APPLICATION OF SOCIAL NETWORKING SITES IN TECHNOLOGY DRIVEN EDUCATION

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ABSTRACT

In the digital world, opportunities for education are available like never before. Students are no more interested in listening to lectures, they demand involvement in the learning process. At adolescence stage students' expectations are influenced by network television, computer games, and Internet. So it is very essential to guide them in proper direction. ICT has potential to involve students actively in the learning process in synchronous or asynchronous mode. This can further be used as a tool by teachers for their professional development. Teachers can use Web 2.0 and online tools to empower students in their education. Teacher should use Social networking sites as Supplementary to face the class.

KEYWORDS: Social Networking Sites, ICT, Teachers, Web 2.0

INTRODUCTION

E-learning is the future of education, now entire Master Degrees can be earned in educational technology and on-line education. Those trapped in the world of the chalkboard and textbooks may be left behind as education advances into the 21st century. E-education has appealed to the mass public because it offers ease to learn and at times convenient to the learner. The possibility to bring education to the masses has expanded, as the population's need for education has grown larger. In the past two decades, computers and their software have modernized education with on-line classes; real-time cameras; video conferencing; chat rooms; bulletin boards; smart board technologies; CD Rom software; Internet software; and interactive tools; bring the learner and the learning process to an even greater understanding and advantage than ever before in the history of education. In this line, Social networking sites are web-based services that allow individuals to share information and communicate within a bounded system, eloquent a list of other users to share information, and view and exchange their list of connections. Social network sites (SNSs) such as Facebook, Orkut, LinkedIn, Twitter, Blogs and Google+ have attracted millions of users all around the world. Today's learners are techno savvy and they are more convenient to learn with the help of Web 2.0 Tools. Thus as an Educationist, it is our duty to utilize such media and Web 2.0 tools for the purpose of education. Authors of this paper have tried to explore utilisation of Social networking sites for Education.

TECHNOLOGY AND EDUCATION

The initial stages of the World Wide Web (WWW) from 1990 to 2001 provided the capacity for information services. Schools, training colleges and universities developed websites as part of the proliferation of information accessible globally. Then beginning in 2001, other types of services began to appear on the WWW. These included Google, Wikipedia, MySpace, Facebook, Twitter, LinkedIn and many more which provided their services remotely and

freely but still these all tools were not dominated in the Indian context. The WWW further moved towards becoming a read/write platform where users could engage with others, contribute and publish information in several formats including text, graphics, animation, audio and video.

This use of WWW as Web 2.0, finally matured as a communication, productivity and social networking platform in its own right with no precedent in history (White, 2008). The technology had very severed influence on people. The develop countries have already started using it in their classroom but in developing countries like India utilisation of Web 2.0 Tools and Social networking is less but now with increased demands and decreasing prizes of electronic gazettes they have started using e-learning/online learning. Now students conveniently using Social media/Web 2.0 in education, research and business with the impact of personalization and the 'pull' versus 'push' expectations of experienced and connected online users.

Technology can be used for the classroom instructions for effectively learning. With the spread of ICT, there is a growing demand for it in education. The National Policy on Education 1986, as modified in 1992, stressed upon employing educational technology to improve the quality of education. Government has taken few steps on the way to increase usability of Multimedia and Computers in School education by introducing schemes like Educational Technology (ET), Computer Literacy and Studies in Schools (CLASS) and Information and Communication Technology @ Schools in 2004 (MHRD, 2011). It was also highlighted in Sarva Shiksha Abhiyan Programme. Again, it figured comprehensively in the norm of schooling recommended by Central Advisory Board of Education (CABE), in its report on Universalization of Secondary Education in 2005. With the realization of the deficiency of ICT integration infrastructure, Government has introduce the Scheme of Information and Communication Technology in Schools (ICT in Schools) during the XI Five year Plan between 2007-2012 to promote ICT based learning (MHRD, 2010).

Sensing the deficiency of the lack of ICT educated human resources, National Council for Educational Research and Training (NCERT), the Indian Society for Technical Education (ISTE) and UGC are conducting and organizing different computer literacy programmes for teachers etc. (Kanshal, 2012). Few more initiations of Azim Premji Foundation, MoU between Intel Technology India Pvt. Ltd. and NCTE, Wipro, UGC-Infonet (a joint programs of UGC, NFLIBNET and ERNET) have significant footmark in the area of integrating ICT in Teacher Education.

Technology is used in many ways in the Classroom. Computer assisted instruction and Technology enhanced learning are widely used approaches today. Such approaches can be used to solve problems like consistent means of collaboration between teachers and students by presented material for reviewing, commenting and solutions of the problems. Organizations can develop working space for the interaction with the students and teachers. Through the Personal Website or Institutional website online learning, virtual teaching and interaction outside classroom are made possible. Blended learning which is mixing of face to face Interaction and interaction outside classroom may help teachers to minimize and overcome educational constraints.
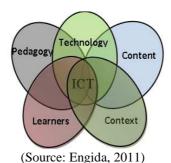

(Source: Engida, 2011)
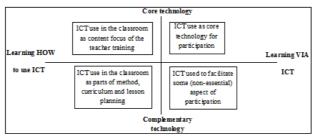**Figure 1: The ICT Enhanced Teacher Development Model**

Engida (2011) identified five areas of knowledge in Integration of ICT in teaching learning namely: content, pedagogy, Context, Learner and technology. Good teaching is not simply adding technology to the existing teaching and content domain. Rather, the introduction of technology causes the representation of new concepts and requires developing sensitivity to the dynamic, transactional relationship between all five components, which is diagrammatically presented in figure 1. It is also assumed that educational terminology will change with the rapid growth of Technology. For example, it is expected that the classroom practitioner will be known as e-teacher, the traditional classroom will be referred to as the virtual classroom, traditional learning will be recognized as cyber-learning or e-learning and electronic testing or e-assessment will replace traditional paper and pencil tests.

CHANGING ROLE OF TEACHER IN TECHNOLOGY DRIVEN EDUCATION

This is the era of technology and the decade of Innovation. Lots of Practices are already implemented in the form of Innovation by schools and different educational Organizations. Information and Communication has opened a new door to stay connected outside Classroom. With the help of ICT, virtual classroom, Video Conference, E-learning, Internet collaboration is possible. This has extended learning beyond imagination. Teachers can use ICT to deliver his/her Lesson more effectively by using different medias like Audio, Video, Animation, Picture etc.

It is highly essential that today's teachers are techno-smart to deal with the learners' expectation. It is essential that teachers are well trained to use ICT maximally for Teaching Learning. Government has initiated to develop Smart classroom by providing Software, Hardware and required Infrastructural Facilities under different schemes. Pre-service and In-service teachers are expected to contribute to class teaching through a variety of asynchronous learning tools outside the classroom. Hence there is an urgent need for proper training in implementation of ICT and ICT related tools in the classroom. Teachers at this stage of training be initiated in the use of ICT for teaching learning and develop lessons/learning experience based on integration of Technology in Teaching.

Teachers should know how to use Web 2.0 Tools for educational purpose, for sharing Information, Online Collaboration, accessing and assessing Information to guide students in proper direction. According to Hooker (2009), teacher Professional Development in ICT which 'should equip teachers not just with basic ICT skills, but should encourage the evolution towards *integrating* technologies into teaching subjects and practices' The goals of Web driven Education should centered on learning how to use ICT and learning with ICT. As per Collin and Mooner (2001), dimensions in which teachers be formularized represented in diagram 1.When learning how to use ICT the instructional focus is on the use of products in or outside the classroom. In learning with ICT, instruction is presented and distributed primarily through 'web environments or systems offering an integrated range of tools to support learning and communication'. A core technology role refers to 'the principle way of organizing the learning experience'. In contrast a complementary technology role is 'optional serving a valuable function but able to be compensated for via the core technology if so needed, or dropped altogether if not functioning or feasible'

Source: Collin and Mooner (2001)

Figure 2: Two Dimensions of *ICT Integration* in Teacher Professional Development

Following set of techno Pedagogical Skills, Teachers should acquire for making learning process effective in the classroom.

- Teachers should have the skill to communicate, collaborate, search and explore with the help of ICT.

- Teachers should have the skill to identify different tools and their potential to integrate them in the curriculum transaction.

- To acquire computer skills such as :Tools to collaborate: exchange files, chat, news groups, white board technology

- Tools to search: teachers should be able to use a search engine, logical operators in a process of identifying information

- Tools to explore: teachers should be able to use exploratory educational software or to use tools as a spreadsheet in an exploratory way.

- Tools to collect process and store data.

- Teachers should be aware of technological innovation and its consequences in Education.

- The teacher has the skill of assigning team work, project work, independent learning and to provide resources and access to the students.

Teacher's beliefs of teaching (pedagogy) and student learning (epistemology) affect teacher technology adoption

- Teachers who engage in more teacher-led pedagogy stay adopt less technology.

- Teachers who leverage constructivist-centric pedagogy have a tendency to use more technology.

- Teacher's beliefs and values are not hardened systems; however, they are complex and prone to revision.

- The richness of an environment (technology, support, quality, quantity) can change teacher's beliefs and values in learners and pedagogy.

- The manner in which technology is presented-teacher-centered or student-centered impacts those teachers holding differing views.

- Web 2.0 and 21st century skills are collaborative in nature; thus they are constructivist.

- This collaborative and constructivist nature of the technologies require teachers to adopt their beliefs which brings us back to teacher technology adoption.

As technology has created change in all aspects of society, it is also changing expectations of teacher education in terms of what student must learn in order to function in the 21st century.

Teachers Commitment to Techno-Pedagogic Skills

- They must have a pro-active attitude towards technological innovation, be committed to use ICT and be able to integrate it in the learning process.
- The teachers should learn about the potential role change towards advanced students and how to cope with a situation where the teacher is not the most advanced person in the class anymore.

- They must have a critical view of the use of technology in Education instead of a remaining a mere passive consumer of technology and must promote this critical view in their teaching.
- Teachers should be able to consider the learner/pupil as the centre of the learning process. He/she must be able to change from a teaching to a learning perspective. He/she must be a model/a guide to the pupils, an agent of the change and not the unique source of knowledge. He/she must be able to have multiple approaches to a question (the perspective of a second observer) showing flexibility in the modelling of knowledge.
- Teachers should keep in mind their role as mediators of the learning process.

In the context of ICT usage in schools, teachers become often moderator for student activities promoting team work, promoting project work and independent learning and acting as a resource facilitator mediating collaborative learning. The choice for a particular methodology should be based on co-participation of students. This includes the participation of students in producing a specific methodology promoting a conversational approach.

The challenges before teachers are to understand and use the potential of relevant technology to improve the development of higher order thinking skills and knowledge creation. ICT cannot simply be downloaded onto existing organization. When this approach is taken, it is almost inevitable that computers will remain in classrooms unused, misused or under-utilized. The development of technical skills alone would be a potential benefits to quality learning that the technology promises. In a cyber age, both teachers and students will need not only to know where to locate information appropriately and efficiently but also to be able to make critical judgments about its validity and reliability. The different modes of integrating ICT in pedagogy are discussed below.

SOCIAL MEDIA AND SOCIAL NETWORKING SITES

Social media is web or mobile based platform that enables an individual to communicate interactively and enables conversation of user generated content. Social Media in recent times have become synonymous with Social Networking sites such as Facebook or Micro Blogging sites such as Twitter. Kaplan and Haenlein (2010) classified social media into six different types: collaborative projects, blogs and micro blogs, content communities, social networking sites, virtual game, and virtual social worlds. Social network sites are the web-based services that allow individuals to construct a public or semi-public profile within a bounded system, articulate a list of other users with whom they share a connection, and view and negotiate their list of connections. Social network sites (SNSs) such as Facebook, Orkut, LinkedIn, Twitter and Blogs have attracted millions of users all around the world and it attracts users of India also

Social networks allow teachers to follow and potentially participate along with students. Richardson (2005) describes a scenario of a teacher's possible use of weblogs and RSS. Such networks are supported by connections between students' and teachers' weblogs through RSS feeds combined with social bookmarking. These tools help in establishing network among students mutually as result of their interest and situation. By having an access to each other work, it provides a scope for discussions between students and teachers. Such discussions are different from the discussions in a discussion forum. The discussions based on weblogs arise from the individual entries of students whereas a discussion forum is shared. Students can subscribe to different weblogs, they can create their individual network, using social software tools such as wikis, weblogs combined with RSS feeds and social bookmarking following.

In addition to what has been discussed under synchronous and asynchronous modes of learning there is increasing use of web 2.0 tools for learning as they provide high level of interactivity among learning community. The online tools like blogs and wikis for sharing viewpoints and ideas are used extensively. The widespread use of these tools is bringing about changes in the way we communicate and exchange information. More and more teachers are discovering that they

can be valuable tools for enhancing learning particularly to develop the research and communication skills, developing creativity among students. There is growing concept of web based communities and services like social networking sites, video sharing sites, wikis, blogs and folksonomies, RSS feeds, social software and web application programming interface provide enhancement over read only web sites.

Facebook

The most popular social networking site in India is Facebook and the master brain behind this was Mark Zuckerberg. It was initially started as college networking site. Attractive Features of the Facebook are "Homepage", "Applications", "Photos and Video Sharing", "Update Ideas", "Creation of Group", "Page", etc. This is one of the tool to communicate from the school or Institute to parents/Students. According to Kayri and Cakır (2010), facebook can be used for educational purpose. Facebook media not only makes lesson enjoyable but also provides lots of electronic material. Building social network with Facebook provides collaboration in group. Teachers can use it for education purpose in the following ways:

Events

Teacher can use event feature for educatioanl purpose. Teachers/ Organisation members can announce important events like Programme, Seminars, Teachers Meeting etc. Students can also used it for the online discussion of certain topics. By the announcement on event, one can post topic, time and time duration so all interested students get together at same time and online discuss can be organised.

Post Update Status and Photo/Video

Status and Photo/video Update is most common and widely used features of Facebook. Teacher and Students can used it for multi purpose. Teachers can used it for updating classroom information, small notes for students, some time they can use it for uploading online experiments/ Videos of Classroom activities/ Programme and stay connected even after school hours. Students can also use it just like teachers, they can connect themselves with other classroom or schools. Here students and students from different Schools may connect and share ideas and experience of teaching learning of different learning environments.

Page

Teacher can create Page of their School Community in their name and invite students and other members of the schools/ Organisations for collaboration. It is just like a website of Classroom or Organisation. Educational institutions are using Facebook pages for promotional reasons also. This is another way for schools and universities to market themselves.

As lesson materials are saved on Facebook, students can access information and give their reflection, idea, question and is answered or reacted by other users, mentors.

Create Group

Schools can use Facebook groups to communicate with students. This is a very powerful tool for sharing information and collaborating with students. Facebook groups do not require members to be friends with each other. Members of the groups can exchange files, links, information, polls and videos very quickly. Anytime someone contributes the members will receive a notification.

One can create groups of similar interest/ hobby. Option of Open group selection allows users to join group and selection of close group option allows users to authorized person or members of the groups. Teachers or students can create their group of similar interested/Organisation/community and share their ideas, ask questions, organize discussion, and important announcements.

Students constantly use Facebook because of its user friendly features. It enable students to interact outside classroom. Thus, Facebook could be used as a supplemental tool in education. Facebook media not only makes lesson enjoyable but also provides lots of electronic material. Building social network with Facebook provides a way of collaboration among groups.

Blogs

Blogs are descriptive content created and maintained by individual users and may contain text, photos and links to other web sites. The main interactive feature of Blogs is the ability of readers to leave comments and the comment trail can be followed. A community of Blogs is referred to as Blogosphere and can be used very effectively to measure public opinion.

A blog is a type of website or part of a website. Blogs are usually maintained by an individual with regular entries of commentary, descriptions of events, or other material such as graphics or video. A blog is similar to an empty book. This book can be in the form of a sketchbook, a diary, a dictionary or writing portfolio it depends on the content that we put into this book. "Tech savvy administrators are using blogs as a tool to keep parents, teachers, and students informed of the things going on in their schools." The commenting feature of blogs allow for immediate feedback on a posting and active participation. The content that can be posted to a blog can be text, images, files, hyperlinks, audio and video. Altun (2005) classifies blogs with regard to their purpose like Personal Blogs, Group Blogs, Press Blogs, Project Management Blogs, Library Blogs, Educational Blogs, and Institutional Blogs etc. Edublogs can be written by teachers for the improving classroom instruction, by students to post their assessment tasks and by policy makers who need comment on education. Edublogs allow all students to participate in discussion on any topic. Mainly used as an additional communication channel to share information with students. Teacher acts as a facilitator in blog-based teaching learning, and moderates the discussion process to keep it on the right track, provide necessary instructional materials and Communicate with parents. Write comments, opinions, or questions on daily news items or issues of interests, showcase their best writing pieces, post instructional notes for students, resources, and important links.

Microblogging

Micro Blogs are similar to Blogs with a typical restriction of 140 characters or less, It allows users to write and share content. It can be done in the form of text message, instant message or even email. Twitter is a micro blogging site that enables its users to send and read text based messages or "tweets" of upto 140 character length. These Tweets are posted on the user's account and the site allows others to "Follow" the user. While Tweets are public by default, they can also be restricted to just the followers. Tweets can be generated via web, smartphone or even through SMS on some mobile phones.

There is a value in networking and real-time interaction that we can get using Twitter. Many educators and academicians find this to be an effective strategy for dealing with the isolation that can come from working in the classroom or office. Imagine encountering technical difficulties during our lesson and having a means of receiving assistance within minutes. Twitter is an effective communication tool for concise messages and news items, or links to longer messages and news items. Twitter is fun to use and may, therefore, be effective in engaging students in discussions who do not need to write longer essays. Consider the ability to receive assistance from others during a teaching where we don't know the answer to a student's query. We can share events at work and this helps us know our friends a bit more and adds an additional layer of community within our online network. One can customize and use it to meet ones specific needs and interests.

Twitter often links to an RSS feed from the website that automatically tweets a news article when it is published on the website. Teachers have been setting up subject or class Twitter accounts that students can follow. The teacher then tweets information related to their class.

Vlogs and Video Sharing Sites

VideoBlogs or Vlogs are blogging sites that mainly use video as the main form of content supported by text. Such sites especially enable those who may have limited knowledge of English and share their experiences over internet. Vlogs are an important category of content over YouTube – the largest video sharing site. YouTube is a video Live Casting and video sharing site where users can view, upload and share videos and even leave comments about videos. However, for upload and sharing registration is required.

Wikis

A Wiki is a collaborative website that allows multiple users to create and update pages on particular or interlinked subjects. While single page is referred to as "wiki page" the entire related content on that topic is called a "Wiki" These multiple pages are linked through hyperlinks and allow users to interact in a complex and non-linear manner. Many wiki communities are "private" and are used for deliberating upon internal policies and for knowledge sharing. Currently, based on the information available, no official wiki on any Indian government policy exists. Wikis are a good option for undertaking "close" web based interactions. Normally the content on wikis are created as part of "Creative Commons".

Bookmarking Tools

The principle behind social book marking is to bookmark your web pages on the web. Del.icio.us (http://del.icio.us) and Furl (http://www.furl.net) are some examples of different kinds of social bookmarking tools. When one bookmark a web page, he/she tags the page with different keywords of one's own choice.

RSS:

RSS stands for "Really Simple Syndication", it is used for easy distribution of list of headlines, update notices, and sometimes content to a large number of people. It is used by computer programs that organize those headlines and notices for easy reading. It is made up of a list of items presented in order from newest to oldest. RSS can be used for many other purposes like for notification of the arrival of new products in a store, Listing and notifying you of newsletter issues, including email newsletters, weather and other alerts of changing conditions, notification of additions of new items to a database, or new members to a group.

These tools are not developed for educational purposes, which mean that a directed effort is necessary to develop educational social software tools to support education activities.

CONCLUSIONS

Students are prominently influenced by the Social media especially Social networking Sites. Hence, it is imperative that students become directors of their own learning with regard to using information technologies in the classroom as well as interact outside classroom. Therefore it is crucial that teacher should be equipped with certain Techno pedagogical skills that will help students feel efficacious and in control of learning to teach with technology.

Teacher should utilize Social networking sites media to integrate with teaching learning process. They serve as supplementary tools to enhance contemporary students' learning across distance and social boundary.

REFERENCES

1. Altun, A. (2005). *Internet applications in Education*. Ankara: ANI Publishing.

2. Central Advisory Board of Education. (2005). *Universalisation of Secondary Education.* Delhi: MHRD.

3. Collis, B., &Moonen, J. (2001).*Flexible learning in a digital world: Experiences and expectations.* London: Kogan Page.

4. Engida, T. (2011).*ICT-enhanced Teacher Development Model.* UNESCO-IICBA.

5. Hooker, M. (2008).*Concept Note: The Use of ICT in Teacher Professional Development.* Retrieved fromwww.gesci.org/old/files/docman/TPD_Workshop-**Concept_Note**.doc

6. Kanshal, H. (2012). Increasing access to Higher education for National Development.*Golden Research Thoughts*, 2(1).

7. Kaplan, A., and Haenlein, M. (2010). User of the world, Unite! The Challenges and Opportunities of Social Media. *Business Horizons*, 53(1).

8. Kayri, M., and Çakır, O. (2010). An applied study on educational use of Facebook as a web 2.0 tool: The sample lesson of computer Networks and communication. *International journal of computer science & information Technology.*2(4).DOI : 10.5121/ijcsit.2010.2405 48

9. Ministry of Human Resource Development.(2010). *Annual Report 2009-10.* Department of School Education & Literacy, New Delhi: Govt. of India.

10. Ministry of Human Resource Development.(2011). *National Policy on Information and Communication Technology (ICT) In School Education.* New Delhi: Govt. of India.

11. Richardson, W. (2005).*Morning at RSS-Blog-FurlHigh school redux.* Retrieved August 25, 2008, from http://www.weblogg-ed.com/2005/08/21#a3906

12. White, G. (2008). ICT Trends in Education.Australian Council for Educational Research. Retrieved from http://research.acer.edu.au/digital_learning/2