Monks to MOOCs: The Transformation of Educational Communication in India

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**Abstract**

This paper presents how educational communication transformed from ancient time to modern days in India. In ancient days education communication was one to one between the monks and the disciples mostly oral later transformed into written as well. The communication was related to mostly religious and moral. In medieval period the education communication was both oral and written and mostly religious. In colonial period the colonial rulers neglected the local languages and promoted English for creating persons into the defence and administrative services. Post independence India has evolved a well structured educational system balancing between regional languages and English. Today it is at the threshold of digital communication forging ahead by producing best human resources for the world. MOOCs (Massive Open Online Courses) is catching up in India too.

Key words: Monastery, Monk, MOOCs, *Gurukul*, *Madarasa*, e-Learning, ETV

**Introduction**

India, a subcontinent in South Asia is an abode for rich cultural, knowledge and education since ancient times. India speaks and writes many languages, but communication never broken down. It is home for 1652 languages/dialects; of which 150 languages have a sizable speaking population and 22 are official languages. Oral and written communication started in India much earlier than other civilizations in the world. The educational communication in India dates back to ancient times. Starting with monastic teachings where there used to be one to one communication between the monks and the disciples in Sanskrit. There even came up world famous universities like Taxila, Nalanda in c1000 BCE and Vikramasila, Vallabhi and the Kanchi during the period of 5th Century AD and 8th Century AD where the communication was in Sanskrit. The Indian education system was systematically destroyed during the rule by Muslim invaders and followed by the British. After independence in 1947 India focused on evolving an effective system for education on the recommendations of various commissions. Now there is well laid structure in place from pre-primary schooling to post doctoral research. The educational communication takes place in regional language and also in English. Today, there exists every faculty, whether it is arts, humanities, social sciences, pure science, engineering, technology, etc., which are flourishing. Apart from formal education there up open learning, distance education and e-learning. To support formal and informal education India has been using television and information communication technologies fully both in regional languages and also in English. At present India is marching towards Massive Open Online Courses (MOOCs). Thus there is a complete transmission in education communication in India from monastic education communication to MOOCs.

**Indian Education in Ancient Period**

In ancient India the education system was mainly *gurukul* (residential) system of Hinduism, the oldest religion of the world, wherein the *guru* (teacher) and the students stay in the same habitat. The *gurukuls* were mainly located in forests away from the society. Vedas and Upanishads were taught in Vedik Sanskrit. In later part of the era subjects such as astronomy, medicine, mathematics, languages, grammar, music, fine arts, architecture, etc. were pursued. During the period two more religions, Buddhism and Jainism, came into being. Apart from *Dhammapada* for children Buddhists established residential universities namely *Nalanda* and *Vikramsila*, *Taxila*, *Odantapuri* and *Jagaddala* that were of international reputation. Subjects such as astronomy, medicine, mathematics, languages, grammar, music, fine arts, architecture, etc. were pursued. Great books such as The *Indika* of Megasthenes and *Arthasastra* of Kautilya were contributed in ancient India.

**Indian Education in Medieval Period**

The medieval period refers to the period from about 10th century A.D. to about middle of the 18th century, i.e. before the British rule. After the death of the Prophet Muhammad in 632 C.E., the Arab mariners started trade with India. Around 1000 C.E. the Turkic and other Central Asian invaders raided Northern India and established their empires.

The Muslim rulers established *maktabs* (primary schools) where students learnt reading, writing and fundamental Islamic prayers from Koran. There were also *madarasas* (secondary schools) where advanced language skills were taught. The medium of communication during the period was Arabic, Persian and Urdu. This Muslim rule destroyed the Hindu and Buddhist educational system and systematically replaced Islamic education with Persian, Arabic and Urdu. Urdu became predominant medium of education and communication. The education system during Muslim rule was much inferior to the Hindu education system of ancient period.

**Indian Education during Colonia Rule**

Colonial period in this context refers to 1757 to 1947 AD. But by 16th Century itself the Western Roman Catholic missionaries, descended on Portuguese occupied places, started conversions to Christianity and also started establishing schools attached to the missionaries. Later business men from various countries such as the Portuguese, the Dutch, the French and the British ventured on Indian soil. During colonial period there existed thousands of Hindu and Muslim schools, mostly religious. The colonial business houses/rulers neither disturbed the schools nor tried to reform them, they just concentrated on exploiting the rich resources of India.

The Charter Act 1813 of British compelled the East India Company to accept the responsibility of education in India. This Act authorized the Board of Control to grant licenses to missionaries to open schools.

Until 1835 the medium of communication was Sanskrit, Persian and English in Hindu, Muslim and missionary institutions respectively in India apart from other oriental languages at other places. The focus of shifted from oriental languages to English, as medium of instruction, with the implementation of the Macaulay minute on 7th March 1835 by the then Governor General of India, Lord William Bentinck. Thus Thomas Babington Macaulay is considered instrumental in introducing English as the medium of instruction in education in India. This resulted in marginalization of oriental languages and promotion of English education in India. However during the colonial rule the British tried to develop an education system for India based on the recommendations of various committees/commissions from time to time. Accordingly, they have established primary schools, secondary schools, high schools, technical institutions, professional institutions and universities. Although these institutions are limited in number they laid the foundation for the present education system in India.

**Indian Education in Post-Independence Period**

After independence Indian concentrated on strengthening the education system with the help of commissions and policies. Prominent among them are the University Education Commission 1948, the Secondary Education Commission 1952-53, the Education Commission 1964-66, National Educational Policy 1968, National Educational Policy 1986, etc.

Relevant provisions also have been made Indian constitution for education. Among others, the Indian constitution guaranties:

* free compulsory school education;
* religious education;
* equal opportunities in educational institutions;
* language and educational safe guard;

The independent India adopted federal form of governance that facilitates sharing of responsibilities of social development. The Indian constitution provides three lists like the Union List, the State List and the Concurrent List; and education is under concurrent list. The present structure of education system is mainly of two types, ie., school education and higher education.

India provided the required legislations for private participation in education. Thus there is private participation from school level to university level. In majority of the State schools the medium of communication is the regional language of the respective state. In private schools it is mostly English medium.

Since independence there is a considerable increase in the number of. The following table depicts the steady growth.

Figure 1: Growth in Number of Schools



Source: Ministry of Human Resources Development (http://mhrd.gov.in/sites/upload\_files/mhrd/files/statistics/SSE1112.pdf)

Starting with 27 universities in 1950-51 they have gone up to 760 by 2014-15. Likewise the number of colleges also enormously increased from 578 to 38498 by 2014-15. Apart from universities and colleges there came up 12278 stand alone institutions by 2014-15. Although English is the medium of communication in a majority of universities there are many universities dedicated to regional languages and also Urdu. In a majority of colleges the under graduation courses are offered in regional language of the respective state. The following table shows number of universities and colleges as on 2014-15.

**Table 1: Category-wise Number of Educational Institutions in India**

**(2014-15)**

|  |  |  |  |
| --- | --- | --- | --- |
|  |  | **Type** | **Number** |
|  | Primary |  | 847118 |
| **School** | Upper Primary |  | 425094 |
| **Education\*** | Secondary |  | 135335 |
|  | Senior Secondary | 109318 |
|  | **Total** |  | **1516865** |
|  |  | Central University | 43 |
|  |  | State Public University | 316 |
|  |  | Deemed University | 122 |
|  |  | State Private University | 181 |
|  |  | Central Open University | 1 |
|  |  | State Open University | 13 |
|  | **University** | Institution of National Importance | 75 |
|  |  |
|  |  |  |  |
|  |  | State Private Open University | 1 |
| **Higher** |  | Institutions under State | 5 |
| **Education** |  | Legislature Act |
|  |  |
|  |  | Others | 3 |
|  |  | **Total** | **760** |
|  | **Colleges** |  | **38498** |
|  |  | Diploma Level Technical | 3845 |
|  |  | PGDM | 431 |
|  | **Stand Alone** | Diploma Level Nursing | 3114 |
|  | **Institution** | Diploma Level Teacher Training | 4730 |
|  |  | Institutes under Ministries | 156 |
|  |  | **Total** | **12276** |
| **Data Source :** |  |  |  |

**For School Education :** National University of Educational Planning &

Administration, New Delhi (website: http://dise.in/)

* Figures related to School Education are provisional.

**For Higher Education :** Ministry of Human Resource Development, Government of India (website: http://mhrd.gov.in/statist)

Apart from instituting formal educational institutions, India as always has been proactive in adopting technologies for education. To supplement the classroom education has been experimenting with using television and ICTs.

**Educational Television (ETV) in India**

Television was introduced in India as a pilot project of UNESCO in 1959 in Delhi to study as a medium of communication and community development. On successful completion of the project ETV came into being in 1960 as part of All India Radio (AIR). Specially designed programmes would telecast every Tuesday from 3 to 4 pm for the benefit of ninth class students. With assistance from Ford Foundation ‘Delhi School Project’ was launched in 1961 to telecast 20 minutes programmes in science subjects for five days a week. The Satellite Instructional Television Experiments (SITE) resulted in use of ETV for primary education in 1975-76. It was intended to bridge the rural-urban divide by taking the programmes in regional languages of the states. With successful launch of communication satellites India embarked on expanding the ETV network in 1982 using INSAT-1B to reach more areas of the country. In 1984 the University Grants Commission (UGC) launched ‘Countrywide Classroom (CWCR) for the benefit of higher education students. The CWCR slot on *Doordarshan,* India’s national channel, would telecast enrichment programmes for the benefit of under graduate and post graduate students. These programmes were mainly in English and Hindi. In the following years **the National Council for Education Research and Training (NCERT), with the establishment of Central Institute of Educational Technology (CIET) at New Delhi and State Institute of Educational Technology (SIET) launched ETV programmes for school children on *Doordarshan*. In the year 2000 Indira Gandhi National Open University launched a separate channel called *Gyandarshan* to reach out its large student community in the country. ‘Vyas Higher Education Channel’ was launched by the UGC to take syllabus based ETV programmes intended for the higher education students in the country.**

**e-Learning in India**

Learning will be just one click away for those who seek education. It will empower the people and will help them to raise their socio-economic status. If we look at the [**Gross Enrollment Ratio (GER) of India**](http://ireport.cnn.com/docs/DOC-1108407), it is poor comparing to other countries and is a topic of immense concern. In this scenario, these open online courses can be seen as the brightest and the best way to improve this ratio and raise literacy level. Without higher literacy rates, India can never fight poverty and education must reach each and every individual. With mere efforts by the government of India, online education can successfully reach every individual. The technology driven education system and online studies will definitely help India to foster its growth. We will see a better and strong India in future.

e-Learning relates acquiring knowledge and skills through use of CD-ROM, laptops, tablet PCs, mobiles, Intranet, Internet and wireless technologies. The term ‘e-learning’ has been in use since 1999. Govt. of India through its separate ministry, Ministry of Electronics and Information Technology’, started encouraging e-learning since 2002 by allocating separate funds during X Plan period.

Although it is a long way ahead for e-learning to take place at school level it is felt more at college and university education level. Reason being, a majority of schools are owned by government located in rural areas. However, private schools in urban areas are adopting the new learning methods resulting in establishment of Digital schools, techno schools, etc.

In the initial stages content was created and distributed through CDs. Governments are supporting the schools and colleges in a big way to extend ICT to schools and colleges by providing computers and Internet facilities. Thus, there came up separate e-learning resource centers in the libraries of educational institutions. In the course of time colleges and universities have been providing access to Internet in their college premises and libraries. This enabled students and teachers access the knowledge using the Internet.

According to ‘Academic Status of Education Report (ASER) 2017’ annual national report, 85% young people, below the age of 14, watch television, 41% use computers, 36% use Internet.

According to ‘All India Survey on Higher Education Report 2015-16’ prepared by Ministry of Human Resources Development, 90% of universities 83% of colleges have computer centers.

The University Grants Commission initiated preparation of syllabus based e-content in almost all the subjects for the benefit of students of higher education. These e-learning programmes are available on portal of Consortium for Educational Communication. The Indian Institutes of Technology also taken up the e-learning to support the engineering students through ‘National Programme on Technology Enhanced Learning’ the records the lectures and makes them available through Internet. Apart from numerous private players are also extending e-learning through their websites.

**Massive Open Online Courses (MOOCs) in India**

Education is something that shapes one’s life and personality and defines success. There are many people in India who are depriving of higher and quality education due to various reasons from family to work responsibilities. Technology and globalization have increased the accessibility of higher education in recent years. MOOCs or Massive Online Open Courses are recent trend in distance or e-learning, offering an opportunity to large number of students to study high quality courses online with prestigious universities at no cost.

MOOCs courses are mainly free open online courses and are the learning hub for those who are deprived of regular studies. These are open to anyone in the world and students need to get enrolled in the institution offering MOOCs that too without or low fees. MOOCs online learning can be regarded as smart mini colleges providing access to many courses which are being taught at some of the world’s leading universities by leading scholars. These are ideal for independent studies and users can select courses from any institutions offering them. MOOCs online learning method made the courses available on internet and students can watch the lectures online which are often more useful than classroom lectures.

MOOCs learning hub help students by providing opportunities to expand their knowledge and interests without dedicating a fix period of time at college or university. Anyone can be benefited from MOOCs online courses for enhancing both theoretical and practical knowledge of the subjects by combining these courses with regular college or university courses.

In a developing country like India where the major part of population resides in rural areas and people can’t afford to get quality education, [**MOOCs**](http://www.raiuniversity.edu/learning-resources/moocs-learning-hub/) can be definitely considered as a game changer. This cost effective way of learning through online medium definitely possess a bright future in India as Government doesn’t have to spend money on the construction of schools and colleges, students do not have to travel up to long distances, no faculty will be needed then what will be required? One only needs to get a laptop or desktop and an internet connection and they are all set to go.

MOOCs is the latest experiments that the Government of India is taking up in a big way that is successful in many Western countries. At present creation of courseware is under way. With rapid expansion of broadband Internet and mobile communications it is expected that MOOCs will be successful in India.

**Conclusions**

Communication is a powerful tool that transformed man from animal to civilized human being. Communication is paramount, especially in education. It can be observed that there are ups and downs in educational communication in India. In ancient times India had Vedik Sanskrit as medium of instruction and it was one to one learning in the *gurukuls* (monasteries). During that period it was mostly Hindu and Buddhist religious and moral education. Vedas, *Upandishads, Dhammapada* etc. were learnt through oral and written communication. In medieval period the Muslims dominated the education scene with Arabic, Persian and Urdu. There were *maktabs* and *madarasas* where religious teachings took place in oral and written communication. During the colonial period the colonial business men and later the British did not improve much on education front and introduced English as medium of instruction. After independence India has been concentrating on improving the educational communication by giving importance to regional languages and also English. The government has also been very active in utilizing the ICTs in educational communication. Today it is at the threshold of human resources development and providing the world best brains in all the fields. Thus there is a radical change in educational communication in India by the monks in monasteries to the MOOCs.

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**References**

Agarwal, P. (2006). *Higher education in India: the need for change.* New Delhi: Indian Council for Research on International Eonomic Relations.

Aggarwal, D. (2009). Role of e-learning in a developing country like India. *Proceedings of the 3rd National Conference; INDIACom-2009 Computing For Nation Development.* New Delhi: Bharati Vidyapeeth‘s Institute of Co mputer Applications and Management.

ASER Center. (2018). *Annual status of education report (rural) 2017.* New Delhi: ASER Center .

Bapna, A. (2015). *School education in India: a hand book.*

Bureau of Planning, Monitoring & Statistics . (2014). *Statistics of school education 2014-15.* New Delhi: Ministry of Human Resources Developoment, Government of India.

Department of Higher Education. (2016). *All India surevey on higher education 2015-16.* New Delhi: Ministry of Human Resources Development, Government of India.

Department of School Education. (2016). *Educational statistics at a glance.* New Delhi: Ministry of Human Resources Developoment, Government of India.

IGNOU, 2010. Communication Networks, MDE-411, Education Communication Technologies, New Delhi, STRIDE, IGNOU, 37.

Jagadeeshwar Rao, V. (2015). Educational television in India: issues and challenges. Educational Multimedia Research Centre, Osmania University, Hyderabad, India.

Loan, F. A. (2011). Internet use by rural and urban college students: a compartive study. *DESIDOC Journal of Library and Information Technology* .

Mason, R. & Rennie, F. (2008). E-learning and social networking handbook: Resources for higher education (1st ed.). New York, NY: Routledge.

Sharma, S. K. (2014). e-Learning in India. *International Journal of Advanced Research in Computer Engineering & Technology* .

UNESCO (2016). *ICT in education statistics: Shifting from regional reporting to global monitoring: Progress made, challenges encountered, and the way forward.* UNESCO.

UNESCO-UIL (2014). Harnessing the potential of ICTs for literacy teaching and learning: Effective literacy and numeracy programmes using radio, TV, mobile phones, tablets, and computers. Hamburg: (Annual status of education report (rural) 2017, 2018)UNESCO Institute for Lifelong Learning.

<http://cec.nic.in/Pages/Home.aspx>

 <http://mhrd.gov.in/>

<https://www.ugc.ac.in/>