

### **EduInspire**

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"Teacher Welfare Is Nation's Welfare

#### **EduInspire - An International E-Journal**

Council For Teacher Education (CTE) – Gujarat Chapter is aspirant to carry out various innovative and interesting programmes as arranging competitions like paper writing for M.Ed. students and teacher educators of the state as well. The best paper in both the categories will be given award and will be published in EduInspire.

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## Editor's Message

Dear Readers.....

I am delighted to initiate the venture of "EduInspire-An International E-Journal" made by the Council for Teacher Education (CTE) - Gujarat Chapter to address educational as well as professional aspects of the teachers of all the levels from the Gujarat state. This initiative is intended to involve and also reach to as many as possible teachers or teaching professionals from Gujarat state to succeed fruitfully for the overall development of the teaching profession.

We are the team stepping forward with the positive attitude to deal with the current or coming trends, issues or challenges in the area of education or teaching. From many activities of CTE, EduInspire is one of the medium to disseminate / share the global ideas through the concept of social-networking and to get connected with no. of readers.

I am greatly thankful to all readers, my all team members and many supporters for their direct or indirect hearty participation in such venture.

--- Prof. R. G. Kotharí

#### Prof. R. G. Kothari Editor-In-Chief' EduInspire – An International E-Journal by CTE- Gujarat Chapter

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# TEACHER SYMBOL PROFESSIONAL IDENTITY TO THE TEACHER IN THE WORLD

#### Abstract

The teachers' existence is expected in the world for performing their role of teaching or educating the students. . So, the teachers and teaching profession is drawing attention from the world and their professional identity is need of the era. Scholars as well as researches have also initiated the same. There are various ways and means for giving professional identity to the teacher in the world. Establishment of a Symbol for identity of the teacher will be unique and wonderful. There are various organizations and professions having their specific visual identity in form of logo, symbol, motto statement, words etc, which are unique in the society and can establish unity in own endeavor. There are very few efforts found in the development of the teacher symbol in the world. So, there is need to develop the teacher symbol and the creators of the 'Teacher Symbol' have done a conscious attempt to create it.

#### INTRODUCTION

"Teachers who educate children deserve more honor than parents who merely gave birth; for bare life is furnished by the one, the other ensures a good life"

- Aristotle

The teachers are universal in nature. They are rendering major performance of shaping the human society and world. Their verbal as well as non-verbal behaviour are creating the learning environment and strongly influencing the students, which results in the future performance and deed of them. So, the teachers and teaching profession is drawing attention from the world and their professional identity is need of the era. Scholars as well as researches have also initiated the same. According to Beijaard et. al. (2003), "While it is clear that teachers' professional identity has emerged as a separate research area, it is, in our view, an area in which researchers conceptualize professional identity differently, investigate varying topics within the framework of teachers' professional identity, and pursue a diversity of goals... We argued for better conceptual clarity of these concepts. We also argued that more attention should be paid to the role of context in professional identity formation and to what counts as professional in teachers' professional identity."

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**Teacher Symbol** 



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#### NEED OF GLOBAL UNITY IN TEACHERS

The teachers' existence is expected in the world for performing their role of teaching or educating the students. There are diversities in form of disciplines, levels, places and time of teaching. There are various disciplines like education, science, mathematics, humanities, commerce, law, performing arts, social services, technology, administration, medicine, engineering etc. All of these disciplines are working in isolation, but the education or knowledge covers all of the disciplines or subjects in integrated way.

There are different levels or stages of education like elementary, secondary, pre-primary, secondary, higher education, professional courses etc. The teachers are teaching the students and mutually depended on efforts of each other. When a student complete own education, efforts of all teachers reflects in behaviour. So, the teaching is a collaborative work in sequential order and effective performance of teacher is essential at every stage of education. If any teacher hasn't done enough effort at own stage, the student may remain weak and the teachers of later stage have to do more efforts. In this sense the teaching task considered as collaborative effort for shaping the human society.

The teachers are teaching at different places like rural, urban; state, nation etc. They performs in a particular context and prepares students. When the student complete own education, start to utilize learning in the society. Here the place of such utilization would not be in that particular context only or pre-decided. The student may utilize it anywhere in the world. So, the teachers of various places are not working for their specific context only, but for the whole world.

The teachers are performing their task of teaching in different times like- past, present and future. The teaching or education of the student influences by the flow of society in every times. The teachers have performed their role in past, performing at present and will perform in future also. We cannot desperate all of these times. The teaching in different times is sequential and cumulative in chronological order and none can break it at a specific point.

## NEED OF ROLE PERCEPTION FOR TEACHERS

The teachers are performing their role in different manners as they perceive. There is a need of a common identity and role perception for teachers. Apart from a human being they should be aware about their specific existence and behave in the same manner. They have to acknowledge about themselves and receive recognition and respect from the society as well.

## IDENTITY OF TEACHER AND TEACHING PROFESSION

There are various ways and means for giving professional identity to the teacher in the world. Establishment of a Symbol for identity of the teacher will be unique and wonderful. There are various organizations and professions having their specific visual identity in form of logo, symbol, motto statement, words etc, which are unique in the society and can establish unity in own endeavour. Different organizations like UNESCO, World Health Organization (WHO), United Nations Organization (UNO), United Nations Children's Fund (UNICEF) and World Bank have their own logo; whereas the concepts like Human Right and Peace have also their identity in form of logo or symbols. The professions like Medicine and Law have their identity in such form at national and international level. The teachers are playing pivot role in education and it is inevitable to denote symbol to this profession's unique and prestigious identity at international level. UNESCO and International Labor Organization (ILO) (2008) recommended in concern of Status of Teachers and given guiding principles. Under fifth guiding principle they stated as, "The status of teachers should be commensurate with the needs of education as assessed in the light of educational aims and objectives; it should be recognized that the proper status of teachers and due public regard for the profession of teaching are of major importance for the full realization of these aims and objectives."

Poisson (2009) revealed that, "The sagging status and dignity of the teacher is matter of serious concern...

Each profession has certain values and ethics. The teaching profession too has its own ethics. Adherence to these professional ethics can contribute significantly to enhancing their status and self-esteem and increasing respect for the profession in the society." In this concern a 'Teacher Symbol' has been developed and offered to Teacher and Teaching profession to establish identity and status in the world utilizing different concepts concurrent to concept and role performance of Teacher.

There are very few efforts found in the development of the teacher symbol in the world. We can found different 'Teacher Symbols' like Japanese teacher symbol in Kanji fonts as '先生' (Sensei) and Chinese teacher symbols as '老師' (Laoshi) as well as '师' (Shi1). These symbols are nation specific and containing very few concepts of teacher and teaching profession. They are fulfilling very less characteristics of being a symbol. So, there is need to develop the teacher symbol and the creators of the 'Teacher Symbol' have done a conscious attempt to create it.

#### **CREATION OF 'TEACHER SYMBOL'**

The symbol creators/designers have make a conceptual journey and created a 'Teacher Symbol'. They have collaboratively thought about it, referred concerned literature and discussed various aspects of the concept of Teacher, Teaching profession and criteria of a Symbol. In the journey of creating this symbol various ideas came in their mind. It was tried to create on paper for many times and the symbol formed. Then they have created in computer using Paint, Photoshop and CorelDraw. As a result this Teacher Symbol evolved. The thickness of the line of this symbol is 35 point in black colour in white background in CorelDraw. The parts of this symbol accomplishing the various concepts were also created by the creators.

#### **ENGLISH LANGUAGE**

#### English Word 'Teacher'

Human beings are communicating in society with the use of language and speaking the language of their own surrounding or the widely spoken languages. From the Encyclopedia Britannica (2013) it was found that the ranking of most widely spoken languages in

the world is English, Mandarin, Hindi/Urdu, Spanish, Russian/Belarusian, Arabic etc. Here the English language is at the first rank as per number of speakers in the world. English is lingua franca. It is a language of knowledge, which is performing the role of an international link language. The global society is using it in politics, science, technology, education, communication, trade, international deed etc. It is enjoying higher rank having maximum number of speakers in many countries of the world. It is enjoying the higher status in the global society for communication in the world in general and education in particular. The designers of 'Teacher Symbol' have taken it into consideration and derived its design philosophy from English language of the Latin script. The English word 'teacher' is also worldwide having universal identity and usage. The designers of the teacher symbol have concentrated on this English word 'TEACHER' in creation of this symbol.

## Abbreviation of word 'Teacher' as 'Tr' in Cursive Writing

This word manipulated as abbreviation considering the first letter of the word 'T' and last letter 'r' in a short form as 'Tr'. The Doctors in medicine profession using short form like



'Dr.', 'Er.' for Engineers and Charted Accounts have recently started using short form 'CA' as initial for their identity. So the Teacher community can also use the initial 'Tr.' for their identity as 'Teacher'.

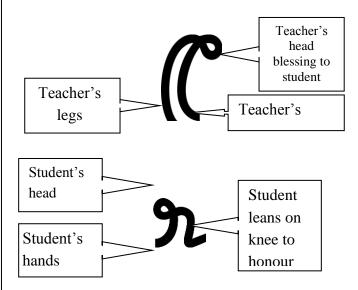
There are different types of scripts as well as computer fonts in cursive writing in English language and the society is utilizing those scripts. One can write 'Tr' in cursive writing in those Microsoft Word fonts like 'Tr' (Gigi font), 'Tr' (Magneto font), 'Tr' (Palace Script MT font), 'Tr' (Vivaldi font) etc. The symbol creators have manipulated abbreviation 'Tr' and created on paper in English cursive writing as 'G', where the 'C' is 'T' and 'N' is 'r'. The derived letters 'Tr' of the word 'Teacher' conveys the association with the symbol. Thus, the 'Teacher' word of English language of Latin script as well as short form 'Tr' and the derived symbol are acceptable for the world society. The teacher symbol is applicable at world level because it is in widely spoken language

'English'. It is breaking the borders of languages in the world, because whenever anyone goes to use it, they can create this symbol and read in English as well as their own language.

## ATTACHMENT BETWEEN TEACHER AND STUDENT

#### Honour to Teacher by Student

The teacher educating students for their wellbeing, whereas the students also following the teacher. The student honours and respects the teacher through leaning or bowing towards teacher. The teacher also tries to make the student stand up. The student looks like bowing towards the teacher; it means doesn't insignificant, but receiving education only. The student respects the teacher at the time of admission, process of learning and leaving the teacher. At the time of admission the student asks to the teacher to accept oneself for education, learns faithfully during process of education in company of teacher and at the time of leaving the teacher after completion of education presents gratitude to teacher. The teacher also blesses student for wellbeing. This concept is also > covered in this symbol. One can visualize it in this symbol 'G' and its two sketches of both of them as the sketch 'n' as student and '(") as teacher. This symbol stands for whole system of education as well as applicable at its every stage.



#### **Holding Hands to Uplift**

While observing the symbol, one can visualize teacher and student's 'hands in hands' at the bottom of this symbol. The 'hands in hands' indicates healthy

relationship and attachment between teacher and student. The symbol shows teacher's help to the student in the field of education, which is new for student. The student has less experience about the path of education and life, while teacher shows path for further move and teach them different steps of education and life. The teacher expresses affection to student and doesn't let lean, but make stand up with supports of own hands, through holding up student's hands. In this way the teacher supports and prepares to strengthen the student on own legs. Teacher prepares the student to live healthy life and to perform duties rendered by the society. A teacher is the only person, who shows the correct direction and lead to the right path of progressive life. This interpretation also exhibits full love and healthy student- teacher relationship in this symbol.

The teacher and student holds hands at the bottom of the symbol means the student is at a specific level and the teacher reaches to that level and provides education.

#### Student's Eagerness to Learn

The student's face is raised up towards the teacher in the symbol. It interprets as the student is ready to learn and eager to receive education. It results in attentive behaviour and constant learning.

#### Gravitational Pull

The sketches of teacher and student in this symbol indicate attachment forever towards each other. The teacher and student moves in the world for their own deed. Whenever they move alone, they moves being straight, while they assemble to each other, there occurs a gravitational pull. Both of the teacher and student affectively attracts towards each other and due to such attraction and gravitational pull, they leans to each other. Such interpretation is also visualizing in this teacher symbol.

#### FIRM TEACHER IN TRIPOD

The curved line of symbol has three bases and balanced through tripod which makes it firm and stable. Beginning of the curve is straight, comparing to other two bases. It means the first base i.e. teacher's legs are firm and stable, which is balancing the other two bases. If we remove the first base, then the other

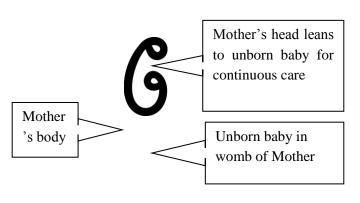
two bases will fall down. So, the firmness of teacher's legs is inevitable and it exists in this teacher symbol.

#### UNBORN BABY IN WOMB OF MOTHER

#### Teacher as an Emotional Mother

Teacher is just like a mother and student is a fetus (unborn baby) in her (teacher's) womb at the time of learning. Mother takes care of her unborn baby, when it grows in her womb. She takes care about own diet and thoughts for the sake of baby. She takes nutritious and good food to maintain better health. At this stage, > she lives in company of holy atmosphere, good persons, holy and personality oriented books or literature and music. She preserves mental health and always be in pleasant mood. In the same way the teacher is an emotional mother for student and the student is in the conceptual womb of teacher during the process of education. Just like a mother the teacher takes care of the student in such own womb. Teacher takes nutritious and good food in form of reading books, discussion with others and utilizing available resources to learn and strengthen teaching. The teacher be in company of good literature and behaves with holiness, so that it may reflect in the behaviour of student. Teacher preserves own mental as well as physiological health for the sake of student's wellbeing. Mother takes prescription from the doctor for the progressive growth development of the unborn baby in the womb.

Teacher also takes prescriptions from the experts, educationists, literatures, researches etc. for betterment of the student. Even the teacher takes part in seminars, workshops, training programmes, projects, research works etc.



Consciously or unconsciously the unborn baby in the womb of mother is at the centre in thoughts, speech and action all day and night. Even she takes more care than own for the promotional stage of baby to getting birth. The health of that baby depends on the care taken by the mother. In the same manner, teacher also be conscious about own thoughts, speech and action all day and night for better learning and promotion of students to the proceeding stage. Teacher takes care of own behaviour in presence of student as well as in their absence too.

#### Conceptual Birth to Child

Mother cares about the child and after a period of time -around nine months- a baby gets birth with enough growth and development. Teacher also cares of student's all-round development. After a period of time, student proceeds to promotional stage. At the time of completion of the grade/standard/year in around ten months or one/two/three/four/five years, the student gets emotional birth. So, the teacher is an emotional mother and student is an unborn baby in teacher's conceptual womb. This matter is also exhibiting through a part of this symbol in a sketch '6' of an unborn baby in the womb of mother.

## TEACHER SYMBOL IN COLOUR AND CIRCLE

The teacher symbol has been given colours too. The colours utilized are yellow, white and sky-blue, which have their specific metaphor.

#### Yellow Colour

The Yellow colour is metaphor of knowledge. The yellow colour is in the head of the teacher, which reveals that the teacher's head is full of knowledge and it is oozing towards the student.

#### White Colour

The White indicates emptiness, purity and containing seven colours i.e. violet, indigo, blue, green, yellow, orange and red (VIBGYOR). The student's head or mind filled up with white colour. It means the student's head is empty. The emptiness doesn't mean nothing is there in student's mind. It has the knowledge of entry level; even it has the space for receiving new knowledge. Having eagerness, it is ready to receive and bear the knowledge oozed from the teacher's head. Apart from it, the white colour is colour of purity and the student is ready to grasp

knowledge with purity of mind. There is another meaning also as the white colour contains seven colours i.e. VIBGYOR, which interprets as various fields of education.

#### Sky-blue Colour

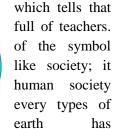
The Sky-blue colour indicates broadness as well as colour of Globe visualizing from space and colour of sky/space from the globe. The sky-blue colour indicates colour of sky/space. It means teacher and > student exists everywhere on earth as well as in space also and both of them -teacher and student- are universal in nature. The teacher and student in sky-blue colour indicates entire relationship between them in wide range of openness with broadness of mind. They interact with each other and whole process > going on in broadness and depth.

#### Circle

The Circle indicates shape of Earth as well as boundary in form of society. The teacher symbol is in circle.

which tells that

the earth is
The circle
also looks
means
as well as
society on



teachers and students. The teaching-learning process goes on the world over, where every human being undergoes through informal, non-formal and formal way of learning. The process of education is going on in the whole world, so the whole world or Globe is full of teachers and students.

#### 'G' AND 'e' LETTERS

#### Letter 'G' for 'Globe'

The teaching-learning process goes on the world over, where every human being undergoes through informal, non-formal and formal way of learning. The process of education is going on in the whole world, so the whole world or Globe is full of teachers and students. The symbol includes the letter 'G' also as script 'G', which represents the 'Global teachers and students'.

#### Letter 'G' for 'Guru'

The script of 'G' as 'G' also stands for the word 'Guru'. This word is from Sanskrit language and accepted in the English Dictionary. The word 'Guru'

has two meanings: one is 'Teacher' and another is 'Greater or Bigger than others'. The symbol is corresponding to both of these concepts.

#### Letter 'e' for 'education'

The English letter 'e' is also included in this symbol as 'C'. The 'e' letter stands for 'education'.

#### EASY TO ADAPT AS A SYMBOL

#### **Covering the Concept of Teacher**

This teacher symbol is covering and containing all of the concepts of teacher's role and teaching profession. All of the human being of the world can recognise it quickly and identify easily with visualization of the expected behaviour of teacher.

#### Easy and Aesthetic Single Line Drawing

The symbol can depart from the central base line in two horizontal shapes, where the second shape's height is half than the first one having the equal length. Both of the shapes look like mirror image. It is created with a continued up and down curved line design in two directions as a freehand drawing. It is an effortless design of the symbol. If anyone wants to create this symbol, has to draw from left hand to right hand direction as shown in the picture. Its shape is very easy to reproduce on a paper, because it is in a single line and one can manipulate without lifting pen from the paper. They can recall it with easiness of its recognition and visualization and represent at ease as it is. In this sense it is very easy to adapt. In this consideration it is fulfilling the characteristics and criteria of being a symbol. It bulges in two directions and looks beautiful, aesthetic, delightful and attractive with possession of the concept of teacher.

#### ESTABLISHMENT OF UNITY IN TEACHERS

The teacher symbol is breaking the diversity of teacher's identity for a specific discipline and can spread feelings of common to all subjects. It is applicable to teachers of all of the levels/stages as well as different places. It is covering concepts of teachers' role and teaching performance and applicable in all times i.e. past, present and future. In this sense the teacher symbol is breaking the boundaries of disciplines, levels, places or time and establishing common platform to all types of teachers. It is bringing equality among all Teachers as well as

all human being of the world. In this manner it is supporting in the globalization on this earth.

#### ANSWER OF 'WHO AM I?'

The 'Teacher Symbol' containing the concept of teacher and teaching profession. When any teacher observes this symbol, one can accept it and find oneself in it. If they are duly performing their duty, then they will be satisfy and strengthen their



performance and carry on their role. If they aren't performing proper role and consciously unconsciously missing some behaviour, then they will acknowledge and modify through observation of this symbol. Thus, this symbol is expressing about the teachers' role performance and getting the answer of 'Who am I?'

Students are also be conscious about own desirable behaviour as student. They acknowledge about the status and dignity of respected teachers, which results in honour to teachers. In this way, when they receive education, will become civilized individual of the society. Such individuals will form healthy global society.

#### **IMPLEMENTATION**

This Teacher symbol is very neat and legible to reproduce as same or smaller sizes. There are various professions on the earth like Medicine, Law, Media, Defense, etc. The symbol establishes association and relationship with other professions across the globe. The symbol can use as special character in computer fonts. It is applicable to draw, print or create for different purposes also. Educational organizations can utilize it in their own logo as well as on their letterhead and in the identity card of teachers. It is useful for teacher's own identity as well as they can create it easily instead of writing the word 'Teacher'. They can use it as their initial as 'Ch.'. They can create or stick it on their name plates, visiting cards, vehicles etc. Even memento can be created for honouring teacher. They can honour individuals other than education also in this way for their best services in education.

#### **CONCLUSION**

Recognizing the dignity and status of teaching profession, a humble attempt has been made to establish identity of 'Teacher' in the global society. Enough care has been taken in the development of the Teacher Symbol. It is communicating the message of 'Teacher' with different interpretations in form of script and sketches. Its design philosophy derived from English word 'Teacher'. Sketches of teacher and student are visualizing in the symbol. It indicates teacher and student's universal existence on the earth. It covers the concept of teacher as a mother and student is an unborn baby in womb of mother. The colourful creation is also possible with right interpretation. It is aesthetic and single line drawing, where teacher looks firm in tripod. It is very easy to create and interpret, so it is easy to adapt. It is establishing direct relationship with the role of teaching profession. It is unique and easily identifiable and easily manipulate. It is aesthetic, pleasing, legible, visible, readable, complete, universal identity and applicable to computer also. It is breaking the boundaries of identity of teachers at various disciplines, levels, places and time. Even the teachers find themselves in this symbol and acknowledges abut right path of their task. The global society can utilize it for the purpose of establishing identity of teacher in the world. Having such characteristics the teacher symbol is applicable to the Teacher and Teaching profession for healthy progress and development of the global society.

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## ENCOURAGING SOCIAL MEDIA WITH SCHOOL EDUCATION

#### Abstract:

Digital era is more focusing on communications which is becoming very easier day by day and covering as possible as long distances. Hence, global world is coming to closer and approachable. And this is blessed by ICT (Information and Communication Technology). ICT can be constituted with mass media, mobile technology and internet technology. Looking to this trends and demands, school education is also seeking to enhance practices of ICT in education with various advanced ICT tools/components. In the context of the ICT in school education, it is essential to encourage and create scope to utilise advanced ICT tools/components to get involve in educational and academic practices. This paper is designed to focus on advanced ICT – especially Social Media. It is considered that Social Media also have merits and demerits in the school context, but author is focusing on positive aspects for practicing Social Media in Education in terms to encourage positive learning experiences.

#### INTRODUCTION

Day by day, ICT is growing very rapidly to speed up the communications and cover the longer distances. This gives the feelings of 'world is small' or even 'in our hand' or as 'at our fingertips'. With such advancements, one also needs to get updated with such knowledge and practices to cope up with the global world. And this thought also needs to implement in the schools or classrooms with the aim to give maximum exposure of real world to the learners.

Social Media / social networks are the emerging and appropriate platforms through which school can improve the communication / interaction with their stakeholders and to world also. Even proper usage of social media under the appropriate policy guidelines, increases the span for learning opportunities and experiences of the learners. Social Media can be used as powerful tool to disseminate and share the necessary information quickly.

The purpose of this paper is to present the possible and positive aspects for the practices of the Social Media in Education and especially in the school context. It is considered that there are many risk factors while using the social media in the school education, but with some norms, regulations and under the

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proper observation / monitoring, these risk factors can be minimized or reduced. The proceeding sections are presenting about the social media and its implications at school education.

#### SOCIAL MEDIA

Social media refers to the means of interactions among people in which they create, share, and exchange information and ideas in virtual communities and networks. The trend of social media was started in 1969 and kept on evolving with various services and facilities. Earlier very few application of social media were used or popular. But from last few years, social media is extensively used to establish social relationships and for regular communications/interactions. Social Media is used through internet where any user can share or disseminate any text, photo, pictures, videos or Basically, it is based on the Web 2.0 audios. technology where two way interactions are possible and constituted with many social networks. Every social networks have their own features and services is explained in the next secion.

Social Networks are means to the system providing the facilities and services to internet users to communicate /interact with many other users and to form the groups to share or disseminate the information / ideas / chat. Following are some of the popular social networks that have been used worldwide by number of people.

- 1. Facebook: Facebook is the most Popular social networking site in this world which was founded by Mark Zuckerberg, Eduardo Saverin, Andrew McCollum, Dustin Moskovitz, Chris Hughes in 2004. The site has more then 1 Billion registered users. Using Facebook you can create pages, Groups by which you can share images, video, texts etc. www.facebook.com
- 2. Twitter: Twitter one of the Popular social networking site which was founded by Jack Dorsey in 2006, The site has almost 500 million users, the site is popular for sharing short text messages of 140 words which are known as "Tweets". According to some reports the site

- generates 340 million tweets daily and handles over 1.6 billion search queries per day. www.twitter.com
- anetworking, which is owned by Google and was launched in 2011. The site has about 500 Million users. Google describes Google+ as a "social layer" which does not consist a single site, but rather an overarching "layer" which covers many of its online properties. www.plus.google.com
- 4. LinkedIn: LinkedIn is a social networking website for people in professional occupations. It was Founded in December 2002 and was launched on May 5, 2003. It has about 200 Million users and is available in various languages. <a href="https://www.linkedin.com">www.linkedin.com</a>
- 5. **Pinterest**: A network of bulletin boards onto which people "pin" photos with links to external sources (recipes, online stores, etc.). It boasts 85.5 million users, and is used most often for marketing, social media, business and crafts. www.pinterest.com/
- 6. **LiveJournal:** LiveJournal is an online blogging community with about 20 million users. People use LiveJournal to create personal blogs and connect with other bloggers in the community. LiveJournal has limited functionality and caters to a younger demographic. If you want to create a company blog, you're better off with a self-hosted platform, like Blogger, WordPress, or Typepad. www.livejournal.com/
- 7. **Tagged:** A social discovery site that allows users to find people and share mutual interests. Tagged has approx 19,500,000 users. It was created in 2004 when Facebook was gaining popularity and the site was originally targeted to high school students, but has since grown into a larger community. It's similar to Facebook, except that users can send each other virtual gifts. <a href="https://www.tagged.com/">www.tagged.com/</a>
- 8. **Orkut:** Orkut is one of the most used social media websites in India and Brazil, with approx 17,500,000 users. It was created by a Google employee (by the last name of Orkut). www.orkut.com/

#### EDUCATION AND SOCIAL MEDIA LITERATURE REVIEW

The use of social media has surged globally in recent years. As of July 2011, Facebook passed 750 million users, LinkedIn had over 100 million members, Twitter had over 177 million tweets per day, and YouTube reached three billion views per day (Chen & Bryer, 2012). Despite the popularity social media for personal use, however, a low percentage of students and faculty use them for academic practice (Lenhart, et al., 2010; Tiryakioglu & Erzurum, 2010; Chen & Bryer, 2012). As educators look for ways to engage and motivate students, social media technologies are becoming a viable supplement to the traditional learning environment (Ebner et al., 2010). Also, educators are examining the combination of distance education delivery with instructional social media, thus, providing new approaches to teaching and learning that blend pedagogy and technology (Brady, Holcomb, & Smith, 2010; Lee & McLoughlin, 2010; Veletsianos & Navarrete, 2012). Following are some of the reviews of the literature presented about the integration of education and social media.

#### Usage And Interest In Social Media

Guy (2011) focused on the use of social media by students of color at several historically Black colleges (HBCs), a population that is underrepresented in the literature. The first study queried 261 undergraduate students regarding their personal use of social networking sites. Eighty-seven percent of the study participants surveyed reported having subscribed to either Facebook or MySpace while only 13% said they participate on Web sites as bloggers. Students were also asked to report their frequency of usage with specific online activities relating to social networking. The results revealed that 53% of the students reported using Facebook and/or MySpace on a daily basis. Blogging was the activity students reported performing the least at 5% daily. A second, separate but related, study surveyed 155 students at a single HBC to determine the likelihood of students going online to actively engage in the use of a social networking. The results revealed that 5.5% were not at all likely, 7.1% not very likely, 11.6% somewhat likely, 23.2% likely, and 42.6% were almost certain of going online to use social networking sites. The same study reported that the majority of students (68%)

subscribe to either Facebook and/or MySpace, 53% access these sites daily, and 18% reported frequent usage.

Liu (2010) investigated students' use of different social media tools and their attitudes and perceptions towards these tools. The author sought to identify the knowledge and trends of using 16 social media tools that included Facebook, Wiki, YouTube, Bulleting Board, LinkedIn, Blogs, Twitter, Podcasts, Virtual Worlds, RSS, StumbleUpon, Netlog, Delicious, Digg, Plurk, and Jaiku. Through an online survey, 221 students were asked to rate their knowledge level of each social media tool using a Likert scale of 1-4 (1=not)at all knowledgeable, 2=somewhat knowledgeable, 3=knowledgeable, and 4=very knowledgeable). The results revealed the following: (a) 82%, 77%, and 70% were either "very knowledgeable" or "knowledgeable" about YouTube, Wiki, and Facebook, respectively; (b) 42%, 41%, and "somewhat knowledgeable" podcasts, blogs, and forums, respectively; and (c) 42%, 40% and 25% were "not at all knowledgeable" about virtual worlds, RSS, and Twitter, respectively. The study results also revealed the top four reasons why students use social media tools. As reported, (i) 85% use such tools for social engagement, (ii) 56% use them for direct communications, (iii) 48% use them for speed of feedback/results, and (iv) 47% use them for relationship building. However, fewer than 10% of the students mentioned using social media tools for academic practice.

**Poellhuber & Anderson** (2011) worked together to conduct a study aimed at describing the use of and interest in social media. A 90-item online questionnaire was completed by 3,462 students between July, 2009 and February, 2010. The demographic characteristics constitute a large percentage of females (75.3%) and students of varying ages categorized by five 8-year spans: Generation Z, 16-24 (37.2%); Generation Y, 25-32 (27.2%); Generation X2, 33-40 (16.1%); Generation X1, 41-48 (10.5%); and Baby Boomers, 49 and over (5.3%). In terms of user proficiency, the results revealed that a significant percentage of study respondents reported being either advanced or expert users of social networking (69.5%), video sharing

(52.9%), photo sharing (33.7%) and blogging (25.4%) tools. In terms of interest in using social media for academic practice. the study respondents demonstrated a higher interest in using those social media tools for which they were most familiar. Ranked by the percentage of interested respondents, the list includes the following: video sharing (58.2%), social networking (52.8%), Web conferencing (42.6%), blogging (40.2%), photo sharing (36.4%), podcasting (33.7%), wikis (31.3%), electronic portfolios (28.5%), virtual worlds (19.4%), tweeting (18.5%), and social bookmarking (18.1%).

Guy (2012) conducted study as literature review is to examine the use of social media in higher education, specifically to reports on: (a) the use of social media by students and faculty; (b) the use of social media for academic practice in both traditional and distance learning formats; and (c) the pros and cons of using social media for academic practice. This report concluded as the effectiveness of social media in teaching and learning is limited to the use of discussions, chats, blogs, and wikis; therefore, the need exists for further exploration in determining how other social media platforms can be used for academic practice.

These reviews revealed with current trends and scenario about the younger generation and their interest with social media can be summarised as:

- The use of social media by students for academic practice is surpassed by its use for social engagement, direct communications, and relationship building.
- A large percentage of social media use and expertise lies with college students between the ages of 18-24, also known as Generation Z
- Facebook and YouTube are the two most commonly used social media technologies among all students.

## Research Studies On Academic Practices With Social Media

Junco et al. (2010) examined the link between social media use and student engagement. The semesterlong study consisted of two groups, experimental and control. With the experimental group, Twitter was used for various types of academic and co-curricular

discussions, class and campus event reminders, faculty and student connections, providing academic and personal support, and organizing service learning projects and study groups for 70 students. Ning, a social networking site, was used to deliver the same course information to the control group of 55 students. Analyses of Twitter exchanges and survey responses showed that: (1) the experimental group had significantly greater increase in engagement and (2) both faculty and students were highly engaged in the teaching and learning process.

George (2011) developed a mini course entitled "Friending Facebook" for 15 healthcare students at Penn State. The mini course was designed with the use of a variety of social media tools as a means to provide participants with content through anecdotes and examples. For instance:

- ▶ Really Simple Syndication (RSS) readers were used to track clinical trial data from multiple journals, to follow blogs originated by researchers, and to receive news and relevant literature regarding the latest trends in the healthcare industry.
- ➤ Twitter was used to share and receive information from colleagues, health organization, and patients.
- ▶ Facebook and LinkedIn were used as the course platform for networking among peers, faculty and medical professionals.
- ▶ Google Resources (Alerts, Mail, and Realtime) were used as search tools that indexed Facebook posts and Twitter tweets and provided social updates on healthcare topics from around the world.

Deng & Yuen (2010) explored the role of academic blogs in supporting a group of 19 pre-service teachers in Hong Kong. Specifically, the purpose of the study was to investigate the pros and cons of using blogs to self-expression, self-reflection, support social interaction, and reflective dialogue among pre-service teachers. Xanga, a free commercial blogging platform, was used as a means of documenting, sharing, and reflecting on their teaching practice experiences. Quantitative and qualitative data were collected through blog frequency counts, questionnaires and interviews. The investigation revealed that only 13 pre-service teachers wrote 75 blogs entries with 62

comments exchanged; 13 participants acknowledged the values of blogs with respect to self-expression, self-reflection, and the documentation of experiences; and 12 pre-service teachers felt more connected through blogging when compared to the teaching practice in the previous year.

These research studies shows the positive influence of social media can be used through academic practices. Such many more academic practices can be planned / prepared using social media or social networks. Following section is presenting some of the examples of the schools are regularly practicing with such media.

## GETTING INSIGHTS FROM EXAMPLES OF SCHOOLS USING SOCIAL MEDIA

Following are the examples of the schools are effectively and actively using the social media for their academic activities and services. According to Lepi (2012), following schools are making very good usage of social media for the academic purposes.

<u>Piedmont High School</u> in Piedmont, Calif. Principal Richard Kitchens (@piedmonthigh) uses Twitter to help students and teachers reach the school's goal: "Achieve the Honorable." This high school places a lot of emphasis on supporting students, so taking that to the digital realm makes perfect sense. Students can reach out to their principal, who moderates the stream, responds to mentions and direct messages, congratulates school teams, and posts updates about calendar events, educational tips, useful resources, and links.

George Middle School in Portland, Ore. This middle school uses the more educationally oriented social networking tools like Wiggio, Edmodo and EduBlogs. Each one is used a little differently, and they've taken student engagement to a new level. "We now have two sections of technology learning social media techniques. [...] Our kids blog, text, whiteboard and tag. They post links and create videos," says counselor Elizabeth Delmatoff. These systems are being used for accountability, too. "Our tardy or absent kids (and their parents) get texts to their cell phones and we have implemented a 1:1 online tutoring program. We have peer chat groups, peer study groups and teacher led groups. Not only do we have them, the kids love them."

Roosevelt High School in Minneapolis, Minn. The curriculum at this high school is geared towards getting students ready for success at colleges and technical schools. Using the University of Minnesota's DigMe (short for "digital media") program, Roosevelt High teachers and administrators started weaving social media into the curriculum at every level. Students use social sites outside the classroom constantly, and bringing it inside the classroom has increased participation and student engagement dramatically.

Half Moon Bay High School in Half Moon Bay, Calif. A.P. U.S. history teacher Mike Putnam assumed that his students knew everything there was to know about using social media, but what he found was that that was only true about Facebook — Twitter was a different story. Emphasizing the role Twitter is playing in politics, revolution and the general unfolding of history, Putnam gives students daily questions and teaches them to be concise through Twitter. Freehold High School in Western Monmouth County, N.J. With a medical science learning center, a culinary academy and a computer science academy all right on campus, Freehold High School takes their four-year program to prepare students for postsecondary studies very seriously. On campus, cell phones have been decriminalized and are now being used for Twitter, Skype and a host of other social networking tools aimed at preparing students to market themselves.

From the above examples, one can learnt that various social media or social networks can be effectively practices to enhance academic activities of any level. Also it required for the academic practioners to have hands on practices or good command over the operational knowledge of social media.

## EPISTEMOLOGICAL IMPLICATIONS OF SOCIAL MEDIA IN EDUCATION: FEW APPLICATIONS

Implications of Social Media in Education is very easy to understand and easy to make various pedagogical/academic practices. Harper (2013) also has suggested and give some examples of different social media can be used for various academic activities are given as below.

<u>Facebook Classroom Page</u>: Facebook pages are used for small businesses, celebrity fan clubs, authors and many others who wish to have a place where they can connect with others. While the Classroom Facebook Page, it is an excellent place to post homework assignments, share updates or even humorous stories from the day. The practice of posting homework assignments each day can save students and their parents a lot of frustration, and discourage excuse-making for assignments that aren't completed. Even if it's not used daily, this social media gathering place can increase the community feel of the classroom.

<u>Twitter for Reminders</u>: A short, 140-character Tweet is often sufficient for giving parents and students a head's up that there's a test scheduled or assignment due the next day. These quick reminders can be lifesavers for busy families that spend the late afternoon and early evening running from one activity to the next. Use them for field trips, conferences or general reminders of supplies needed. Similar to the Facebook page, Twitter can also be used to increase parent-teacher communication.

Show and Tell with Pinterest: Pinterest is a social media venue that caters to those who are visually oriented. If you take pictures in your classroom of the students working or of classroom projects, pinning them on Pinterest can be an excellent way to share the photos with parents. Before doing this, be careful to review your students' photo releases to see if you have permission to take and post photos. Even with this, it's often best to post photos of projects and activity results rather than of the students themselves. Blogging in The Classroom: Whether you use it as part of your English class lesson plans or for any other subject, having students participate in a classroom blog can be an excellent way to get them to map out their thoughts and practice writing. Assign a different student each day to take care of blogging. Be sure to provide guidelines and demonstrate how to follow them at the beginning of the year. Classroom blogs can be made available to parents and administrators only by maintaining a private blog that can be accessed only by approved or invited subscribers.

#### **CONCLUSION**

Social Media is the open platform, has many useful features that can be used for various educational purposes. Many pedagogical and academic activities are possible to design through social media. It is very useful tool to improve communications / interactions at any level or with any audience. To minimize the risk factors associated with the social media in the context of school or young students, needs to formulate proper policy guidelines /norms / regulations and also essential to have proper observance / monitoring. Also one recommendation / suggestion can be expressed by the author as looking to the risk factors associated with the social media is school should create the features and opportunities of social media through their own school website. The features like blogging, social networking, sharing etc should be developed through their own school website in terms to connect all the stakeholders of the respective school. Even such implications should be made for higher education also which help to create our own community / social groups.

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# PERCEPTION OF TEACHERS TOWARDS FUTURE SCHOOLS IN INDIA AT 2025AD WITH RESPECT TO CAPACITY BUILDING MEASURES

#### Abstract:

This paper is an attempt to study the perception teachers towards the future schools at 2025AD. The objective is to study the perception of teachers about the present school in India in terms of Capacity building Measures, to study the perception of teachers about future schools in India at 2025AD in Terms of Capacity building Measures, to compare the perception of teachers about the present schools in India and Future schools at 2025AD in India in terms of Capacity building Measures The sample for the present study was taken purposively. The sample consisted of 90 teachers and principal from 30 secondary and higher secondary schools (CBSE/ICSE/ State Board) in seven Indian states. The samples of the present study were draw randomly from the rural and from urban & rural area. The results shows that Present school is less equipped to augment the demand of present learners as it is expressed by very large number of teachers' where as the capacity building measures of future school is going to play a catalytic role in future schools as it is evident from the response of teachers to very large extent. In the past, schools have often been unresponsive to change. Today, such unresponsiveness cannot be allowed to impede full scale transformation.

#### INTRODUCTION

Learning can occur anywhere, but the positive learning outcomes generally sought by educational systems happen in quality learning environments as depicted in fig.1. Learning environments are made up of physical, psychosocial and service delivery elements. Physical learning environments or the places, in which formal learning occurs, range from relatively modern and well-equipped buildings to open-air gathering places. The quality of school facilities seems to have an indirect effect on learning, an effect that is hard to measure. Our school system is afflicted with numerous problems (**Sharma**, 2010) like: How to link school education with economic independence, Bridging the gap between world of work and world of academics, Harnessing information technology, Curriculum reform to face the challenges of 21st century and to diminish curriculum overload, Privatization of school education, Gender disparity at school level, school education is unable to

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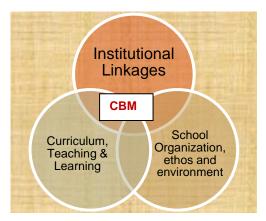


FIGURE 1 QUALITY SCHOOL WITH CBM

foster skills among students for facing the challenges of the century resulting into various kinds of stress the students face, School education does not help students to develop self confidence, skills of entrepreneurship etc. Therefore the burning challenge is to strengthen capacity building effort of schools.

#### RATIONALE OF THE STUDY

"Educationists should build the capacity of the spirit of enquiry, creativity, entrepreneurial and moral leadership among students and become their role model" Dr APJ Abdul Kalam. Schools have to provide an innovative environment to harness the energy of the educands and have to stay abreast with the latest trends in the field of technology. Today we need techno savys and not technophobes for the society. The educators must ensures that their students do not fall victim to blind superstitions. They have to free them from the shackles of blind faith and guide them to soar high up, breaking all bondages .Schools must ensure that teachers are the mentors of the student at school but at home the parents are their mentors. Parents have to manoeuvre their progeny towards a path of becoming competent and useful citizens of the world. Schools must have to ensure that their students possess high morale character as they can be lured away from the values and bedazzled by the superficial glamour to which they have been exposed due to globalization. Schools as we know them today were designed more than a century ago. In those times, schools were almost the last place for change, and in fact changed after the change was established in the society outside. Schools were a place where adults led the learning, they direct and controlled, child centered activities. Today this type of schools is no longer relevant. The entire concept and structure of a school needs to change like: a freshly prepared vintage car that that works perfectly is not what is needed- a totally new model that is built for the needs of this constantly changing future needs to be designed. The school plant must contribute positively for the effective growth & development of the learner. Therefore capacity building Measures finds immense importance for maintaining and monitoring quality input-process-Output purpose.

#### **REVIEW OF RELATED LITERATURE:**

Khan etal (2010) undertook a Study entitled "A Study of the preferences for the learning Environment with respect to the learning style of IX standard students of English medium schools in Bhopal city" with the objective: To study the preference for learning environment of IX standard students of English medium school of Bhopal city on the following dimensions: (a) student's cohesiveness (b) teacher support (c)involvement (d) task orientation (e) investigation (f) cooperation (g) equity (h) differentiation (i) computer usage and (j) young adult ethos. To compare students total preference for learning environment and its above mentioned dimensions on the basis of their learning environment: (a) student cohesiveness; (B) teacher support (C) involvement (D) task

The Sample comprised of 61 schools of CBSE and 52 schools of Madhya Pradesh Board of English Medium. The whole city is divided into 5 Zones , South , east north ,west and center zone , from each zone 2 schools were selected randomly , constituting the sample for this study in the city of Bhopal. One – way ANOVA was used to test the hypothesis. The findings are as under:

(1) There is significant difference in teacher support dimension, involvement dimension, task orientation dimension, co-operation dimension, equity dimension, differentiation dimension, young adult ethos dimension and total preferred learning environment of students.

(2) However, there is no significant difference in student's cohesiveness dimension, investigation dimension, and computer usage dimension of students on the basis of their learning style.

#### RESEARCH QUESTIONS

- How is capacity building effort of school responsible for quality education ?
- What are components of capacity Building effort that need to be considered for the improvement in school effectiveness.
- How is perception of teachers determines the quality of school?

#### STATEMENT OF THE PROBLEM

Perception of teachers towards future schools in India at 2025AD with respect to capacity building measures

#### **OBJECTIVES OF THE STUDY**

The following objective has been developed to realize the present study.

- To study the perception of teachers about the present school in India in terms of Capacity building Measures
- To study the perception of teachers about future schools in India at 2025AD in Terms of Capacity building Measures
- To compare the perception of teachers about the present schools in India and Future schools at 2025AD in India in terms of Capacity building Measures

#### **DEFINITION OF THE TERM**

**Perception:** Perception is awareness, comprehension or an understanding of something. Alternately perception is a neurological process, act, or faculty of perceiving or recognition and interpretation of sensory stimuli based chiefly on memory. Also it is an insight, intuition, or knowledge gained on any thing/ any matter.

#### **OPERATIONAL DEFINITION**

Capacity building Measures: Creating an environment that fosters learning, character and personality development, efficiency in physical surroundings and environment. That means an effort

in the direction of continuous improvement of all the stake holders of the school for the realization of the objective of schooling. For the present study, it has been measured with the help of the perception scale developed by the investigator, one for the present school and other for the future school respectively. Total scores secured in the scale is the measure of the capacity Building in schools

#### **DELIMITATION OF THE STUDY**

The study was delimited to the perception of secondary school teachers and principals of state board/ CBSE schools spreaded in seven Indian states.

#### **METHODOLOGY**

The design meant for survey method has been used in the present study.

#### SAMPLE FOR THE STUDY

The sample for the present study was taken purposively. The sample consisted of 90 teachers and principal from 30 secondary and higher secondary schools (CBSE/ICSE/ State Board) in seven Indian states. The samples of the present study were draw randomly from the rural and from urban area.

#### TOOLS FOR THE STUDY

The tools used for the data collection were Perception scale for the present and future schools prepared by the investigator. Perception scale has 2 parts i.e. about present school and future school. Each section i.e. present and future schools comprises of 15 questions related to Teacher quality.

#### **TECHNIQUES**

To study the future perception of teachers about future schools, Delphi technique was used. The Delphi method was developed at the beginning of the Cold War to forecast the impact of technology on warfare. Delphi is based on the principle that forecasts (or decisions) from a structured group of individuals are more accurate than those from unstructured groups. This has been indicated with the term "collective intelligence".

The technique can also be adapted for use in face-toface meetings. In the standard version, the experts answer questionnaires in two or more rounds. After each round, a facilitator provides an anonymous summary of the experts' forecasts from the previous round as well as the reasons they provided for their judgments. Thus, experts are encouraged to revise their earlier answers in light of the replies of other members of their panel. It is believed that during this process the range of the answers will decrease and the group will converge towards the "correct" answer. Finally, the process is stopped after a pre-defined stop criterion (e.g. number of rounds, achievement of consensus, and stability of results) and the mean or median scores of the final rounds determine the results.

#### DATA COLLECTION

After finalizing the sample and the perception scale the investigator distributed the questionnaire containing 15 items to the teachers personally and by post. The data was collected form the target sample. It was sent to 150 teachers among which 90 teachers responded within stipulated time. The data for present school analyzed & the frequency and perception was sent to the sample in second round.

#### DATA ANALYSIS

First round data collection and analysis:

The first round data was collected from the 90 teachers from different schools. After supplying the questionnaire the above respondents were requested to attempt all the items freely by putting  $(\sqrt{})$  mark against the most suitable alternatives out of six choices. After that the results of the collected data was analyzed by using the appropriate statistical techniques like percentage. The group response was analyzed item wise as well as in total.

#### Second round data collection and analysis

For the second round data collection both sections of the questionnaire ( Present school and future school ) each having 15 items and corresponding percentage of opinion , collected in the first round data was supplied to the same sample along with their previous questionnaire. The respondents were requested to put mark  $(\sqrt{})$  in favour of or against of their previous responses for each item looking into the group response and his own response to the first round data collection

#### Analysis of the second round data:

After collecting the second round data the items were analyzed. The statistical techniques like percentile, was used for item wise and component wise.

From the above table it is evident that the intensity index about the present and future Capacity Building Measures is given statement wise which enabled the researcher to arrive at conclusions.

#### MAJOR FINDINGS OF THE STUDY

#### Findings for Objective 1:Present School

- ♣ Many teachers perceived that the present school education system has poorly accounted the stronger partnerships with civil society, failed to cater inclusive education, connect knowledge across disciplinary boundary, provides broad framework for insightful construction of knowledge, enhances potentials of learners, it have forged partnership with communities for greater accountability and quality, it has an effective academic planning and leadership strategy.
- Large extent of teachers disagreed on the fact that our school system has the capacity to reform itself, has potent culture to nourish the varied interest of children, has decentralized planning of academic calendar, our text books caters the multiple interest of teachers and learners, our class room interaction encourages questioning and leaves space for pursuit of new questions which is very much required for effective T-L process in schools.

#### Findings for Objective 2: Future school

Nearly 95.56% teachers agreed that our schools will have a potent school culture to nurture children's identities as learners, 92.22% agreed that our text books will cater to the multiple interests of teachers and needs of learners, 93.33% agreed that our class room interactions will encourage questions, about 90% agreed that our school education system will have decentralized planning of school calendar and daily schedules, 95.55% of teachers agreed that our school education system will have the capacity to reform itself by enhancing its ability to remedy its own weakness and to develop new capabilities, 91.11% of teachers agreed that our classroom interaction

will leave space for the pursuit of new questions in future.

♣ Remarkable observation which the investigator observed that there is no clear cut opinion about the involvement of local community will enhance the quality and accountability in education at 2025AD which points out that there will possible change in socio –politico- economic condition of community that may decide the future course of our schools.

## Findings for Objective 3: (Comparison of the present schools in India and future schools at 2025AD.

♣ Present school is less equipped to augment the demand of present learners as it is expressed by very large number of teachers' where as the capacity building measures of future school is going to play a catalytic role in future schools as it is evident from the response of teachers to very large extent.

#### **SUMMARY:**

Perception of teacher about present school and school at 2025 AD with regard to capacity building measures could be concluded that:

- Most of the respondents of present school strongly agreed that there should be greater autonomy for teachers with regard to professional practices and schools just connect knowledge across disciplinary boundaries.
- ❖ The respondents for present and future schools agreed on the matter related to changing role of school i.e. school must promote inclusive education, broader frame work of knowledge, enhance the potentiality of the learner, strong partnership with community and civil society, plan strategically and should provide definite leadership to society.
- ❖ However there is strong disagreement among the respondents of present school and future school and teachers perceived strongly for the school at 2025 AD that school must have the capacity to reform itself, potent culture to nurture the identity of the learner, decentralized planning, Text book will cater to the multiple interest of the learner, encourage questioning, and environment of questioning etc.

## IMPLICATIONS OF THE PRESENT STUDY Policy Implications

School education in India is largely a government affair. Educational managers are interested in issues of efficiency and productivity. To make our school more efficient, we need to empower schools to understand the how and why of the curriculum, children, learning, instructional methods and materials, testing and evaluation .Thus more research avenues need to be created for which financial resource need to be managed by respective state govt. Or union govt. or it can be a public private partners ship mode.

#### Administrative Reforms

A threat free atmosphere should be there in schools which will result in creating conducive atmosphere for learning. Further quality and competency of any educational institutions is determined by the role played by its teachers. Therefore it is necessary for concerned school authorities to be vigilant in recruiting faculties. Efforts must be made to update their knowledge at regular intervals. There also need to plan and organize orientation and refresher course regularly.

#### THE LAST WORD

For capacity building measures large extent of teachers agreed that our school system has the capacity to reform itself to some extent which seems less favourable in terms of present quality demand. It could be concluded that the perceptions of teachers are not so positive and it could be said that in this dimension, the teachers perceive present school to average standard. However Future schools will have capacity to position itself for new generation learners through its accountability and assured quality as responded by very large number of teachers to a large extent. Teachers perceive future schools very positively in terms of the quality such as Capacity Building measures as well as the average intensity index which was found to be better in comparison to the present school system.

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**Table 1:** Comparative intensity Index about present and future schools in India at 2025 AD in terms of Capacity Building Measures

SN	Statements	INTENSITY INDEX	
		PRESENT	FUTURE
1	Our school education system has the capacity to reform itself by enhancing its ability to remedy its own weakness and to develop new capabilities.	3.32	5.56
2	Our schools cater inclusive education irrespective of social discrimination.	4.52	4.72
3	Our schools connect knowledge across disciplinary boundaries.	4.61	4.53
4	Our schools provide a broader frame work for insightful construction of knowledge.	4.68	4.77
5	Our schools have a potent school culture to nurture children's identities as learners.	3.26	5.47
6	Our schools enhance the potentials and interest of the child.	4.82	4.89
7	Our schools have forged a partnership with communities.	4.39	4.50
8	Our school education system has decentralized planning of school calendar and daily schedules.	3.27	5.43
9	Our schools have autonomy for teacher professionalism practices those are basic for conducive learning environment.	4.59	4.57
10	Our text books cater to the multiple interests of teachers and needs of learners.	3.31	5.49
11	Our class room interactions encourage questions.	3.30	5.50
12	Our classroom interaction leaves space for the pursuit of new questions.	3.22	5.42
13	Our schools have an effective academic planning & leadership strategy.	4.66	4.80
14	Our school education system has accounted the stronger partnerships with civil society.	4.33	4.59
15	Involvement of local community enhances the quality and accountability in education.	4.71	4.81

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## A STUDY OF THE ADJUSTMENT OF B.Ed. STUDENTS

#### Abstract:

Time is scarce for preparing a teacher due to this lot of academic problem is created. Academic problems are there because students are unable to adjust him in changing condition. There arise the need of to be Social, Emotional, Educational, Health, home adjusted to make the student stress free and understand them very well need to know adjustment problem. Adjustment gives us the ability and strength to bring desirable changes in the state of our environment. In this paper attempt has been made to study adjustment of B.Ed. students.

#### INTRODUCTION

Education has a lot of responsibilities among which one major responsibility is to make a child not only human resource but human in real sense. Gandhiji has quoted education as a process of drawing the best from a child. But in the formal settings this process is through study of various subjects, development of skills from the interaction in the class. In this relation teacher training plays a vital role. Kothari & Shelat in University News (June. 2009) have stated that the B.Ed. programme duration should be of at least three semesters. NCTE (2008) has designed two years regular B.Ed. programme where three semesters are for theory and practical and last and the fourth semesters is meant for internship in secondary or senior secondary school. The concerns shown above suggests that time is scarce for preparing a teacher due to this lot of academic problem are created. Academic problems are there because students are unable to adjust him in changing condition. There arise the need of to be Social, Emotional, Educational, Health, home adjusted to make the student stress free and understand them very well need to know adjustment problem.

#### **CONCEPT & DEFINITION OF ADJUSTMENT**

The concept of adjustment was first used by Darwin in his theory of natural selection. At that time the word adaptation to environment was used instead of adjustment. Man had the highest capacity to adapt to new situation among all living being. In this process of adaptation man uses his maximum capacity to fight against the adversaries of the environment situations. When man becomes victories, he is said to have been adapted to the environment. Through the word adaptation adjustment come.

As per the dictionary the term 'adjustment' is synonymous with change, alteration, modification, amendment, tuning and so on. Therefore, the

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individual who find themselves adjusted in society are considered to be the privileged ones. In psychological terms, the behavioural process by which humans and other animals maintain a balance among their various needs and the obstacles of their environments is called adjustment. Adjustment is an ongoing process which continues throughout the lifespan of human and animals.

Dictionary of Education defines adjustment as "adjustment as the process of finding and adopting modes of behaviour suitable to environment or to change in the environment." According to Crow & Crow, "an individual's adjustment is adequate, wholesome or healthful to the extent that he has established harmonious relationship between himself and the conditions, situations and persons who comprise his physical and social environment."

According to Shaffer, "adjustment is the process by which a living organism maintains a balance between needs and the circumstances that influence the satisfaction of these needs." Gates, A. & Jersild, A. states "adjustment is a continual process by which a person varies his behaviour to produce a more harmonious relationship between himself and his environment."

A close examination of the definition draws out certain characteristics of adjustment:

- Adjustment enables to strike a balance between our needs and our capacity to meet these needs.
- ➤ Adjustment leads to change in our thinking and change in the way of life with the regards to the demands of the situation
- Adjustment gives us the ability and strength to bring desirable changes in the state of our environment.
- Adjustment is both physiological as well as psychological.
- > Adjustment is multifaceted.
- ➤ Adjustment brings us happiness and contentment. In simple words, adjustment is to be understood as a means 'to be' fit to make correspondent changes, to adopt or to accommodate in the changing condition, circumstances to get satisfaction in life otherwise stress will come.

#### Two General Adjustive Modes

Many writers on psychology have recognized the two general adjustive modes. Piget (1952), who has been greatly concerned with the development of adaptive intelligence, and has utilized the terms 'accommodation' and 'assimilation' to represent the alternation of oneself or the environment, respectively as means of adjusting.

Learner (1937), referred to the two groups as chameleons and beavers. The chameleons adapt immediately to the situation changing them to suit the circumstances. Beavers in contrast, continue gnawing through the trees regardless of what happens.

Reism (1950), described the inner directed person as one who carries his values and standards of conduct around with him, maintaining these in spite of major changes in the social climate. In contrast with this is the other directed person, who must take his standards from the social context, changing his believes in accordance with the altered values of the person and institution around him. The former person is the beaver. The and assimilator the later is chameleon. the accommodator.

#### Criteria of Adequacy of Adjustment

#### i. Health and Physical Adjustment

Sometimes only evidence of inadequate adjustment appears in the form of damage to body issues. Some students have diseases as well as physical problems from their birth which keeps the child out of the normal childhood rough and tumble such as height problem, fat etc. Even this physical problem may be due to any accident or injuries such as weak eye sight, acidity, back pain, etc.

The field of psychosomatic medicine has developed because of increasing recognition that physiological damage can be brought about by psychological malfunctioning e.g. disturbance in digestion is one of the most common ways in which difficulties in adjustment and their consequent tension states manifest themselves. The formation of ulcer, impairment of appetite, and persistent diarrhea are some of the symptoms that frequently reflect

disturbance in psychological economy. The existence of adjustive problems that such physical symptoms have psychological origins is after ascertained by the fact that no physical basis for them can be found and the disturbance may respond to psychological therapy.

#### ii. Social Adjustment

Social adjustment is a process whereby the individual attempts to maintain or further his security, comforts, status or creative inclination in the fact of the ever changing conditions of the society through such efforts. A young person's social adjustment reflects the influence upon him of his experience in the more specific adjustment areas, but goes beyond them as the adolescent attempts to respond to all the human inter-relationships by which he constantly and consistently is stimulated.

#### iii. Psychological Adjustment

One of the most compelling signs of adjustive failure is that a person is psychologically uncomfortable in some way e.g. depression chronic or acute anxiety obsessive thoughts of guilt or fear of illness or dying. if these states of mind occurs so much of the time and to such a degree that a person is in great distress, they may stimulate him to seek help which depends upon how much discomfort a person is willing to tolerate. Experiencing this discomfort after implies.

#### iv. Work Efficiency

Another sign of adjustive difficulties is impaired ability to make full use of social capabilities or skills. A person may be falling in school or chronically poor performance may result regularly in the loss of the job such a person may be able to work consistently but only at a level far below his capabilities. He/she sometime unaware that he is functioning below poor and may have difficulties in understanding that why he is failing occupationally or socially. In activities work efficiency is after attributable to state of stress, which can impaired the ability of the individual to function of to his capacity.

#### **Need of Adjustment to Cope with Problems**

Darwin's theory of evolution, states only those organisms most fitted to adapt to the changing circumstances survive. So that individual who is able to adjust themselves in the changing situations in their environment can live in perfect harmony and lead a happy life. They have to correspond one another for

survival. As a member of the society besides own needs, there is the demand of the society i.e. particular mode of behavior from its members. When one thinks to fulfill his needs by setting aside the norms, ethics and cultural traditions of one's society, and personal thinking, different environment in which he brought up get conflict and make a person confused. It create imbalance in one's life that is the problem of adjustment. But if he modifies himself and change own way or circumstance, then it will make person fittest for survive in the society satisfactorily. In short following points we can infers from the above discussion what needs of adjustment in our life.

- Adjustment is a process that takes a person to lead a happy and well contented life.
- Adjustment helps in keeping balance between one's needs and the capacity to meet these needs.
- Adjustment persuades one to change one's way of life according to the demands of the situation.
- Adjustment gives strength and ability to bring desirable changes in the condition of one's environment.

#### **Characteristics of a Well Adjusted Individual**

- > Individual understands the philosophy of life
- > Individual is aware of his strength and weakness.
- ➤ His aspiration is neither too high nor too low.
- ➤ Individual satisfies his basic needs. He learns to be happy.
- ➤ He/she has rational and positive attitude.
- ➤ He/she has flexible behavior.
- > Individual strongly faces challenges.
- ➤ He/she has realistic perception of life. He sees life as it is.
- ➤ He/she has respect for self and others
- ➤ Individual is aware of his environment and feels comfortable in it.

## IMPLICATIONS FROM THE REVIEWED STUDIES

Barot (1991) carried out a study to know the adjustment problems of M.Sc. Home Science Students and found that students were more worried about their studies, work, career and future. They also wanted to improve their memory, and like to know the ways of concentration. They were over anxious to make a

success of their life. Also it had observed that all the students experience more or less the same degree of adjustment problems. Pandya (1989) has carried out a study of adjustment problems of the foreign students in the M. S. University of Baroda and found that students were segregated by the Indian students, disagreement with their roommates like disturbing behaviour, cultural barriers, misunderstanding and different in opinion. Also some did not have contact with the advisor appointed by the M. S University for foreign students.

Bhatt (1969) has carried out a study of the factor related to the social and personal adjustment problem of adolescent girls in the faculty of home science and preparatory unit of arts and he found that there is a highly significant positive relationship between personal adjustment problems and social adjustment, The following factors namely, age of menarche, socio-economic status type and size of the family bear no significant relationship with the adjustment problems of adolescent girls. Metha (1973) has conducted a study of adjustment problems at Shree Manak Seva Sangh; Bombay and he found that all such type of negative relation may lead them to emotional depression and hostility toward the institution which may finally lead to maladjustment in the situation. Whereas (Jani, 1981) found that B.Ed. trainees faced more adjustment problems.

#### **RATIONALE**

Education is the key component in national development in the end of globalization and technology the world changing fast and continuously. To cope up with the demand of changing world needs quality education. It may be 10<sup>th</sup> five year plan or 11<sup>th</sup> vear plan, one can see focus of enrolment has been shifted to quality education and quality of education depends upon the quality of the teachers. And to prepare future teachers is essential need, within years of professional courses they have heavy curricula such as 8 compulsory courses, 2 method courses, 1 special field, practice teaching phase, lots of assignment and academic work. It is difficult to complete the curriculum as suggested by Kothari and Shelat in the article of issue of teacher education (University News) 2 years B.Ed. course suggest, will provide most enough time for the professional development. Due to 1 year B.Ed. course lot of stress on the students. They have all the programmes conducted 1 by 1 and along with this some students may have the problem of medium of instruction considered as academic problem. To cope with such academic problems, there is first need of psychological preparation of students, having aspiration to complete effectively and learning needs to understand how to be adjusted. This is possible only when they are healthy, socially & emotionally well adjusted at home.

Home is the end of the earth, as we believe that provides healthy atmosphere, inspiration. Health is necessary because health is wealth. Sound health is prior is one of condition to make you effectively. Human being is social animal and living in society. So, social adjustment is needed to live peacefully, harmoniously with peers, neighbour that gives support and satisfactory. Education is also one of the basic factors. At the present time there is a lot of emphasis on IQ & EQ. However one is intelligent, if he/she is not stable emotionally will create problem.

In the M. S. University education department divided into two semesters having too workload so, here is need of study an adjustment of B.Ed. students, because investigator didn't come across such a study. So there is some questions cause in the mind of investigator such as,

- 1. What are the problems faced by B.Ed. students in home to be adjusted?
- 2. What are the problems faced by the students to adjust himself/herself in the society?
- 3. What are the problems related to their health?
- 4. Which problems are arising to that as hindrance to cope with their emotions?

#### METHODOLOGY

#### **Statement of the problem**

A Study of the Adjustment of B.Ed. Students

#### Objectives of the study

- 1. To study the adjustment of the B.Ed. Students with respect to
  - a. Home adjustment
  - b. Health adjustment

- c. Social adjustment
- d. Emotional adjustment

#### Operationalization of the term

#### Adjustment

In the present study adjustment means to be fit in the present and in the changing demand of environment to make life smooth and stress free.

#### **Home Adjustment**

Home adjustment is expressed in terms of satisfaction or dissatisfaction with home life, appropriate and inappropriate expectations of behavior, trust of family, and satisfaction and affection within the family and certain health related aspects.

#### **Social Adjustment**

Social adjustment is expressed in terms of comfort or discomfort in social gatherings, shyness, submissiveness and introversion relating to group activities.

#### **Emotional Adjustment**

Emotional adjustment is expressed in the terms of disappointment, irritation, feelings of inferiority, sleeplessness and nervousness.

#### **Health Adjustment**

Health adjustment is expressed in terms of illness, fatigue, stress and indigestion.

#### **Delimitation of the Study**

The study was delimited to the batch of the B.Ed. Students of the M. S. University of Baroda. Vadodara year 2009-2010

#### **METHODOLOGY**

#### **Population**

All the 150 Students studying in the M. S. University of Baroda, Vadodara- during the academic year 2009-10 constituted the population of the study.

#### Sample

60 Students of Hindi method of the M. S. University of Baroda was selected using cluster sampling.

#### Tool

Bells' adjustment inventory tool was used to know the adjustment of the student teachers. There are items related to home, health, social and emotional adjustment in check list. All items are in the form of statements.

#### **Data Collection**

The data was collected by the group personally from the B. Ed. Class of the M.S. University of Baroda, Vadodara. From 60 students, investigators has collected data from presented 43 students on the day of data collection.

#### **Data Analysis**

The data was analyzed first individually considering 4 categories like social, emotional, home and health on the base of criteria and interpretation of each raw data was done. Then means of every adjustment was found out and after that whole mean of class adjustment is was found.

AVERAGE SCORE OF DATA

	HOME	HEALTH	SOCIAL	EMOTIONAL
TOTAL	436	294	587	500
RAW				
SCORE				
MEAN	10	6	13.65	11.62

INTERPRETATION OF SCORES		
*V.H.A:- Very Highly Adjusted	0 – 8:- Very Highly Adjusted	
*G.A.:- Good Adjusted	9 – 16:-Good Adjusted	
*A.A.:- Average Adjusted	17 – 24:-Average Adjusted	
*B.A.:- Below Adjusted	25 – 33:-Below Adjusted	

#### **Data Interpretation**

	V.H.A.	G.A.	A.A.	B.A.
HOME	15	25	2	1
HEALTH	32	8	3	0
SOCIAL	9	24	8	2
EMOTIONAL	15	19	8	1

Home adjustment – the mean of home adjustment of the classroom shows that 15 students are very high adjusted at their home where as 23 students are good adjusted. It means the students are highly supported to by their family, very less controversy. 2 students are average adjusted and only one is below adjustment. Home is the basic which provides healthy satisfactory environment, to be adjusted. Those persons who are not adjusted home, for them there may be problem of other adjustment.

Health adjustment -The mean of health adjustment of the classroom shows that most of the students i.e. 32 are highly well adjusted in the health adjustment. 8 students are come under the category of good adjustment, 3 students are come under average adjustment and no student falls in below adjustment category. It is a good sign of good adjustment in health. Biological adjustment is very high.

Social adjustment - there are 9 very highly adjusted, 24 good adjusted and 8 are average adjusted and 2 are below adjusted students are found in B.Ed. class. Most of the students have problems when they were asked to speak in public without preparation, and having less experience quality of leadership in social adjustment are found socially most of the students are under the category of good adjustment.

In emotional adjustment, very highly adjusted students are 15, good adjusted students are 19, 8 students are average adjusted and 1 student is below adjusted. Ups and down of mood, useless thoughts in mind, sleeplessness, and inferiority are generally found in emotional adjustment. Below adjustment and average adjustment are found less then home and health adjustment. Most of them are less adjust emotionally.

## REMEDIAL MEASURES FOR ADJUSTMENT OF THE STUDENTS

Educational institute and teacher shoulder has the responsibility to develop the personality of the students ensuring that to provide healthy environment to be well adjusted. If for some reasons a few students seem to be maladjusted then steps or measures should be taken in the direction which can help them solve their problems.

Therefore, following points can be taken into consideration by institution/ teacher for helping the adjustment process of every student:

- 1. Provide an environment that permits young people to feel free to express themselves and put forth their best efforts as individual and as a group.
- 2. Develops self- respect and self esteem of each individual student by acknowledging efforts made by them.
- 3. They should be aware of the behaviour which deviates from acceptable behaviour and should be able to find the causes for the same, whether it is because of institute, home or community.

- 4. They should be able to understand that a student who does not cause any trouble or is non-participative most of the times in any activity of the class may be having a serious emotional conflict.
- 5. They should be able to identify chronic behaviour cases and refer them to specialists for treatment.
- 6. Atmosphere that allows good mental health programmes for students to practice must be provided by the institute or teacher.
- 7. Teacher should treat all students equally and no biases should be practiced.
- 8. Team and individual activities should be encouraged
- 9. Co- curricular and extracurricular activities should be so organized that all get a chance to display their talents and get recognized by the others.
- 10.Problems of maladjustment should be identified, analyzed and remedies should be provided accordingly.
- 11.Instruction methods should be made studentcentered, interesting and innovative so that they attend the needs of each individual student.

Thus, these are some ways how the teachers can play a vital role in making the adjustment process in children adolescents and youths a smooth process and help in developing a well adjusted individual.

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## DISCOMFORT IGNITED THINKING

#### Abstract:

All that we are is the result of what we have thought. The mind is everything. What we think we become.

- The Buddha

#### INTRODUCTION

The art of engineering thought for enriching an individual is at the core in theory as well as in practice in present day educational panorama. Hence, "teaching thinking skills" has become a buzzword in pedagogy too. We all strive to raise educational standards at level of education by bringing in internal as well as external changes in the system. We need to understand it clearly that the mastery of the 'basics' are insufficient to meet the demands of an active, fulfilled life (Mortimer, 1982). It is now recognised that a broader range of competencies, redefined as 'higher order' thinking skills, is required because:

- The 'banking theory' of knowledge based upon rote learning has been discredited as it is recognised that individuals cannot 'store' sufficient knowledge in their memories for future use (Arendt, 1971).
- Information is expanding at such a rate that individuals require transferable skills to allow them to address different problems in different contexts at different times throughout their lives.
- The complexity of modern jobs requires staff who demonstrate comprehension and judgement as participants in the generation of new knowledge or processes.
- Modern society assumes active citizenship which requires individuals to assimilate information from multiple sources, determine its veracity and make judgements (Barber, 1997).

Collectively, these present a new challenge to develop educational programmes that assume that all individuals, not just an elite, can become competent thinkers' The cognitive approach suggests that learners must develop an awareness of themselves as thinkers and learners and practice the approaches and strategies for effective thinking. How to achieve this is a major consideration in pedagogy.

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## DISPOSITIONS REQUIRED IN THINKING SKILLS

What characterizes a good thinker? To be sure, a good thinker possesses certain abilities: cognitive capabilities, as well as thinking strategies and skills. Yet what sets good thinkers apart is not simply superior cognitive ability or particular skills; rather, it is their abiding tendencies to explore, to inquiry, to seek clarity, to take intellectual risks, to think critically and imaginatively. These tendencies can be called "thinking dispositions."

Good thinking dispositions — the ones that normally describe productive intellectual behavior - can be characterized as consisting of seven broad but key intellectual tendencies (Perkins, Jay and Tishman, 1992). The following list describes these seven dispositions. Ideally, good thinking includes all of these dispositions exhibited appropriately at different depending on the thinking (Barell, 1991). While other dispositions may contribute to good thinking, these seven are believed to be central; efforts to teach thinking ought to cultivate them.

- 1. The disposition to be broad and adventurous

  The tendency to be open-minded, to explore alternative views; an alertness to narrow thinking; the ability to generate multiple options.
- 2. The disposition toward sustained intellectual curiosity

The tendency to wonder, probe, find problems, a zest for inquiry; an alertness for anomalies; the ability to observe closely and formulate questions.

- 3. The disposition to clarify and seek understanding
  A desire to understand clearly, to seek
  connections and explanations; an alertness to
  unclarity and need for focus; an ability to
  build conceptualizations.
- 4. The disposition to be planful and strategic

  The drive to set goals, to make and execute plans, to envision outcomes; alertness to lack of direction; the ability to formulate goals and plans.
- 5. The disposition to be intellectually careful

- The urge for precision, organization, thoroughness; an alertness to possible error or inaccuracy; the ability to process information precisely.
- 6. The disposition to seek and evaluate reasons

  The tendency to question the given, to
  demand justification; an alertness to the need
  for evidence; the ability to weigh and assess
  reasons.
- 7. The disposition to be metacognitive

  The tendency to be aware of and monitor the flow of one's own thinking; alertness to complex thinking situations; the ability to exercise control of mental processes and to be reflective.

## DISCOMFORT CONTRIBUTING TO THE DEVELOPMENT OF THINKING DISPOSITIONS

Much of conventional instruction reflects a tacit conception of the teaching/learning process that might be termed as the transmission model. The essence of this model is easily stated: the teacher's role is to prepare and transmit information to learners. The learners' role is to receive, store, and act upon this information. Development of thinking dispositions necessitates change in the perception regarding what is teaching. It calls for a paradigm shift from transmission model to Enculturation Model which requires an active participation of the learner in the thought process which is facilitated by the teacher. The thought process where feeling discomfort is a characteristic feature has its pedagogic foundation in dewey's concept of problem solving merged with Vygotsky's Zone Of Proximal Development (ZPD).

Through such merging the distance between the actual development level as determined by independent problem solving and the level of potential development as determined through problem solving under guidance or in collaboration with more capable peers is evaporated (Vygotsky, 1978). Here creating scope for peer interaction is an essential part of the thinking process. In order for children to think, pairing more competent students with less skilled ones is suggested. When a student is in this zone of

proximal development, is provided with the appropriate assistance and tools(scaffolding), they accomplish the new task or skill. Eventually, the scaffolding can be removed and the student will be able to complete the task independently. It is important to realize that the zone of proximal development is a moving target (Perkins, 1987). As a learner gains new skills and abilities, this zone moves progressively forward. Stretching students through creating discomfort necessitates:

- challenging accuracy and completeness of thinking in a way that acts to move people towards their ultimate goal.
- thinking more about what exactly they are asking or thinking about.
- Probing their assumptions makes them think about the presuppositions and unquestioned beliefs on which they are founding their argument. This is shaking the bedrock and should get them really going!
- Making them dig into that reasoning. Making them not think of oftenly used un-thoughtthrough or weakly-understood supports for their arguments.
- attacking the position students take. Showing them that there are other, equally valid, viewpoints.
- Making them forecast logical implications of their argument that they have given.
- Getting them reflexive about the whole thing, turning the question in on itself. Use their attack against themselves. Bounce the ball back into their court.
- Challenging set beliefs which are deeply rooted in the affective self of the individual

For such discomfort generative facilitations, Teacher may ask such questions.

- Why are you saying that? What exactly does this mean?
- How does this relate to what we have been talking about? Can you give me an example?
- Are you saying ... or ... ? Can you rephrase that, please?

- What else could we assume?
- You seem to be assuming ...?
- How did you choose those assumptions?
- Please explain why/how ... ?
- How can you verify or disprove that assumption?
- What would happen if ...?
- Do you agree or disagree with ... ?
- Are these reasons good enough?
- Would it stand up in court?
- How might it be refuted?
- How can I be sure of what you are saying?
- What evidence is there to support what you are saying? On what authority are you basing your argument?
- Another way of looking at this is ..., does this seem reasonable?
- What alternative ways of looking at this are there?
- Why it is ... necessary?
- Who benefits from this?
- What is the difference between... and...?
- Why is it better than ...?
- What are the strengths and weaknesses of...?
- How are ... and ... similar?
- What would ... say about it?
- What if you compared ... and ...?
- How could you look another way at this?
- Then what would happen?
- What are the consequences of that assumption?
- How could ... be used to ...?
- What are the implications of ...?
- How does ... fit with what we learned before?
- Why is ... important?
- What is the best ... ? Why?
- What was the point of asking that question?
- Why do you think I asked this question?
- Am I making sense? Why not?
- What else might I ask?

Such Questions as create discomfort lead to the development of thinking dispositions.

#### **CONCLUSION**

Educational theories have a structure similar to that of an ideology and not to that of a scientific theory. Ideology is constituted of four parts: utopia - an image of the ideal world; diagnosis - a description of the actual world; strategy - the means to turn the actual world into an ideal world; collective - the target population at which ideology is aimed and which is expected to adopt and to realize it. In the ideological structure these four parts do not appear separately but are welded into each other, and this causes their distortion (Swartz, 1987). Lets check out our ground root realities and weld these four components ourselves to achieve our aim of facilitating our students not just to become a good thinker, but an efficient thinker. According to the first, the good thinker conducts cognitive activities efficiently: makes decisions, solves problems, makes generalizations, comparisons, grading, etc. with maximum speed and precision. According to the second dimension, efficient thinking aids the good thinker in reaching his practical goals - the efficient thinker is also the practical thinker.

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# COMPUTER ASSISTED SELF LEARNING: GEARING UP LEARNERS FOR SCIENCE LEARNING

#### Abstract

Education is only tool to enlighten the change and teacher is only a person who bringing out change student according to need of the society. One of the Goals of Education is to develop Critical thinking in Student. Teacher has to adopt some innovative practice to achieve goals of Education. Self-learning Material in form of technology enhanced Package is innovative approach toward Self learning. Computer assisted Self-learning is a process in which individuals take the initiative, with or without the help of others, to diagnose their learning needs, formulate learning goals, identify resources for learning, select and implement learning strategies, and evaluate learning outcomes with the help of ICT. Science is a branch of Education deals with scientific principles and Factual information. Computer assisted Self-learning in Science is helpful to provide open access to Science learning and encourage a broader spectrum of students to pursue studies in the sciences. It help students to develop Self Confident, Self Awareness and also helpful in academic achievement of the students.

#### INTRODUCTION:

The world is rapidly growing in a new technology driven era. This decade in human history has been called the information revolution. It is a time of expanding population and communication. Science teachers continuously try to improve their instructional practices to enhance student learning. According to Baybee et. al. (2006), complementing the aims of science teachers, curriculum developers systematically attempt to identify research findings they can incorporate in materials that will facilitate connections between teachers, curriculum, and students. Recently, the use of coordinated and coherent sequencing of lessons, learning cycles and instructional models has gained popularity in the science education community. People, who take initiative in learning, learn more and learn better than those who don't. They also learn more deeply and permanently (Knowles, 1975). According to Woo (2009), educators have shown that effective instruction requires not only disciplinary content knowledge, for example, expertise in life sciences, but also pedagogical content knowledge, that is, understanding of and ability to apply known educational principles.

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According to Yadav and Govinda (1977), self learning stategy is really worthy of use at the different level and subject. Computer assisted Self-Learning Material is one such innovative practice to help student's learning. It refers to teaching materials that can be used by the learners without the assistance of teacher. These materials keep the learners active and help to improve their cognitive skills. Programmed learning materials and learning modules are such materials that follow self-study approach.

#### COMPUTER ASSISTED SELF LEARNING

Computer assisted self-learning is nothing but a development of Self-learning material in form of computer assistance. It follows all the principles of Self learning Material and develops Computer assisted Instructional Strategy which is helpful to the learner to foster self-learning. Content will be presented in form of question answer. So learner can get feedback immediately after the answer. Computer assisted self-learning Package contains all the information of content in form of text, image, graphics, audio, video. So it will help learners for lifelong learning. Computer assisted self-learning Package helpful to understand concept Wholistically which is lacking in the present education system. Some constraints of the teacher education is minimize with the help of Computer assisted Self learning Package and it facilitate learning by doing. Architect of the Computer assisted self-learning package helps students a lot for anytime anywhere learning and learner can study it on computer, Laptop, Smartphone, etc.

Computer assisted Self learning can be useful to Science students to learn concept easily and Drill and Practice help Science subject more effective and purposeful.

#### **Nature of Science:**

Science is a particular way of understanding the natural world. Science is an objective, logical, and repeatable attempt to understand the principles and forces operating in the natural universe. Science is based on the premise that our senses, and extensions of those senses through the use of instruments, can give us accurate information about the Universe.

Science follows very specific "rules" and its results are always subject to testing and, if necessary, revision.

Science has two main branches: Physical Science and Life Science. Physical Science is an encompassing term for the branches of natural science and science that study non-living systems, As per the nature of Study it is divided into Chemistry and Physics. Chemistry is the science of matter and the changes it undergoes and Physics is a natural science that involves the study of matter and its motion, along with related concepts such as energy and force. Life Science contains study of Living Organisms, again it divides into two sub branches Botany (Study of Plant) and Zoology (Study of Animal). New emerged branches are Microbiology, Biotechnology, Biochemistry, Nanotechnology etc.

## TEACHING OF SCIENCE AT SECONDARY LEVEL

Science subject is taught to the students from primary level as an integrated subject at later stage it is taught as science subject which includes chemistry, physics and biology, and at higher secondary stage it is taught as a separate discipline. One can find an answer to the questions like Why? How? When? with the help of Science. Basically Students at Secondary level learn Science to know fundamentals like Principle, Laws, and facts. Basic Information and knowledge about Science is provided at these stages of Education. At the secondary level Student has to learn all these sub branches in detail. Knowledge about all sub branches helps student to select appropriate subject at higher Secondary level. Thus, it is essential to know and understand basic fundamental principles, law of Science at Secondary level.

According to NCERT (2006), the objectives of Teaching of Science are to enable the learner to

✓ know the facts and principles of science and its applications, consistent with the stage of cognitive development,

- ✓ acquire the skills and understand the methods and processes that lead to generation and validation of scientific knowledge,
- ✓ develop a historical and developmental perspective of science and to enable her to view science as a social enterprise, relate to the environment (natural environment, artifacts and people), local as well as global, and appreciate the issues at the interface of science, technology and society,
- ✓ acquire the requisite theoretical knowledge and practical technological skills to enter the world of work.
- ✓ nurture the natural curiosity, aesthetic sense and creativity in science and technology,
- ✓ imbibe the values of honesty, integrity, cooperation, concern for life and preservation of environment, and
- ✓ cultivate "scientific temper"-objectivity, critical thinking and freedom from fear and prejudice.

Thus, learning science at secondary level develops skills and abilities among students to solve problems of daily life, develop skills of observation, interest and curiosity about the natural phenomenon, develops vocational and productive skills, Scientific skills that link Science learning to Productivity.

#### **Problems of teaching learning of Science:**

Science is a Discipline which requires visualisation of a concept and it is very essential to strengthen their basic fundamental concepts. Thus, it will help students to accommodate easily. Here researcher observed certain problems of Science at early stage of the learning that is listed below:

- Competitive class climate, strict grading, over packed curricula, and the overt "weed-out" attitude of some school are most often criticised and could be the reasons for abandoning a science major.
- Traditional pedagogical settings of teachercentred direct instruction, mostly dominated by lecture-based approaches to teaching.
- Instruction Selection used in Science classrooms have created a situation in which by our very

- choice of pedagogy, we are constructing environments in which only a subset of learners can succeed.
- The general lack of interest on the part of the younger generation in a career in Science is compound by "Brain-drain"
- Many teachers are not capable to draw diagrams, chats to explain certain content which requires proper illustration with the help of diagram.
   Some do not possess a big enough knowledgebase to link scientific content with day to day life example.
- Lack of appropriate Evaluation techniques and sometime teacher do not motivate students.

For the development of Scientific attitude and Skills of Science, teacher can take help of Information and Communication technology to minimize constrains of Science learning like Visualisation of Concept, Practicability, exposure.

#### CONCEPT OF COMPUTER ASSISTED SELF LEARNING MATERIAL

Self-directed learning has been described as "a process in which individuals take the initiative, with or without the help of others," to diagnose their learning needs, formulate learning goals, identify resources for learning, select and implement learning strategies, and evaluate learning outcomes (Knowles, 1975).

Computer assisted Self-learning materials (CASLMs) can be designed for both Teachers and Students to use on their own. CASLMs include all the material prepared to stimulate independent study/learning with the help of Computer application Software. The learners have less contact with either the institution or the tutor, and depend heavily on these specially prepared teaching materials — largely pre-planned, pre-produced and pre-packed. Computer assisted Self-learning Materials (CASLMs) differ from a chapter of a textbook or an article of a journal and Computer assisted Instructions. The chapters of a text book usually present information in a very compact form. They are closer to reference material than learning materials. They are organized in terms of the subject

matter rather than to aid learning. Similarly an article in a journal is a means of communicating with equals in the profession. Computer assisted instruction programme is a set of Programme of instructional materials presented with the help of a computer or computer system. It may or may not be follow principles of Self learning. On the other hand, CASLMs are the instrument for learning which is designed based on principles of Self learning. There are major differences between Textbook and Computer assisted SLM showing in the following Table 1.

Table 1: Difference between Textbook and Computer assisted Self Learning Material

Textbook	Computer assisted SLM		
Assume interest	Arouse interest		
Written mainly for	designed primarily for		
teachers	Learners		
Do not indicate study	Give estimates of study		
time	time		
Designed for a wider	Designed for a particular		
market	learner Group		
Rarely state aims and	Always give aims and		
objectives	objectives		
Structured for teachers	Structured according to		
and specialists	the need of learners		
Little or no self-	Major emphasis on self		
assessment	assessment		

## IMPORTANT OF COMPUTER ASSISTED SELF LEARNING MATERIALS

Self Learning Materials are primarily developed in accordance with the curriculum. Since the material is written in very easy to understand language along with numerous examples after each heading, it becomes easy for the distance learning students to understand and grasp the concepts. In Computer assisted SLMs, the text are interspersed with computer assisted self-checks and exercises. This helps the students to assess their knowledge after going through few topics and check whether they have understood the topics or not.

This mode of education will help Student who can't go to School especially for physically handicapped and slow learners. Besides subject based teaching, much professional and industrial training is now imparted through Computer assisted self-learning packages. Such materials are boon for pre and inservice education, lifelong Education etc.

One of the benefits of Computer assisted self-instruction is the capability of providing learners some control over the instruction. Self-regulation of learning means monitoring and controlling one's own learning. Motivation helps the learner put forth the effort required to monitor and control learning. Drill and Practice with Computer assisted SLM makes learning more comprehensive.

An important goal is to achieve the constant response of the student in order to incite interest and to avoid boredom. Moreover, in this way the student can fix her/his own intensity of learning. The unit should not only offer quality contents but also it should present them in an attractive way so the student takes interest in reading and understand the concept easily.

Skinner characterized Program Instructions as having

- small steps or units of content to be learned,
- active student involvement,
- immediate feedback,
- positive reinforcement,
- self-pacing. (Minmik, 1989).

According to Nirmala (2009), followings are the principles of self-learning materials which are applicable to Computer assisted Self learning Material also.

- **1.** *Ground Work:* Computer assisted Self Learning materials are relevant to the need of the students and level of students.
- **2.** *Range:* The range refers to the breadth and depth of the learning material.
- 3. Structure and Design: Computer assisted Self Learning materials must not only promote effective learning and assessment strategies but also have a clear structure and be sequenced such that the target group can easily explore them.
- **4. Flexible delivery:** Computer assisted Self Learning materials must consider the learners varying needs, preferences and entry levels.

- **5.** *Ingress and Equity:* In order for Computer assisted self learning materials to be inclusive; they must Accommodate cultural diversity
- 6. Content: Content refers to what goes into the Computer assisted self learning material. A wellbalanced content should be there.
- **7. Feedback and Evaluation:** Computer assisted Self learning materials must promote self assessment for the learner and provide feedback to both the learner and the developer.

These principles can be applicable to any subject content and it will help student to gearing up learning as per their convenience and pace. These principles will be more effective if it infuse appropriately with the technology. In this way Computer assisted SLM is very much helpful to increase interest of the learner.

#### **Features of Computer assisted SLM:**

After Reviewing Characteristics given by Maharaj and Jain (2011), Nirmala, J. R. (2009), and Woo (2009) on Self learning material, researcher derived effective Computer assisted self-learning package have following characteristics which inspiring learners.

- **1.** Learning activeness: The Computer assisted SLM is developed in such a way that the learners can interact with it more and learn better.
- 2. Learner Activeness: A unit is said to be learner active if it has the potential to motivate the learners to sit up and be engaged in various types of academic activities.
- **3.** *Self Awareness:* Effective learning develops awareness and questioning of one's own learning process.
- 4. Motivate learners: learners can be compared with an effective teacher in the classroom situation who motivates them, explains concepts and provides all the possible guidance and direction in their studies.
- **5.** *Self-contained:* Self sufficient for learner so that he does not look for additional sources, No need for a Tutor.
- **6. Self- Pace:** Learner study Material as per their need and pace.

- **7.** *Self-Evaluation:* Learners can evaluate themselves.
- **8. Long-term memory:** Learning involves the elaboration of knowledge structures in long-term memory.

Such Features of the Computer assisted Self learning material helps students of Science to foster learning. Scientific content representation in form of Self learning Material helps student to study concept and simultaneously get feedback that facilitate lifelong learning.

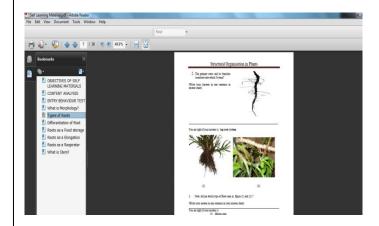
#### EXAMPLE OF COMPUTER ASSISTED SELF LEARNING FOR STUDENTS ON STUCTURAL ORGANISATION OF PLANTS:

As a researchers, it is our duty to envision a better future for our people and provide educational resources from limited resources, and to break away from ineffective instructional methods and embrace new methods and technology that can address the real needs and aspirations of the students.

Computer assisted Self learning Material can be create in with the help of different Software like Macromedia Flash MX. Corel Draw. Adobe Acrobat Reader, Page Maker, powerpoint and many other graphical software. Most commonly used software is PowerPoint. Following Figure showing Computer assisted SLM developed with the help of Acrobat Reader 9.0. Student can learn concept from Computer assisted SLM created on Acrobat Reader 9.0 because we can easily create Bookmark through which Learner can easily go to bookmark by Clicking on it. Likewise we can create Hyperlink also. As per the requirement student can jump down to specific point/topic and Drill and Practice through CASLM makes student learning more comprehensive and specific.

Instructions should be designed based on Principles of Self learning Instruction. Content delivery as interactive way in form of question and answer, activities are the main characteristics of CASLM. It will be more clear with the help of following example of illustration of content in form of question-answer. E.g. one of major functions of root is to Storage of

Food. Student learns this concept from Computer assisted SLM by following step:



**Instruction:** The stem is the ascending part of the axis bearing branches, leaves, flowers and fruits. It develops from the plumule of the embryo of a germinating seed. The stem bears **nodes** and **internodes**. The stem bears buds, which may be terminal or axillary. Stem is generally green when young and later often become woody and dark brown.

**Que:** The region of the stem where leaves are born are called \_\_\_\_\_ while \_\_\_\_ are the portions between two nodes.

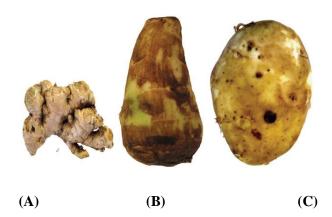
(Write missing word in the above sentence in your answer sheet)



The Correct answer is: Node; Internodes. **Que.:** What are the functions of Stem? (Write your answer in your answer sheet)

You are right if your answer is similar in meaning to the following.

The main function of the stem is spreading out branches bearing leaves, flowers and fruits. It conducts water, minerals and photosynthates. Some stems perform the function of storage of food, support, protection and of vegetative propagation.



Did you ever seen above figures in Home, If Yes then **Que:** What is this and what is the name of this all? (Write your answer in your answer sheet)

\_\_\_\_

You are right if your answer is similar in meaning to the following:

It's an Underground stems and we use it as food.

- (a) Ginger
- (b) zaminkand (Sweet Potato)
- (c) Potato.

#### CONCLUSION

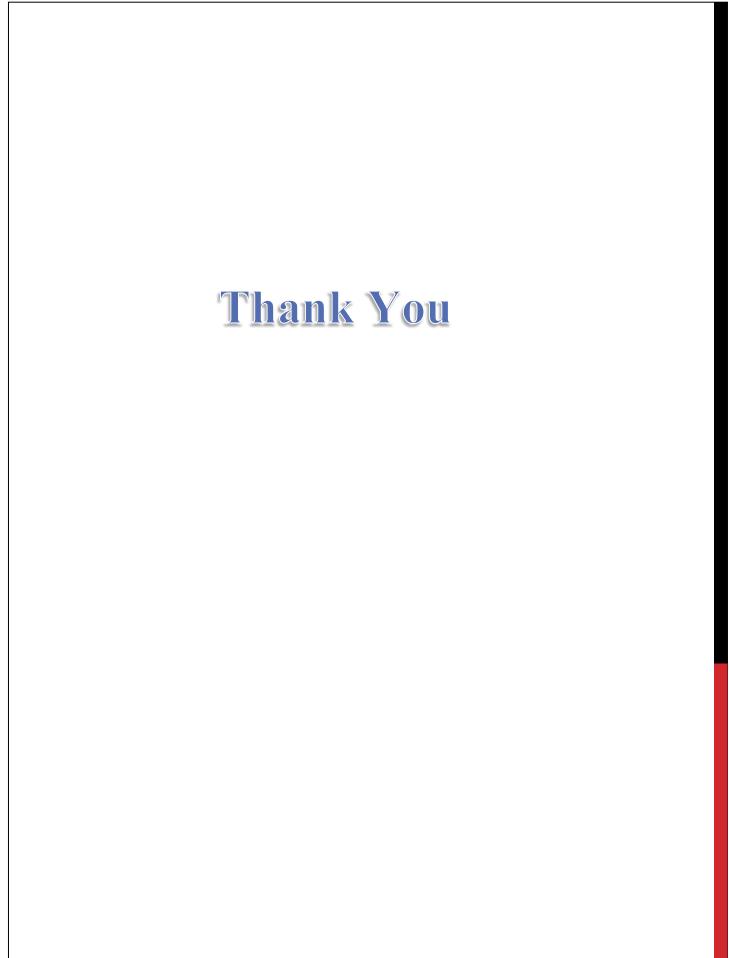
Computer assisted Self Learning Material is very suitable with sentence written by PLATO "Do not train youths to learning by force and harshness, but direct them to it by what amuses their minds so that you may be better able to discover with accuracy the peculiar bent of the genius of each. To provide open access to Science learning and encourage a broader spectrum of students to pursue studies in the sciences, Computer assisted SLM is innovative approach toward it. The self study approach to learning changes the role of the teacher/students, by placing greater responsibility for the learning process on the learner. Self learning Material is useful in terms of achievement of the students. It will help students to

develop Self Confident, Self Awareness and also helpful in academic achievement of the students.

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