Chapter 8 Impact of Technology on Educational Patterns: Virtual vs. Traditional Pedagogy

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ABSTRACT

With innovations in technology, educational practices and expectations are changing at a rapid pace. The virtual reality on electronic devices is at a stark contrast with traditional classroom teaching and ethics. This chapter aspires to trace the changes that the use of ICT tools has brought to conventional pedagogy, teacher's adaptability, and teacher's anxiety in coping with the inclination of education toward technology. For the study, various sets of data were collected from different institutions, and then the data were observed. Apart from ICT tools, the popularity of social media elicits teachers to explore its educational use. However, the tempting distraction of this technology could make teachers anxious about its pedagogical use. Thus, the aim of this chapter will be to analyze the impact of technology on factors like school culture versus online teaching, attitude towards social media, professional development of teachers, learning goals, and content-building in the curriculum.

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INTRODUCTION

Information and Communications Technology has changed the face of education system. It is rightly said that technology has impacted every sphere of life. Education sector forms a major part of our lives and it is needless to say that technological advancements have made their way in it. Earlier it was unthinkable to conduct classes without a classroom set-up. But technology has enabled us to conduct classes from our homes which reach the homes of our students. Technology and pedagogy are closely connected through a continuous feedback loop, and it is in the integration of new technologies and related practices into existing ecologies that opportunities and challenges arise (Fawns, 2018).

The failure to meet such integration preserve traditional academic practices and values (Feenberg, 2017; Rose, 2017). Technology is neither a negative nor a positive force, rather a part of the landscape in which education is enacted. Technological "solutions", like virtual learning environments (VLEs), create pressures, implicit or explicit, to use them. Such environments make many educational practitioners unsure of their responses towards the values imparted by traditional pedagogy, which can be defined as a "pre-technology education context in which the teacher is the sender or the source, the educational material is the information or message, and students is the receiver of the information." (Mbodila, Munienge, and Muhandji, 2012)

The traditional pedagogy relies completely on the teacher. The teacher is the facilitator who instructs the students what to do, with the help of chalk-and-talk or marker-and-white board. The students depend entirely on their notebooks or books for the retention of information given in the classroom while the teacher prescribes the activities. Its limited effectiveness in teaching and learning has been explained by Mbodila, Munienge, and Muhandji (2012) in the following words:

In this method, the learner's skill, knowledge and practice is of little value, therefore teaching methods are educational and people learn what society expects from them. So the curriculum is homogeneous.

The importance of the transition towards technology-based pedagogy is intensified when the institutionalised status of physical classroom is considered. Instruction in such classrooms is an integral part of both the behavioural and the normative social structure (Hardy, 1983) of higher education. The teaching -learning environment, that is pedagogical ecology, of the traditional classroom includes a set of prescribed social roles and normative expectations that not only shape behaviour but also confer greater status and power to particular social actor. (Jaffee, 1997). The introduction of the new virtual learning environment leaves us with the question whether this will represent a pedagogical ecology that reinforces or alters these established pedagogical roles and behaviours. The mode of instructional technology is proliferating rapidly and this in turn has a transformative impact on teaching and learning (Reiser, 2001; Mc Donald and Postle, 1999)

This instructional technology, commonly termed as "the virtual classroom" (Hiltz, 1994) is defined as a video conferencing tool where instructors (teachers) and participants (students) engage with each other using the learning material. Being an online learning platform, it allows live interaction between the teacher and the student. Nevertheless, unforeseen situations like, low battery of the device or poor internet connectivity, do cause hindrance in the learning process. Even the setup of the house enabling the learning process plays a major role in facilitating the process as people engaged in online learning need a space of their own which might be a constraint in many of the houses.

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