

# Chapter 45

## ISTE Standards for Students, Digital Learners, and Online Learning

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### **ABSTRACT**

*As perceptions toward online learning shift, more educators/students are embracing and enrolling in degree programs that are offered online. As a result, colleges and universities are increasingly introducing online learning as a valued approach to delivering education to learners (Parker, Lenhart, & Moore, 2011). This paper will outline the Performance Indicators of the International Society for Technology in Education (ISTE) Standards for Students (ISTE, 2016). It will discuss the characteristics of digital learners and examples of strategies that educators can use to meet these performance goals. Experts in the field, recognize that there are still underlying concerns about online learning in relation to what constitutes the design, delivery, and assessment of effective and meaningful content that utilizes current and emerging technologies (Magda, 2018). Moreover, while there is an understanding amongst researchers and practitioners that online learning is more than just creating a digital version of a paper syllabus, more research is needed to move from theory to practice and to further explore effective learning with digital tools.*

### **INTRODUCTION**

As perceptions toward online learning shift, more educators are embracing online learning and are considering degree programs that are offered online. As a result, colleges and universities are increasingly introducing online learning as a valued approach to delivering education to learners (Parker, Lenhart, & Moore, 2011). This paper explores the most effective strategies and tools for delivering content to learners as well as the characteristics of effective online learners. As a consequence, it will identify the benefits associated with digital learners and the strategies that educators can use to meet the performance indicators of the ISTE (International Society for Technology in Education) Standards for Students (ISTE,

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2016). Experts in the field, recognize that there are still underlying concerns and barriers about online learning in relation to what constitutes the design, delivery, and assessment of effective and meaningful content that utilizes current and emerging technologies (Magda, 2018). Moreover, while there is an understanding amongst researchers and practitioners that online learning is more than just creating a digital version of a paper syllabus, more research is needed to move from theory to practice and to further explore effective learning with digital tools (Nguyen, 2015). This chapter outlines the optimal characteristics of a digital learner through the ISTE Standards for Students and explores the benefits and strategies used to deliver online learning while engaging learners.

## **BACKGROUND**

According to the International Society for Technology in Education (ISTE, 2019) the standards it produced is a framework to allow educators to rethink education and create innovative learning environments. While they are referred to as standards, and are accompanied by characteristics (or competencies) of digital learners, they are not “standard” in the strict sense. The most generalizable part of the ISTE Standards for Students (ISTE, 2016) is that they provide a framework for reflection, student choice, and the creation of personalized learning opportunities for learners. The ISTE standards push the envelope and outline opportunities for parents, teachers, and administrators to rethink traditional approaches to education at local, national, and international levels.

Through research and practice, online learning continues to be a matter of interest in the field of education. Learners typically indicate that time, flexibility, and affordability are the main advantages of online learning. Colleges, universities, and other providers of content (i.e. MOOC providers) understand that engaging/effective strategies and approaches to online learning are key to maintaining retention and ensuring that learners remain engaged and are benefitting from the learning experience (Magda, 2018).

The most commonly identified benefits of online learning include the flexibility to study anywhere, anytime, the affordability compared to the cost of traditional face-to-face courses offered on a campus, and opportunities for national and global collaboration. Beyond advantages related to time and space, online learning also provides ample opportunities for all online students to have a forum where they are expected to reflect thoughtfully by communicating and collaborating online. Online learning spaces also provide opportunities for online students to publish content more widely and to a broad range of authentic audiences.

As a result, those developing and delivering content must think critically about the choices they make when deploying the varied and unique strategies created by online learning environments and the plethora of options to deliver meaningful content in engaging ways. Cope & Kalantzis (2016) identified the following seven new learning affordances: ubiquitous learning, active knowledge making, multimodal meaning, recursive feedback, collaborative intelligence, metacognition, and differentiated learning (see Table 1). Deep reflection on these affordances and the harnessing of their potential facilitates the creation of opportunities for online instructors to address how best to utilize new and emerging technologies for teaching and learning. Cope & Kalantzis (2016) have explored transformations in the patterns of pedagogy that accompany e-learning through the seven affordances. These include the cultivation of the habits of mind for 21<sup>st</sup> century for meaning making, anywhere, any time; active knowledge creation rather than just passive reception of knowledge; the potential to make meaning via multiple modes; to facilitate collaborative intelligence via peer to peer interaction and global engagement with others; to

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