

## **NY Times Business section - Don't Buy That Textbook, Download It Free**

SQUINT hard, and textbook publishers can look a lot like drug makers. They both make money from doing obvious good — healing, educating — and they both have customers who may be willing to sacrifice their last pennies to buy what these companies are selling.

It is that fact that can suddenly turn the good guys into bad guys, especially when the prices they charge are compared with generic drugs or ordinary books. A final similarity, in the words of R. Preston McAfee, an economics professor at Cal Tech, is that both textbook publishers and drug makers benefit from the problem of “moral hazards” — that is, the doctor who prescribes medication and the professor who requires a textbook don't have to bear the cost and thus usually don't think twice about it.

“The person who pays for the book, the parent or the student, doesn't choose it,” he said. “There is this sort of creep. It's always O.K. to add \$5.”

In protest of what he says are textbooks' intolerably high prices — and the dumbing down of their content to appeal to the widest possible market — Professor McAfee has put his introductory economics textbook online free. He says he most likely could have earned a \$100,000 advance on the book had he gone the traditional publishing route, and it would have had a list price approaching \$200.

“This market is not working very well — except for the shareholders in the textbook publishers,” he said. “We have lots of knowledge, but we are not getting it out.”

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While still on the periphery of the academic world, his volume, “Introduction to Economic Analysis,” is being used at some colleges, including [Harvard](#) and Claremont-McKenna, a private liberal arts college in Claremont, Calif..

And that, in a nutshell, is a big difference between textbook publishers and the drug makers. Sure, there have been scientists with Professor McAfee's attitude — Jonas Salk was asked who owned the patent to the polio vaccine and scoffed: “Could you patent the sun?”

For the textbook makers, however, it is a different story. Professor McAfee allows anyone to download a Word file or PDF of his book, while also taking advantage of the growing marketplace for print on demand.

In true economist fashion, he has allowed two companies, Lulu and Flat World Knowledge, to sell print versions of his textbook, with Lulu charging \$11 and Flat World anywhere from \$19.95 to \$59.95. As he said on his Web site, he is keeping the multiple options to “further constrain their ability to engage in monopoly pricing.”

A broader effort to publish free textbooks is called Connexions, which was the brainchild of Richard G. Baraniuk, an engineering professor at [Rice University](#), which has received \$6 million

from the William and Flora Hewlett Foundation. In addition to being a repository for textbooks covering a wide range of subjects and educational levels, its ethic is taken from the digital music world, he said — rip, burn and mash.

Unlike other projects that share course materials, notably OpenCourseWare at [M.I.T.](#), Connexions uses broader Creative Commons license allowing students and teachers to rewrite and edit material as long as the originator is credited. Teachers put up material, called “modules,” and then mix and match their work with others’ to create a collection of material for students. “We are changing textbook publishing from a pipeline to an ecosystem,” he said.

Like Professor McAfee, Professor Baraniuk says he decided to share his material while writing a textbook.

“If I had finished my own book, I would have finished a couple years ago,” he said. “It would have taken five years. It would have spent five years in print and sold 2,000 copies.” Instead, he said, he posted it on the Web site and there have been 2.8 million page views of his textbook, “Signals and Systems,” including a translation into Spanish.

Connexions is strongest in statistics and electrical engineering — areas with technologically advanced students and a greater need to update material than, say, works on medieval history. He said there were 850,000 unique users a month, with more than 50 percent of the traffic originating from outside the United States.

“It’s anyone’s guess as to when we will break through,” he said.

One of the most popular Connexions contributors is Sunil Kumar Singh, a production engineer from New Delhi who works for the Oil and Natural Gas Corporation of India. He explains physics for precollege students, using the feedback from readers who e-mail from all over the world.

“It is a two-way process,” he wrote in an e-mail message. “I, for one, have experienced difficulty during my formal study years with the best of textbooks around.” He said the new system “gives me opportunity to respond to the editing needs all the time.”

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While these open-source projects slowly grow, the textbook publishers have entered the online publishing field with CourseSmart, a service owned by five publishers. In service for only a year, CourseSmart allows students to subscribe to a textbook and read it online, with the option of highlighting and printing out portions of it at a time.

The price is generally half of what a print book costs, a sum that can still appear staggering — an introductory economics textbook costs around \$90 online. (This semester, a student has the option of downloading a book as well — but it is an either-or choice: read online or download to a computer.)

Frank Lyman, executive vice president at CourseSmart, said that the company was created in response to changing times. “There wasn’t a lot of content and it was in a bunch of formats,” he said of past efforts by publishers. “There never was any momentum.”

There are 4,000 textbooks currently available — about a third of the market — but the goal is to cover “50 percent of the backpack.” Without being specific, he said that tens of thousands of textbooks have been read online and that 1,240 separate institutions have a student who has made at least one e-textbook purchase.

While conceding that open-source textbooks would take hold in a few subject areas, Mr. Lyman stressed that the current system would still prevail and that collaborative works online would have a hard time winning an audience.

“Of all the things that are changing, one thing is consistent — the authorship model,” he said.

“What doesn’t worry me is that leading experts will say I will write my own damn book and people will read it.”