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Digital Dharma
Education
Digital Textbooks Set to Cut Costs and Improve Education

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Digital textbooks have been in the news lately for two very distinct and important reasons. In 2007, community college text books for one year cost more than $900 and prices have soared since then. In colleges, vocational training institutions and other post-secondary schools, the alarming drop-out rates, as high as 50%, lead to tremendous wasted talent and investment. Expenses contribute to the dropout rates.

"Open textbooks" are digital documents offered online under an open-source license. They can reduce costs up to 80%. Digital versions are free, with a low-cost print option. Instructors can customize, compile and edit as per their needs. Over 1,000 professors across the US are already using open textbooks as of fall 2010.

The quality of content is another issue. Hinduism Today has covered the problematic depiction of Hinduism in middle-school textbooks. For example, teachers complain about obsolete science in current texts. Altering or building upon standardized curriculum is often a political and bureaucratic nightmare. Digital textbooks will enable an expedited updating process, allowing more fluidity in the creation and regulation of educational content.

Heavyweight textbook publisher McGraw-Hill has launched Create, an online platform that allows instructors to mix and match existing standard textbook (not open) content to fit their needs and publish customized course-readers. Flat World Knowledge, a start-up enterprise, offers a similar system with additional features for professors to edit and add their own content, including embedding video, images

and other multimedia.

The organization CK-12 is at the forefront of championing a flexible and less expensive system to create and distribute books and online content. CK-12 uses an open-content, web-based collaborative model termed the "FlexBook" to generate and distribute digital educational content to be used by K-12 public schools in California.

Post-secondary schools and universities can make the transition to digital content much faster than K-12 institutions, as their textbooks and classroom materials are not strictly regulated by state governments and school boards. Leading the way in Australia, the University of Adelaide will provide all 2011 undergraduate science students with a free Apple iPad.

States across the US are taking steps to advance open textbooks in the K-12 sector. In 2010 Illinois passed a bill that expanded the definition of textbooks to include digital textbooks, and increased their funding. Gov. Schwarzenegger of California signed legislation in October 2010 to increase the quantity, availability and practicality of digital books in the classroom.

In addition to textbooks in document form, another emerging trend in this space is free, open educational videos. Khan Academy, a nonprofit organization, has risen to international fame in less than a year by putting up short YouTube videos on a variety of academic subjects to help children around the world learn in an intuitive, fun and accessible way.

There are many concerns about this shift to digital content: accessibility, standards quality assurance, infrastructure support, copyright and teacher training. However, it is indisputable that education must become more affordable, and more in-tune with the way the "Google generation" consumes information. The days of students lugging around heavy backpacks and shelling out huge amounts of money for textbooks with a short shelf-life are coming to an end. Parents, educators, policy makers and all others interested in ensuring the best quality education for our students would do well to take note of this developing trend.

Visit: www.ck12.0rg

www.khanacademy.org

www.flatworldknowledge.com

www.create.mcgraw-hill.com