

### REVIEW OF RESEARCH

UGC APPROVED JOURNAL NO. 48514

ISSN: 2249-894X



VOLUME - 8 | ISSUE - 2 | NOVEMBER - 2018

# HIGHER EDUCATION IN INDIA: GROWTH PROSPECTS AND THE ROLE OF ICT IN ADMISSION PROCESS

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#### **ABSTRACT**

Nations prosperity is the outcome of good education system and the pillars of education rests on the good administration. The technological revolutions made in the past few decades has opened a new era for administration. It has provided versatility to all the stakeholders and has left no space for error. The level of transparency has tremendously increased and the idea of doing the rights have amplified. Higher education imparted by various Universities across India are also adopting modern technologies for the sake of good governance. Admission process is the foremost key and vital process through which the new entrants enter into the system. Across decades this process was being carried over by the lengthy hand written process, but of late the same have been replaced by technology. ICT (Information and communication technology) have made significant transformation in the admission process of the Universities in India. The present paper identifies and highlights the prospects and growth of higher education in India and identifies the role of ICT in admission process. It presents brief literature on the previous work done in role and usages of ICT in admission process.

**KEYWORDS:** Higher Education, Admission System, Admission process, ICT.

# **INTRODUCTION**

Civilization grow and changes its form and across civilization generations acquire new means of life style. We are said to live in a civilised society which is nurtured and shaped by education. Education plays the most prominent role in the changing system of society. It is the basis of development which acts as a pillar of success for a nation. Right to education has rightly been a part of fundamental right in our country. The Constitution (Eighty-sixth Amendment) Act, 2002 inserted Article 21-A in the Constitution of India to provide free and compulsory education of all children in the age group of six to fourteen years as a Fundamental Right in such a manner as the State may, by law, determine (MHRD). In order bring equity in higher education sector government of India have taken significant initiatives. Rashtriya Ucchatar Shiksha Abhiyan (RUSA), National Initiative for Design Innovation, National Research Professorship (NRP), Establishment of New Central Universities, Indira Gandhi National Tribal University, Establishment of 14 World Class Central Universities, Setting up of 374 Degree Colleges in Educationally Backward Districts, Scheme for incentivising state governments for expansion of higher education institutions, Central Sector Interest Subsidy Scheme, 2009 on Model Education Loan Scheme of IBA are some of the initiatives by the government to promote higher education in the country.

#### **OBJECTIVES OF STUDY**

The present article is based on the following two research objectives:

- 1. To study the growth of educational institutions in India.
- 2. To explore the available literatures on the use of ICT in admission process of higher educational institutions.

#### **GROWTH OF HIGHER EDUCATIONAL INSTITUTIONS**

Higher educational institutions in India constitutes Central University, Deemed University government, government aided, private, Institute of national importance, State private university and State public university. Table 1 depicts the growth of number of universities by types from the year 2010-11 to 2015-16. In the year 2010-11 the number of Universities in India was 610 which grew to 766 in the year 2015-16. It is significant to note that there has been notable growth of state private universities in India as compared to that of state public universities. The overall growth in the number of institutions has however remained steady.

State	Central University	Deemed University- Government	Deemed University- Government Aided	Deemed University- Private	Institute of National Importance	State Private University	State Public University	Total
2010-11	41	40	11	91	59	87	281	610
2011-12	42	38	11	79	59	105	286	620
2012-13	42	36	11	80	62	122	292	645
2013-14	42	36	11	80	68	153	309	699
2014-15	43	32	11	79	75	181	316	737
2015-16	43	32	11	79	75	197	329	766

Table 1.1 Number of Universities by types

Source: Compiled from Report of All India Survey on Higher Education (2011-2016)

## **REVIEW OF ROLE OF ICT IN ADMISSION PROCESS**

Pircher & Pausits (2001) in their work identified modernization of higher education (HE) has forced the institutions to store, manage and use existing information and knowledge stores in a better way in order to meet new accountability, effectiveness and efficiency requirements. They discussed some strategic applications of information management at HEIs in addition to proposing a basic structure for IT-services if they are to provide support systems for knowledge management.

Bandalaria (2007) explored the influence of the information and communication technologies (ICTs) in open and distance learning (ODL). The different ICTs being used in ODL and their specific applications to the various facets of this mode of delivery are also described.

Kachepa & Batchaeva (2008) in their study ICT finds use in the teaching and learning activities. This study looks at how this technology is being used at the University of Zimbabwe as an administrative tool and as a teaching and learning tool.

Snehi (2009) in her study revealed that ICTs can play significant role in bringing efficiency in the universities/organizations. Networking of various departments and sections within the university/colleges and interuniversity networks established would lead to streamlining of university functioning. Contribution of ICTs in developing Management Information System for the Universities/ colleges is vital to ensure collection of information, its analysis for identifying trends, keeping track of resources/funding and their monitoring.

Desai & Shah (2009) in their research study identified different activities where ICT can be utilized in administration of colleges. The areas identified by them are online admissions, One window-one minute

service, Recording of student attendance, Issuing of books by library, Musters for the nonteaching staff, Security of the campus, Feedback from students, Record keeping, Circulars and GRs, Alumni association. Hoter et al. (2009) in their work pointed out an online inter-group contact hypothesis (OICH) model, developed within the Israel education system, whereby online and distance learning (ODL) is used in the service of multiculturalism. The model developed and the results presented from the course based on the model show that structured ICT intervention can reduce bias, stigmas, and ethnic prejudice among prospective teachers.

Krishnaveni & Meenakumari (2010) in their paper specified that Information and communication technology has played an effective role in decreasing operational inefficiency and making better decision in many areas of governance. The author has final concluded by providing a conceptual model for implementing a good technical system. It is also mentioned that usage of ICT in higher education administration involves "harnessing technology" for better planning, setting standards, effecting change and monitoring results of the core functions of universities.

Asiabaka (2010) in their study investigated the access and use of information and communication technology for administrative purposes by Principals of Government Secondary Schools in Imo State, Nigeria. Findings revealed that majority of the Principals never used the broadcast/audiovisual and telecommunication/computer technologies for administrative purposes.

Ujunju et al. (2012) evaluated the role of ICTs in supporting processes of management in institutions of higher learning in Kenya. The research investigated how the different levels of management used ICT in their management processes and whether the use had any effect on management processes. The research further made recommendations to the universities on better use of ICTs in their management processes.

Mutagahywa (2012) studied about the governance activities using ICT in universities of Tanzania and found that the Universities are using ICT for student admission and records, tests/examination results and transcripts, human and financial resources and management of various assets. The highest impact of ICT on university 39 governance is in this area of administration.

Pyla (2012) identified that ICT in administration of educational institutions play a very important role. It simplifies the administration tasks by reducing the paper work and replaces the manual maintenance of record keeping to electronic maintenance of records which helps in easy retrieval of any information of students.

Meenakumari & Krishnaveni (2013) in his study identified various functional areas to which ICT is deployed for information administration in higher education institutions and to find the current extent of usage of ICT in all these functional areas pertaining to Information administration. The various factors that contribute to these functional areas were identified. A theoretical model was derived and validated. Many researches reveal that the integration of ICT helps to reduce the complexity and enhance the overall administration of higher education.

Kumar et al. (2013) focused to develop a web based online admission system to computerize university admission process for higher education programmes. The main objective is to increase their reach to geographically scattered students, reducing time in activities, centralized data store and paperless admission with reduce workforce.

Ahmed & Jibia (2013) found ICT is a good means of recording and protecting the records that we generated. However, issues such as security, usage, maintenance and lack of qualified personnel in ICT centres are hindering the effective utilization of such centres.

Kapoor & Kelkar (2013) in their work found that although the government of India has taken important steps towards successful implementation of e-governance but despite of that there are some factors which may effect in successful implementation. The ways to enhance learning by enabling access to universal information are possible with the introduction of e-governance initiatives.

Muralidhara & Babu (2013) compared the new e-governance actions with the pervious system of admission procedure of the Karnataka state. It also compares the Bangalore University model with more automated admission models in Karnataka state. It examines the performance of the e-governance initiative

in decreasing manpower and redundancy. E-governance initiative has helped many governmental institutions to carry out their services transparently, conspicuous, efficiently, and democratically. The e-governance process has helped the students, University and its stakeholders in rendering the admission system transparent.

Shaikh et al. (2013) in their study proposed software uses, the concept of UID (Aadhar card) system that is extensively used to uniquely identify all people who is living in India. In the same way all the student in this system is uniquely identified. The admission process is fully centralized of this application and each student will have only one admission place.

Mantri et al. (2014) in their study developed a web portal which is able to manage all data pertaining to colleges. This framework can offer forecast for the next or future year cut off list, effectively help to student for selecting applicable college.

Shrivastava et al. (2014) in their study revealed that the integration of ICT helps to reduce the complexity and increase the overall administration of higher education.

Mirji et al. (2014) found e-admission system will help the students to get the list of all colleges which they would get the admission at the click of a button. The students only have to enter their marks of CET, AIEEE etc. with this software, the students can very easily obtain the list of colleges even branch wise and category wise. This will not only make the admission process easy but also minimizes mental stress of students and parents.

Chhajed et al. (2014) in their study identified the potential use of Android application within organizations in the admission making process. This application would help to students to fill their application forms with the help of internet from anywhere and anytime basis.

Jadhav et al. (2014) in their study found that College Management Software is a simple yet powerful one joint integrated platform that connects all the various departments of an institution like administration, account, student section, student and many more specialized departments.

Auddy & Mukhopadhyay (2014) proposed a combined Web-based online admission system applying multi-agent system and Web-based technologies. The centralized online admission system is a vital reform initiative in education area to bring about greater conspicuous, transparency, efficiency and liability in complicated and time-consuming admission process.

Manal et al. (2015) in their study said that each institution must work within the context of its own system to fit choices to what best suits its unique situation and culture. The author enlisted areas where the ICT has vital role to play for enhanced quality in the administration is online admission.

Tarus et al. (2015) investigated the challenge in hindering the implementation of e-learning of Kenyan public universities and recommendation to possible solutions for successful implementation of e-learning system.

Blessing et al. (2015) in their research study said that the application of ICT in the Nigerian university system is taking up a revolutionary trend. The researcher has successfully developed a mobile application for university enrolment system and created a robust and centralized database for information and data storage. This will reduce cost and time in admission enrolment processes.

Saadat et al. in their paper discussed how the university level education in the societies of developing countries like Pakistan can be standardized to attain maximum learning outcomes, developing standard operating procedures to ensure quality of education and benefits to students, faculty, staff and management through the application of information technology.

Vijayalakshmi et al. (2015) projected online system in an android application to manage student details on mobile and keeping them updated regarding latest events in college. These applications are an improvisation to the standard system to transaction processing systems. The Student Information System (SIS) would be a new way of achieve efficiency on processing student information system.

Madhuri et al. (2015) in their paper studied the admission process in almost all subjects in Maharastra and other competitive educational institutions. From phases of Admission system Evaluation

steps are presented by researchers which will be helpful for Evaluation and Design of any Online Admission System by any academic organization.

According to Daniel Karanja (2016) in a study revealed that the integration of information solutions gives higher education institutions competitive advantages.

Alotaibi et al. (2016) in their research study prepared a framework for designing a proposed admission system in the Saudi Universities. The study recommends applying new approaches related to Decision Support Systems (DSS) in order to improve the efficiency of the admission system in the Saudi universities.

#### **CONCLUSION**

The present article descriptively presents the literature on Information and communication technology (ICT) in admission process in higher educational institutions. The transformation of admission process across decades has been significant and has become more transparent and free from cumbersome documentation. In order to adopt it in all the levels of administration institutions need to be more technical friendly and open to innovation.

#### **REFERENCES**

- Admire Kachepa & Oksana Batchaeva (2008). Using Information and Communication Technology at the University of Zimababwe challenges, Successes and recommendations.
- Ahmed, M. (2013). Application of Information Communication Technology (ICT) and Records Keeping in Schools. *International Journal of Innovative Research and Development*, *2*(1), 300-310.
- Akshay Mantri, Naina Rohra, Naman Verma, Nikita Gaikwad and Prof. P.V. Kasture (2014). Literature Review on Web Portal for Engineering Admission Process.
- Alotaibi, A., Ayesh, A., & Hall, R. (2016). Managing Admission in Saudi Universities: a System Approach. *International Journal of Information and Education Technology*, 6(4), 314.
- Asiabaka, I. P. (2010). Access and use of information and communication technology (ICT) for administrative purposes by principals of government secondary schools in Nigeria. *The researcher*, 2(1), 43-50.
- Auddy, A., & Mukhopadhyay, S. (2014). Modelling Online Admission System: A Multi-Agent Based Approach. *International Journal of Modern Education and Computer Science*, *6*(5), 26.
- Balasaheb, J. S., Sitaram, S. B., Khushalrao, W. V., Ashok, V. N., & Bhausaheb, M. P. (2014). Web Based College Admission System. *IJEDR*.
- Bines, H., & Lei, P. (2011). Disability and education: The longest road to inclusion. *International Journal of Educational Development*, 31(5), 419-424.
- Blessing, O. O., & Monica, N. University Mobile Enrollment System: A Nigeria Perspective.
- Chhajed Sanchita, Mruganayani Mane, Rohit Jadhav and Siddhant Gokule (2014). Android Application for Online Admission Process.
- Daniel Karanja (2016). Integration of ICT in Human Resource Management: Case of Kenyan Higher Education.
- De la Pena-Bandalaria, M. (2007). Impact of ICTs on open and distance learning in a developing country setting: The Philippine experience. *International Review of Research in Open and Distance Learning*, 8(1), 1-15.
- Elaine Hoter, Miri Shonfeld & Asma Ganayim (2009). Information and Communication Technology (ICT) in the Service of Multiculturalism.
- Giffard-Lindsay, K. (2007). Inclusive education in India: interpretation, implementation, and issues.
- Hodkinson, A., & Devarakonda, C. (2009). Conceptions of inclusion and inclusive education: A critical examination of the perspectives and practices of teachers in India. *Research in Education*, 82(1), 85-99.
- J. Meenakumari & Dr. A. Krishnaveni (2013). Transforming Higher educational institution administration through ICT.

- Kapoor, R., & Kelkar, N. (2013). E-Governance: Higher Education in Rural Area. In *Proceedings of National Conference on New Horizons in IT-NCNHIT* (p. 95).
- Krishnaveni, R., & Meenakumari, J. (2010). Usage of ICT for Information Administration in Higher education Institutions-A study. *International Journal of Environmental Science and Development*, 1(3), 282.
- Madhuri P. Pant, Dr. Sachin A. Kadam (2015). Fechnology impact on Admission Systems with Reference to Professional Programmes in Maharashtra.
- Malalha, S. A. (2012). Design And Development of Online Admission System For Alquds Open University in Palestine(Doctoral dissertation, Universiti Utara Malaysia).
- Manal Bhagwan Suresh (2015). The Role of ICT in Administration and Academic Audit.
- Michael Okumu Ujunju, G. Wanyembi & Franklin Wabwoba (2012). Evaluating the Role of Information and Communication Technology (ICT) Support towards Process of Management in Institutions of Higher Learning.
- Miles, S., & Singal, N. (2010). The Education for All and inclusive education debate: conflict, contradiction or opportunity?. *International Journal of Inclusive Education*, 14(1), 1-15.
- Mirji, C., Deshpande, V., Walunj, S., & Ambavane, A. E-Admission System. Kumar, R., Desale, P., & Puri, C. G. Web Based Admission System.
- Ms. Vijayalakshmi P.B., Manasi Kawathekar, Kirti K. Bhate and Pankaj Belgoankar (2015) An Android Application for Student Information System.
- Muralidhara, B. L. (2013). Centralized Admission: A Novel Student-Centric E-Governance Process. *International Journal of Computer Applications*, *66*(23).
- Patel, J. V. (2015). Inclusive Education in India: Interpretation, Implementation and Issues. *University News*, *53*, 12.
- Beda Mutagahwa (2012). The Role of ICT in University Governance in Tanzania.
- Pyla, A. (2012). ICT as a change agent for higher education and society. *Proceedings published by International Journal of Computer Applications. IJCA*.
- Richard Pircher & Attila Pausits (2001). Information and Knowledge Management at Higher Education Institutions.
- Rieser, R. (2012). *Implementing inclusive education: a Commonwealth guide to implementing Article 24 of the UN Convention on the Rights of Persons with Disabilities*. Commonwealth Secretariat.
- Saadat, I., Azam, S. M., Asad, S., & Haroon, R. CU Online: A Step towards imparting Quality Education through ICTs.
- Sameer A. K. Alha (2012) "Design and Development of Online Admission System Alquds Open University in Palestine"
- Sanjeev, K., & Kumar, K. (2007). Inclusive Education in India, Electronic Journal for Inclusive Education, 2 (2).
- Savita Desai, Prashant Shah (2009). The Role of ICT in Administration, Teaching, Learinig, Evaluation and Research in Higher Education.
- Shaikh, M. A., Jagadale, H. K., Karol, S. B. A., & Sayed, S. (2013). Helping Educators to Lessen Paper Work (HELP). *International Journal of Engineering*, 2(9).
- Shrivastava, R. K., Raizada, A. K., & Saxena, N. (2014). Role of e-Governance to strengthen higher education system in India. *IOSR Journal of Research & Method in Education (IOSR-JRME)*, 4(2), 57-62.
- Snehi, N. (2009). ICT in Indian Universities and Colleges: Opportunities and Challenges. *Management & Change*, 13(2), 231-244.
- Tarus, J. K., Gichoya, D., & Muumbo, A. (2015). Challenges of implementing e-learning in Kenya: A case of Kenyan public universities. *The International Review of Research in Open and Distributed Learning*, 16(1).