

Indiana University and the Effectiveness of Kurzweil 3000 as a Reading Tool

Below is a summary on the effectiveness of Kurzweil 3000[®] and the ability of the program to mitigate the attention limitations and learning problems of a college student with learning and attention challenges.

Researchers:

Anjali S. Kanitkar, MA, MS, Associate Instructor, Instructional Systems Technology

Theresa A. Ochoa, Ph.D., Associate Professor, School of Education

Megan L. Handel, Special Education Major

Background

Students with Disabilities in Postsecondary Education

About nine percent of all undergraduates in higher education, amounting to 1.3 million students, report having a disability. This is a noteworthy percentage as it has tripled in the last two decades. More than half of students with disabilities that enroll in higher education are at risk for failure (National Council on Disability, 2003). Subsequently, only 28 percent of students with disabilities enrolled in four-year college programs will earn a diploma as compared to 54 percent of their peers without disabilities (Institute for Higher Education Policy, 2004).

Students with disabilities may be less likely to participate in general education academic classes than their non-disabled peers prior to entering college. Therefore, they may enter postsecondary education underprepared for the challenging reading, writing, and math requirements of college.

A growing number of students are entering college unprepared for the rigors of coursework due to academic limitations that include their inability to comprehend an increased volume of reading, develop effective study skills, and differentiate between essential and non-essential information.

The transition from high school to college is a challenging time for students. For students with learning disabilities (LD) or ADHD, this transition can be even more difficult. In addition to the typical concerns about academic success, campus safety, roommates, and social adjustments, there may also be concerns about disability-related issues.



INDIANA UNIVERSITY is a major multi-campus public research institution, grounded in the liberal arts and sciences, and a world leader in professional, medical, and technological education. Indiana University's mission is to provide broad access to undergraduate, graduate, and continuing education for students throughout Indiana, the United States, and the world, as well as outstanding academic and cultural programs and student services. Indiana University seeks to create dynamic partnerships with the state and local communities in economic, social, and cultural development and to offer leadership in creative solutions for 21st century problems. Indiana University strives to achieve full diversity, and to maintain friendly, collegial, and humane environments, with a strong commitment to academic freedom.

Indiana University has campuses in eight locations, including its core campuses in Bloomington and Indianapolis.

Programs for students with learning disabilities vary from college to college and from state to state. But all of these students have the same goal — to graduate with a degree that enables them to fulfill their lifelong dreams. It is these students that Ochoa, Kanitkar, and Handel believe can benefit from Kurzweil 3000 and on which they base their research.

How Kurzweil 3000 is Used at Indiana University

Enrolled students with disabilities are evaluated by the Disability Student Service office. If they meet the criteria for support, the Disability Student Service office makes a referral and approves use of Kurzweil 3000 for that student. The student then works with one of the consultants in the adaptive technology center and is provided free access to Kurzweil 3000. Kurzweil 3000 is loaded on the student's personal computer and training is scheduled through the adaptive technology center.

Implementation

Dr. Ochoa's previous experience with Kurzweil 3000 spurred an interest in further investigation into the use of Kurzweil 3000 for students in higher education. The study followed the use of Kurzweil 3000 to help with course load for a female sophomore with a family history of dyslexia and who described herself as an auditory learner. Although not formally diagnosed with a learning disability, the participant indicated having a history of reading difficulties. Because each undergraduate class required the student to read 60 to 90 pages per week, she turned to Kurzweil 3000 to manage the large quantities of content. Despite mention of reading difficulties, her academic performance at institutions of higher education has been strong. The study employed a case-study method to describe how Kurzweil features respond to the characteristics of LD and ADHD. Responses were reviewed and compared to items on the questionnaire by two of the authors, looking for commonalities between the different characteristics associated with students with ADHD and LDs and matching them to how the participant used Kurzweil.

The Results

Overall the participant's responses to the items about Kurzweil were positive. She attributed Kurzweil to improving peer collaboration and improving her grades. She said that Kurzweil allowed her to "participate fully in class discussion" as she could completely digest the reading, think about and integrate the topic's implications with previous knowledge. In addition, assignments that previously took two and a half hours, took 45 minutes using Kurzweil 3000. *"An unintended side effect of Kurzweil is that my reading speed has increased. After I passed the initial learning curve of navigating around the program, I was able to increase my reading speed from 170 to 230 words per minute. This has allowed me to finish reading assignments with more time to devote to other school projects. Additionally, when I am reading texts that are not on Kurzweil, my eyes are trained to read at a faster pace and I am proud to say my reading speed without Kurzweil has also increased."*

To read the complete research summary go to <http://www.kurzweiledu.com/research-efficacy.html>, or contact your local Kurzweil 3000 representative.

1-800-547-6747
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