on assessing, recording and reporting learners' progress overall. From this, it is obvious, that the teachers seemed to regard 'assessment' as a distinct activity from teaching. Furthermore, they have been asked to conduct formative and summative assessments of specific numbers for the purpose of accountability, rather than to benefit themselves and their students for further progress. Rather than becoming a tool to improve the quality of learning and teaching, the CCE seemed to have become more of a burden and a source of anxiety and stress to the student population as well. The students seemed to be constantly under the pressure of completing the overcrowded assignments and projects which are given in all subjects at the same period. In certain instances, it is also reported that the teachers use it as a power string and as a threat to control the students. Regarding the assessment of personal and social qualities and the skills in areas like art and physical education, it is seen that, the assessment is either done in a haphazard manner without following any criteria or not done at all. In most cases, it is seen that the descriptive reporting shown in the report cards of students reflect a stereotyped use of words and adjectives that have been picked up

from the guidelines prescribed for reporting students' skills, abilities etc.

Overwhelmingly, it is observed that assessment is perceived as a formal activity oriented to producing formative and summative measures of performance and teacher assessment is assumed to be a major part of this process. There is a need to reorient the teachers on the integral process of teaching, learning and assessment, and above all their purpose in improving learning as well as teaching. It is also important to consider the premise on which CCE needs to be viewed for its prospective improvement. For instance, the learning paradigm — whether it is of behaviouristic or constructivistic, or eclectic in orientation needs to be considered, while planning for CCE in schools. Because, the means adopted for continuous assessment undergoes a change based on the learning paradigm, we choose to believe in for our educational system. The teachers' role has to be re-emphasized in the context of learning paradigm practiced, rather than simply giving an account of formative and summative measurements to the authorities.

### **Continuous Assessment— Prospects for Improvement**

At a theoretical level, formative assessment could be grounded in a behaviouristic or in a constructivistic approach to learning. In the behaviourist paradigm to learning, the instruction is organised aiming



at mastery learning, while in social constructivist paradigm to learning, the learning is organised around the learners' world of understanding, giving attention to the quality of teacher-learner interaction and scaffolding of learning in action. The National Curriculum Framework (2005) has also emphasized upon the need for pedagogical changes in school education, in the context of which the constructivist approaches to teaching and learning process was stressed. There is a need to examine the virtues of this perspective to learning and assessment practices in our system.

Learning is viewed more as an interactive process by the cognitive scientists. According to them, the students do not simply encounter and learn material, moving from the simple to the complex, but actively engage with and attempt to make sense of what they encounter and incorporate it into their developing schematic understanding. This takes us to the formative assessment deriving from the social constructivist perspective, which affords the active engagement of the learner, a much more central role, and the role of teacher-learner interaction in the learning process. Here the teacher-learner interaction goes beyond the communication of assessment results, and teacher's judgement of learner's progress. It includes identification of learning problems and assisting in the process of learning and to comprehend and engage with new ideas and problems.

The process of assessment itself is seen as having an impact on the student, as well as the product of learning — the result.

According to Vygotsky, it is important to identify, not just what students have achieved, but what they might achieve, what they are now ready to achieve with the help of an adult or in some circumstances, a collaborating peer in the 'zone of proximal development'. Thus learning should be scaffolded by providing appropriate support to the students, with the purpose and focus of assessment being, to identify what they could achieve next. With this perspective, formative assessment should be planned to identify the level of task that a child is ready to undertake on the basis of what he can already do, as long as she/he receives possible help from the adult. What we have here then, is a notion of assessment which looks forward rather than backward and which envisages teacher-learner interaction as part of the assessment process itself. At the same time, it is important to consider the learning standards or the statement of attainments determined for each unit of area of learning that provides direction for teachers as well as students to pursue them in the process of learning.

In the present context of teaching-learning, where the teachers are expected to create a learning context in which children explore the concepts through activities, observations,

interactions, etc. the assessment should aim to discover what the learner knows, understands or can do. This can be achieved by flexible planning on part of the teacher, instead of giving a fixed number of projects and assignments as rituals in the name of formative assessment. The formative or continuous assessment must directly relate to the learning attainments and the learning experiences. While planning for continuous assessment, the learning attainments or the expected standards have to be targeted, so that assessment results can be effectively utilized to guide activities toward overall course goals. Careful examination of the course and identification of learning attainments that include both the learning process as well as the learning outcomes is needed. The higher order thinking abilities such as the learners' ability to apply, analyze, evaluate, create and performance of certain skills and abilities, along with the development of appropriate attitudes need to be mapped in the context of the content and the learning experiences. Also, the assessment modes along with the questioning for each lesson could be mapped while planning before teaching. However, the prior planning of these could be flexible enough to accommodate changes in instruction as well as in assessment based on the reflections of teachers which should be daily based.

The flexible planning of teacher should incorporate several alternative

modes of questioning and assessing the students during the process of learning. The open questioning and tasks which stimulates learners' thinking processes should be used to a large extent rather than closed or pseudo-open questioning. Sometimes, certain aspects of learners' work/responses might provide insights into their current understanding, and misconceptions. Prompting them to reflect on their own thinking might also provide a lead to an understanding of their prior conceptions, based on which the present conceptions or misconceptions have been built up. One of the research studies report that the teachers appeared to ask 400 questions per day, out of which 65% of those questions were concerned with recall of textbook information and the learning consisted mostly of responding to teacher questions and virtually no questions were asked by students. There is a need to explore the kinds of questions that teachers ask their students and how those questions may be classified—factual, conceptual, procedural, analytical and value questions. The conceptual questions are concerned with understanding of ideas, phenomenon and reasoning, while, the procedural questions are concerned with observation, recall of facts, possible experimentation and the procedures involved in a particular phenomenon. It involves reasoning also, in order to confirm the connections between the facts and observations. The analytical

questions are those that require the students to think, analyze the given problem or a situation which involves critical examination, seeing relationships between different elements that are involved in the given problem or situation. These types of questions help students to develop higher order thinking skills. The value questions are concerned with the issues and social concerns such as equality, discriminations, poverty, health issues, environmental issues etc. Appreciation and attitudes of students can also be known through asking open type questions which is quite different from the closed type of questions which demands a specific answer. The open forms of recording the observations such as narratives and anecdotes should be used extensively, instead of just ticking the list of specifications and assigning marks or grades. The traditional tests which demand specific right answers and memorized facts need to be replaced by assessment types which measure the higher order thinking skills. The open-ended and contextualized questions where the students' expression can find place should gain importance. Along with regular classroom questioning, worksheets, classroom activities either in groups or individual as regular features are required for continuous assessment which help in knowing the understanding and the attainment levels of students. The projects and assignments given should also reflect what learning

attainments are expected of students. As stated earlier, the tendency among the teachers seemed to be towards assessing only the final product of the projects and the assignments. Many times, one is not sure whether the expected learning goals have been achieved through the given task or not. The assessment of these could be planned in such a way that both the process and the product performance are assessed with the constant feedback from the teacher along with interactions. The self-assessment and the peer assessment along with the teacher assessment could be a part of the assessment of projects, presentations, discussions etc. In continuous assessment, the students' responses should be used to enrich lessons, alter learning strategies, and the content organisation. Sometimes, it may also require simplifying the key questions that lead to learning of the concepts. Since the goal of formative assessment is to identify and correct conceptual errors, teachers must provide constructive and relevant feedback specific to the learning activity and assessment results to clarify misconceptions.

It is also seen since decades until now, that the assessment practices whether they are formative or summative have been mostly judgemental or quantitative in nature, which is expressed either in the form of marks or marks converted into grades. The students are treated as mere the recipients of assessment

made. Instead, the assessment should be more descriptive rather than purely quantitative or judgemental in nature. In the context of the learner-centered education, the involvement of students should be both initiators as well as the recipients of assessment. This calls for the students' partnership with the teachers in the process of assessment. To identify the role of the student and assert the importance of her/his playing an active part in the process is also important. But this is usually less articulated than the teacher's role. The conventional thinking is that, the students understand and act upon the information produced by the assessment, rather than actively engaging with or being affected by the process itself. Besides teacher assessment, the self-monitoring, self-assessment and reflections on part of the students play an important role in assessing one's own strengths. For the students to be able to improve, they must develop the capacity to monitor the quality of their own work during actual process. This, in turn, requires that students possess an appreciation of what high quality work is, develop evaluative skills necessary to compare with some objectivity, the quality of what they are producing in relation to the higher standard. This leads to the development of certain moves which can be drawn upon to modify or improve their own work. This also helps them to reflect on and assess

their own learning experiences – leading to self-regulatory habits essential for “Learning to Learn”. To be most effective, the formative assessments must be ongoing and continuous by providing opportunities for reconstructing meanings and guiding students toward learning attainments. What has to be realised is, continuous assessment is an ‘assessment for learning’, where the assessment results are used as the constructive feedback for further learning or relearning those that have been alternatively conceptualized.

### **Conclusion**

Many countries in the west are paying more attention to the formative and developmental assessment where the learners' development is given more importance. It is also seen that the concept of assessment has progressed from the traditional notion of testing in isolation, to assessment of holistic development of the learner. Though, continuous and comprehensive evaluation has found its way at last in some parts of our country, there are many myths and misconceptions held by the practitioners as discussed in this paper. Understanding the real essence and the purpose of continuous assessment will change the narrow perspectives and the assessment procedures and practices as well. The points that have been highlighted on improving continuous assessment have a wider application and might contribute to

a better understanding of formative assessment wherever it takes place. It is also widely claimed that all assessment practices will have an impact on students' learning which can be either positive or negative. This claim can be substantiated by the evidences assembled through classroom experiences of the teachers. The assessment practices featured in constructivist context, and at the same time not losing sight of the learning attainments can be very challenging as well as promising

towards learners' development. Reflections on instructional and assessment practices based on the observations of learners' progress, and one's own insights and experiences of classroom processes and their effectiveness on learners' development would help teachers to understand their own strengths. Finally, the teachers' orientation on these lines should attempt to orchestrate the positive possibilities of classroom assessment, rather than to reduce it to a formula.

## REFERENCES

- LINN, ROBERT and NORMAN, E. GRONLUND. 2000. *Measurement and Assessment in teaching*, Eighth edition, Prentice Hall, Inc. Pearson Education, Printed in USA.
- NATIONAL COUNCIL OF EDUCATIONAL RESEARCH AND TRAINING. 2000. *National Curriculum Framework for School Education*, published at Publication Division by the Secretary, NCERT, Sri Aurobindo Marg, New Delhi.
- NATIONAL COUNCIL OF EDUCATIONAL RESEARCH AND TRAINING. 2005. *National Curriculum Framework-2005*, published at Publication Division by the Secretary, NCERT, Sri Aurobindo Marg, New Delhi.
- PAYNE, D.A. 2003. *Applied Educational Assessment* (2nd edition) Wadsworth, Printed in Canada.
- RAO, MANJULA. 2006. *Status of Evaluation Reforms in School Education – A Study in Kerala* (Monograph). Regional Institute of Education, NCERT, Mysore.
- RAO, MANJULA. 2006. *Impact of training in Continuous and Comprehensive Evaluation on the evaluation practices of teachers of primary schools in Tamil Nadu*, Published in *Indian Educational Review*, Vol. 42, No. 1, January, NCERT.
- RAO, MANJULA and ANIL KUMAR. 2004. *Evaluation in schools – training package for teachers* (Monograph). Regional Institute of Education, NCERT, Mysore.
- RAO, MANJULA. 2011. *Continuous and Comprehensive Evaluation: A sourcebook for teachers and key resource functionaries at elementary stage* (Monograph). Regional Institute of Education, NCERT, Mysore.
- RAO, MANJULA. 1998. *Training material on Continuous and Comprehensive Evaluation* (Monograph), Regional Institute of Education, NCERT, Mysore.
- RAO, MANJULA and KULAKARNI. 2002. *School-based evaluation* (Monograph), Regional Institute of Education, NCERT, Mysore
- WARD, ANNIE and MILDRED, M.W. 1999. *Assessment in the Classroom* by Wadsworth Publishing Company, Printed in USA.

## Factors Affecting Learning Outcomes at the Elementary School Level

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### ABSTRACT

*India is a democratic, socialistic republic country and committed to provide quality elementary education to all children including deprived children in the age group of 6 to 14 in the society. The slum children come from most deprived and down trodden sections of the population in urban areas. As such the country has a special responsibility for their education and welfare. In order to provide quality elementary education to slum children, adequate school resources, effective teachers, conducive physical-natural environment and quality in classroom instruction should be ensured in elementary schools in urban slum areas. Also, learning outcomes of students should be satisfactory. This research paper examines and analyses the effect of school and home factors on the learning outcomes in elementary schools in urban slums of Varanasi city. The paper also assesses the learning outcomes of students of these elementary schools. Descriptive survey method was used in the study. The study was conducted in randomly selected sample of 62 elementary schools (29 government and 33 private) in urban slums of Varanasi city. The subjects of the study were 62 headmasters/principals (29 government school headmasters and 33 private school principals), 62 teachers teaching in Class V students, and 620 students of Class V of these sampled elementary schools. Furthermore, the instruction methods adopted by teachers were observed in 62 classes of Class V. For collecting information in accordance with the objectives of the study, four tools — School Questionnaire, Teacher Questionnaire, Home Environment Questionnaire and Classroom Observation Form — were developed by the investigator. For assessing learning outcomes in elementary schools, Competency-based Mathematics and Language (Hindi) tests developed by the Department of Educational Measurement and Evaluation, NCERT (2006), were also used in the study. Data were analysed using multiple linear regression analysis, percentage, grouped-bar-diagram and Mann-Whitney 'U' test.*

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*The results of the study revealed discernible effect of five school and home factors (i.e., basic facility available in school, instructional method adopted by teacher in curriculum transaction, teacher's behaviour in classroom in order to accelerate learning among students, physical-natural environment of classroom and parents' socio-economic status) and five other school and home factors (i.e., school-community co-operation, co-curricular activity organized in school, teachers' interest and satisfaction, evaluation procedure and teaching-learning environment at home) did not significantly affect the learning outcomes at elementary stage of education in urban slums of Varanasi city. Furthermore, three school factors — teaching-learning materials available in school, maintenance of school records and supervision and teacher's qualifications — were found obstructing insignificantly the learning outcomes at elementary stage of education in urban slums of Varanasi city. The learning outcomes of elementary schools in slum areas were found not satisfactory. Learning outcomes in government elementary schools in slum areas were found significantly less than learning outcomes of private elementary schools. Also, learning outcomes of elementary schools in slum areas were found significantly less than learning outcomes of elementary schools at national level.*

## **INTRODUCTION**

The elementary education lays the foundation of physical, intellectual, social and emotional developments in the life of every human being. Being the foundation of the entire edifice of education, our commitment should be for providing quality elementary education to all children including deprived children of our society. The Government of India is committed to provide free and compulsory elementary education to all children. The Right to Education Act (RTE Act, 2009) declared free and compulsory education from age 6 to 14 as a fundamental right of children. The Government of India is also committed for the development of weaker sections of society. In its Directive Principles of State Policy,

the Constitution of India (Article 46) states: "The State shall promote educational and economic interests of the weaker sections of Indian society, specially the Scheduled Tribe and Scheduled Castes".

To fulfil the commitment, the Government of India has launched various programmes and schemes concerning quality education objected to deprived children community. The *Sarva Shiksha Abhiyan* launched in 2002, has laid special focus on disadvantaged groups of children in 6-14 age group like children from rural and difficult areas, children from SC, ST, minority communities, children with disabilities and all those who are out-of school, girls cut across all sections of society. The other programmes and schemes

are: Operation Blackboard Scheme, the Alternative, Innovative and Education Guarantee Scheme (EGS/AIE), the National Programme for Education of Girls at Elementary Level (NPEGEL), Kasturba Gandhi Balika Vidyalaya (KGBV), the Mid-day meal Scheme, etc. These initiatives have had considerable impact on children's access to education but issue of elementary education with satisfactory learning outcomes is still a major concern. In reality, learning outcomes of students belonging to disadvantaged groups dwelling in slum areas 'including poor children, girls, children from Scheduled Caste (SC), Scheduled Tribe (ST) and Other Backward Class (OBC) groups are comparatively low. Most of the students are not attaining minimum level of learning in slum areas. The students cannot properly read or write even they have completed their elementary education. Without ensuring elementary education with adequate learning outcomes in children belonging to these deprived slum community, the national as well as international commitments cannot be fulfilled.

Article 28 of the United Nations (UN) Convention stated that "state parties recognize the right of the child to education with a view to achieving this right progressively, they shall in particular (a) make primary education compulsory and available to all". The World Conference on "Education for All" in Jomtien, Thailand (5-9 March 1990)

adopted the vision that all children, young people and adults have the fundamental human right to basic education to develop their talents, improve their lives and transform their vision. The declaration insisted that universalisation of access to basic education had to mean universalisation of access to learning. The focus of basic education must, therefore, be an actual learning acquisition and outcomes rather than exclusively upon enrolment. The world Dakar framework for action, 'Education for All: Meeting Our Collective Commitments-2000, reaffirmed the world to improve access with quality of education and ensuring excellence of all so that measurable learning outcomes are achieved by all, especially in literacy, numeracy and essential life skills (World Education Forum [WEF], 2000).

A good deal of research has been conducted on effectiveness of various school factors and on relationship between school factors and pupil performance. The findings of these researches supported significant relationship between school resources and pupil performance (Benson, 1965; Card and Krueger, 1992; Kartzman, 1968; Krueger, 1999; Krueger and Lindahl, 2002; Thomas, 1962).

There is general agreement among researchers that the child's early home experiences are part and parcel of his or her learning and education. Several researchers (Marjoribanks,



1972; Burns and Homel, 1985) have detected a relationship between home environment and pupils' academic achievement. Most of the studies, conducted in India, found strong relationship between socio-economic status of parent and academic performance (Chopra, 1964; Mathur, 1963). Bradley (1985) said that home environment shows generally stronger relation to cognitive development.

School circumstances and home environment play vital role in learning achievement of students. In this context, several studies (Card and Krueger, 1992; Krueger and Lindahl, 2002; Kundu and Tutoo, 2000) have proved positive impact of school and home on pupil's performance. It was hypothesised that some school factors may contribute significantly in the development of achievement in some social setting but not for others and some social factors may lead high achievement in some school setting but not for others. The review of literature revealed the lack of such type of studies on deprived children especially on slum dwellers. Without studying the effect of school and home factors on learning outcomes of slum children, the target of providing quality education to all children, especially deprived children, cannot be assured. The present study is an attempt to explore and focus upon the effect of school and home factors on the learning outcomes of slum children at elementary stage of education.

## **Methodology**

### *Sample*

Multistage stratified random sampling technique was used for selection of sample of the study. At the first stage of sampling, all nine educational wards in Varanasi city were selected for the study, and then from each ward fifteen slum areas were randomly selected. In case of less than 15 slum areas in any ward, all the slum areas, available in the ward, were selected for the study. From the sampled slum areas, 4 government and 4 private elementary schools were randomly selected from each ward. In case of less than 4 elementary schools available in any sampled slum areas, all the elementary schools, available, were included in the sample. For the purpose of collecting information regarding schools, the headmasters of selected elementary schools were included in the sample of respondents. Further, one of the teachers, teaching in Class V, was selected by consulting headmaster of sampled schools during field visit for providing information in teacher questionnaire and for observing his classroom instructional strategy. Furthermore, for providing information regarding home environment and for assessing learning outcomes at elementary stage of education, 10 students, studying in Class V, were randomly selected from each elementary school. In this way, the sample consisted of 62 elementary schools (29 government and 33 private), 62 headmasters/

principals (29 government school headmasters and 33 private school principals), 62 teachers teaching in Class V, 62 Classes of Standard V and 620 students of Class V (10 students from each Class).

### Tools

The following tools were used to collect the data:

- (i) School questionnaire developed by the investigator.
- (ii) Teacher questionnaire developed by the investigator.
- (iii) Home environment questionnaire developed by the investigator.
- (iv) Classroom observation form developed by the investigator.
- (v) Competency-based Mathematics and Language (Hindi) test developed by the Department of Educational Measurement and Evaluation, NCERT (2006).

School questionnaire was developed to collect factual information about elementary schools. This information was related with basic facilities available in schools, teaching-learning materials available in school, information about school-community co-operation, organization of co-curricular activities, evaluation procedure adopted by school and maintenance of school records and supervision. The questionnaire contains 31 items related with basic facilities available in schools, 2 items related with teaching-learning materials available in the school, 7 items related with school-community co-operation, one item

with organization of co-curricular activities in schools, 8 items with evaluation procedure adopted by school and 3 items with maintenance of school records and supervision.

Teacher questionnaire was developed to collect the information about teachers' qualification, their interest and satisfaction in teaching profession. This questionnaire consisted of 15 items, related with teacher's qualification and teacher's interest and satisfaction in teaching-elementary schools' children in slum areas. The information regarding this questionnaire was collected from teachers in the school.

Home environment questionnaire was developed to assess teaching-learning environment available to slum children at their homes. This questionnaire consisted of 27 items related with parent's socio-economic status and teaching-learning environment available to slum children at their homes.

Classroom observation form was developed to assess the effectiveness of instructional strategy adopted by teachers in curriculum transaction and to examine the teacher's behaviour in accelerating learning among students during classroom interaction. The classroom observation form also assesses the physical-natural environment of classroom and teaching-learning material displayed in classroom. The classroom observation form consisted of 55 items, in which, 35 items were related with instructional

method, 11 items were related with physical-natural environment of classroom, 8 items were related with teaching-learning materials displayed in classroom and one item was related with teacher's behaviour in accelerating learning of students during classroom interaction. This form was one of the major instruments developed for observing teaching-learning process in real situation.

In order to ensure the trustworthiness of the tool, pilot study has been conducted and content validity was examined. The reliability coefficient of questionnaires—school questionnaire, teacher questionnaire, home environment questionnaire, examined through test-retest method, were found 0.73, 0.69 and 0.64, respectively. The inter-observer reliability of classroom observation form was established by employing Cohen's Kappa coefficient, which was found 0.69.

### **Data Analysis**

Multiple linear regression analysis, percentage and grouped-bar-diagram and Mann-Whitney 'U' tests were used for analyzing the data. Multiple regression equation was developed between learning outcomes as dependent variable and thirteen school and home factors as independent variables. Mann-Whitney 'U' Test was used for examining the significance of difference in learning outcomes at elementary stage of education of government elementary schools with that of private elementary schools.

## **Results and Discussion**

### *School and Home Factors Affecting Learning Outcomes at the Elementary School Level*

In the perspective of effect of school and home factors in the learning outcomes, the results of multiple regression coefficients  $b$  and  $\beta$ , standard error of regression coefficients,  $p$ -value, correlation coefficients  $r$  and  $\beta r$  values for thirteen school and home factors have been given in Table 1.

As can be seen from the Table 1 that un-standardized multiple regression coefficients  $b$ 's for 5 school and home factors, i.e., basic facilities available in the schools, physical-natural environment of classroom, instructional method adopted by teacher in curriculum transaction, teacher's behaviour in classroom and socio-economic status of parents were found 0.254, 0.973, 0.627, 1.249 and 0.686, respectively.  $p$ -value for these factors were found 0.031, 0.047, 0.003, 0.049, 0.044, respectively, as a result, these  $b$ 's values were found significant at .05 level of significance. It implies that individual variation in these five school and home factors are simultaneously being accompanied with variation in learning outcomes. Furthermore,  $\beta r$ 's values for these 5 school and home factors, i.e., basic facilities available in the schools, physical-natural environment of classroom, instructional method adopted by teacher in curriculum transaction, teacher's behaviour in classroom and socio-economic status

**Table 1**  
**Multiple regression coefficients  $b$  and  $\beta$ , correlation coefficients  $r$  and  $\beta r$**   
**values for thirteen school and home factors (N=62)**

S. No.	School and home factors	Un-standardized multiple regression coefficients $b$	Standard error of regression coefficients	$p$ -value	Standardized multiple regression coefficient $\beta$	Correlation Coefficient $r$	$\beta r$
1	Basic facility in school	0.254	0.114	0.031	.227	0.678	0.154
2	TLM	-0.166	0.089	0.068	-.135	0.381	-0.051
3	Physical-natural environment	0.973	0.470	0.047	0.193	0.672	0.130
4	School-community co-operation	0.123	0.538	0.820	.016	0.433	0.007
5	Co-curricular activity	0.248	0.201	0.223	.093	0.532	0.049
6	Instructional method	0.627	0.198	0.003	.282	0.697	0.197
7	Teacher's behaviour in classroom	1.249	0.610	0.049	0.184	0.619	0.114
8	Teacher's qualification	-0.006	0.061	0.918	-.006	0.091	-0.001
9	Teacher's interest and satisfaction	0.124	0.412	0.765	.022	0.402	0.009
10	Evaluation procedure	0.184	0.356	0.608	0.041	0.516	0.021
11	Maintenance of school records and supervision	-0.253	0.148	0.095	-0.241	0.139	-0.034
12	Parent's SES	0.686	0.336	0.044	0.206	0.667	0.137
13	Home teaching-learning environment	0.021	0.268	0.938	0.006	0.487	0.003

of parents were found 0.154, 0.130, 0.197, 0.114, and 0.137, respectively. It reveals that these five school and home factors, i.e., basic facilities available in the schools, physical-natural environment of classroom, instructional method adopted by teacher in curriculum transaction, teacher's behaviour in classroom and socio-economic status of parents separately contribute 15.4, 13, 19.7, 11.4, 13.7 per cent, respectively in the learning outcomes at elementary stage of education in urban slums of Varanasi city. In the present study, instructional method adopted by teacher in curriculum transaction has made maximum contribution in learning outcomes. Basic facility available in school has made second largest contribution while, socio-economic status of parents has made third largest contribution in the learning outcomes at elementary stage of education in urban slums of Varanasi city. In continuation, physical-natural environment of classrooms has made fourth largest contribution and fifth largest contribution was made by teachers' behaviour during instruction in order to accelerate learning among students.

Table 1 further shows that multiple regression coefficients (bs) for school-community co-operation, co-curricular activity organized in school, teacher's interest and satisfaction, evaluation procedure and home teaching-learning environment factors were found 0.123, 0.248, 0.124, 0.184 and

0.021, respectively. p-values for these factors were found 0.820, 0.223, 0.765, 0.608 and 0.938, respectively. Consequently, these values were not found significant at .05 level of confidence. It implies that variation in school-community co-operation, co-curricular activity organized in school, teacher's interest and satisfaction, evaluation procedure, and home teaching-learning environment factors individually are not significantly being accompanied with variation in learning outcomes score. Furthermore,  $\beta$ r value for school-community co-operation, co-curricular activity organized in school, teacher's interest and satisfaction, evaluation procedure and home teaching-learning environment factors were found 0.007, 0.049, 0.009, 0.021 and 0.003, respectively. It reveals that contribution made by school-community co-operation, co-curricular activity organized in school, teacher's interest and satisfaction, evaluation procedure and home teaching-learning environment factors in learning outcomes score were only 0.7, 4.9, 0.9, 2.1 and 0.3 per cent, respectively, that have been considered as insignificant. Multiple regression coefficients (bs) for teaching-learning material available in school, teacher's qualification, and maintenance of school records and supervision factors were found -0.166, -0.006 and -0.253, respectively. p-value for these factors were found 0.068, .918 and 0.95, respectively, consequently (bs) values for these school factors were

found not significant at 0.05 level of confidence. Furthermore,  $\beta$ r value for teaching-learning material available in school, teacher's qualification and maintenance of school records and supervision factors were found -0.051, -0.001 and -0.034, respectively. It reveals that teaching-learning material in school, teacher's qualification and maintenance of school records and supervision factors do not obstruct significantly. Instructional materials, used within the classroom to facilitate the teaching-learning process, obstruct learning outcomes comparatively

of multiple determination ( $R^2$ ) and index of forecasting efficiency for different linear regression models have been given in Table 2.

Table 2 indicates a strong positive association ( $R=0.857$ , SE of  $R=0.038$ ) between thirteen school and home factors and learning outcomes score. 'F' value ( $F=9.311$ ) for multiple correlation R between learning outcomes score and thirteen factors (school and home) was found to be significant at 0.05 level of significance with  $dfs=47, 14$ . This indicates that these thirteen predictor variables

**Table 2**

**Multiple correlation coefficient R, level of significance and index of forecasting efficiency for combined thirteen factors, eleven school and two home factors, five positive significant factors, five positive non-significant factors and three negative non-significant factors respectively ( N=62)**

<i>Factors</i>	<i>Multiple Correlation Coefficient R</i>	<i>SE of R</i>	<i>F Value</i>	<i>dfs</i>	<i>P</i>	<i>R<sup>2</sup></i>	<i>Index of forecasting efficiency</i>
Total thirteen school and home factors	0.857	0.038	9.311	14,47	.05	0.735	0.485
Eleven school factors	0.772	0.057	5.999	12,49	.05	0.595	0.364
Two home factors	0.374	0.112	3.147	3,58	NS	0.140	0.073

higher than maintenance of school records and supervision and teacher's qualifications. Teacher's qualification obstructs least in the learning outcomes of children in slum areas of Varanasi city.

### **Multiple Linear Regression Model and its Significance**

Results of multiple correlations R, level of significance and coefficient

are strongly associated with learning outcomes at elementary stage of education. Furthermore, 73.5 per cent of variance in learning outcomes was accounted for by all thirteen factors (school and home) considered together in the study, eliminating double consideration of things that they have in common. The remaining percentage of variance as well as contribution in learning outcomes,

which is 26.3 per cent, attributed by some other factors is still to be accounted for.

The index of forecasting efficiency for thirteen school and home factors was found to be very high, i.e., 48.5, indicating that prediction of learning outcomes at elementary stage of education through these school and home factors, by means of regression equation, is 48.5 per cent better than those made merely from the knowledge of means of learning outcomes scores only.

Table 2 further indicates a strong positive association between learning outcomes score and eleven school factors ( $R= 0.772$ , SE of  $R= 0.057$ ) considered in the study. 'F' value ( $F=5.999$ ) for multiple correlation R between learning outcomes and eleven school factors was found to be significant at .05 level of significance with  $dfs = 12,49$ , which indicates that the linear regression model between learning outcomes as dependent variable and these eleven school factors as independent variables are highly associated. Furthermore, 59.5 per cent of variance in learning outcomes scores was accounted for by these eleven schools factors. The index of forecasting efficiency for eleven school factors was found to be high i.e., 0.364, indicating that prediction of quality of elementary education through these eleven school factors, by means of regression equation, is 36.4 per cent better than those made merely from the knowledge of means of learning outcomes scores only.

In the context of linear regression model considering two home factors as independent variables and learning outcomes as dependent variable, table 2 shows weak association ( $R=0.374$ , SE of  $R=0.112$ ). Also multiple correlation R was found not significant ( $F=3.147$ ) at .05 level of confidence with  $dfs = 3,58$  which indicates that the linear regression model between learning outcomes as dependent variable and these two home factors as independent variables are not considerable. Furthermore, these two home factors contributed only 14 per cent ( $R^2 =0.140$ ) in learning outcomes. The remaining contribution in learning outcomes, which is 86 per cent, has been attributed by some other factors except to these two home factors.

The index of forecasting efficiency for two home factors was found to be 0.073, indicating that prediction of learning outcomes at elementary stage of education through two home factors, by means of regression equation, is very less i.e., only 7.3 per cent better than those made merely from knowledge of the means of learning outcomes scores.

### **Equation of Regression Line**

Table 1 presents the b coefficients for thirteen school and home factors. Also, intercept value was found 1.392. Using values of b coefficients and intercept, the regression equation between learning outcomes at elementary stage of education as dependent variable and thirteen

school and home factors as independent variables are as under:  
 $LOS = 1.392 + .254X_1 - .166X_2 + .973X_3 + .123X_4 + .248X_5 + .627X_6 + 1.249X_7 - .006X_8 + .124X_9 + .184X_{10} - .253X_{11} + .686X_{12} + .021X_{13}$

Where LOS= learning outcomes score,  $X_1$ =basic facility,  $X_2$ =teaching-learning material,  $X_3$ =physical-natural environment,  $X_4$ =school-community co-operation,  $X_5$ = co-curricular activity,  $X_6$ =instructional method,  $X_7$ =teacher's behaviour during teaching,  $X_8$ =teacher's qualification,  $X_9$ =teacher's interest and satisfaction,  $X_{10}$ =evaluation procedure,  $X_{11}$ =maintenance of school records and supervision,  $X_{12}$ =parent's socio-economic status and  $X_{13}$ =home teaching-learning environment.

With this regression equation, one could predict learning outcomes

in the elementary school in urban slums, knowing thirteen school and home factor's scores.

### **Learning Outcomes of Elementary Schools Students in Urban Slums of Varanasi City**

Table 3 shows that there was not a single student found in mastery grade either from government or private schools. In excellent grade only 8.788 per cent of students were found in private schools. In good grade 11.698, 16.970 and 14.334 per cent of students were found in government, private and total schools, respectively. In average grade, 14.734, 22.121 and 18.428 percentages of students were found from government, private and total schools, respectively. In minimum grade, the percentage of students' frequencies of government, private

**Table 3**  
**Percentage of elementary schools' students' frequencies in different grades of learning outcomes**

<i>Learning outcomes (range)</i>	<i>Description of grade</i>	<i>Percentage of students' frequency (government school)</i>	<i>Percentage of students' frequency (private school)</i>	<i>Percentage of students' frequency (all sampled schools)</i>
0-34	Below minimum grade	63.369	39.091	51.230
35-39	Minimum grade	10.189	13.030	11.610
40-49	Average grade	14.734	22.121	18.428
50-59	Good	11.698	16.970	14.334
60-79	Excellent	0	8.788	4.394
80-100	Mastery grade	0	0	0
0-100	Total	100	100	100



and total schools were found 10.189, 13.030 and 11.610, respectively. Table 3 also shows that, maximum number of students was found in below minimum grade. The percentage of frequencies in below minimum grade, from government, private and total schools was found to be 63.369, 39.091 and 51.230 per cent respectively. The results indicate that, in higher grades of learning outcomes, the percentages of students of private schools are comparatively higher than the percentage of students of government schools. While in lower grades of learning outcomes, the percentage of students of government schools was found comparatively higher than

the percentage of students of private schools. This reveals the fact that in urban slums of Varanasi city, private education is comparatively better than the government education.

The bar diagram, given in Figure 1, depicts the facts that in below minimum grade the concentration of students are maximum and in minimum grade, percentage of students are low. In upper grades the percentages of students' of government, private and total sampled schools continuously decrease. Bar diagram also depicts that in upper grades, the percentage of students in private school was found comparatively higher than percentage of students in government schools.

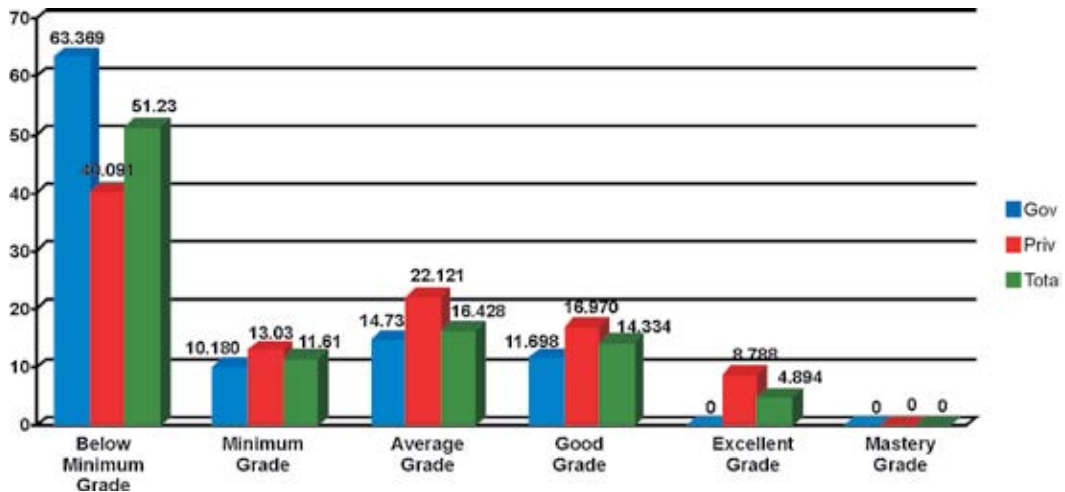


Figure 1: Percentage of students' frequencies of government, private and total sampled schools in different grades of learning outcomes

**Table 4**  
**Mean, SE of means, SD, variance and ranges of learning outcomes of government, private and total sampled elementary school students in urban slums of Varanasi city**

<i>Statistical Values</i>	<i>Government School</i>	<i>Private School</i>	<i>Total Sampled School</i>
Mean of learning outcomes	28.650	36.267	32.875
Standard Error of Mean	0.771	0.678	0.531
Standard Deviation of learning outcomes	12.545	12.319	12.944
Variance of learning outcomes	157.384	151.766	167.538
Range of learning outcomes	0-52	7-69	0-69

Table 4 indicates that the mean of learning outcomes of students of government and private elementary schools was found 28.650 and 36.267, respectively while average learning outcomes of students of total sampled schools was found 32.875, which shows that mean learning outcomes of government elementary schools is comparatively lower than mean learning outcomes of private-managed elementary schools. Besides, Table 4 also shows that the standard error of mean for government, private and total schools students were found 0.771, 0.678 and 0.531, respectively. Standard deviation of learning outcomes were found 12.545, 12.319

and 12.944, respectively and the variance of learning outcomes of government, private and total schools students were found 157.384, 151.766 and 167.538, respectively. The learning outcomes vary from 0 to 52, 7 to 69 and 0 to 69 for government, private and total sampled schools, respectively. Higher variance in learning outcomes of students of government schools indicate that scores obtained by students in government schools are distributed widely than in private schools. Here it can be deduced that learning outcomes in private elementary schools is comparatively better than that of government schools.

**Table 5**  
**Significance of difference in means of average learning outcomes of government and private elementary schools in urban slums of Varanasi city.**

<i>Types of School</i>	<i>Mean of learning outcomes</i>	<i>No of Schools</i>	<i>Sum of Ranks <math>\sum R</math></i>	<i>Value of U</i>	<i>Value of Z</i>	<i>SIG</i>
Government School	28.650	29	552.5	117.5	5.093	≤.05
Private School	36.267	33	1400.5			

Table 5 reveals that obtained Z value was found to be significant at 0.05 level of confidence with df=60. It means that the group of students of government and private schools differ significantly with respect to the learning outcomes of elementary education. The above table further shows that the mean learning outcomes score of private schools was found to be higher than that of government schools. It means that learning outcomes at elementary stage of education in private elementary schools are significantly better than that of government elementary schools in urban slums of Varanasi city.

**Learning Outcomes of Elementary School Students in Urban Slums as compared to Learning Outcomes of Elementary School Students at National Level**

Table 6 presents the facts that in the learning outcomes range of 0-49, the percentage of students

at national level, government school level and private school level were found to be 44.50, 88.292 and 74.242, respectively. In the middle range of learning outcomes 50-59, the percentage of students at national level, government school and private school levels were found to be 16.02, 11.698 and 16.970 per cent respectively. In upper range of learning outcomes (60-100), the percentage of students at national, government and private students were found to be 39.48, 0 and 8.788 per cent respectively. From these results, it can be deduced that in low range of learning outcomes (0-49) the percentage of students in sampled elementary schools is comparatively higher than that of at national level. In learning outcomes range (50-59), the percentage of the students in sampled elementary schools is comparatively low than that of at national level. In higher range of learning outcomes (60-100) the percentage of students in sampled

**Table 6**  
**Percentages of sampled elementary school and national levels elementary school students' frequencies in different ranges of learning outcomes**

<i>Learning Outcomes (Range)</i>	<i>Percentage of students (government school)</i>	<i>Percentage of students (private school)</i>	<i>Percentage of students (total sampled schools)</i>	<i>Percentage of students (national level)*</i>
0- 49	88.292	74.242	81.268	44.50
50-59	11.698	16.970	14.334	16.02
60-100	0	8.788	4.394	39.48
Total 0-100	100	100	100	100

\* National level students' frequencies are taken from learning achievement of students at the end of Class V, NCERT, 2000.

elementary schools is very low than that of at national level.

The bar diagram given in Figure 2 also depicts that in lower grade (0-49) the concentration of students is maximum and comparatively higher

found 52.54 and 19.80, respectively. It shows that the mean learning outcomes of elementary education at national level is comparatively higher than that of elementary education in slums of Varanasi city.

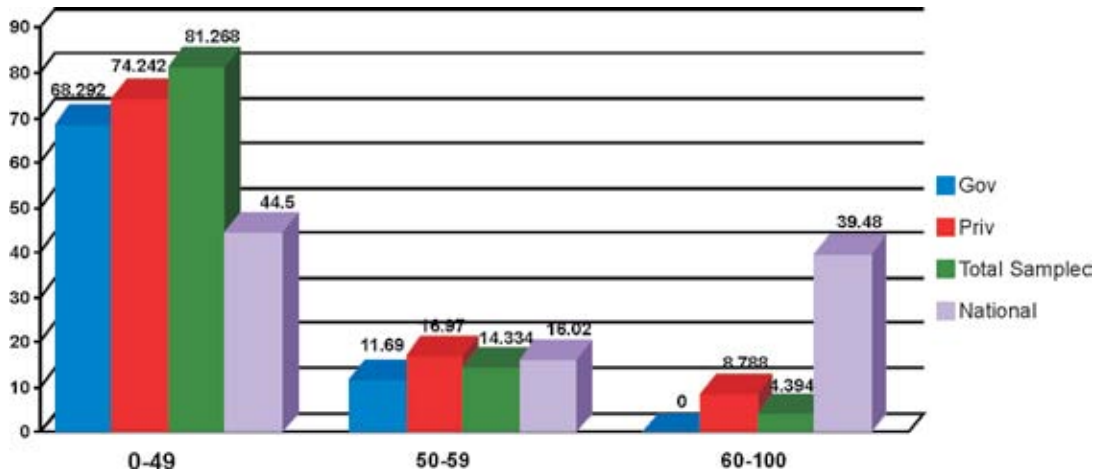


Figure 2: Proportion of elementary schools students frequencies in different learning outcomes' range

than national level. In middle grade (50-59), the percentages of students are low and almost same as it was found at national level. In upper grades, the percentages of students are comparatively less than it was found at national level. Here, it may be deduced that learning outcomes at elementary stage of education in urban slums of Varanasi city is not satisfactory as it compared to national level.

The mean and standard deviation of learning outcomes of sampled elementary schools students were found 32.875 and 12.944, while, at national level (NCERT, 2000), mean and standard deviation were

## Discussion

The present study attempted to find out and focus upon the effect of thirteen school and home factors in learning outcomes of elementary school children of slum areas. The results of the study supported discernible effect of five school and home factors (i.e., basic facility available in school, instructional method adopted by teacher in curriculum transaction, teacher's behaviour in classroom in order to accelerate learning among students, physical-natural environment of classroom and parents' socio-economic status) on the learning outcomes at elementary stage of education in urban slums of

Varanasi city. The result regarding the discernible effect of basic facilities on the learning outcomes is in agreement of the findings of the earlier studies by (Bonesronning, 2003; Fuller, 1987; Heyneman and Loxely, 1983); however, the results contradicts the findings of the other studies by Hanushek and Kimko (2000), and Hanushek and Luque (2003) that have shown insignificant effect of school resources on pupils' test scores. It seems that the present study, conducted in one of the deprived area of a developing country like India, basic amenities in all sampled slum schools (government and private) were found in disparity; hence, variation in basic amenities was observed to exert influence on the learning outcomes at elementary stage of education.

Teacher directly influences learners by his teaching strategies and behaviour. The results regarding the effect of instructional method adopted by teacher in curriculum transaction on the quality of elementary education is in agreement of the earlier findings of the survey conducted by the Central Advisory Council on Education (1969) and studies conducted by Heyneman and Loxley (1983), and Robinson and Sink (2002). Furthermore, the result regarding the effect of teachers' behaviour during instructional process in order to accelerate learning among students was similar to the results obtained in recent studies conducted

by Capraro, 2001 and Ziegler and Yan, 2001. These studies have formerly shown the positive impact of instruction on learner's outcomes. In the present study, the variation in learning outcomes was discernible in those elementary schools where learner-centered approach has been followed by teacher in curriculum transaction. Since learner-centred approach in teaching encourages students' active engagement in academic material, questioning, experimenting, reflecting, discussing and creating personal meaning (Smith, 1999) and this approach has also been supported in most of the earlier research studies (Capraro, 2001; Robinson and Sink, 2002; and Ziegler and Yan, 2001). Learning outcomes in those elementary schools was found better where teachers had adopted appropriate strategy of teaching-learning process based on learner-centred approach. In this context, mono grade teaching inside classroom, learner-centred approach of teaching, interactive classroom, encouraging group works, use of adequate teaching-learning materials, methodological skill-based teaching, adopting diagnosis and remedial measures, friendly behaviour with children affected learning outcomes.

It is usually accepted that physical-natural environment of a school such as indoor air quality, ventilation and thermal comfort, lighting and acoustics affect learning outcomes of students. Since clean,

quiet, safe, comfortable and healthy environments are important components of successful teaching and learning. A number of studies have shown that the elements of physical-natural environment of classroom such as poor lighting (Dunn et al., 1985; Phillips, 1997), inappropriate ventilation (Phillips, 1997), inoperative heating and cooling systems, noisy external environments, availability and quality of classroom equipments and furnishings, as well as ambient features such as climate control and acoustics affect achievement of students. The results of the present study regarding the effect of physical natural environment of classroom on the learning outcomes validate the results obtained in previous studies conducted by Hortons (1972), Luckiesh and Moss (1940), Phillips, (1997). It seems that many schools, running in high-poverty slum areas of Varanasi city have poor physical-natural environment in classrooms. The variation in physical-natural environment factors, especially in private schools, exerts discernible positive influence in the learning outcomes of children.

Family, being the first and major agency of socialization, has great influence and bearing on the development of the child. It is the home, which sets the pattern for the child's attitude towards people and society, aids intellectual growth in the child and supports his aspirations and achievements.

Research studies have previously revealed the importance of family background characteristics, such as Socio-Economic Status (SES) of the family, and teaching-learning environment at home in explaining variation in students' achievement, and the relatively small impact of school characteristics on students' achievement (Colman, 1966; Kundu and Tutoo, 2000; Maicibi, 2005; Teddlie and Reynolds, 2000). The result regarding the effect of parents' socio-economic status on quality are in agreement of the findings of earlier studies conducted by Chopra (1964), Colman et al. (1966), Kulkarni (1970), Mathur (1964), Prakash (1975), Shukla (1994) and Singh and Saxena (1995). Many of the parents that live in slums are illiterate. Because of their illiteracy, uncertainty of job and low income and seeing little use for their children to go to school than to help in their work they put their children to work for little wages. It seems that the parents, whose socio-economic statuses are comparatively better and are motivated toward benefit of education, ensure private elementary education to their wards. Due to comparatively better education, given in private schools, the learning outcomes correspondingly vary in elementary schools of Varanasi slum areas. It also seems that the learning outcomes score varies due to variation in parents' residence, education and their occupation. The residence in safe and vigorous natural environment, higher education

of parents and their better financial position were the possible causes for variation in learning outcomes. Five other school and home factors (i.e., school-community co-operation, co-curricular activity organized in school, teachers' interest and satisfaction, evaluation procedure and teaching-learning environment at home) did not significantly affect the learning outcomes at elementary stage of education in urban slums of Varanasi city. The importance of school-community co-operation has been strongly recognised in *Sarva Shiksha Abhiyan*. The present study did not support the significant effect of school-community co-operation on learning outcomes of children. It seems that, in slum areas, schools were not properly organizing parent-teacher meetings at regular intervals. Due to poor socio-economic status of the community, the slum dwellers contributed insignificantly in school development. Also the guardians, due to their low standard of education, in slum areas were insincere with continuous and comprehensive development of their wards. They did not regularly attend parent-teacher meetings organized in school.

Results regarding the insignificant effect of co-curricular activities on learning outcomes were not found in agreement with the results obtained in the studies conducted by Bauer and Liang (2003), Broc (2003), and Noam, Biancarosa and Dechausay (2003). These studies have shown that participation in extra-curricular

activities positively influence pupils' performance. It seems that teachers, in slum areas, are not familiar with the objectives of extra-curricular activities and its role in all-round development of children; also these activities are not being properly organized due to poor economic status of elementary schools in slum areas of Varanasi city. It has been accepted that working condition in school affects teaching-learning process. The poor working conditions in school obstruct work of teachers; it reduced levels of effort; it is cause of low morale and finally it reduces job satisfaction. On the contrary, good working conditions result in enthusiasm, high morale, co-operation and acceptance of responsibility. The results regarding the inconsequential effect of teacher's interest and satisfaction in teaching profession on learning outcomes at elementary stage of education did not support the findings obtained in study conducted by Ladd (2009). It seems that the de-motivating conditions for teachers in slums like slum environment, insufficient salary, ad hoc post, etc., are the rationale of insignificant effect of teachers' interest and satisfaction on learning outcomes at elementary stage of education.

Evaluation has been an integral part of teaching-learning process. It is essential for good measurement of pupils' achievement as well as improving the measurement value and pedagogical value of instrument.

An effective evaluation helps in improving instruction and students' learning. Old system of evaluation has been ineffective due to organizing only terminal written examinations, evaluating only cognitive development and memory of learners, neglecting affective and psychomotor domain, giving more importance to summative evaluation and ignoring continuous and comprehensive nature of evaluation. The new system of evaluation focuses on continuous and comprehensive evaluation, evaluating all aspect of development through different methods, grading and semester system, and formative and summative evaluation leading to immediate feedback, knowledge of result, diagnosis, remediation, gradation and placement (National Education Policy, 1986). Since the new approach of evaluation is not being properly used in elementary schools in urban slum areas and elementary schools' teachers are not familiar with new trends of evaluation, traditional pattern of examinations are being followed for primarily maintaining records. The role of evaluation in learners' betterment and personality development is almost negligible in old pattern of evaluation system.

A good and compassionate environment at home enhances child's learning outcomes. It has also been exposed that most of the children who are successful, great achievers and well adjusted come from the families where wholesome relationships exist. The results

regarding the insignificant effect of teaching-learning environment at home on the learning outcomes did not support the finding of earlier studies which have shown vital role of family background characteristics such as teaching-learning environment at home in explaining variation in student achievement (Coleman et al., 1966; Maani, 1990; Maicibi, 2005); also, highly significant positive relationship between the variables of academic achievement and family scores (Shaha and Sharma, 1984). It is quite possible that the weak association between home learning environment and quality scores, in present study, is due to quite similar deprived socio-economic condition of slum dwellers in Varanasi city. Consequently, these slum dwellers disburse minimum of their earning on the study of their wards. Therefore, high-quality teaching-learning environment at home in context of availability of teaching-learning materials, provision of home tuition, guidance at home, involvement and motivation by parents, availability of sufficient time for study at home, etc. is not available to slum children.

Further, the slum homes failed to provide a variety of objects, play things and stimuli to children's senses. The environmental deprivation in slum areas seems to result into a depression of learners' academic development and proficiency in various competencies. Also, a majority of slum parents were uneducated



or insufficiently educated and had little time or ability to develop the necessary language skills among their children through conversation and other verbal interaction. The deprivation in context of these characteristics seems to impact the learning outcomes of children.

From the results, three school factors insignificantly obstruct the learning outcomes at elementary stage of education in urban slums of Varanasi city. These factors are: teaching-learning materials available in school, maintenance of school records and supervision and teacher's qualifications. The result regarding the effect of teaching-learning material available in schools did not support the results obtained in previous study by Benson (1965), who has established positive association between instructional expenditure per pupil and pupil's achievement. But the result was found in agreement of the findings of some other studies, that have earlier shown either no or very limited impacts of teaching-learning materials such as textbooks (Glewwe et al., 2009) and flip charts (Glewwe et al., 2004) on student test scores. Here, it seems that teaching-learning materials available in school were mostly on record and in practice these materials are not being effectively used. Government schools have reported availability of maximum instructional materials but these materials were not being properly used in classroom transaction; while,

a few instructional materials available in private elementary schools were being utilized comparatively better. Maintenance of school record and supervision is necessary for making conducive teaching-learning environment in school and stimulating teaching-learning process. There is a need for sound evaluation of education personnel since effectively educating students and achieving other related goals depends on the use of evaluation by educational institutions to select, retain, and develop qualified personnel and to manage and facilitate their work (Stufflebeam, 1993). The purpose of evaluation is to improve the performance of the individual and the organization (Reeves, 2004). Here, it seems that school records in elementary schools in urban slum areas of the city are made only for supervision purposes and these records were not functional for the purpose of learner assessment and perfection. Also the purpose of supervision is not clear to head of schools. Teachers' qualification was found not considerably affecting the learning outcomes at elementary stage of education. In previous research studies, teacher qualifications like experience, education and in-service training had little effect on students' achievement (Harris and Sass, 2006; Rivkin et al., 2005); while, in other studies, the effect of teacher's qualification on students' achievement was found positive (Aaronson et al.,

2007; Clotfelter et al., 2007), also the impact of teacher's efficiency variables such as teachers' reading and writing skills and professional knowledge (Ferguson, 1996; Strauss and Sawyer, 1986), teacher's verbal aptitude (Ehrenberg and Brewer, 1994), and pedagogical knowledge were found significantly affecting the students' achievement scores. The results obtained in the present study, regarding the negligible effect of teacher qualification, was not in agreement of the results obtained in the studies conducted by Clotfelter et al. (2007), Frome, Lasater and Cooney (2005), Goldhaber (2007), Rivkin et al. (2005), and Strauss and Sawyer (1986). But result of present study was identical to the results obtained in other studies conducted by Aaronson et al. (2007), and Rowan, Correnti and Miller (2002). In urban slums of Varanasi city, most of the teachers were working on ad hoc/daily basis at very low payment. They hold hardly graduate degree and very few of them were trained for teaching elementary school students. These were the possible reasons of insignificant negative association of teachers' qualification with the learning outcomes at elementary stage of education in urban slums of Varanasi city.

The results of coefficient of multiple determination ( $R^2$ ) reveals the fact that multiple linear regression model between quality score considered as dependent variable and thirteen school and

home factors as independent variables is significant. The higher value of forecasting index for these thirteen school and home factors indicate that prediction of quality of elementary education through regression equation is comparatively better than those made merely from knowledge of the means of quality scores. Here it can be deduced that these thirteen school and home factors are pertinent in regard to quality of elementary education. Previous research studies have exposed the importance of school inputs and family background characteristics in pupil performance (Bonesronning, 2003; Cash 1993; Coleman et al., 1966; Mollenkopf and Melville, 1956; Teddlie and Reynolds, 2000). These research studies have concluded that school inputs and family background characteristics play vital role in learning outcomes. In this context, the results obtained in the present study confirm the pivotal role of school inputs and home environment in quality determination. The study further revealed that school factors contributed comparatively higher than home background factors in the quality of elementary education in urban slums of Varanasi city. However, the results obtained, in this context, in previous studies were contradictory. Research studies have previously exposed the importance of family background characteristics, such as socio-economic status (SES) of the family, and teaching-learning environment at home in explaining

variation in student achievement, and relatively small impact of school characteristics on student achievement (Coleman et al., 1966). It seems that in present study, school inputs play foremost role in quality determination due to trivial variation in family background characteristics in comparison to variation in school circumstances in slum areas.

The present study has shown that the learning outcomes varied across schools in urban slums of Varanasi city. Most of the students could not achieve higher grades of learning. The finding by Jangira and Yadav (1994) and Singh and Saxena (1995) that there was a marked difference in achievement across schools are confirmed by this study. Furthermore, a number of research studies have shown that management and leadership affect the learning outcomes in schools. Privately-managed schools are more efficient than government-managed schools. In the present study, the learning outcomes of private elementary schools was found considerably better than the learning outcomes of government elementary schools in urban slums of Varanasi city. This finding conforms to that of the study by Kulkurni (1970). Private schools are comparatively better in providing basic facilities, utilizing teaching-learning material and conducive teaching-learning environment to their children. It seems that instructional method and teacher's behaviour in classroom

were comparatively methodological in private schools, hence more efficient in achieving the goal set by school in context of learners' outcomes. In most of government schools teaching-learning materials and organization of co-curricular activities were on record only. Since, the purpose of evaluation is to improve the performance of the individual and the organization (Reeves, 2004), it seems that private schools were evaluating their students continuously and comprehensively in context of different personality aspects while in government schools, evaluation of students was not comprehensive. Possibly these were the foremost reasons of comparatively better learning outcomes of private elementary schools.

Concern to improve the learning outcomes at elementary stage of education has been highest priority agenda in almost all countries throughout the world. In earlier studies, it has been revealed that the schools, concentrated with minority or disadvantaged students, are negatively associated with achievement and these schools accounts for a substantial amount of variability in achievement (Bryk and Raudenbush, 1988). In particular, schools with higher proportions of minority and disadvantaged students have lower average achievement than other schools. Other school composition variables such as school SES are also significantly associated with student achievement (Lee and

Bryk, 1989). Higher SES schools have typically higher average achievement than lower SES schools. Major research studies and achievement surveys in India found the academic performance of primary schools' students, belonging to deprived community, to be disappointingly low. In the present study, the learning outcomes of elementary education provided to deprived section in slum area of Varanasi city was found qualitatively low than average learning outcomes of elementary education provided at national level. It obstruct in achieving the goal of universal elementary education of a satisfactory quality to all the children in country. The finding of the study, that slum children had low learning outcomes, are in agreement of the findings of earlier studies conducted by Chandrashekharaiiah (1969), Chopra, 1964, Dave (1963), Shah, and Sharma (1984). These studies have already shown that academic achievement of children belonging to deprived categories dwelling in slum areas considerably differ with the academic achievement of children belonging to privileged categories. In slum areas of Varanasi city, the possible causes of low learning outcomes may be teachers using traditional method of teaching in curriculum transaction, unfamiliarity with innovative learner-centred method, inefficient teachers' behaviour during instruction in accelerating learning among students. In these schools, students were not given the opportunity to

ask questions, express ideas and participate in open discussion during instruction. Since non-threatening interactions allow students to ask questions, practice the free expression of ideas, develop their own skills and improve class discussion (Paswan and Young, 2002). It further seems that, in slum elementary schools, students did not have access to sufficient basic facility in schools, qualified teachers having interest in teaching profession, conducive physical- natural environment and teaching-learning material. The co-curricular activities had been rarely organized in these schools.

### **Educational Implications of the Study**

The present study will enrich the existing stock of knowledge in the field of elementary education, especially, in enhancing learning outcomes of deprived children. Further, the study will serve the purpose of academicians, professional, researchers, administrators, economists and planners concerned with elementary education. Consequently, it would also provide opportunity to the researchers to disseminate their knowledge and experience worldwide. As far as the applicability and usefulness of the study is concerned, the following are the thrust areas where the study may be helpful:

- The study may be beneficial for making policy decision and formulating special

programmes for achieving goal of universalisation of elementary education with satisfactory learning outcomes.

- The study may be beneficial for teachers, headmasters and parents in order to enhance learning outcomes of deprived children in the society.
- The present study reveals the fact that basic facilities available in schools, instructional method used in curriculum transaction, teacher's behaviour in classroom, physical-natural environment, and parent's socio-economic status significantly affect the learning outcomes at elementary stage of education in slum area of Varanasi city.

By improving status of these factors in slum areas, the learning outcomes of elementary education can be improved:

- There is considerable difference in

learning outcomes of elementary education in slum areas and learning outcomes at national level. The study draws the attention and calls for intensifying school improvement programmes specifically in deprived areas.

- Government schools perform lower than the private-managed schools. Hence the improvement programmes should be designed keeping in view of the specific needs of the government schools.
- There is a positive association between mean SES of parents and outcomes of teaching-learning process. The deprived young parents in the low mean SES school need to have priority in adult literacy programmes.
- The results of the study may be useful in achieving the right of children to free and compulsory elementary education, as envisaged in RTE Act, 2009.

## REFERENCES

- AARONSON, D., BARROW, L., and SANDER, W. 2007. Teachers and student achievement in the Chicago public high schools. *Journal of Labour Economics*, 25(1), 95-135.
- AHMAD, M. 1993. Identification and analysis of educational and socio-economic factors affecting the standards of education: A research study of secondary schools in Karachi west and central districts, Unpublished Ph.D. Dissertation, Institute of Education and Research (IER), Karachi.
- BAUER, K.W. and LIANG, Q. 2003. The effect of personality and precollege characteristics on first-year activities and academic performance. *Journal of College Student Development*, 44, 277-290.
- BENSON, CHARLES, S. et al. 1965. State and local fiscal relationship in public education in California: Report of the senate fact-finding committee on revenue and taxation. California: Senate of the California.

- BONESRONNING, H. 2003. Class size effects on student achievement in Norway: Patterns and explanations. *Southern Economic Journal*, 69(4), 952-965.
- BRADLEY, R. 1985. Social-cognitive development and toys. *Early Childhood Special Education*, 5, 11-15.
- BROC, M.A. 2003, Self-concept, self-esteem and academic performance in fourth year secondary students. *Revista Denvesigacion Educativa*, 18, 119-146.
- BRYK, A.S., and Raudenbush, S.W. 1988. Toward a more appropriate conceptualization of research on school effects: A three-level hierarchical linear model. *American Journal of Education*, 97, 65-108.
- BURNS, H.M. and Homel, R. 1985. Social inequalities and adjustment to school. *The Australian Journal of Education*, 69 (7), 518-530.
- CAPRARO, M.M. 2001. Defining constructivism: Its influence on the problem solving skills of students. Paper presented at the Annual Meeting of the Southwest Educational Research Association, New Orleans, LA.
- CARD, D. and Krueger, A.1992. Does school quality matter? Returns to education and the characteristics of public schools in the United States. *Journal of Political Economy*, 100 (1), 1-40.
- CASH, C. 1993. A study of the relationship between school building condition and student achievement and behaviour. Unpublished doctoral dissertation, Virginia Polytechnic Institute and State University, Blacksburg, VA.
- CENTRAL ADVISORY COUNCIL FOR EDUCATION. 1969. *Children and their primary schools*, (Plowden Report), Vols. I and II, London: H.M.S.O.
- CHANDRASEKHARALAH, K. 1969. *Educational problems of Scheduled Caste*. Department of Sociology, Karnatak University, (NCERT financed).
- CHOPRA, S.L. 1964. A study of the relationship of socio-economic factors with the achievement of the students in secondary schools., Unpublished Ph. D. thesis, Lucknow University, Lucknow.
- CLOTFELTER, C., LADD, H., and VIGDOR, J. 2007. How and why do teacher credentials matter for student achievement?. NBER Working Paper 12828.
- COLEMAN, J.S. 1966. Equal schools or equal students? *The Public Interest*, 4, 70-75.
- COLEMAN J.S., CAMPBELL E.Q., HOBSON C.J., McPartland J., Mood A. M., Weinfeld F.D., and York R.L. 1966. *Equality of Educational Opportunity*, Washington, D.C.: U.S. Government Printing Office.
- DAVE, R.H. 1963. The identification and measurement of environmental process variables related to educational achievement. Unpublished doctoral dissertation, University of Chicago.
- DELORS, J. et al. 1996. *Learning: The treasure within*: Report to UNESCO of the international commission on education for the twenty-first century. Paris: UNESCO.
- DEPARTMENT OF ELEMENTARY EDUCATION AND LITERACY. (n.d.). *Sarva Shiksha Abhiyan*: Programme for Universal Elementary Education in India. Retrieved, July 17, 2010, from Error! Hyperlink reference not valid.

- DEPARTMENT OF ELEMENTARY EDUCATION. 2003. Monitoring Formats for Quality Dimensions under SSA. NCERT, New Delhi.
- DUNN, R. KRIMSKY, J.S., MURRAY, J.B. and QUINN, P.J. 1985. Light up their lives: A research on the effects of lighting on children's achievement and behavior. *The Reading Teacher*, 38(19), 863-869.
- EFA GLOBAL MONITORING REPORT. 2005. Retrieved, December 15, 2011 from [http:// www.unesco.org/new/en/education](http://www.unesco.org/new/en/education)
- EHRENBERG, R.G. and Brewer, D.J. 1994. Do school and teacher characteristics matter? Evidence from High School and Beyond. *Economics of Education Review*, 13(1), 1-17.
- FERGUSON, R., Ladd, H. 1996. How and why money matters: An analysis of Alabama schools. In Ladd, H. (Ed.). *Holding schools accountable: Performance-based reform in education*, 265-298. Washington, DC: Brookings Institute.
- FROME, P., LASATER, B., and COONEY, S. 2005. Well-qualified teachers and high-quality teaching: Are they the same? Retrieved, July 15, 2011, from [http:// www.Sreb.org/ programs/hstw/publication/briefs/05v06-Research-Brief-high quality-teaching.pdf](http://www.Sreb.org/programs/hstw/publication/briefs/05v06-Research-Brief-high-quality-teaching.pdf)
- FULLER, B. 1987. What school factors raise achievement in the third world. *Review of Educational Research*, Vol. 57 (3). 17-35.
- GLEWWE, PAUL, KREMER, M., and MOULIN, S. 2009. Many children left behind? Textbooks and test scores in Kenya. *American Economic Journal: Applied Economics*, 1:1, 112-135.
- GLEWWE, PAUL, KREMER, M., MOULIN, S., and ZITZEWITZ, E. 2004. Retrospective vs. prospective analyses of school inputs: The case of flip charts in Kenya. *Journal of Development Economics*, 74: 251-268.
- GOLDHABER, D. 2007. Everyone's doing it, but what does teacher testing tell us about teacher effectiveness? *Journal of Human Resources*, 42(4), 765-794.
- GOVERNMENT OF INDIA. 1986. *National Policy on Education-1986*. MHRD, New Delhi.
- GOVERNMENT OF INDIA. 1951-2002. Five year plans of India, I,II,III,IV,V,VI,VII,VIII,IX and X, Five Year Plans, (Chapters on Elementary Education). Planning Commission, GOI. New Delhi
- HANUSHEK, E. A. and LUQUE, J.A. 2003. Efficiency and Equity in Schools around the World. *Economics of Education Review*, 22 (5), 481-502.
- HARRIS, D. and SASS, T. 2006. The effects of teacher training on teacher value added. Working paper, Florida State University.
- HEYNEMAN, S.P., and LOXLEY, W.A. 1983. The effect of primary school quality on academic achievement scores across twenty-nine low and high income countries. *American Journal of Sociology*, 88, 1162-1194.
- HORTON, C.D. 1972. Humanization of the learning environment. Arlington, VA: Hollway. (ERIC Document Reproduction Service No. ED066929).
- JAMISON, D., SEARLE, B., GALDA, K., and HEYNEMAN, S. 1981. Improving elementary mathematics education in Nicaragua: An experimental study of the impact of

- textbooks and radio on achievement. *Journal of Educational Psychology*, 73(4), 556-567.
- JANGIRA, N.K. and YADAV, D.D. 1994. *Learning Achievement of Primary School Children in Reading and Mathematics*. NCERT, New Delhi .
- KATZMAN, and MARTIN, T. 1968. Distribution and production in a big city elementary school system. *Yale Economic Essays*, 15(2), 201-256.
- KRUEGER, A. and LINDAHL, M. 2002. The School's Need for Resources – A Report on the importance of small classes. The Expert Group on Public Finance (ESO), Stockholm.
- KRUEGER, A.B. 1999. Experimental estimates of education production functions. *Quarterly Journal of Economics*, 114, 497-532.
- KULKARNI, S.S. et al. 1970. *All India Survey of Achievement in Mathematics*. NCERT, New Delhi.
- KUNDU, C.L. and TUTOO, D.N. 2000. *Educational Psychology*. Sterling Publishers Pvt. Ltd., New Delhi.
- LADD, H. 2009. Teachers' perceptions of their working conditions: How predictive of policy relevant outcomes? CALDER Working Paper 33. Washington, DC: National Center for Analysis of Longitudinal Data in Education. Retrieved, March 2, 2011, from <http://www.urban.torg/uploadedpdf/1001440-Teachers-Perceptions.pdf>.
- LEE, V.E., and BRYK, A.S. 1989. A multilevel model of the social distribution of high school achievement. *Sociology of Education*, 62, 172-192
- LUCKIESH, M. and MOSS, F.K. 1940. Effects of classroom lighting upon the educational progress and visual welfare of school children. *Illuminating Engineering*, 35, 915-938.
- MAANI. 1990. Factors Affecting Academic Performance. Unpublished dissertation, Makerere University, Kampala, Uganda.
- MAICIBI, N. A. 2005. *Pertinent issues in management: Human resource and educational management*. Net Media Publishers Ltd, Washington, DC.
- MARJORIBANKS, K. 1972. Environment, social-class and parental abilities. *Journal of Educational Psychology*, 63 (2), 103-109.
- MATHUR, K. 1964. Effects of socio-economic status on achievement and behaviour in higher secondary schools. Unpublished Ph.D. thesis, Agra University, Agra.
- MINISTRY OF HUMAN RESOURCE and DEVELOPMENT (MHRD). 2002. *Sarva Shiksha Abhiyan—A document*. MHRD, GOI, New Delhi.
- MOLLENKOPF, WILLIAM, G., and MELEVILLE, S. D. 1956. A study of secondary school characteristics as related to test scores. *Research Bulletin*, 56-6 (Mimeographed).
- NCERT. 2004. *Modules on Quality Dimensions of Elementary Education under SSA*. NCERT, New Delhi.
- NCERT. 2000. Learning achievement at the end of class V. Retrieved, June 27, 2011, from [http://www.ssa.nic.in/quality\\_of\\_education/](http://www.ssa.nic.in/quality_of_education/)
- NOAM, G.G., BIANCAROSA, G. and DECHAUSAY, N. 2003. *Afterschool education: Approaches to an emerging field*. Harvard University, Massachusetts.



- PASWAN, K.A. and YOUNG, J.A. 2002. Student evaluation of instructor: A nomological investigation using structural equation modelling. *J. Mark Educ.* 24(3), 193-202.
- PHILLIPS, R.W. 1997. Educational facility age and the academic achievement of upper elementary school students. Unpublished Doctoral Dissertation, University of Georgia.
- PRAKASH, S. 1975. Use of sample survey techniques to study the problems of education of children of Delhi and Bombay slums. NUEPA, New Delhi.
- REEVES, D. 2004. *Assessing educational leaders: Evaluating performance for improved individual and organizational results*. Corwin Press, Thousand Oaks, CA.
- RIVKIN, S., HANUSHEK, E., and KAIN, J.F. 2005. Teachers, schools and academic achievement. *Econometrica*, 73(2), 417-458.
- ROBINSON, H.L., and SINK, C.A. 2002. Making the connection: Applying APA's learner centered principles to school-based group interventions. *Professional School Counselling*, 5(2), 39-47.
- ROWAN, B., CORRENTI, R., and MILLER, R.J. 2002. What large-scale research tells us about teacher effects on student achievement: Insights from the prospects study of elementary schools. *Teachers College Record*, 104(8), 1525-1567.
- SHAHA, R. and SHARMA, A. 1984. A study of the effect of family climate on students' academic achievements. *Inst. Edu. Res.*, 8(3), 11-15.
- SHUKLA, S. et al. 1994. *Attainment of Primary School Children in Various States*. NCERT, New Delhi.
- SINGH, S. and SAXENA, R.R. 1995. Achievement differences and school effects. *Indian Educational Review*, special no. 1995, 247-253.
- SMITH, J. 1999. Active learning of mathematics. *Mathematics Teaching in Middle School*, 5(2), 108-110.
- STRAUSS, R., and SAWYER, E. 1986. Some new evidence on teacher and student competencies. *Economics of Education Review*, 5(1), 41-48.
- STUFFLEBEAM, D., and NEVO, D. 1993. The principal evaluation: New directions for improvement. *Peabody Journal of Education*, 68(2), 24-46.
- TEDDLIE, C. and REYNOLDS, D. 2000. *The International Handbook of School Effectiveness Research*. Falmer Press, London.
- THE RIGHT OF CHILDREN TO FREE and COMPULSORY EDUCATION ACT (RTE- Act), 2009. Retrieved, September 27, 2011, from Error! Hyperlink reference not valid.
- THOMAS, J.A. 1962. Efficiency in education: A study of secondary school characteristics as related to test score in a sample of senior high school students, Unpublished Ph.D. dissertation, Stanford University School of Education.
- TODD, R., and KUHLETHAU, C. 2005. Student learning through Ohio school libraries, Part 1: How effective school libraries help students. *School Libraries Worldwide*, 11(1), 89-110.
- World Conference on Education for All. 1990. World conference on education for all: Meeting basic learning needs. UNESCO, Jomtien, Thailand.

- World Education Forum. 2000. Dakar framework for action-Education for all: Meeting our collective commitments. UNESCO, Dakar, Senegal.
- Ziegler, J.F., and Yan, W. 2001. Relationship of teaching, learning and supervision: Their influence on students' achievement in mathematics, Paper presented at the Annual Meeting of the American Educational Research Association, Seattle, WA.

# 8

## Gender Discrimination in the Primary School English Language Textbooks in Tamil Nadu

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### ABSTRACT

*For a great majority of school-going children, as also for teachers, school textbooks are the only accessible and affordable resource for education. Thus, the textual material that is developed for the school-going children is of paramount importance in education. It is the textbook that they are exposed to in the classroom, and the teacher conveys its meaning and interpretation, while embossing his/her own ideas on the minds of children, who are yet in the formative stage. This is one of the earliest and most important influences on the young, growing minds. School textbooks and curriculum influence gender roles of students immensely. This paper explores the English language textbooks taught in Government primary schools in Tamil Nadu through a gender sensitive perspective. It is quite clear from the analysis of the textbooks that despite an explicit policy of gender sensitization of school curriculum, gender stereotypes and gender bias still exists. It points to the need of preparing gender sensitive textbook material based on feminist knowledge base.*

Key words: School textbooks, Socialization, Gender stereotypes, Gender bias, Gender roles.

In *Sexual/Textual Politics* Toril Moi states that the “principal objective of feminist criticism has always been political: it seeks to expose, not to perpetuate, patriarchal practices.” (Moi, 1985. 2001: Preface). Given the gender bias of school curricula, one of the prime aims of feminist curriculum practice has been to challenge and change the content of taken-for-granted school knowledge(s) (Coffey

and Delamont, 2000:38). Feminist educational thinking closely scrutinizes the way in which gender stereotypes pervade curricula, syllabi and teaching materials, how schools, colleges and universities perpetuate stereotypes, the link between education and gender conceptions of society, the family and the economy. While the academic establishment in India is slowly taking note of these

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developments, a lot remains to be said about the actual rhetoric and practices of educational discourse.

The National Curriculum Framework (2005) document recognized that “we must use textbooks as one of the primary instruments for equality, since for a great majority of school-going children, as also for teachers, it is the only accessible and affordable resource for education” (Panday, 2004).

The textual material that is developed for the school-going children is of paramount importance in education. It is the textbook that they are exposed to in the classroom, and the teacher conveys its meaning and interpretation, while embossing his/her own ideas on the minds of children, who are yet in the formative stage. This is one of the earliest and most important influences on the young, growing minds.

It is necessary and relevant to study and understand how gender is depicted in primary school textbooks, because by age seven, and perhaps as early as age four, children begin to understand about the basic concept of self. Gender Schema Theory suggests that youngsters develop a sense of femaleness and maleness based on gender stereotypes and organize their behaviour around them (Ben, 1981, 1983, 1984; Eagly and Wood, 1999).

American feminists like Elaine Showalter argue that women and men write and read differently since the

contexts of their lives are different. Showalter says, in many educational settings the experiences of women and the issues that concern them are often ignored or trivialized by teachers and by curricular materials (Tierney, 2008:555).

Firoz Bakht Ahmed (2006) notes that since 1982-83, the National Council of Educational Research and Training (NCERT) has been laying stress on removing gender disparities – specifically emphasizing the elimination of gender stereotypes and gender biases from textbooks. He observes a general slow reduction in gender bias is discernible in the typical “second generation” study conducted at least a decade after the “first generation” research. But Ahmed’s overall conclusion is that “Despite the NCERT having developed a set of guidelines for the elimination of gender stereotyping in textual material and the same disseminated to the authors and publishers, not much has changed” (Quoted in Blumberg, 2007).

According to Noopur (1999:161), “The government of Tamil Nadu, and the Gujarat State Board Textbooks revised their books, and the element of gender bias has become negligible, if any.” This paper seeks to explore English language textbooks taught in Government primary schools in Tamil Nadu through a gender sensitive perspective and to know if stereotypes or gender bias still exists, since it is a hidden obstacle on the road to gender equality in education.

Along with online readers (Tamil Nadu is the only state in the country to publish textbooks from 1 to 12th standards on the web-site) millions of students are exposed to these textbooks which are predominant teaching resources.

The content analysis of textbooks examined two main criteria; the personnel involved in the development process and the actual content.

### Personnel Involved in Textbook Development

Personnel involved in the process of textbook production were the authors, artists, consultants, editors and state resource group members. Personnel involved in the production of Standard I English textbook include two consultants, four authors and four artists. For Standard II it is one consultant, six authors, two artists and one layout artists. For Standard III the personnel involved include a chairperson, a reviewer and an editor,

seven teachers and three artists. For Standard IV the personnel involved include 9 authors, one artist and four state resource group members.

The percentage of women involved in the book development process was 44.44. The percentage of women involvement in Standard I textbook preparation was 40% , Standard II was 10 % , Standard III was 70% and Standard IV was 57.14%. According to a study cited by UNESCO (Blumberg, 2007:10), “There is no correlation between the sex of the author and the level of gender fairness promoted in the texts”, but it states that higher levels of patriarchy in a society seem to be associated with more intensely negative depiction of females. Subsequent analysis of textbooks provides a similar conclusion in the present study too.

### Gender Division of Labour

The essential biological sexual division of labour applies only to a

**Table 4.1: Personnel Involved in Textbook Development**

Personnel involved	STD-I			STD-II			STD-III			STD-IV			Total		
	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T
Consultants	1	1	2	1	-	1	-	-	-	-	-	-	2	1	3
Authors	2	2	4	5	1	6	1	6	7	4	5	9	12	14	26
Artists	3	1	4	3	-	3	2	-	2	-	1	1	8	2	10
Chairperson	-	-	-	-	-	-	1	-	-	-	-	-	1	0	1
Reviewer/ Editor	-	-	-	-	-	-	-	1	1	-	-	-	0	1	1
State Resource group members	-	-	-	-	-	-	-	-	-	2	2	4	2	2	4
Total	6	4	10	9	1	10	3	7	10	6	8	14	25	20	45
Percentage	60	40	100	90	10	100	30	70	100	42.86	57.14	100	55.56	44.44	100

small group of reproductive labour, namely pregnancy, child birth and breast feeding. Those schools of thought which regarded the gender division of labour as natural beyond these areas are essentialist and largely conservative, whereas most feminist and other progressive analyses regard the gender division of labour as socially constructed. The significant contribution that women make to the economy and to the well being of their families is all too often ignored. Studies have shown those women's reproductive roles that involve nurturing, caring and sympathizing is devalued across occupations. Women's participation in economic activities involves a substantial amount of unpaid labour; overt participation in the labour market or in what is declared to be "economic activity" does not capture the full extent of women's work. Many unpaid household-based activities of women are not simply those related to social reproduction, but very clearly economic in nature. For example among women's unpaid domestic work include free collection of fuel, wood for household consumption. Activities related to food processing, such as husking and grinding grain, other unpaid activities such as maintaining kitchen gardens and looking after livestock and poultry, etc. These are all economic activities, which in developed societies are typically recognized as such because they are increasingly delegated away by women in households and

performed through paid contracts, thereby becoming marketed services.

Girls also represent a lower earning capability than boys. This is, of course, largely due to inherited work patterns between gender roles where women are considered as the 'other' in a patriarchal society. No economic value is given to the work which girls do at home as surrogate mothers and care-givers, or what they contribute through their labour to the domestic and farm economy.

The concept and spreading of sexism takes its root from the negative representation of women in textbooks as only mothers, wives and low-status workers. The majority of girls in schools internalize these stereotypical female behaviour role models as depicted in the textbooks and as women they neither question the unequal gender division of labour at home nor the concept of the so-called gender-appropriate jobs (Tuwer, Theresa, Maria Antonitte Sossu, 2008).

A total number of 31 occupations were found in the textbooks. Professional roles comprise the first kind of stereotypes observed. The nurses and teachers in the textbooks were consistently women, while doctors, police officers, post persons, pilots, drivers, carpenters and soldiers were all men. These textbooks reinforce the stereotypical image that men dominate the public sphere and women the private sphere. Nursing and teaching are the only paid work done by women other than a woman

**Table 4.2: Gender stereotypes about occupational and domestic roles**

<i>Males</i>	<i>Females</i>
Vegetable seller (1)	Teacher (10)
Fruit seller (1)	Queen (1)
Teacher (2)	Gardening (house garden) (3)
Farmer (4)	Sweet seller (1)
Leader (1)	Nurse (1)
Driver (1)	Sweeping (1)
Doctor (1)	Cooking (2)
Carpenter (1)	Washing (1)
Professional Cook (1)	Packing (1)
Pilot (1)	Fetching water (2)
Policeman (2)	Making tea (1)
Postman (2)	
Soldier (1)	
Tailor (2)	
Singer (1)	
Autorickshaw driver (1)	
Hunter (1)	
Head Master (2)	
Captain (1)	
Computer Operator (1)	
Washing (1)	
Boatman (1)	
Snake Charmer (1)	
Ice Cream seller (1)	
Bangle seller (1)	
Gardener (Professional) (1)	
Cleaning plate (1)	
Fisherman (2)	

selling sweets. "Women's potential for excelling in "non-traditional" endeavours receives scanty mention in educational materials. Materials rarely picture women as managers, pilots, lawyers, scientists, doctors or heads of states," (UNESCO, 2004). Based on the views of primary education experts, a 1986 UNESCO report entitled *The Education of Girls in Asia and the Pacific* concludes that curricula and materials reinforce the stereotype of dependent and exclusively domestic roles for women. These limited views have been a guiding principle in the treatment of female pupils. As a result, at both the pre-school and primary school level, girls lack opportunities to develop spatial skills and perform weakly in technical areas, mathematics and the sciences.

When women are shown in unpaid jobs like sweeping, cooking, washing, packing, fetching water, making tea and looking after children, the only gender sensitive image is a boy cleaning a vessel and helping his mother along with his sister (Lesson 7, Standard I, p.60). Unpaid domestic work everywhere is regarded as women's work, even when they are important they are often devalued and unacknowledged. Food has to be cooked, the children are to be fed, clothes have to be washed and mended, water and firewood have to be collected, the cattle have to be looked after... all these are time-consuming activities. But the long hours and hard work

that go into these are undervalued and unrecognized (Noopur, 1999:18).

The gender division of labour in paid work takes the form of horizontal and vertical occupational segregation, with women confined to particular types of work and at lower levels. It seems that the textbooks perpetuate this image, for example among the twelve teachers shown in the textbooks, all ten are women but the only head teacher (Head Master) is interestingly a man. These images give the message that 'glass ceilings' which are invisible barriers are preventing women's upward mobility in professions. Studies also show that a gendered division of labour exists within the teaching profession (Acker, 1994). In principle, 'teaching is a career in which women and men enjoy equal opportunities' (Measor and Sikes, 1992:111). However the numbers of women securing senior teaching posts remain disproportionately low (Acker, 1989 and 1994; Bell and Chase, 1993; Boulton and Coldron, 1998; De Lyon and Mignioulo, 1989). Thus these textbooks are not only reinforcing stereotypes but also hierarchies, power relations and resultant domination between men and women.

### **Gender Difference in Games**

It is through games that children learn about their world and acquire key social, intellectual, language and motor skills. Children's games are not like adults games. Their impact on the mind is deeper. The educator



## Identify



Driver



Doctor



Teacher



Carpenter



Farmer



Nurse



Cook



Pilot



Policeman



Postman



Soldier



Tailor

**Competency:** Gives the words relating to occupation. (5.4)

**Note to the teacher:** Show the pictures related to different occupations and their related places.

and philosopher Maria Montessori said that children learn through play. “Play is child’s work”. Children’s games refer to an extremely varied range of activities which provide to the child a means of defining the world.

Games and play activities have a significant role in shaping children’s

attitude and lifelong orientation towards objects and social processes. It is important that parents should expose their children to the full range of experiences related to playing. Both indoor and outdoor games experiences are important for children’s development. Outdoor

areas are ideal places for children to engage in merry games with sand, water, paint and other art and craft activities. The outdoor activities present more opportunities for children to engage in active games, important for the development of key motor skill such as running, balancing, chasing, throwing and catching. Outdoor games also offer children opportunity to explore their environment in relationship to themselves. Outdoor active games can be intensely stimulating and creates opportunities for children to learn about and develop self-control. Active games not only promote good health and physical development but also provide children the opportunity to develop essential skills that will help them in their social interactions with peers.

Research shows (Kane 2006, Messner, 2000) both parents and non-parents tend to purchase gender-stereotyped toys for children especially boys. Girls have more doll, doll houses, musical items and miniature domestic items (e.g., irons, microwaves, kettle etc.). Little boys get dirty, fight and play with cars, guns and trains, while little girls were given dolls and play at being housewives and mothers. There is also imbalance in the price of toys for boys and girls. Khale and Meece opines that parents can increase achievement in science by providing their daughters with science-related experiments at home, toys that are mechanical in nature and science related

excursions (Khale and Meece,1994). Researchers have focused on the influence of the social environment on children's mathematics achievement. Very early on boys are given the chance to tinker with toys or objects (for example, building blocks, racing cars and simple machines) that involve many principles inherent in mathematics and science. Girls are often denied these experiences, so they enter mathematics and science classrooms feeling insecure about their abilities. Hammrich recommend to parents that they should provide girls with puzzles, building blocks and teach them common household tools as prerequisite skills needed for science (Hammrich, 1997). In a study conducted by Ashton (1978) among 3-5 year old children who read gender biased or unbiased children's picture books, it was reported that children who read biased books later made stereotypical toy choices.

In my analysis of English textbooks from Standard I to IV, it can be seen that textbooks reinforce gender stereotypes regarding games. Boys are shown in outdoor games and activities that include more physical activity, team work and higher level of competition like football, cricket, hockey, etc. Team leadership, management, group leadership and tasks that involve physical strength are seen as men's domain, and these are reflected in these gender stereotyped plays. While girls are shown in more indoor games and which are more sedentary

**Table 4.3: Gender Difference in Games**

<i>Male</i>	<i>Female</i>
Throwing ball	Throwing ball
Kicking ball	Playing with sand
Badminton	Blindfolding
Cricket	Hopping
Chess	Chess
Carrom	Carrom
Football	Running
Marble	Skipping
Running	Playing with fan
Jumping	Turning round
Hockey	Building sand castle
Tennis	Hop scotch
Playing with top	Drawing
Painting	Clay modelling
Making toys with clay	Pebble game
See-saw	See-saw
Kite making	Kite making.
Playing with top	
Kabadi	
Bowler	
Batsmen	
Wicket keeper	

or require less physical activities like blind folding, playing with pebbles, playing with sand and drawing. There are also gender stereotyped games and activities associated with girls like hopping, skipping, hop scotch etc., depicted in these textbooks. The books also reinforce gender-specific teams where boys and girls play differently, instead of promoting healthy inter-gender interaction. Very few games like chess, carom, kite making, clay modelling are depicted wherein both girls and boys participate together. By perpetuating

gender stereotyped games and activities textbooks are promoting gender discrimination and gender inequality giving the message that girls and boys are having different gender roles.

Simone de Beauvoir (1997) has analysed at length how women come to internalize and live out feminine attributes – including passivity. In *The Second-Sex*, she writes that the passivity which is the essential characteristic of the ‘feminine’ women is a destiny imposed upon her by her teachers and by society she writes:

The great advantage enjoyed by the boy is that his mode of existence in relation to others leads him to assert his subjective freedom. His apprenticeship for life consists in free movement towards the outside world; he contends in hardihood and independence with other boys, he scorns girls. Climbing trees, swimming, fighting with his companions, facing them in rough games, he is aware of his body as a means for dominating nature and he takes pride in his muscles as in his sex; in games, sports, fights, trials of

strength, he finds a balanced exercise of his powers... he undertakes, he invents, he dares... it is by doing that he creates his existence, both in one and the same action (Beauvoir, 1997:307).

Simone de Beauvoir states that on the contrary, a girl is not given the freedom to grasp and discover the world around her. The stories she hear, the books she read and all her experiences condition her to accept superiority of boys. She is shaped by social institutions to fit social roles 'voluntarily'. She does not dare to

## Match me



Hockey



Cricket



Football



Tennis



Carrom



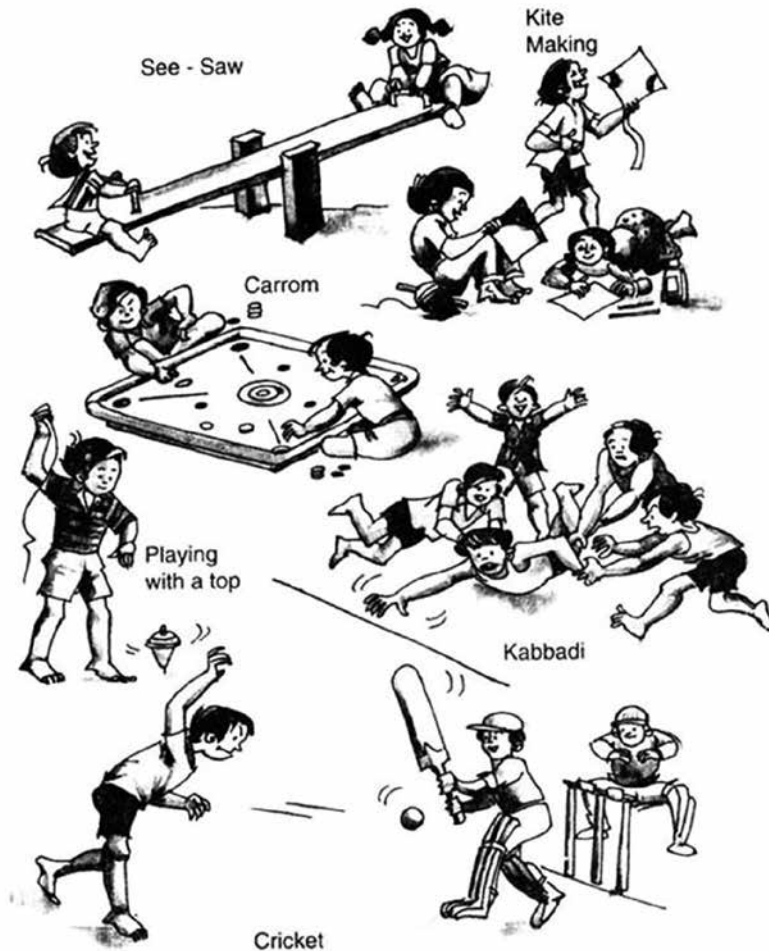
Chess

**Competency:** Gives the words relating to games. (5.4)

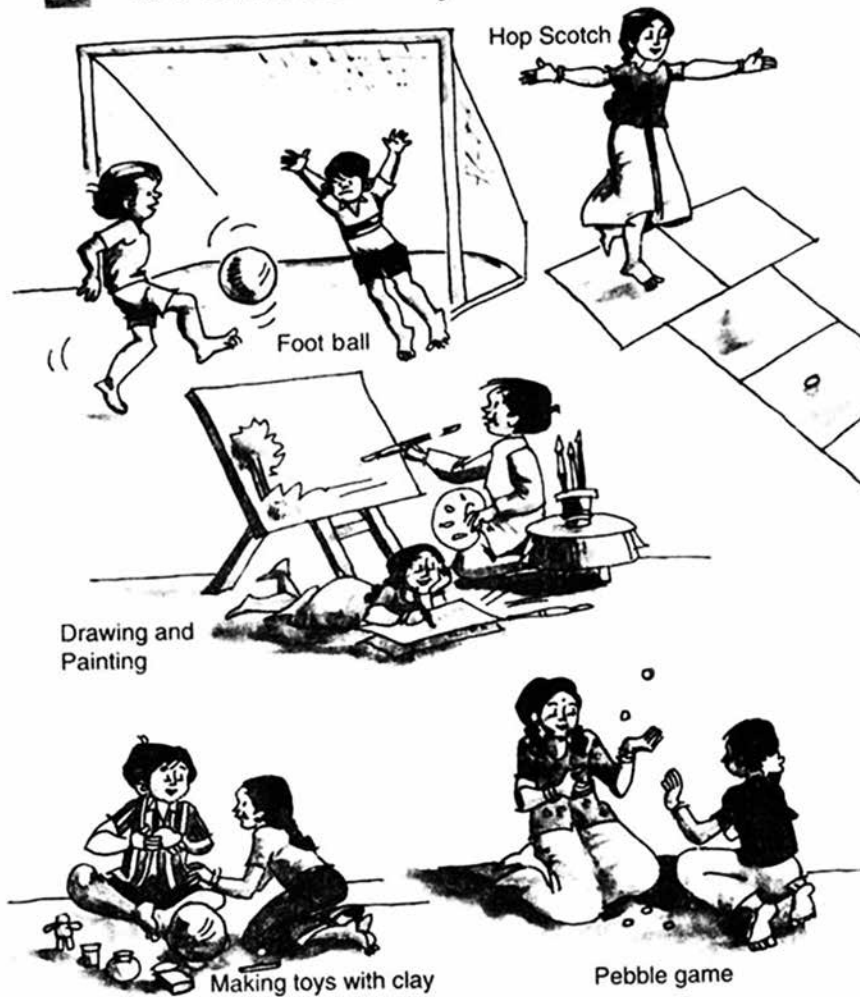
**Note to the teacher:** Say the name of the game and show the relevant pictures. Ask the children which game they are interested in.

affirm herself as subject but consider it is her womanly destiny and resigns herself to socially accepted roles. Simone de Beauvoir sums up her ideas thus “one is not born a woman, one becomes a woman” (Beauvoir, 1997:300). Gender is thus not a biological essence, something natural or innate but a social construct, a learned behaviour, a product of language culture and its constitutions. Kate Millet, an

American feminist, writer and activist observes how patriarchy maintains power largely by ideological means, winning consent through the socialization of both sexes to sexual inequalities of temperament, role and status (See Moi, 1985:29) such constructs disempower women. Male-dominated culture and patriarchal values idealise women into powerlessness (Das, 2003:171).



## 15 It's Time for Play!



### Gender Specific Dress

A person's sex is determined by biology whereas gender is constructed by socio-cultural factors. For example in the western world, trousers were considered to be male clothing before the world wars; however, when

women started working in factories because of paucity of labour, they started wearing trousers. Today, trousers are gender neutral and not masculine (RGNIYD, 2009). Socialization is inevitable but it is not a constant. For example, it is not

possible to say now that girl children are always given frilly clothes to wear while boys are given shorts and clothes that allow free play. The contemporary generation is usually dressed in gender neutral clothes. But the books under review give a totally different story. They still show stereotyped gentle mothers and teachers wearing *sari*, bangle and *bindi*, even though there are many young mothers and primary school teachers who wear dresses like churidar, jeans pants etc.

Dress is one of the most significant markers of gender identity. Dress is a powerful means of communication and making statements about the gender role of a new-born child soon after birth. Although new-born children's first dress may be gender-neutral, their sex soon prompts kin or other caretakers to provide them with dress considered gender-appropriate within their particular society.

Dress is both a repository of meanings regarding gender roles and a vehicle for perpetuating or rendering changes in gender roles. It can be seen that dress of girls and women shown in the textbooks are unfit for climbing trees or other jobs demanding more physical activity.

Even when forms of dress and their properties are largely shared or similar for both sexes, gender distinctions can be clearly communicated by a minimum manipulation of dress. For example, if the hair of males is expected to

be cut short and that of females is expected to grow long in a particular society the shape and volume of hair immediately communicate to the observers the gender of the individual under scrutiny and a ribbon but a tiny attachment tied to a wisp of a baby's hair, can announce a gender identity as feminine.

Acquiring knowledge about gender appropriate dress for various social situations extends to learning rights and responsibilities to act "as one looks", accordingly, gendered dress encourages each individual to internalize gender roles.

The books under review show men, women and children wearing gender specific dresses. As children grow older and develop increasing physical and social independence, children learn by trial and error to manipulate their own dress according to rules for age and gender. They usually acquire these rules via directions from adults or older siblings or by following role models of the same sex, such as admired friends or publicly acclaimed individuals. Textbooks are silent regarding the dress preference of transgenders altogether.

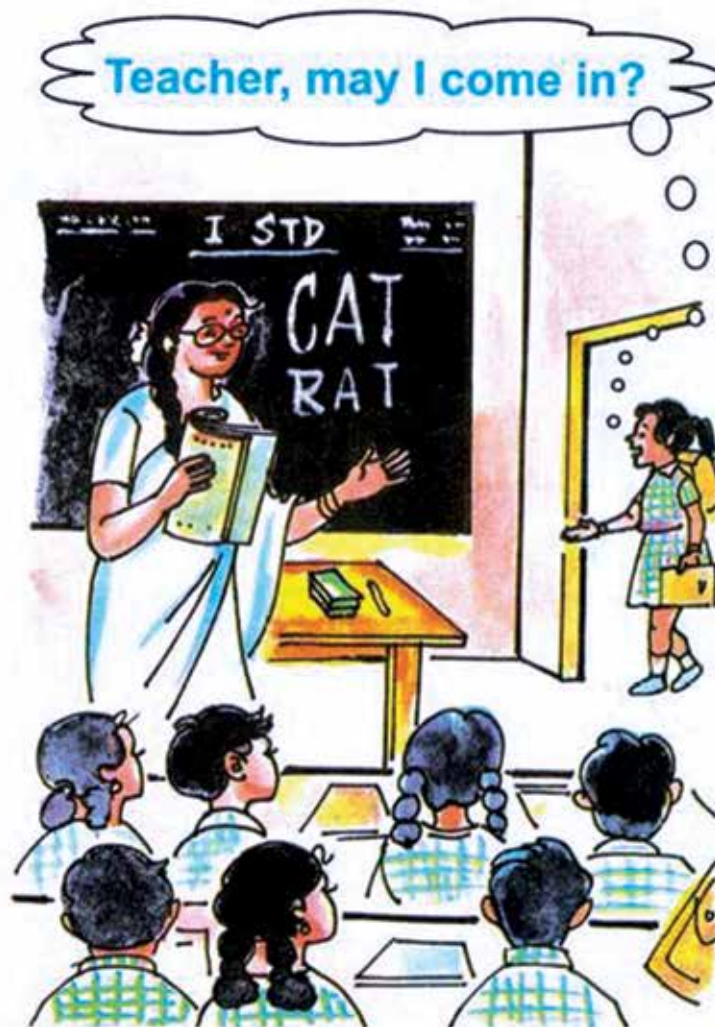
### **Gender Specific School Uniforms**

Illustrations regarding classrooms show that all children are in school uniforms. School uniforms have many positive functions. It removes distinctions of class as well as a more orderly environment. Uniforms also can remove visible economic differences between students. School

uniforms reduce peer-envy based on clothes. Moreover, it can even be later transferred to younger siblings or needy students who come from poor economic background.

But it has to be noticed that both

boys and girls have different kinds of uniforms even in primary schools which convey a clear message that boys and girls are different. Textbooks can depict gender neutral school uniforms, which would undermine



**Competency:** Asks permission using "May I?".

**Note to the teacher:** Use "May I?" in regular classroom situations and encourage children to use the same.



gender stereotypes. Many schools are now following gender neutral school uniforms from primary level to high school level. Gender neutral school uniforms will reduce exploitation

and discrimination based on gender. And it will also bring the message of non-discrimination on the basis of class, caste, religion or sex.

## Look and say



Blouse



Shirt



Sari



Skirt



Trousers



Dhoti

**Competency:** Gives the words relating to dress. (5.4)

**Note to the teacher:** Say the words aloud using pictures. Show real objects. Ask the children to repeat.

### Gender Specific Names

Names have sociological and political significance — naming is what constructs categories, and the power to name essentially constitutes power. An unnamed thing remains invisible, as if it does not exist. Today, many people recognize the significance of a name as one element of personhood, and the act of naming as a practice influenced by cultural norms having to do with identity, lineage, status, dominant ideology and social institution (Miller 1927). Names given to children tell us quite a lot about them including fixing them into a context by religion, region and ethnic group. Equally important, names are always differentiated by gender. Parents choose ‘important’ names for boys while pretty, soft and melodic names for girls. It is also observed that boys are suffixed with their caste or family name which clearly defines their place and position in the family’s ancestral records from which girls are often excluded.

The textbooks under review perpetuate these stereotypes, in page 26 of Standard II, the topic titled ‘What’s your name?’ four pictures – three boys and one girl are given with their names as ‘My name is Siva’, ‘He is Khan’, ‘He is John’, and ‘She is Vimala’. The pictures clearly reveal that to which religion and gender Siva, Khan, John and Vimala belong to. Similar things are repeated in page 60 and page 61 of the same textbook. In page 7 of Class I textbook, lesson one with subheading ‘Happy Family!’

the names given are as follows: “My name is Ravi.”, “My father’s name is Raja”, “My mother’s name is Vani.”, “My brother’s name is Hari” and “My sister’s name is Susi.” There are many such examples in the textbooks.

Teachers also propagate stereotypes based on name. According to a study conducted by Hui Song among junior middle school science teachers in China, 71% of science teachers who read a description of a student with a male name rated him as a good student, whereas, the same description was used but the student was given a female name, only 20% of teachers rated her as a good science student (Song, 2003).

Whether commemorating a relationship, confronting the problem of what last name one will adopt in a marriage, or in naming offspring, choosing a name to signify identity, and the process of that determination, represents both elements of personhood and the social and cultural norms. A name can shape one’s identity, locate a person within family, society, time and history, confer status and determine one’s power to act autonomously and influence public ideology.

Now there is greater awareness of names as “gender markers” (Lieberson, Domais and Shyon, 2000). But our textbooks do not seem to be aware about it. Gender neutral names in school textbooks may bring a new trend in naming that is free from bias and prejudices from religions, caste,

## Names of Persons



My name is Raja



My father's name  
is Balu



My mother's name  
is Kamala



My sister's name  
is Santhi



My teacher's name  
is Radha

ethnicity and gender.

### Gender Biased Language

Language has power not only to shape our view of the world, but our view of who we believe ourselves to be and our place in society. There is a growing awareness that language does not merely reflect the way we think; it also shapes our thinking. It is a powerful tool which can be used to convey a range of attitudes and values. If words and expressions that imply that women or men are inferior

are constantly used, that assumption of inferiority tends to become a part of our mindset (Shyleja and Latha, 2007). Turner Bowker (1995) noted that language is often utilized as a media tool to maintain the gender status of individuals in our society. Therefore, the language books can be used to encourage or eliminate stereotypes.

Concern about the use of language is part of our increased awareness of the changing roles of men and women in the society. The language of books

under review conveys a number of examples for non-inclusiveness of women and biased connotations of gender roles and identity.

Language can be a powerful

conveyor of bias, in both blatant and subtle forms. The exclusive use of masculine terms and pronouns, ranging from our fore-fathers, mankind, businessman to the generic

## What's your name?



My name is Siva



He is Khan



He is John



She is Vimala

**Competency:** Writes his / peers' names. (4.2)

**Note to the teacher:** Write the names of students on the blackboard.

Ask the children to tell their friends names and write them in their notebooks.

*he* denies the full participation and recognition of woman (Blumberg, 2007:5). English speakers and writers have traditionally been taught to use masculine nouns and pronouns in situations where the gender of their subject is unclear or variable, or when a group to which they are referring to contains members of both sexes (Writing Center, 2005). For example, page 14 of Standard II, *he* and *him* are used for a parrot. Similarly on page 55 of the same book a parrot says 'I can speak like a man'. On page 47 of Standard III on 'My Bicycle', even though the textbook depicts a positive image of a girl riding a bicycle, 'It runs with manpower', In page 83 of Standard III, 'A Brave Little Squirrel', the squirrel is *he*. This is an example for using masculine pronouns (*he*, *his*, *him*) for sex neutral/non-human nouns or sex is of little significance. On Page 15 of Standard III, 'The Work of God', it is said, '*He* gave us eyes to see them'. The reference of god as *He* perpetuates the androcentric idea of god as male.

Another simple illustration is provided for androcentric use of language. In Britain up until at least 1980s 'mankind' and 'men' were widely used in generic way, instead of the more gender neutral 'humankind' and 'people'. Similarly, the pronoun 'he' was routinely used in preference to 'she', or even to 'he or she'. Feminist analysis have problematised the generic use of masculine nouns and pronouns,

arguing that such linguistic practices both reflect and contribute to the marginalization of women and are symbolic of their status in general (Pilcher 2004:1). For the textbooks it is still *Postman, Milkman, Watchman, Policeman, Fisherman, Boatman and Head Master*. The textbooks also ask the students to 'find out the following *men*' (Standard III, pages 7,8,9,10,49 and 53) instead of using gender neutral nouns like police officer, postal worker/mail carrier, chairperson, etc. Feminist scholars have provided a critique of the generic 'man' used in linguistic practices and conventions. Dictionaries say that 'man' can be used to mean both the human race (the generic use) and the male of the species. Feminists have pointed out that this can result in considerable ambiguity in classroom. There is ample research (Thorne et al., 1983) to show that pupils do not understand the generic man but think it means male. Forty-four articles are cited on this point in Thorne et al., (1983), including Harrison (1975), who discovered some American adolescents studying 'the evolution of man' who believed that only males had evolved! (Coffey and Delamont, 2000:32).

Page 18 of Standard I says. 'Girls and boys come out to play'. On page 19 it is 'Be good boys,' 'Be good girls'. On Page 14 there is a line 'Yes, good boys and girls, why don't you say thank you?' On Page 41 of Standard I says 'Yes, good boys and girls always say, I am sorry. The sentences seem

inclusive and good, but actually by using 'boys' and 'girls' instead of 'Children' or 'students' (Blumberg, 2007:31) we raise in effect two different kinds of children: boys and girls, from the first standard itself. Psychologists generally agree, by age 3, children have an 'irreversible conception of what gender is'. This kind of language gives children the impression that they are different and men and women should be treated differently.

It is wrong to say that the language used in textbooks is completely gender biased, there are many instances where gender neutral language is used. For example on page 61 it is given 'Does he/she play'. On page 21 of Standard IV textbook the statement 'someone broke the baby's doll, so *it* is \_\_\_' is gender neutral. Here *it* is used instead of *he* or *she*. Though in many instances parrot, elephant and other animals are called *he* on page 27 of Standard IV the cat is termed as *it*.

The power of language derives from its power to reify that which is constructed — precisely at the point where this construction is most questionable — into something that appears natural and self-evident. In one word, language serves to naturalize gendered inequalities. Feminist critic Julia Kristeva says that this gender bias has nothing to do with the inherent structure of language, or some kind of male conspiracy. It is an effect of the power relation between the sexes

(Moi, 2001: 157) The gender bias in the language of the textbooks under review should also be attributed to this power imbalance between sexes in our society.

### Negative Portrayal of Women

Women were almost always portrayed as wives and mothers. And in almost every story intended to be humorous, the butt of the joke is a female (Blumberg, 2007:12). On page 3 of Standard I, a line is: "My sister likes to see the moon, but she tries to see it in the noon!" In the same book on page 35 an elder girl tries to help a little boy who lost his way, "Don't be afraid, my little child! Tell me your school's name I will guide." The boy answers "It is Government primary school. Today is Sunday. Why to school?" By portraying girls who wish to see moon during day time and girls who don't know Sunday is a holiday, school textbooks still carry negative statements like 'women are illogical' (Noopur, 1999:44).

"Father goes to work to earn money, mother washes, cooks and does the household work..." (Noopur, 1999:29). This kind of stereotype is reinforced on page 25 of Standard IV textbook in an exercise: 1. 'His father \_\_\_\_\_ (buy) \_\_\_\_\_ and \_\_\_\_\_ this evening. 2. His mother \_\_\_\_\_ cook \_\_\_\_\_ and \_\_\_\_\_ tonight.

Girls are shown watching boys doing experiment or handle sophisticated equipment (Noopur, 1999:28). Though more women are there in information and communication technology field

our textbooks still present girls as spectators. For example, a lesson on page 86 of Class III English language textbook, "The computer calls U", illustrates a boy operating computer with two other boys, but the girl is shown just 'watching' it.

### Invisibility

The invisibility of women in public sphere and invisibility of women's work are important women's issues. It can be found that the textbooks give less attention to women, those with disabilities, transgendered



persons and others. The analysis shows that the books were not only ineffective in portraying positive role for women as part of the workforce of the country but their roles were not even presented in accordance with the prevailing conditions in reality. It is desirable that school textbooks should portray more women in professional roles so that girls can take those as role models. Pictures of three leaders have been mentioned in the Standard III textbook. They are Dr S. Radhakrishnan, Mahatma Gandhi and Jawaharlal Nehru.

Neither the name nor the picture of any women leader is mentioned. Equitable representation of heroic women in textbooks should be another way of influencing girls to perceive themselves as equally capable of doing well as their male counterparts. For example, in most textbooks men are represented as heroes, leaders and as people with prestigious jobs and it is obvious that boys are most likely going to be inspired by these male heroic representations (Tuwar, Theresa, Marie-Antoinette Sossu, 2008).

## Leader



Teacher, Teacher,  
Call my name.  
May I lead  
My friends in game?

March them up,  
And march them down  
Soon I'll win  
A leader's crown.

**Competency:** Listens to and repeats jingles. (1.5)

**Note to the teacher:** Say the jingles aloud and ask the children to repeat.



## Cosmetic Bias

Cosmetic bias offers an 'illusion of equity' to teachers and students who may casually flip the pages of a textbook. Beyond the attractive covers, photos or posters that prominently feature all members of diverse groups, bias persists. For example, the cover page of the Standard II textbook of English language gives a very positive image of a boy and girl reading the book and the cover page of Standard IV textbook shows a boy and girl going to school. But from the analysis of textbooks, it can be seen that bias exists despite shiny covers. Though there are number of illustrations of women and girls in the textbooks most of them are mothers and teachers. Most often women characters are shown passive and menial. Most of the times in

the illustrations women are shown watching rather than doing.

It is quite clear from the analysis of the textbooks, that despite an explicit policy of gender sensitization of school curriculum, the situation on the ground did not improve a great deal. Traditional meanings of the masculine and feminine continued to persist along with the oppositional, dichotomous categories of active-passive, emotional-rational, nature-culture and dependent-autonomous. Gender-sensitive material in the textbooks should be prepared based on a feminist knowledge base. Without this knowledge-base, those who were given charge of rewriting textbooks will restrict themselves to superficial tinkering: either by increasing the number of times women are visually or verbally represented in the books or by facile role reversals.

## REFERENCES

- ACKER, S. (Ed.) 1989. *Teachers, Gender and Careers*. Falmer, Lewes.
- ACKER, S. 1994. *Gendered Education: Sociological Reflections on Women, Teaching, and Feminism*. Open UP, Buckingham.
- ASHTON, E. 1978. The Effect of Sex-role Stereotyped Picture Books on the Play Behaviour of Three and Four year old Children. *Dissertation Abstracts International*, 39, 1310.
- BEAUVOIR, SIMONE DE. 1997. *The Second Sex*. Vintage, London.
- BELL, C. and S. CHASE. 1993. "The Under representation of Women in School Leadership." *The New Politics of Race and Gender*. Ed. C. Marshall. Falmer, Washington, D.C.
- BLUMBERG, RAE LESSER. 2007.. "Gender Bias in Textbooks: A hidden Obstacle on the Road to Gender Equality in Education: Paper Commissioned for the EFA Global Monitoring Report 2008, Education for All by 2015: Will we make it?" UNESCO, Paris.
- BOULTON, P. and J. COLODRON. 1993. "Equal Opportunities, Teacher Education and Europe". 'Race', *Gender and the Education of Teachers*. Ed. I. Siraj-Blatchford. Open UP, Milton Keynes.

- COFFEY, Amanda and Sara Delamont. 2000. *Feminism and the Classroom Teacher: Research, Praxis and Pedagogy*. Routledge Falmer, London.
- DAS, SHILPA. 2003. "Gender Constructs in Primary School Textbook : A Critique." *Shakti: Multidisciplinary Perspectives on Women's Empowerment in India*, Ed. Ranjana Harish and Bharathi Harishankar, 164-177, Rawat, Jaipur.
- DE LYON, H. and F.W. MIGNIUOLO. 1989. Ed. *Women Teachers*. Open UP, Milton Keynes.
- GENDER-SENSITIVE LANGUAGE. The Writing Center, University of North Carolina at Chapel Hill, 2005. 31 November 2008 <<http://www.unc.edu/depts/wcweb/handouts/gender.html>>
- HAMMIRICH, P. 1997, January. "Yes, Daughter, You Can". *Science and Children*. 21-23.
- HARRISON, L. 1975. "Cro-Magnon Women – in eclipse", *Science Teacher*. (42) 4: 9-11
- KAHLE, J. and MEECE, J. 1994. "Research on gender in the classroom". In D. Gabel (Ed.), *Handbook of research on science teaching*. Macmillan, 542-557, New York.
- KANE, EMILY. W. 2006. "No Way My Boys are Going to be Like That: Parents, Responses to Children's Gender Nonconformity." *Gender and Society*, 20.2: 149-177.
- LIEBERSON, STANLEY, SUSAN DUMAIS and SHYON BAUMANN. 2000. "The Instability of Androgynous Names: The Symbolic Maintenance of Gender Boundaries." *The American Journal of Sociology*. 105.5: 1249-1287.
- MEASOR, L and P. SIKES. 1992. *Gender and Schools*. Cassell, London.
- MESSNER, MICHAEL. 2000. "Barbie Girls Versus Sea Monsters: Children Constructing Gender." *Gender and Society* 14: 765-784.
- MILLER, NATHAN. 1927. "Some Aspects of the Name in Culture-History." *American Journal of Sociology*. 32. 4: 585-600.
- MOI, TORIL. 2001. *Sexual/Textual Politics: Feminist Literary Theory*. Routledge, London.
- NOOPUR, INDIRA KULSHRESHTA. 1999. *Women in Search of Identity*. BPR, Delhi.
- PANDAY, KALPALATA. 2008. Gender Issues and Indian Textbooks. 25 Sept <[www.caen.iufm.fr/colloque-iartem/pdf/pandey.pdf](http://www.caen.iufm.fr/colloque-iartem/pdf/pandey.pdf)>.
- PILCHER, JANE, IMELDA WHELEHAN. 2004. *50 Key Concepts in Gender Studies*. Sage, New Delhi.
- RGNIYD. 2009. *Training Manual on Youth for Gender Equity*. RGNIYD, Sriperumbudur.
- SHAILAJA, S. LATHA. 2007. "Gender Neutral Language – Some Observations." *Kakatiya Journal of Women's Studies*. 1.2:89-97.
- SONG, HUI. "Who is a Good Student? An Exploration and Analysis of Stereotyped Gender Impressions among Junior Middle School Teachers of Science Subjects". *Chinese Education Society*. 36 (3): 43-54.
- TAYLOR, FRANK. 2003. "Content Analysis of Gender Stereotypes in Children's Books". *Teaching Sociology*. 31: 300-31.
- THORNE, B., KRAMARAE, C. and HENLEY, N. 1983. *Language, Gender and Society*. Rowley, Mas.: Newberry House.
- TIERNEY, HELEN. (Ed.). 2008. *Women's Studies Encyclopedia: Revised and Expanded Edition*. Rawat, Jaipur.

- TURNER-BOWKER, D.M. 1996. "Gender Stereotyped descriptors in Children's Picture Books: Does Curious Jane exist in the Literature?" *Sex Roles*. 35: 461-488.
- TUWOR, THERESA and MARIE-ANTOINETTE SOSSOU. 2008. "Gender Discrimination and Education in West Africa: Strategies for maintaining Girls in School." *International Journal of Inclusive Education*. 12.4: 363-379.
- UNESCO. 2004. *Gender Sensitivity: A Training Manual*. UNESCO, Paris.

# 9

## Right of Children to Free and Compulsory Education Act-2009 and Quality Education

Ram Pal Singh\*

### BACKDROP

*Since independence, the country has been making relentless efforts to achieve the goals of Education for All. The National Policy on Education (1986) envisaged that the country would achieve Universal Primary Education by 1990 and Universal Elementary Education by 1995. Later the achievement of the goal was shifted to 2000 (World Conference on Education held at Jomtien in 1990). The efforts for achieving the goal gained renewed impetus after the World Education Forum held at Dakar in 2000. The achievement of the goal was then shifted to 2015. The country has made major strides towards the attainment of the goal by launching programmes like District Primary Education Programme (DPEP) and Sarva Shiksha Abhiyan (SSA). However, in the light of the present scenario, the chances of attaining the goal by 2015 are bleak.*

*It was envisaged by all the stakeholders – teachers, teachers’ organisations, social reformers, child rights’ activists, educationists, politicians and policy makers that if the right to education becomes a fundamental right, the dream of EFA could be fulfilled. All India Primary Teachers’ Federation has launched the movement in 2002 to generate awareness among teachers, social activists, politicians, policy makers about the need and importance of education for all for the wellbeing of the people and economic development of the country.*

*The country enacted Right of Children to Free and Compulsory Education Act in 2009. It reads as: Every child of the age of six to fourteen years shall have a right to free and compulsory education in a neighbourhood school till completion of elementary education. Millennium Development Goal-2 adopted at Dakar in 2000 specifies that each country would ensure that by 2015 children everywhere, boys and girls alike will be able to complete a full course of primary schooling.*

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## **Universal Participation in Education**

It is well recognised that the achievement of universal participation in education fundamentally depends upon the quality of education. If the quality of education is low, universal participation in education cannot be achieved at all. For example, how well pupils are taught and how much long they stay in school and how regularly they attend depend upon the quality of education. Furthermore whether parents send their children to school also depends on their judgement about the quality of teaching-learning in schools. In case they feel that attending school is not worth the time spent and expenditure they make on the education of their children, they would not send their children to school. In that situation they may even send their children for child labour or ask them to do household chores. The Jomtien Declaration in 1990 and more particularly, the Dakar Framework for Action in 2000 recognised that the quality of education as a prime determinant of whether education for all is achieved. India has achieved remarkable progress as net enrolment ratio in Class I have gone up to 97 per cent. But the dropout rate continues to persist around 26 per cent. As consequence, the right of every child. It affirmed that quality was at the heart of education – a fundamental determinant of enrolment, retention and achievement.

Country has not been able to achieve EFA so far. As mentioned earlier, the chances of achieving EFA by 2015 are bleak. Many factors contribute to the prevalence of this phenomenon. Low quality of education is the most important factor for this phenomenon. It is unfortunate that the country is laying greater emphasis on quantitative aspects of education in the recent years. The quality of education has taken a back seat. There is a need to shift the focus from quantity to quality of education. Enabling inputs for quality of education need to be made to achieve the goals of Education for All.

## **Indicators of Quality Education**

Notwithstanding the growing consensus about the need to provide access to education of good quality, there is much less agreement about what the term quality actually means. However, there are a few elements which characterize quality education.

Cognitive development is identified a major explicit objective of all education systems. The degree to which a system actually achieves this, is an indicator of quality education. The second element is that the education system should develop learners' creative and emotional capacities. The education system should produce good citizens, develop the attitude for building a culture of peace and democracy and pass on

the global and local cultural values down to future generations. However, compared to cognitive development, the extent to which these are achieved is harder to determine.

### **Concept of Quality Perceived by UNESCO**

The UNESCO first position statement on quality of education appeared in 'Learning to Be: The World of Education Today and Tomorrow' – the report of the International Commission on the Development of Education. The Commission identified the fundamental goal of social change as the eradication of inequality and the establishment of an equitable democracy. Consequently, it reported, 'the aim and content of education must be recreated, to allow both for the new features of society and the new features of democracy' (Faure et al., 1972).

More than two decades later came 'Learning: The Treasure Within,' Report to UNESCO of the International Commission on Education for the Twenty-first Century, chaired by French Statesman, Jacques Delors. This Commission saw education throughout life as based upon four pillars. These are:

- Learning to know,
- Learning to do,
- Learning to live together, and
- Learning to be.

'Learning to know' acknowledges that learner's build their own knowledge daily, combining indigenous and 'external' elements.

'Learning to do' focuses on the practical application of what is learned. 'Learning to live together' addresses the critical skills for a life free from discrimination, where all have equal opportunity to develop themselves, their families and their communities. 'Learning to be' emphasizes the skills needed for individuals to develop their full potential. This conceptualization of education provided an integrated and comprehensive view of learning and, therefore, of what constitutes education quality (Delors et al., 1996).

The core objectives of education, laid down by the Universal Declaration of Human Rights and expounded by the work of the United Nations Human Rights treaties. "Education should enable to develop child's personality, talents and mental and physical abilities to their fullest potential. It should promote knowledge, values, attitudes and skills conducive to respect for human rights and to an active commitment to the defence of such rights and to the building of a culture of peace and democracy."

It can be summarised that quality education is one which allows children to reach their fullest potential in terms of cognitive, emotional, critical and creative capacities.

### **Measures to Improve Quality of Education**

Suitable measures need to be taken to improve the quality of education. Some of these are highlighted in brief:

**(a) Enabling Inputs in Schools**

The quality teaching and learning is strongly influenced by the resources available in school to support the process of teaching. It is obvious that schools without an adequate number of teachers, textbooks or learning materials will not be able to realize fully the objectives of education. Resources are therefore, important for education quality. The main input variables are material and human resources. Improving the quality of human resources and governance are thus crucial factors to achieve the quality of elementary education.

- (b)** Material resources provided by government include textbooks and other learning materials and the availability of classrooms, libraries, school facilities and other infrastructure.
- (c)** Human resource inputs include managers, administrators, other support staff, supervisors and most importantly, teachers. Quality teachers are vital to the education process. Teacher-pupil ratio, teacher salaries and the proportion of education spending allocated to various items have indirect impact on teaching-learning.
- (d)** Enabling school-level governance concerns the ways in which the school is organised and managed. Examples of potentially important factors

having an indirect impact on teaching and learning are strong leadership, a safe and welcoming school environment, good community involvement and incentives for achieving good results.

**Improvement in Teaching and Learning Process**

Indirect enabling inputs for improving teaching-learning process have been discussed above. However, there is a need for direct inputs for improving teaching-learning process. Teachers need to be encouraged to use appropriate instructional strategies and techniques for transacting the curriculum in their context. If a learner is not learning the way the teacher teaches, the teacher should teach the way the pupil learns. For this, teacher needs to bring about modification in his/her teaching process.

**Overhauling the Content and Process of Pre-service and In-service Teachers Education**

The patchwork for improving the curricula for pre-service and in-service education of teachers would hardly be enough to improve their quality. Its overhauling is highly essential. This is because the quality of these programmes is presently quite low. Teachers produced by the colleges of education particularly from some self-financing institutions hardly possess requisite knowledge and skills to be good performer in

school. Therefore, the content of pre-service and in-service education of teachers need to be revisited and thoroughly revised in the light of social-economic changes taking place in the country. Over the period of last two decades, there have been advances in the field of pedagogy – Science of teaching children. Pre-service and in-service teachers need rich experiences in innovative instructional strategies such as co-operative learning, concept attainment, synectics, theory of multiple intelligences, etc. Trainers in these programmes need to provide experiences in andragogy – science of teaching adults.

### **Monitoring of Pupils' Progress**

The need for quality monitoring of pupils' progress in the scholastic, effective and psycho-motor domains is highly essential to help pupils to achieve their fullest potential. There is three types of monitoring – Compliance Monitoring, Diagnostic

Monitoring and Product Monitoring. The emphasis needs to be made on supportive diagnostic monitoring. Teachers should monitor pupil progress on a continuing basis and provide feedback in a supportive manner to help the pupil to progress to reach the goal.

### **Outcomes**

The outcomes of education should be assessed in the context of its objectives. They are most easily expressed in terms of academic achievement only. The assessment of creative and emotional development and as well as changes in values, attitudes and behaviour are rather being ignored. This is because these are not given any importance. Continuous and Comprehensive Evaluation as provided in the RTE Act-2009 would greatly address the issues of quality and outcomes of education at elementary stage. Implementing CCE in its right spirit would be the key for quality enhancement.



# 10

## Understanding the Role of School Management Committees (SMCs) in the Context of Effective Implementation of the Right to Education Act - 2009

Pooja Singh\*

### INTRODUCTION

People's participation is fundamental to the success of *Sarva Shiksha Abhiyan* (SSA) and for proper implementation of Right to Education Act (RTE). The objective of equitable quality for all children can be attained only with active participation of all stakeholders including parents, teachers, community, civil society and children. We have not been able to attain community support and implement effective strategies for community mobilization. It is required for translating RTE from a legal framework on paper to a vibrant movement on the ground.

Local governance of education is not a new phenomenon in India after independence. Education is a subject in concurrent list. Under the concurrent list, the central government is expected to have a meaningful partnership with the state governments for educational development. Further, local self-

governments, viz. Panchayati Raj Institutions in rural areas, Municipalities in urban areas have been entrusted with the responsibility of education of children in order to make the system more decentralized and responsive to local requirement through community participation and ownership. However, the decentralization of educational management has not taken its shape and structure even after more than two decades for effecting desirable changes.

Responsibility for implementation of the RTE Act has been vested to "appropriate government" at central, state and the community level. Local authority is defined under Section 2(h) of the RTE Act as: "local authority" means a Municipal Corporation or Municipal Council or Zila Parishad or Nagar Panchayat or Panchayat, by whatever name called and includes such other authority or body having administrative control

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over the school or empowered by or under any law for the time being in force to function as a local authority in any city, town or village; ...

The expectations from the local education authority have become considerably high in the Act. School Management Committees (SMCs) have a significant role to play in the local governance and functioning of schools under the RTE Act (2009). The Act gives immense importance to SMCs as the decentralized structure in which the parents will have a very significant role to play. The RTE guideline mentions specific functions to be performed by SMCs, which are:

- Monitor school activities and its working.
- Prepare and recommend School Development Plan (SDP).
- Supervising and supporting implementation of SDP.
- Supervision/monitoring of finance, management, academic progress, distribution of entitlements and other functions.
- Ensuring accountability and transparency in the system through the social audit mechanism.
- Keeping proper accounts of the fund available and its utilization
- Creating and maintaining an educational database.
- Co-ordinating with the local authority, generating funds from other sources for development of schools.
- Monitoring academic progress of the children.

- Instituting social audit mechanism and processes to bring transparency in the system and ensuring universal participation.
- Monitoring teachers' and students' attendance.
- Monitoring Mid-day Meal.
- Ensuring 100% enrolment of children in the age group of 6-14 years.

### **Need for Empowering SMCs**

Proper exercise of their powers by parents through the formation of SMC can be instrumental to initiate a process of improving schools. The SMCs will provide the support system to ensure that provisions pertaining to duties of the teacher as well as prohibition of private tuition are fulfilled. It will also monitor that teachers are not burdened with non-academic duties and take steps for making school development plan as per the requirement of the schedule of RTE Act. Apart from requirements of infrastructure facilities, adequate attention has to be paid by the SMC to quality issues including teacher training, teaching-learning materials in schools and use of child-friendly assessment methods. The SMC can also act as a bridge between community and school for garnering resource support. For communities/parents to be able to effectively play their role in SMC, they need to be empowered. This is required as it is seen that there is lack of knowledge and skills in

planning and management regarding the functioning of SMCs. An article by Emmanuel, L. (2012) reveals that (i) the SMC members were not even aware that they were members of SMC, (ii) members were not able to make the connections between their attending meetings and the quality of outcomes in the school, and (iii) sometimes they are made SMC member by the headmaster, and are never told what their roles and responsibilities are. Various researches by government and non-government agencies on the effectiveness of these bodies brought to light that they were not able to discharge their expected functions. It was found across states, that many SMC members were not aware of their membership of any such committees, let alone their roles and their powers. Some who were aware could not exercise their powers because of the non-facilitative, hostile environment and a lack of training. In many cases these committees were packed with those whose children were not enrolled in those schools. All these experiences bring to the fore, the importance of proper composition and representation in such a body during the process of formation and the need to equip the members to discharge their role and functions.

### **Formation of SMC**

RTE Act, 2009 has provided specific guidelines for the development of SMC in schools. A School Management Committee is required

to be constituted for all the schools, except unaided schools as per section 21 of the RTE Act. The SMC should comprise parents, local authority and school teachers. Keeping in view the heterogeneous nature of the community and the power relations that exist, the Act has tried to ensure representation of different segments of the community in the SMC, especially earmarking fifty per cent seats for women. In the Central Model Rules, the composition suggested is as follows:

- Three-fourth (75%) members of the SMC from the parents/guardians. From them 50% will be women. Weaker sections will be represented in the SMC in proportion to their population in the village.
- Rest one-fourth (25%) will consist of representatives of local authorities, school teachers, academicians/students.
- Proportionate representation will be given to disadvantaged groups and weaker sections. Community members and parents should be aware of the roles of the SMC and the process of its formation. The quality of the SMC will directly depend on the level and quality of the participation of parents. Therefore, it is necessary that parents should be sensitised with respect to the provisions of RTE Act, the roles and responsibilities of the SMC, and also their accountability towards the Committee. Village

youth and women (in particular SHGs, wherever they exist) need to be especially trained to play an effective role in ensuring proper functioning of the SMC. A general observation is that mothers express more concern and are better informed about their children's education. So, provision of effective training and orientation to the SMC members and adequate sensitization and mobilization of parents, especially mothers, will pave the way for democratic and effective functioning of the SMCs.

### **Empowering SMCs**

Specific provisions have been made under RTE Act-2009 for democratization of schools and for parents and local communities to play their due roles in shaping and running of the schools in the form of School Management Committee (SMC) and preparation of School Development Plan. For communities to be able to effectively play that role, they need to be empowered and supported. This can be achieved by employing specific strategies like training, orientation, awareness campaigns, nukkad natak, media campaigns, etc. Training SMC members would be an important area of NGO involvement. The Act clearly outlines the functions to be performed by SMCs. It is, therefore, important that training covers issues like key provisions of the RTE Act-2009, preparing school development

plan, generating information using the school records, School Mapping and Focus Group Discussion.

### **Helping SMCs to Plan Better**

Empowered and technically equipped SMCs would be crucial for bringing in improved quality in school education of our children. The area where SMCs would need help are :

- SMCs should be able to focus on tracking each child's progress and continuously monitor critical indicators. For this the records of attendance and achievement must be generated through systematic record keeping and made available to SMCs for school level planning and monitoring.
- Maintaining detailed financial records of income and expenditure of school.
- Meetings of SMCs must be conducted by school on a regular basis and should include discussion about participation of children in school, their access and retention in education as well as funding and expenditure of school activities.
- SMCs need resources to build capacity and awareness among members to help them assess needs and requirements for effective teaching-learning in schools. Guidelines and checklists are needed for SMCs and therefore it should be made available to them as a framework.
- There is a need for co-ordination of child related programmes at the grassroot level and making

schools the nodal agency, where the SMC acts as the apex planning and implementing body to oversee children's wellbeing. The school development plans must be shared in gram sabha (village council meetings) organised from time to time.

- In order to achieve every child's right to education of comparable quality, programmes and strategies for inclusion of children with special needs, mainstreaming out-of-school children after their special training are important areas for SMCs to act.
- Monitoring teachers' attendance, children's attendance, overseeing that teacher teaches effectively and children learn meaningfully need strong leadership at community level having a shared vision about children and school.
- The active participation of parents and community members from disadvantaged groups in developing an inclusive education system addressing issues of 'meaningful access' is important.
- More people should be involved in the proper functioning of schools through media campaigns including hoardings, poster campaign, print and electronic media discussions.
- Financial support should be provided by the government for

the smooth functioning of the SMCs and implementation of school development plans as envisaged by the recent Right to Education Act.

### CONCLUSION

SMCs have a very crucial role in actualizing the goals of RTE. It has tremendous potential to transform the existing system of education, characterized by cynicism and a defeatist outlook of the system functionaries and stakeholders, including teachers and parents. Through its positive action and a constructive dialogue with other stakeholders, the SMC can work towards reinstating a well functioning school system. Consistency of positive actions by SMC will change the dynamics and solutions will begin to take shape, first at local levels and then at the larger systemic levels.

Parents and children are the primary stakeholders of an education system and it is they who bear the brunt of the faulting school system. They need to be given opportunities and support to bring about a change in the education system. Our role is to make them realize that they hold the powerful key to initiate the process of reversing the decline in schools, through their constructive and collective engagements with the school and other stakeholders.

## REFERENCES

- BANDYOPADHYAY, M. AND DEY, M. 2011. Effective School Management Committees, CREATE INDIA Policy Brief.
- DAYARAM. 2011. School Management Committee and the Right to Education Act-2009, American India Foundation.
- EMMANUEL, L. 2012. Empowering School Management Committees — Helping SMC members plan better. Retrieved from <http://www.accountabilityindia.in/accountabilityblog/2522-empowering-school-management-committees-smc-members-plan-better>
- GOVERNMENT OF INDIA. 2009. The Right of Children to Free and Compulsory Education, 2009. Department of School Education and Literacy, Ministry of Human Resource Development, New Delhi
- MHRD. 2011. *Sarva Shiksha Abhiyan* – Framework for Implementation (Based on the Right of Children to Free and Compulsory Education Act, 2009), Government of India, New Delhi.