

A Personal Vision of Technology in Schools

Angela B. Burgess

Kennesaw State University, ITEC 7410

Much has changed in the classrooms in which we now teach when compared to the classrooms in which we were students. For many of us, the highest level of technology in our childhood classrooms was a calculator and perhaps an overhead projector. Despite these humble technological backgrounds, we now must embrace technology or be left behind. To paraphrase William Shakespeare in *The Tragedy of Julius Caesar*, “That we shall [embrace technology in the classroom], we know; ‘tis but the time (1599).” Consequently, as educators, we cannot reject the changes that are coming. Instead, we must examine how technology should be used in our classrooms, the purpose behind its use, and the practices that teachers and administrators should adopt to keep technology use on their terms while both supporting and strengthening school goals.

The International Society for Technology in Education was “initially focused on computer systems to support and deliver instruction; [it] now focuses on all electronic devices and systems to support teaching and learning (Roblyer, 2013).” As such, they have set forth fourteen Essential Conditions for schools, as well as standards for technology use for both teachers and students. The most important of these Essential Conditions is that technology use supports student-centered learning with “planning, teaching, and assessment centered around the needs and abilities of students (ISTE, 2009).” This means that educators must begin rethinking the way in which they present information. Students no longer passively learn information presented by a teacher. Indeed, they may never have done so to the degree imagined by some. The constructivist theory of education “presents the notion that learners...build knowledge structures in their minds rather than have the knowledge implanted by the teacher (Creighton, 2003).” Instead of employing technology only to remarket 19th century skills as 21st century skills (Richardson, 2010), schools must learn how to integrate technology effectively, in a way

that creates truly meaningful and engaged learning for students.

According to staff members at Edutopia, “Effective technology integration is achieved when the use of technology is routine and transparent and when technology supports curricular goals (Edutopia Staff, 2008).” With today’s ubiquitous use of technology, we must strive to use technology in a way that not only supports curricular goals, but also enables students to reach the highest levels of Bloom’s Taxonomy. Theodore Creighton says it best in *The Principal as Technology Leader*, “Technology that does not advance student learning has little value in the classroom, and...even ‘gets in the way’ of other types of learning (2003).” Using technology simply for the sake of using technology is not enough. Technology use should drive “creativity and innovation, communication and collaboration, research and information fluency, and critical thinking, problem solving and decision making skills (Allen, 2012).” Daily use and use for assessments should require students to interpret, apply, and create. In other words, it should transform “the way learning occurs by utilizing technology inside and outside of the classroom to engage students in their learning (Allen, 2012).”

When choosing tools to use, it is important to begin planning by asking, “What specific needs do my students and I have that (any given resource) can help meet (Roblyer, 2013)?” While directed instruction by the teacher is always going to have a place in school, it is important to consider constructivist ideals as well. “Constructivist teachers relinquish their traditional role of “sage on the stage” (the omnipotent keeper of knowledge) to become the “guide on the side” (the facilitator of experiences and opportunities for students to learn).” Instead, students should have options regarding technology integration and they should participate in constructing their own learning experiences with and about technology by being “actively engaged in creating, understanding, and connecting with knowledge (Smith & Throne, 2010).”

Kathy Schrock has assembled an amazing collection of technology tools to use in the classroom. One of the pages in her blog *Kathy Schrock's Guide to Everything* is called "Bloomin' Apps" and contains resources that support teachers and students along the full spectrum of Bloom's Taxonomy. Tools range from Apple and Android applications to Google tools to Web 2.0 tools. At the highest levels, educators have a range of options sure to fit every need. In the school that truly integrates technology, students reflect and answer a question using Mentimeter or Socrative at the end of the lesson instead of completing a paper "ticket out the door." Instead of taking a paper assessment, students create their own podcast that reteaches the material using Podomatic. After publishing the podcasts, students get feedback from classmates and even from others around the world, which continues the learning process well beyond a typical testing situation. In lieu of keeping a class journal or writing an essay, students use Blogger or WordPress to keep a formal academic blog. Not only do they reflect upon and answer a question analyzing the learned material, they read and respond to others, creating a collaborative community of learners. Others create presentations or movies using Prezi, VoiceThread, or WeVideo.

These may seem lofty goals, but they are goals shared by faculty, administration, and staff at Lambert High School. It is expected that teachers use technology in a way that fosters student growth and independence, drive and initiative, while focusing on differentiating the learning experience in ways that ensure success and exceeding expectations for all. Success in meeting these goals will prepare students "for their future in a competitive job market (International Society for Technology in Education, 2012)." Rather than resisting technology in the classroom, it is embraced and adopted as a tool to serve the *needs* of students, not just their *desires*. By focusing on how and why technology is used, the best practices of its practical

applications, and the desired outcomes, teachers are able to achieve that same measure of success for all.

RESOURCES

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