



Assistive Technology:

Thoughts and Best Practices from a Parent's Perspective

by Carmen Sanchez

Recent news reports lamented the quickly disappearing art of cursive writing, as more students rely on keyboards. While some mourn the loss of the handwritten note, as a parent of a child with a disability, I welcome the increasing use of technology for communication because of its ability to level the playing field for students with disabilities.

My son began using technology to express himself when he was 3 years old. Now a seventh grader, his computer proficiency outpaces that of his peers and even his teachers. He first started using simple switches that would “speak” for him long before he developed his own ability to speak. He used a touch screen then moved on to IntelliKeys (overlays on a flat screen that takes the place of a keyboard) and eventually a conventional keyboard for typing on the computer. He also progressed from using a rollerball to a regular mouse. For oral presentations, he uses DynaWrite (a text-to-speech device that looks like a small keyboard) or turns on the speech functions of PowerPoint. In addition, he uses a wide variety of software programs, including Inspiration (a graphic organizer) and CoWriter (word prediction)...all while typing with essentially two fingers.

Without access to assistive technology, my son's participation in the general curriculum and inclusion in the regular classroom would have been greatly diminished. Because he uses little spoken language and has handwriting that is difficult to decipher even after painful and time-consuming effort, he would not have been able to express anything he learned. Most students, whether they have mild learning disabilities or severe disabilities, rely on assistive technology to succeed in the general education classroom. In turn, more students without disabilities are using their classmates' technology. Mobile computer and Alphasmart labs are becoming increasingly common in all classrooms, as are the use of graphic organizers and speech-to-text software. The increasing availability of

technology makes students with disabilities feel more welcome and included in the general education classroom because they no longer stand out.

Increased Impact of AT

The importance of assistive technology is highlighted by the recent authorization of the National Instructional Materials Accessibility Standard as part of IDEA 2004. What the regulation does is lay out a uniform way for textbook and other educational publishers to provide electronic versions of their materials, which in turn will be housed in a central National Instructional Materials Access Center (NIMAC) in Louisville, Kentucky. The center will provide standardized files to people authorized to obtain the files in order to provide materials for students who are blind, visually impaired, or have a print disability. Having a standard file format and housing materials centrally will make getting instructional materials in alternative formats easier and quicker. The center is expected to be up and running by the end of 2006; more information can be found at www.nimac.us.

Developers of new technologies, recognizing the ever-growing impact of assistive technology, are becoming increasingly interested in making products that have universal design elements. Universal design means making technology that is accessible to the broadest range of people with disabilities without having to make any further modification or adaptation to meet individual needs. One concrete example of universal design is my new vegetable peeler. The old one was made completely of metal and had a thin handle. In order for my son to use it, we would have to build up the handle so that he could more easily grip it. My new peeler, available at my local grocery store, has a wide soft plastic handle. Without making any further modifications, I can use it comfortably, as can my son and my mother, who has some arthritis in her hands.

The number of items that are now made with some universal design principles is quickly growing, fueled by

