An Efficient use of ICT for Education in our Rural Area

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Abstract:
In this modern Era, ICT provides more opportunities for both teachers as well as students to work better in an information age. ICT is a most effective way to increase knowledge of people. It also add values to education as well as provides better infrastructure for agricultural development, health services, E-commerce, business, advertisement and financial serviced in rural areas. The role of ICT in education is becoming more and more important as well as popular and will continue to grow and develop in the 21st century. This paper mainly focuses on effective use of ICT for education along with ICT use in teaching learning process, quality and accessibility of education, learning motivation, learning environment. This paper also focuses on the role of ICT in solving the problem of rural economy in India. Its main aim is to analyze and examine the impact of this technology on rural infrastructure growth and development. In this paper we have also highlighted the various positive and negative trends of these technology (ICT) to carry various rural development operations. In this paper we have visited a certain schools and colleges to examine and verify the use of ICT in education. And we had gone through several stages like questionnaire, interview with students, observation and at last we conclude that some challenges and lack of equipment’s are there.

Keywords: ICT, Education, school and colleges.

I. INTRODUCTION

ICT has an impact on every aspect of our lives – from working to socializing, learning to playing, creating to analyzed. We are living in a constantly evolving digital world of a new age. The use of ICT in rural area has fundamentally changed the practice and procedures of nearly all forms of effort within business and governance and other sectors of the economy. It can also effect assist international economic integration, improve livingstandards, improve in biodiversity utilization and management. India is a country of villagers and there are more than 500 villages. It is known as a rural economy as 60% of its population lives in the village. The government of India is providing high priority to rural development with the objective to achieve rural- urban integration in growth process. [4] The focus of development is to include disadvantaged sections of society i.e ‘quality in growth’ and ‘equality of opportunity’, ‘higher learning process’, ‘quality in education’. In India, Education plays an important role as government has provided various scheme and awareness programs regarding the importance of education and nowadays, education with the use of ICT is becoming popular day-by-day. The use of ICT for education in rural areas is not yet started in many places, rural area is almost backward in all aspects. The all India rural credit review committee in its report warned. “If the fruits of development continue to be denied to the large sections of rural community, while prosperity accrues to some, the tensions social and economic may not only upset the process of orderly and peaceful change in the rural economy but even frustrate the national affords to set up agricultural production”[1]. ICT is now an essential part of rural economy for various development strategies. It is widely used in agriculture, business service, education, rural health, rural development. Though with the help of ICTs people of rural areas can connect with national economy. ICTs can overcome with many infrastructural constraints. ICT provides access to information through telecommunication. The use of technology devices such as televisions, tape recorder and video recorders have been incorporated as a tool for language teaching since 1960s. There was evidence of many problems in terms of technical skills at the beginning and it took about a generation for the technical skills and the technical problems to be ignored out [3]. Though ICTs people of rural area can connect with national economy, ICTs also serve as instrument of awareness creation and feedback giving rural people a voice in nation’s socio – political life [1].

II. WHAT IS ICT?

ICT is an acronym for information and communication technology. It is concern with the storage, retrieval, manipulation, transmission or receipt of digital data. ICT has a great impact in our daily lives, i.e we can read newspaper using the online newspaper. It brings a lot of advantages for economic development enabling billions of transactions to happen in faster and easier way. ICT is basically ours society efforts to teach its current and emerging citizens valuable knowledge and skills with the help of computing and communications devices. Teachers generate meaningful and engaging learning experiences for their students, strategically using ICT to enhance learning [5]. The definition taken from the guidance in the QCA schemes of work for ICT is:

“ICTs are the computing and communication facilities and features that variously support teaching, learning and a range of activities in education.”

The use of ICT in education add more values in teaching and learning process, or by adding a dimension to learning that was not previously available before. ICT may also be a motivational factor in student’s learning. A report made by the national institute of Multimedia Education in Japan proved that an increase in the use of ICT in education with integrating technology to the curriculum has a significant and positive impact on student’s achievement[2]. A numbers of different ICT tools and applications may be integrated in teaching and learning [2].
Components of ICT:- The term ICT is generally accepted to mean all technologies that combined, allow people and organizations to interact in the digital world.

ii. Role of ICT in Education and Rural Areas:-
- Application of ICT has the potential to improve living standards of people in rural areas and by providing important educational benefits, social and commercial awareness.
- Providing adequate infrastructure and technical support.
- To increase variety of education services and medium.
- To promote technology literacy.
- ICT is helping in modernizing agriculture, in medical surgery, to educate and to trained workers for industry.
- To support schools in sharing experience and information with others.
- To increase a variety of educational services i.e. development of learning skills, expansion of optional education, distance education.
- To promote equal opportunities to obtain education and information.
- ICT helps teacher for organizational preconditions (vision, policy, and culture).
- It helps in effectiveness of classroom as well as innovative teaching.
- ICT helps teacher in both pre-service and in-service teachers training.

III. METHODOLOGY -

The study was descriptive and consisted of two phases: phase 1 and phase 2. Phase 1 was a close ended as observing the environment of the lab and classroom and phase 2 was a questionnaire as well as interviews with all the education institutions in the native place. The schools were selected in terms of region, location (urban or rural) and types of school (government owned, mission owned or community school). Systematic sampling was used on the schools in each of the region so as to have schools represented in all regions. A close ended was administers to 2 schools that teach ICT. In phase 2 of the study, questionnaire and interview as done with the institutions that offers education. This phase was to find out the challenges faced by the institution in teaching ICT. The main purpose of the study was to find out the challenges faced by the schools when introducing the ICT.

Some data where being collected during the survey of a school:-

1. Govt. Boys Higher Secondary School Kunkuri:-
   - Numbers of computer system were only 8.
   - Computer class were only as a subject in 9th, 10th, 11th and 12th.
   - And the no. of students were around more than 90.
   - There were only 1 computer teacher.
   - Smart class was not there as well as no projector was available.

2. Loyola Higher Secondary Hindi Medium School Kunkuri:-
   - No. of computer system were 40.
   - Computer class were only as a subject in 9th, 10th, 11th and 12th.
   - And the no. of students were around 250.
   - There are 3 computer teacher.
   - Smart class room as well as projector was also available in the lab and seminar room.

3. Loyola College Kunkuri:-
   - Numbers of computer system is 45.
   - Computer classes are a subject in B.Sc (C.S), B.Com. , B.A, B.C.A, DCA, PGDCA.
   - And the number of students were around 340.
   - There are 6 Asst. prof. and 1 lab technician.
   - Smart class room as well as projector was also available in the lab and seminar room.
IV. CHALLENGES FACED BY MANY SCHOOLS AND COLLEGES DURING ICT INTRODUCED.-

Positive and Negative Impact of ICT

Positive impact of ICT: -
- It can maintain electronic health records.
- Increase in healthcare data management.
- It has the potential to increase health care.
- Potential to improve quality in health care.
- Use of ICT on health sector leads to achieve overall development goals.
- Daily routine management
- Social relationship
- Information sharing
- Usage of free time
- Self employment

Negative impact of ICT: -
- Huge initial investment and transaction costs.
- Power supply.
- Lack of training and awareness
- Under funding
- Limited investment priorities in providing access to new technology in health sector.
- Due to its cost, maintains is high
- Social disconnection
- Reduced physical activity & health problems
- Loss of privacy and security.

V. CHALLENGES OF ICT IN RURAL AREAS-

1) The first and main challenges is illiteracy, almost every 90% people are uneducated.
2) Most of the people are living under poverty, they are struggling for their breads and daily needs.
3) There is a lot of lack of awareness towards any governance project.
4) There is a shortage of required infrastructure such as electricity, internet and modes of communication.
5) The dominance of English on the internet bounds access on non-English speaking population.
6) Lack of enough human resources.
7) As in education, teacher is not familiar with the equipment’s.
8) Lack of familiarities of villagers with computer.
9) Lack of suitable telecommunication infrastructure, villages and rural areas don’t have internet services centers and people need to connect to the internet through service centers in cities.
10) Lack of personal computers at homes and high cost of internet use in rural areas.

VI. CONCLUSIONS

The field of education has been affected by ICT which have undoubtedly affected teaching, learning and research. ICT have the potential to accelerate enrich, and deepen skills to motivate and engage students to help relate school experience to work practices. The use of ICT will not only enhance learning environments but also prepare our next generation for future lives and careers. The use of ICT in education have a positive impact on teaching, learning and research. ICT can affect the delivery of education and enable wider access to the same. This study concluded that the high school teachers are familiar with ICT and ICT usage. This does not necessarily mean that they integrate ICT into the curriculum. We find that there are insufficient technical supports at schools and little access to internet to use ICT in the classroom. Shortage of lack of knowledge, class time, lack of computers, and time.

VII. REFERENCES

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