From Accommodation to Accessibility: Creating Learning Environments That Work for All

Nearly fifteen years ago, Todd D. Schwanke, Roger O. Smith, and Dave L. Edyburn introduced the A3 Model as an instructional tool for accessibility and universal design. Today their model continues to provide a useful framework for examining major trends in higher education for the inclusion of students with disabilities. The model consists of three phases that describe the developmental progression of higher education institutions in this area: Advocacy, Accommodation, and Accessibility.

The second phase, Accommodation, describes most contemporary approaches to enabling campuses to include more students with disabilities. Within this phase, the focus is on compliance with legal mandates, which is often done through accommodations that meet the needs of individual students. The main problem with this approach is that the burden is placed on individual students, who have to self-identify as having a disability in order to receive services from the institution. For students who have grown up in a relatively protected K–12 environment where most decisions have been made for them by others (e.g., parents or teachers and other professionals), the transition to a system that emphasizes self-advocacy can present a significant challenge. Furthermore, about half of higher education students with disabilities report having one of the “hidden disabilities” such as a specific learning disability or ADD/ADHD. Such students may resist disclosure in order to avoid the stigma and labeling that followed them through their K–12 schooling. The result of inaccurate reporting is that not only are many students with disabilities not receiving the services they are legally entitled to, but higher education institutions may be underestimating the number of students who need support.

To move beyond the Accommodation stage and better meet the needs of students with disabilities, higher education institutions should take a more proactive approach and emphasize universal design. In the next stage of the A3 model, Accessibility, the focus shifts from addressing the needs of a single student to creating a learning environment that works for all learners. One way to move an institution into this phase is to make sure that instructional design incorporates universal design for learning (UDL) principles. UDL is a framework for inclusive education that places the burden for accessibility on the curriculum rather than on students. Although a full exploration of the UDL framework is beyond the scope of this article, a number of resources from the Center for Applied Special Education (CAST) are available for any faculty or staff members who want to learn more.

UDL was inspired by the universal design movement in architecture, but in its current incarnation, it owes more to neuroscience insights about the nature of learning and learners. UDL is based on the idea that learners show a great deal of variability in what engages them in learning, in how they perceive and process information, and in how they are able to interact with the learning environment and demonstrate their learning. To match this variability among and within learners, the curriculum has to be designed with flexibility in mind: flexibility in how students engage with the content (e.g., choice of topics and tools), in how information is presented, and in how students navigate and respond in the environment. This is in contrast to the typical course design, which relies on a single method such as lecture for content delivery and multiple-choice tests or essays for assessment.

As with universal design in architecture, UDL focuses on addressing the needs of those in the margins in order to cast a wide net and reduce the need for accommodations that target only students with disabilities. Accommodations may still be required for some students with the most significant needs, but by addressing accessibility in a more proactive way, UDL reduces the need for these accommodations. Echoing the implementation of universal design in architecture, instructional designs that incorporate UDL have a number of secondary benefits that extend beyond students with disabilities. Just as a ramp or a curb cut benefits a parent pushing a stroller as much as someone who uses a wheelchair, instructional designs that leverage the flexibility of digital tools can also be helpful for international students who struggle with the English language, students with writing challenges, and students who simply learn best when information is presented in an alternative format (e.g., visually, orally, or even kinesthetically).

The implementation of UDL and a more proactive approach to accessibility is necessary for all students to reap the full potential of trends such as the rise of online learning and attempts at alternative instructional designs (e.g., MOOCs and flipped learning). For students with disabilities, English language learners and others who have special learning needs, these trends present both opportunities and challenges. These alternatives to the traditional curriculum rely more heavily on digital materials that tend, by their nature, to be more flexible than their analog counterparts. With a digital textbook, students can adjust the font, the text size, and other parameters to customize the appearance of the content, or they can even turn on the text-to-speech function (now built into most operating systems) to receive the information in another
format that works better for them. However, this personalization of the content is only possible when it has been designed in an accessible way from the start. In other words, digital does not automatically mean accessible. For example, a PDF document that has not been scanned with optical character recognition will present itself as an image that cannot be read aloud by text-to-speech or by any of the screen readers used by students who are blind. Building in accessibility from the start allows learners to leverage supports that are part of the smartphones and tablets many of them already own, reducing the need for costly commercial software that runs on stand-alone computers in a lab setting.

Students with disabilities have more options for technology (and at a lower cost) than ever before. Realizing the full potential of the digital revolution for these students will require a fundamental shift in how services are delivered and how instruction is designed, moving from a reactive approach (Accommodation) to a more proactive one (Accessibility). Such a move not only will result in greater educational opportunities for students with disabilities but also will raise the quality of education for all learners through greater personalization of the learning environment, resulting in a richer learning experience for everyone. Building in accessibility from the start may seem like a daunting task, but it does not have to be. Campuses can start small by using the UDL guidelines¹ to redesign the course syllabus and make it more accessible. Building on this experience, faculty can continue to add UDL strategies to their teaching repertoire over time. Not only will they be growing as professionals and becoming better educators for more students, but faculty and higher education institutions will be doing the right thing by creating learning environments that work for all.

Notes
2. These resources include a free online book, Universal Design: Theory and Practice (available by setting up a free account at http://udltheorypractice.cast.org) and a UDL on Campus website aimed specifically at higher education: http://udloncampus.cast.org/home.
3. A new version of the UDL guidelines, ready for printing, is available at http://www.udlcenter.org/aboutudl/udlguidelines_theorypractice. These guidelines are explained in more detail throughout the CAST website (http://www.cast.org/).

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