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BLISSFUL IMPACT OF DIGITAL TRANSFORMATION ON EDUCATION ON EXPERIENTIAL AND INNOVATIVE APPROCHES OF LEARNING



RESEARCH ARTICLE

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Abstract

Education is the only tool that eradicates the darkness of our society and, it is the path of prospering and finding new direction for the development. In this competitive and creative world, digital transformation and use of technology in the education system becomes a replicate of the traditional way of teaching-learning method, and it will able to enlighten the societies breaking all the monotonous barriers. Over the years, teachers have adopted various teaching strategies using digital equipment raising effectiveness of their teaching and learners have used digital tools acquiring knowledge in innovative way. Therefore, technology in education helps dissemination of the new and innovative knowledge and experiences of the new creation of our society. This study has been tried to focus on the evolution of using digital tools in education and how we are continuously going to the new era of Artificial Intelligence, and Information and Communication Technology (ICT). This study will able to illustrate transformation of digital tools facilitates the opportunities of teaching-learning methods with changing time. At present to make classroom teaching more attractive and innovative technology-based study equipment helps to increase the pace of teaching and learning. Teaching and Learning will become more effective and impactful if we constitute digital equipment in our education curriculum. Thus, the transformation of the education system from traditional to experiential digital equipment creates its own relevance, and it will help enhancing the strategies of teaching learning methods in the near future.

Keywords: Innovative, Artificial Intelligence, ICT, Experiential, Digital equipment

Introduction

Once students have to listen and memorize moralistic, principles, ethics, morals of life from there 'gurus'. Then the concepts of manuscripts came where these were usually written on palm leaf. These manuscripts dealt with all kinds of subject. Over the year inscriptions have been discovered by the aerologist these are writings on relatively hard surface such as stone (NCERT, 2018-19). Then gradually printed books were coming as a self-learning tools which students could access according their choices. Despite that using of digital tools in education and its adverse impact on education is the topic of this paper. As per our conception digital tools includes radio, television, computers, laptop, cell phone, internet connection and other mobilities which have significant role in our education since 19th century and today it becomes an integral part of education system. Digital tools enabling the opportunities of exploring learning materials to the student. It enhances self-confidence and self-learning capacity as well as. In most of the public schools focus on set up of digital tools for innovative learning environment. Internet make our world into a global village from where one can find lots of information regarding their need by one search therefore integration of digital tools in education becomes fortunate for both teachers and students. Not only for students' educators, teachers who had cell phone, computer etc. using these for upgrading their teaching skills by gathering more knowledge in their mastery subject. At present using ICTs in education is a blissful concept and to get better version a teacher can always get support from using it. During pandemic teachers and students both have been realised the main role of ICTs in education. Due to fear of spreading of diseases all educational institutions were remain closed. At this time various digital tools and ICTs together was introduced new version of teaching learning mode. But using digital tools and ICTs are unable to bring learning into a same pace while it makes gap between prosperity of education. Also set up of digital tools in educational institution is a time-consuming process, expansive process. School colleges have not proper infrastructures for getting it. This paper is concluded by the positive side of digital tools and its evolution and adaptation in education by changing time and its impact on experiential approaches of learning

Objectives

Main focus of this study is

- 1. To discuss on the evolution of using digital tools on education.
- 2. To focus on using of ICT influences the approaches of experiential and innovative learning.

Literature Review

Howard & Mozeko (2015) explained in their paper recent hype of technology and media over the last century and instead consider the modulation into teaching learning strategies considering its history. Firmin & Genesi (2013) provided information about history of classroom technology and its possible benefits, limitation and adaptation considering classroom condition in this paper. DeCoito (2020) said in this paper about digital timelines assist educators as well as teaching practice. Banerjee (2024) focused on using digital tools in teaching of history, and showing contradictory approaches integration of digital in mastery subjects. Negro & Núñez (2012) they forecasted integration of technology in university education and its adverse impact on students, teachers and methods of teaching. Kumari (2022) she said in this paper the growth of internet opens new path of learning as well as opportunities to explore the world of learning and teaching. Biswas, Bhattacharya & Bandyopadhyay (2017) this article is published by Netaji Subhas Open University. This literature is focused on population explosion and increased number of students due to population explosion, increased mobility of students, increased range of student's abilities and diverse backgrounds. Haelermans (2017). This literature is focused on ICT based education where inclusion of ICT in education makes learning easier. computers, tablets, smart-phones, interactive whiteboards and broadband and Wi-Fi etc. digital learning tools have effective applications on education. Ratheewari (2018) said in this paper about using ICTs in education at present it is influencing every aspect of human life and it has salient effect on all working fields of mankind. Prathap (2024) highlighted in his paper about the norms of NEP 2020 establishing technical tools in educational institutions and focus on providing proper training to the teachers facilitating ICTs in teaching and learning.

Discussion

1. To discuss on the evolution of using digital tools on education.

Uses of 'Digital Tools' in learning might seem new, but it has a long history. From 21st century population increase has been affected education system also. With the growing population student capacities has been increase with the same pace. But over the time advancement of using digital tools has become welfarning to our education system. Technologies, such as radio, film, and television, were introduced into classrooms long before computers and each of these digital tools has significance revolutionary effects on teaching and learning strategies.

Digital Tools: Pre 20th Century

'It is important to have knowledge of the history of education technology. So, we, can better understand expectation of technology integration' (Howrad & Mozeko, 2015). From beginning 1890s to late 1920s Radio was introduced in school education and Television was come forward in late 1930s. But regional disparities have become the major challenge utilising digital tools into school education. Radio and Television have limited advantages on teaching learning practices. Over the time classroom education become necessary and priority of society therefore integration of such digital tools Radio and Television has become effective initiatives. Although set up of these digital tools logically tough and less effective to both teacher and student

Digital Tools: 20th Century

In 19th century mechanical calculator used to solve mathematic challenges. The 1980s have shown a rapid growth in use of information technology in most of school education. The idea that computers are playing an important role in life of citizen is no longer disputed. The major goal of using computers in education is international association for evaluation of education system. As a well as the availability of hardware and software are two basic needs for the development of computer in education. Late 20th century using of internet entered into human life simultaneously at the ground of education. Internet usages are essential to teachers and student to make learning attractive and informative. By the late 1990s, broadband and cable connections were replacing slow dialup internet service and at educational institution set up of broadband have become an uninterrupted source in getting internet connection.

Digital Tools: Post 20th Century

Approximately half of the school teachers who had computer and internet connection using these for improvising their teaching techniques. Also, teachers assigned students to use digital tools getting better version of every information. To achieve successful digital technology adoption and integration, teachers need sufficient support and professional development. Setting up of smart board, projectors in classroom for giving inclusive atmosphere for education to the students. It could be easier to the faculty members also in explain a topic in various method.

Scenario after COVID Pandemic

The COVID-19 pandemic has left an unforgettable mark on the education system. Due to the pandemic, offline mode is not possible for the huge number of students in the class at all levels of education. After having long time of lock down period several institutions provided policies to carry out online learning. The role of digital tools and technology become significant during pandemic continuing their studies. Mobile phones, Laptops, Computers are the major digital tools using this period enabling the learning process through lots of online platforms including Goggle Meet, Goggle Classroom, Skype, Zoom etc.

In addition to challenges were also there because using of digital tools are an expensive component. In our society there is an economic gap between urban and rural people. This divide is often based on socioeconomic factors, with marginalized groups and underprivileged communities being disproportionately.

2. To focus on using of ICT influences the approaches of experiential and innovative learning.

ICT means Information and Communication Technology. It's related to various digital tools including the internet, wireless networks, cell phones, and other communication medium (Ratheeswari, 2018). Teaching is an art and teacher is the core of teaching. The rapid changes of technology have made innovative changes in education. ICTs provides more opportunities both teacher and students in adapting teaching and learning.

ICTs offers students more time to explore the learning beyond the text books and classroom learning. ICTs uses also made changes teaching learning relationship. This changing relationship boosts students adapting innovative learning. Therefore, use of ICTs changes traditional approaches in teaching. ICTs are needed to develop good quality teaching and learning. By using ICTs in classroom students creatively and nature of discover can be optimised. They may want to discover digital tools and create study materials in their own style, thus autonomy and creativity also enhanced by ICTs. The ability to keep up with technological developments has been identified as critical factor in organisational success.

Concept of online learning has been appreciated by various academic institution as it is encouraging learning in effective way. For an example uploading a video will be reviewed by experts and used by student for content and quality. As a result of, the student associated about their increase self-confidence and able to use multimedia tools. Participating experiential learning helps the students to get technical knowledge in their core subject (Patil & Meena 2018). Therefore, ICTs become the earliest and most important educational and experiential learning environment for student which affects learning attitudes toward the process of teaching learning relationship and learning ability also. For an example QR Codes are used in text books by scanning this code may generate more opportunities to get further information as per the chapter. Experiential learning emphasises one's unlimited potential opportunities and touches all dimension of effective teaching learning: cognitive, effective and social. AI innovation becomes a new concept which has need to more research and exploration but AI would be great innovation in field of ICTs and become a powerful tool which may replicate activities of human brain. Proper practices to use ICTs in teaching learning may successfully change the monotonous style of teaching and learning and helps to make active learners.

Suggestions

The main barriers to effective technology use in the classroom include a lack of time, incentive, technological assistance, and not knowing how to implement technology in a practical manner. Therefore, the following points could be followed-

- As per NEP 2020, acknowledge the technology-based education not only in public schools but it has need to facilitate in Governmental Schools also which become so effective at upgrading teaching and learning.
- It could be more effective if sufficient training has been given to the teachers getting them comfort with technology.
- Government should emphasise investing money at all level of schools for additional infrastructure to set up digital tools.

Conclusion

Adapting technologies in the field of education is an expected phenomenon in education history. When new technologies introduced, social expectation was so high. Over time, educators and learners are getting more familiar with adapting these mentioned technical tools according to their needs in education. Here is a direct impact using digital tools relationship of teaching learning approaches by nature of accessing them. Revolution of digital tools in education, enabling learning easier by searching through a single device. Continuous changing in teaching learning practices via digital tools and ICTs is more likely to boost acquiring knowledge. Integration of ICTs in classroom enhances competency among students as well as helps to modify teaching approaches. Recently, many public schools have been upgraded teaching strategies influencing ICTs. It is the accurate time when the ground of education would be introduced by implementing digital tools and ICTs together. Integration of AI has become impactful ICTs using in education but it is not much explored and implemented till now in our country. At the end this paper is tried to highlight the evolution and continuous exploration of digital tools and adapt these tools in classroom learning. To meet today's demand of education through experiential and innovative approaches use of ICTs has become inclusive and dynamic.

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