Project UEB PREP

Federal Grant awarded to Special Education and Computer Engineering Departments to develop a unified eLearning braille platform.

Portland State University – A 5 year Federal Grant of $548,483 has been awarded to Dr. Holly Lawson, Dr. Samuel Sennott, and Dr. Christof Teuscher for their project UEB PREP. Project UEB PREP will develop a web-based and mobile eLearning platform to train adult braille users, current and pre-service teachers of students with visual impairments, vision rehabilitation specialists, paraprofessionals, and parents of children with visual impairments in Unified English Braille.

On January 4, 2016, the United States will be adopting and implementing the UEB code created by the Braille Authority of North America (BANA). In order to prepare for this, an estimated 286,000 working-age braille users, and the thousands of professionals who provide service and training to people who are blind and visually impaired, will need to learn UEB. BANA has indicated that the development of new training materials was one of the most pressing issues for rehabilitation agencies and institutes of higher education.

Project UEB understands the need for rich, relevant, and evidence-based content in order to gain understanding and expertise of UEB subject matter. The internet offers a variety of communication and interactive learning experiences, which can allow students to receive direct feedback and engage in authentic learning experience. Project UEB PREP’s eLearning platform appeals to the need for on-the-go availability as well as being dedicated to putting accessibility considerations at the forefront of project design, adhering to ADA and 508 compliance standards, and following accessible game design guidelines. There is an additional need to develop an eLearning platform that is sustainable. Project UEB PREP will have the ability for contributors with expertise in UEB to contribute content to the eLearning platform.
Dr. Christof Teuscher is incorporating Project UEB PREP into his current Embedded Systems Programming course. The final project of this course will have students build an Android app concentrating on the goals within Project UEB PREP. Dr. Teuscher will be directly including one or more guest speakers with visual impairment to allow the students to hear the needs for learning the new Unified English Braille code.

Project UEB PREP

Principal Investigators

Holly Lawson, Ph.D. Principal Investigator. She is an assistant professor at Portland State University and program coordinator of the Visually Impaired Learner (VIL) teacher preparation program, a multi-state program between Oregon, Washington State, Hawaii, Idaho, and Montana. She has worked in the field for visual impairment for twenty years as a teacher of students with visual impairment and orientation and mobility specialist. She has broad expertise in developing distance education materials and teaching braille in higher education.

Samuel Sennott, Ph.D. Co-Principal Investigator. He is an Assistant Professor of Special Education at Portland State University. His work forces on universal design for learning and assistive technologies.

Christof Teuscher, Ph.D. Co-Principal Investigator. He is an Assistant Professor in the Electrical and Computer Engineering Department at Portland State University. His research focuses on computer architecture and computer science, including nano, bio, and neurosciences as well as innovative approaches to adaptive learning.

Expert Panel of Consultants

Frances Mary D’Andrea, Ph.D.
Michael Fish, MA
Cheryl Kamei-Hannan, Ph.D.
Penny Rosenblum, Ph.D.
Tessa McCarthy, Ph.D.

From: http://tinyurl.com/lbq8b9g
From: http://www.brailletranslator.org/