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INFORMATION AND COMMUNICATION TECHNOLOGY (ICT) FOR TEACHERS TO CREATE DIGITAL LEARNING CONTENT

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Abstract

This era is the era of information, technology and internet i.e. this is the digital era. Modern innovative technologies have changed the structure and every aspect of our society. Innovative advanced technologies are making our life easier and more globalized. Among modern innovative advanced technologies, information and communication technology is one of the most important part, without it, we cannot imagine the dynamic existence of all aspects and dimensions of our life. Education is one of the most important aspects of human life and teaching-learning is one of the most integrated dimensions of education. The traditional way of teaching with textbooks, chalk-duster, and blackboard or only plan lectures can no longer satisfy the needs of the students in this present digital era of information and communication technology. So, for teachers, it is a big challenge to meet the needs of the learners of this present digital era. The purpose of this paper is to understand the ICT, digital learning content, and how the teachers can create digital learning content by using ICT to fulfill the needs of the students of the present digital era. Primary and secondary data is collected for this study through the bibliographic, internet search, and peer-reviewed research journals. ICT is meant a very much popular and useful instrument to create digital content for a teacher. Digital content is any content which is made in digital form, it may be texts, images, charts, diagram, audios, videos, or audio-video combined content. A teacher can create

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these various types of digital content as per the needs of him and his students but through various studies, it is proven that audio-visual content is very much powerful for students to learn in digital mode. The digital learning content connects teachers and learners effectively and offers the opportunity to learn formally and informally through using offline mode or online mode, in online mode students can learn synchronously or asynchronously. Using ICT created digital learning contents often offers to the teachers to teach huge numbers of students easily in the worldwide level and to the students to learn independently in groups or individually, to meet individual needs and to allow the students voice and choices. ICT opens new gates for learning as it helps to the learners as well as teachers to access, extend, transform, share the information, knowledge, and ideas in various communication styles. So the practical application and use of ICT for a teacher to create digital learning content are very much important.

Keywords: *Audio -visual content, Digital learning content Information, internet.*

INTRODUCTION

We are living in a globally rapid evolving digital era. The structure of our society is changing rapidly with the help of technologies. Information and communication technology is one of the major key factors in shaping new global society by bringing change in various aspect of society such as in industry, agriculture, business, telecom etc., they also bringing potential change in the entire education system. Computer, ICT –the recent innovative technologies are bringing a revolutionary change in the present education system. It gives to the learners to learn in a more appealing, inter-

esting and motivating way, as well as to the teachers to create digital learning content and to teach huge numbers of students at a time in online mode or offline mode synchronously or asynchronously. In this present digital era education is taking full benefits of ICT and internet which are enhancing and improving the entire teaching-learning process.

OBJECTIVES OF STUDY

ICT created digital content is very much essential for today's generation as this is very much digital. This paper tries to focus on the following objectives:

1. To know the concept of ICT and digital learning
2. To understand the digital learning content
3. To know how to create digital learning content by using ICT
4. To understand the benefits of digital learning content

INFORMATION AND COMMUNICATION TECHNOLOGY (ICT)

In the field of Technology, ICT stands for information and communication technology. It is comprising of three words information and communication technology. Information is a collection of meaningful data that helps the draft to draw out a conclusion and make a decision based on that. Information is very much valuable in this present digital era, without it we cannot draw the right decision or we cannot draw an appropriate conclusion.

Communication is a process of sharing information, knowledge, experiences, thoughts,

ideas feelings emotions, etc., with others through a mutually agreeable common channel. Communication can be in verbal form or nonverbal form or combined both at a time as per the needs of the sender and receiver.

Technology is an umbrella term, includes tools, techniques, strategies, methods and mechanical as well as electronic devices and instrument, media equipment inventories etc., it includes more than this these. In the field of education, Thus, ICT refers to a form of technology that creates, organizes, Stores, displays and shares or exchanges information by using electronic means or media like radio television, mobiles satellite system, computers or any other software or hardware, as well as the equipment and services, are associated with it such as email blogs chat video conferencing, etc.

DIGITAL LEARNING

Digital learning is a natural evolution form of learning-enabled transfer of information, knowledge, experiences and skills by using ICT and the internet. It uses electronic devices i.e. various newly innovative hardwires and software in the process of learning. Digital learning means the use of any dimension of educational information, knowledge, experiences and skills over the internet in digital forms. Digital learning is simply technology and internet-based learning. It incorporates many learning activities by using electronic devices and the internet in form of the digits, of which online learning is one of the important it can be synchronous or asynchronous.

DIGITAL LEARNING CONTENT AND HOW TO CREATE DIGITAL LEARNING CONTENT BY USING ICT

DIGITAL LEARNING CONTENT

Digital learning content can be termed as electronic content that includes text, images, graphics, animation, audio, video or audio-video combined, sometimes digital learning content will be single element carrying any one of the above or more than that together to display offline or online, synchronously or asynchronously using any website or digital channel by taking the help of computer and internet.

HOW TO CREATE DIGITAL LEARNING CONTENT BY USING ICT

Digital learning content is a newly arrived style of acquisition of use of knowledge primarily distributed and facilitated by electronic means, currently which depends on computer and internet but is likely evolving into systems consisting a variety of channels like wireless or safelight etc. and new innovative technologies like smartphone, cellular phone, iPad, tablet and personal digital assistants etc as they are developing and adapting.

TOOLS FOR TEACHER TO CREATE DIGITAL LEARNING CONTENTS

There are various tools as the part of ICT which can be used to create digital learning content but those tools can be divided mainly into two categories -Hardware and Software

Some Hardwires which are very much needed for teachers to create digital learning content are-

Without a computer or laptop, the imagination of creating digital learning content is not possi-

ble. There are huge numbers of digital content creating software tools but few numbers of hardware tools but hardware tools is primarily very much important for teachers to create digital learning content. Those are Computer or laptop, Graphics tablet, Camera, Audio recorder. Computer or laptop is the main hardware and graphical pen tablet, audio recorder and camera for video recording are very much useful for teachers to create digital learning contents.

Software as part of ICT can be divided into three categories which are very much needed for teachers to create digital learning content are as follows-

Creating Tools

Creating tools are very much important tools to the teachers for preparing digital learning content for the students of the present digital era. Creating tools are those tools which helps the teachers to make e-learning or digital learning content in versatile and interesting ways which is very much effective for online education. There are various types of creating tools among those most important are Microsoft office, Google slides, One note, Evernote, Online whiteboard, Etc. Others numbers of tools are there available for the teacher which can take used for creating digital learning contents but MS Office is most popular, there are a bundle of applications under MS office among those PowerPoint and word are most used by the teachers to create digital learning content. Time to time new innovative creating tools are being developed by software developers.

Recording Tools

The creating tools help the teachers to prepare digital learning content in raw forms. In the process of creating digital learning content,

sometimes teacher needs to record his computer screen for making content attractive by using graphics, pictures, animations, or with the help of a pen tablet. There are various software which helps the teachers to record his computer screen as per the teachers' choice the use of free software or paid software. Among those Camtasia screen recorder, OBS screen recorder and Snagit etc., are very popular, except these there are a number of screen recording software.

Editing or Modifying Tools

In the process of digital learning content creation, editing or modifying tools are very much important for the teachers. This is the last step in the process of creating digital learning content where the teachers use any software to modify or edit his digital content to provide the students. Here teachers remove all types of mistake which have been unfortunately done by him either at the time of creating as a raw material of screen recording and add some annotation or animation for making the content attractive interesting and effective. For purpose of editing, the teacher can use Camtasia editor, OBS, Flimora or any other software according to his choice.

These above-mentioned tools as part of ICT can be used to create effective and professional digital learning contents. In the process of creating digital learning content, first of all, the teachers take computer or laptop, pen tablet, camera and an audio recorder as hardware tools and then takes helps of software tools such as creating tools like MS Office, Google slides, OneNote, Evernote etc and the as per the types of contents needs teachers takes helps of screen recording tools like OBS, Camtasia or Snagit screencasting tools and finally

the teachers take bits of help of modifying or editing tools like Camtasia editor or flimora editor or any others software as per his choices. This how a teacher creates digital learning content to serve the students of this present digital era.

BENEFITS OF DIGITAL LEARNING CONTENTS CREATED BY USING ICT

There are very much more benefits of digital learning content for learners although there are various challenges for the teachers especially who are outdated, aged teachers because they do not have enough technical knowledge of new innovative wide scope ICT. Despite having this challenge there are numbers of benefits or advantages of the digital learning content. Those are given below

1. The digital learning content is very much dynamic, interesting, interactive relevant and useful.
2. It offers multi-divers types of content which meet the individual needs of the diverse students and gives personal attention to the students.
3. The digital learning content increases the flexibility of time that is more convenient and productive for both students and teachers.
4. The digital learning content enhances the flexibility of location by including the students and teachers from diverse geographical locations.
5. The digital learning content gives learning a new relevance to contemporary society and professional and industry practice.

6. The digital learning content provides opportunities to access and share information more easily.
7. The digital learning content can enhance the student learning experience by providing opportunities for cross-disciplinary, cross-cultural and/or cross-campus collaborations.
8. The digital learning content provides a mechanism for equal opportunity among students and teachers.
9. The digital learning content develops digital literacy skills that are increasingly required in contemporary society and workplace environments.

CONCLUSION

Education is considered as the most powerful tool to build a developed nation by creating a knowledge-based society, and ICT is the changing face of the contemporary world which can meet the ever-changing needs of the world. It is generally believed that ICT can empower teachers and learners, promote change and foster development of the nation through the education system in this present changing time. ICT created digital learning content helps to enhance the online teaching-learning by putting students in a real context and create a new educational environment. Digital learning content created by the teachers using ICT is giving the new dimension to our education, taking classroom learning next level through the facing and meeting the needs of virtual communities of learners and teachers who interact online either synchronously or asynchronously.

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