

Assignment 7 Discussion - Visuals in the Classroom

Discuss the advantages and limitations of using digital images in learning. Describe a situation in your own teaching environment where the use of visuals enhanced instruction.

As an online math instructor, I use digital images to explain abstract and complex mathematical concepts to my students in the online learning environment. Online students do not benefit from the typical instruction and learning interactions that occur in face-to-face math courses. However, it is possible to emulate onsite learning experiences in the online environment by inserting digital images in text communications (i.e. e-mail and discussion threads) with students. Digital images in the online environment become the whiteboard I use in the onsite environment. I often use a free screen capturing tool (i.e. Jing) to facilitate and enhance learning of mathematical concepts and skills. Using Jing's editing tools (e.g. text boxes, pointers, colors), I can manipulate the images I captured from my computer screen and emphasize the main points of a math topic. From my personal experiences, facilitating online math courses without using digital images would be a counterproductive learning experience for my students since they will be lacking concrete experiences of abstract concepts.

At my onsite math courses, I have been using digital images to spice up the course content. Most students in basic skills math courses typically have a predisposition of disliking mathematics. The integration of digital images in the math classroom could change the way students view mathematics and make concepts come alive during the learning process (Tubbs, n.d.). As a developmental math instructor, one of my goals is to promote awareness among my students of how math is connected in our lives. Digital images of real-life examples are used to provide real-world contexts during math instruction, which could ease students' math anxieties, make sense of what they are learning, and build confidence in doing mathematics. I want students to become actively involved in the learning process and the use of digital images is one of the means to capture students' attention to become active learners.

The large size of digital images taken with digital cameras has been one of the limitations I have experienced when using these during instruction. Due to the large size, downloading these images could take considerable time when students and instructors do not have access to fast Internet connections. Digital images can be compressed for quick downloads but only if students and instructors have access to digital imaging software. Finally, images inserted or embedded in web pages that are displayed in secure sites, such as the course management systems used by academic institutions, often pops up a security information window prompting users about the display of nonsecure items. The frequent pop ups of these windows at one point become bothersome interrupting the seamless process of viewing web pages.

Reference

Tubbs, J. (n.d.). *Digital cameras and digital images in the classroom (math)*. Retrieved on February 5, 2009 from <http://futureofmath.misterteacher.com/digitalcameras.html>.