

# Report on House Bill 4058

### Textbook Affordability

Submitted to the Oregon Legislature by the Higher Education Coordinating Commission (HECC) Textbook Affordability Work Group

**December 13, 2012** 







### **Textbook Affordability Work Group Members**

Ken Brown (Portland State University Bookstore)

Charlene Gomez (HECC)

Tony Greiner (Portland Community College Library)

Al King (HECC)

David Krumbein (HECC)

James Woods, Ph.D. (HECC)

Staff:

Alethia Miller (Oregon State University)

Sean Pollack (Oregon University System)

Cover photos from left to right: courtesy of Southern Oregon University, Western Oregon University, Eastern Oregon University,

## Report on HB 4058, Textbook Affordability

#### **Table of Contents**

1.	Introduction	4
11.	Background on HB 4058	5
<i>III.</i>	Textbook Affordability Legislation in Other States	6
IV.	Division of Recommendations into Current and For Future Study	8
V.	Public Testimony	9
VI.	Scope of Recommendations	11
VII.	Directed Topics	13
VIII.	Current Recommendations	20
IX.	Recommendations for Future Study	24
Χ.	Conclusion	27
Sourc	ces	28

### Report on HB 4058, Textbook Affordability

#### I. Introduction

The Higher Education Coordinating Commission (HECC) was directed in House Bill 4058 to:

"[convene] a work group to examine and recommend adoption of strategies for making textbooks more affordable for students at all postsecondary institutions in this state."

The group was charged with:

- Analyzing the successes and shortcomings of ORS 337.500 to 337.506, which address bundling of
  instructional materials;
- Assessing the effect of Section 112 of the federal Higher Education Opportunity Act of 2008 (HEOA) regarding textbook bundling and price disclosure for textbooks and;
- Examining lists of policy changes that have the potential of reducing textbook prices in Oregon.

The Textbook Affordability Work Group (hereafter "the work group") was convened on July 12, 2012 and held three public meetings on August 23, September 13, and October 4, 2012. Participation was solicited from students, faculty, librarians, and bookstore managers associated with Oregon's public, private non-profit, and private for-profit institutions of higher education, as well as publishers and open educational resource advocates.

In addition to this testimony, the work group conducted research on similar initiatives in other states. Summaries of this research can be found in section IV of this report.

Early in the process, it became clear that if the work group conceived of the charge with a narrow definition of textbooks, either in print form or electronically, it would not be able to address some fundamental cost drivers and make real changes in student costs. The report would be very similar to those produced by the other states where instead of addressing fundamental change, cost reduction strategies were frequently "encouraged" and information was "made available."

To this end, the work group has interpreted the HECC charge to be a broader examination of the costs of instructional materials, which includes a wide variety of print and digital materials as well as instructional services, e.g., textbooks, exam banks, course management systems, computer mediated tutorials, and lecture slides.

Following the Introduction, the report is organized as follows. Section II gives background on the bill that prompted this report. Section III describes some of the research and recommendations on textbook costs conducted in other states. (It should be noted that Oregon has already implemented many of these recommendations.) Section IV describes the work group's rationale for dividing recommendations into parts, those that can be implemented now, and the topics that require additional investigation. This division was necessary because of the extremely short deadlines relative to those in other states. Section V summarizes the public testimony given in the three hearings. Section VI describes the general incentives problem that can

cause inefficient instructional materials choices. Section VII describes the work group's recommendations on the topics that members were specifically asked to report on in HB 4058. Please note that some of the recommendations have been embedded in the current recommendations that follow in Section IX and the topics for future study in Section X.

#### II. Background on HB 4058

HB 4058 was passed by the Oregon Legislature and signed into law on April 11, 2012. The Bill's purpose and intent was:

"to examine and recommend adoption of strategies for making textbooks more affordable for students at all postsecondary institutions in this state."

The Higher Education Coordinating Committee empanelled the Textbook Affordability Work Group to fulfill the charge of HB 4058 in July of 2012.

In addition to producing a set of recommendations, the work group was charged with studying several existing state and federal laws relating to textbooks:

Sect. 1(2): The Higher Education Coordinating Commission shall analyze the success and shortcomings of ORS 337.500 to 337.506<sup>2</sup> and the textbook affordability provisions of the federal Higher Education Opportunity Act of 2008<sup>3</sup> regarding textbook bundling and price disclosure for textbooks.

Other specific charges are summarized here:

Section (4) specifies that HECC is to "deliberate upon the recommendations" of the work group; the recommendations will be forwarded to the Higher Ed committee of the Legislature before November 1, 2012. 4

Section (5) mandates that "[a]ny strategies recommended in the report must respect the principles of academic freedom, maintain quality of instruction, foster student success and respect copyright law."

Section (6) requires that the recommendations of the HECC working group must be strategies that require actions or rule adoption by the State Board of Higher Education, Board of Education, and strategies that require new or additional legislation.

<sup>&</sup>lt;sup>1</sup> http://www.leg.state.or.us/12reg/measures/hb4000.dir/hb4058.en.html

<sup>&</sup>lt;sup>2</sup> **337.500** contains the definitions ("higher education institutions" etc.) <a href="http://www.oregonlaws.org/ors/337.500">http://www.oregonlaws.org/ors/337.500</a>. **337.506** requires that that textbook bundles also be offered separately, and disclosure of price of for separate sale <a href="http://www.oregonlaws.org/ors/337.506">http://www.oregonlaws.org/ors/337.500</a>.

<sup>&</sup>lt;sup>3</sup> Section 112 of HEOA 2008 is an amendment to Part C of Title I (20 U.S.C.1015) by creating and adding section 133 to the existing part of 20 U.S.C 1015. An analysis of Oregon compliance with HEOA 2008 is presented below in section xx. <a href="http://www2.ed.gov/policy/highered/leg/hea08/index.html">http://www2.ed.gov/policy/highered/leg/hea08/index.html</a>; See also <a href="http://www.gpo.gov/fdsys/pkg/PLAW-110publ315/pdf/PLAW-110publ315.pdf">http://www.gpo.gov/fdsys/pkg/PLAW-110publ315.pdf</a>

<sup>&</sup>lt;sup>4</sup> A preliminary Executive Summary for this report was submitted to the HECC, accepted, and passed on to the Legislature on November 1, 2012.

#### III. Textbook Affordability Legislation in Other States

Many states have investigated relieving student textbook costs in recent years. The recommendations range from increasing awareness among faculty members at postsecondary institutions, to creating textbook buyback programs at campus bookstores. The various state task forces and commissions have produced recommendations that employ language of persuasion and information dissemination--e.g. encouraging faculty to consider the cost of textbooks--while other recommendations offer suggestions for university campuses to make specified changes. Due to the wide range of institutions, from community colleges to private independent universities, states had difficulty providing recommendations that would benefit all postsecondary institutions. Below are the summaries of findings and recommendations made in other states:

#### Arizona:

Arizona universities reported addressed recommendations by a task force on textbook costs. The results were that some college bookstores were able to produce a textbook rental pilot program, while others were not. Campuses were able to produce a brochure describing the concerns with purchasing new textbook editions.

#### Florida:

The Office of Program Policy Analysis & Government Accountability found that Florida's postsecondary institutions are using mechanisms to contain textbook costs. These include faculty guidelines that require professors to take student costs into account, and providing access to textbooks at public libraries.

#### Illinois:

The Illinois Board of Higher Education in conjunction with the Illinois Community College Board examined the feasibility of creating textbook rental programs in universities, finding that rental programs can be an effective cost-savings measure for low-income students. However, faculty members were concerned that rental programs would have textbook adoption periods lasting too long, especially when there is concern about faculty turnover.

#### Kentucky:

In Kentucky, the Textbook Commission had an easier time producing recommendations to alleviate K-12 textbook costs compared to postsecondary institutions. Due to the extensive market in college textbooks (via publishers, online, and in-store), much of the material faculty purchased cannot be regulated by the Textbook Commission. "While faculty members select the textbooks and supplementary materials, it is the students who actually make the purchases..." (Kentucky Legislative Research Commission, Report 356 pg. vii).

#### Maryland:

In Maryland, the textbook affordability summit reported that electronic textbooks, longer edition cycles, and subscription-based textbook models would ultimately reduce the costs of textbooks. Rental pilot programs were being evaluated and discussed; however, requiring public institutions to develop and implement specific textbook practices could induce new university costs.

#### Minnesota:

The Minnesota Office of Higher Education recommended that faculty members at postsecondary institutions increase their efforts to understand how textbooks costs affect their students, and asked that textbook orders be placed as quickly as possible. Faculty were also encouraged to not have supplemental material ordered by the bookstore if it will not be used in class. Faculty were asked to share information about textbook options with students. The University of Minnesota has set up a website with a goal to find a point for all open source textbooks nationwide. This website includes reviews, so that faculty who want to explore switching to an open source text can find and assess them easily. The URL for this site is https://open.umn.edu/opentextbooks/

#### Mississippi:

The Associate Student Body Textbook Taskforce at the University of Mississippi wants postsecondary institutions to hold their faculty members accountable when choosing textbooks, and requested that universities produce incentives for faculty members to observe the textbook deadline implemented by the bookstore. One incentive is having faculty evaluation forms assess the professor's textbook choice and the amount of time given to students.

Report of the textbook taskforce in Mississippi identified that major problems concerning textbook affordability were: selection base, availability, pricing transparency, and turnover between editions. Recommendations included having Institutional Executive Officers sign a unified letter, creating open forums for students to discuss textbook options, and offering library reserves.

#### North Carolina:

The University of North Carolina (UNC) reported that progress is being made on multiple UNC campuses to ensure a guaranteed buyback or rental book offered for required textbooks in introductory postsecondary courses. Communication between faculty, students, bookstores, and publishers has been the key element to making textbooks affordable on campuses.

#### Pennsylvania:

The College Textbook Policies Advisory Committee directed their report to the Pennsylvania State Board of Education with a series of recommendations for improving the affordability of textbooks statewide. They provided recommendations for the six legislative directives issued to their committee. One recommendation was to have the Pennsylvania Department of Education develop and host an electronic information depository. This would allow faculty members to provide access to textbooks and course materials for free. Another recommendation worked to hold faculty members accountable for their textbook choices by evaluating them on their course material selection, while effectively reporting this information to the department chair. The intent is to ensure that faculty members are held accountable for their decision-making regarding course materials.

#### Federal Level:

At the Federal level, the Advisory Committee on Student Financial Assistance advocated for increasing textbook resources at libraries, implementing textbook rental programs, and improving financial aid policies concerning student supplies and textbook costs. Financial aid measures include allocating emergency vouchers, loans, and need-based grants; all of these are designed to directly target student textbook costs.

### **Division of Recommendations into Current and For Future Study**

#### IV. Division of Recommendations into Current and For Future Study

As the work group assessed statewide and national responses to textbook affordability concerns it became very clear that there were far too many issues to explore in the three months available, and that the scope of our recommendations would extend from the level of legislative funding requests to the level of campus policy.

Priority was given to those topics that we were specifically asked to investigate in HB 4058. These are addressed in the "Directed Topics." Many of these directed topics were either not feasible or are already being implemented in Oregon and focused on the final mile (for example, the cost after textbook adoptions had been made by faculty members), or on a scope that would only be effective on a national scale (for example, bundling).

Our current recommendations focus on the two ends of the decision making process: the choice of instructional materials made by the instructor and the timeliness of that decision. These recommendations were intended to be easy to implement and low cost, relative to some of the more far-reaching topics that we recommend for further study; e.g. changing the fee structure across OUS institutions such that a fraction of instructional materials costs are included in fees.

#### V. Public Testimony

At the public meetings held in August, September, and October of 2012, the work group heard testimony from a number of different groups and stakeholders. Some key themes and ideas are summarized here.

**Publishers:** Cengage and the Association of American Publishers (AAP) disputed the assertion that textbook costs are rising precipitously, citing data showing cost decreases, or increases lower than the Consumer Price Index. Both Cengage and AAP noted how quickly the technology surrounding educational materials and publishing has changed, and that faculty and students are demanding a broad array of services (software, online supplements and applications, for example) that act as cost drivers. Cengage and AAP also noted the need to focus on quality of materials, as well as price.

**Libraries:** The evidence on library reserves is mixed, currently. Experiments and pilot programs are underway in Oregon. Some institutions (North Carolina State) report great success. Where library partnerships with departments and bookstores are close, there seems to be a good fit. Libraries must be willing and able to take on the extra administrative and service duties such programs require.

**Bookstores**: Bookstore operators noted that the cost drivers of textbooks and instructional materials were not of their making. PSU's bookstore reported that all OUS institutions currently have rental programs in place, and all are in current compliance with HEOA's reporting requirements. Finally, bookstores identified faculty non-compliance with textbook ordering deadlines (at the institutional level) as a major controllable factor in textbook prices.

**Faculty:** The work group was unable to get significant faculty participation at the public meetings. Faculty groups were contacted, but because most of the work was done during the summer, it was difficult to arrange faculty testimony. Portland Community College was a notable exception, as two faculty members reported on PCC efforts to control textbook costs and to create new open educational resources for Math 115. If nothing else, the work group learned that local efforts are already underway, and it would be advisable to spend more time learning about the efforts of campus level individuals and groups to control costs by a variety of means.

Students: The work group heard testimony from both individual students and student focused groups, such as the Associated Students of PSU, OSPIRG, the Oregon Student Association, and others. All students who testified reported spending between \$200 and \$500 per term on books, and financial aid awards typically do not cover these costs. All reported that they tried to mitigate those costs where possible by purchasing used, renting, or shopping on secondary markets. But when faculty routinely choose new editions, or do not submit their selections in a timely manner, their efforts to economize are futile. OSPIRG in particular made specific policy recommendations, including regulation of the marketing of textbooks, and the facilitation of more open educational resources.

**Open Educational Resources:** The work group heard testimony from Cable Green of Creative Commons and Jay Cohen of Textflow Media. Dr. Green in particular pointed out how out of step the textbook market is with other content distribution industries. What is needed, according to Creative Commons, is the

equivalent of an iTunes or Netflix or educational content, a new modality that offers access to high-quality digital content for a cost that reflects the economics of digital reproduction. Jay Cohen of Textflow Media gave an enlightening demonstration of a new open source digital content creation model that leverages existing Internet and open source architecture to create customizable educational resources.

### VI. Scope of Recommendations

As noted in the Introduction, restricting our attention to textbooks without taking into account the interconnections between textbooks, lectures, course management systems, availability of teaching assistants, and evaluation instruments would be counter-productive. Faculty make different choices—textbooks and other instructional materials—depending the availability of other resources.

Faculty textbook decisions must be considered as part of a whole system of instructional materials that includes:

- textbooks:
- exam banks;
- automatic grading systems;
- technical support;
- lecture notes; and
- classroom technology

Some of these are clearly under control of the faculty member, while others are choices made by academic departments or the larger institution.

If instructors have large classes and no teaching assistants, they are likely to conduct assessments with multiple-choice tests. If they have access to teaching assistants, they may change this strategy and include term papers or class projects. If the university provides access to a high quality course management system (CMS), they may make use of that for homework and content. If the university does not, they may require students to purchase access to one of the commercial course management systems.

Institutions make decisions about class size, instructional support, classroom technology, and course management systems. Instructors use these constraints to construct a student evaluation and content delivery plan—including textbooks. Students are responsible for any additional costs generated by those plans, for example, textbooks and online subscriptions.

It is the intent of this work group to affirm the right of faculty to make their own choices regarding instructional materials, but to also call attention to their obligation to consider the final cost to students and the state as they make those decisions. Our recommendations are directed toward the end goal of creating a better alignment of incentives for institutions, bookstores, faculty, and students.

#### Incentives in Instructional Materials Choice and Use

Misalignment of incentives is a classic institutional problem that repeats itself throughout our economy. Faculty choice of instructional materials is but one example.

Perverse incentives focused on just one benefit, at the cost of others, can produce either a lower quality educational experience for the same expenditure or higher costs for the same experience. For example:

- A university-provided Course Management System that the faculty do not use is a waste of resources that increases total costs;
- The extra \$100 required for a text that was chosen because it has marginally better coverage of one topic is money that could have been better used for one-on-one tutoring;
- Machine-graded multiple choice tests are rarely the best student assessment, but given the constraints
  of large class sizes, no technical support and little grading assistance, this may be the best that can be
  done.

Misaligned incentives account for the persistent gap between the intention to provide the best educational experience, and the unnecessarily high final costs of chosen instructional materials.

Maximizing both faculty choice and student benefit without creating a vicious cycle of cost increases would require several conditions:

- Better information and motivations for faculty to account for incremental costs, and benefits to students in choice instructional materials;
- Strong incentives for faculty to place textbook orders in a timely fashion;
- Access to more robust low-cost and open educational resources;
- Better agreements with publishers and content providers that allow both institutions and publishers greater certainty and clarity of their anticipated needs for both print and digital materials; and
- Stronger coordination at the system (OUS) and state level for digital content initiatives.

Each of the work group's recommendations for implementation and further study (sections VIII and IX below) are made with a view toward creating or encouraging these conditions.

#### VII. Directed Topics

#### a. HEOA 2008

A renewal of the Higher Education Act of 1965, the Higher Education Opportunity Act of 2008 contained a provision for reducing textbook costs by making more information on editions and prices available to students.

Sec. 112 of the HEOA 2008 Concerns "Textbook Information"

"(a) PURPOSE AND INTENT.—The purpose of this section is to ensure that students have access to affordable course materials by decreasing costs to students and enhancing transparency and disclosure with respect to the selection, purchase, sale, and use of course materials. It is the intent of this section to encourage all of the involved parties, including faculty, students, administrators, institutions of higher education, bookstores, distributors, and publishers, to work together to identify ways to decrease the cost of college textbooks and supplemental materials for students while supporting the academic freedom of faculty members to select high quality course materials for students."

HEOA 2008 contains a number of provisions to encourage transparency in pricing, and (un)bundling options, similar to OR 337.506

Perhaps most interesting for this work group are the provisions that mandate:

- disclosure of the price for the college bookstore, and the retail price of the item for the general public
- disclosure of the ISBN for all recommended and required materials (presumably to enable searching for the same edition from online vendors, resellers).

An informal study of OUS and Community College institutions and their bookstores indicates that timely submission of textbook orders (which enables compliance with HEOA Sec.112 provisions) is uneven across institutions and departments due to a number of factors. These include:

- A lack of uniform textbook adoption policies;
- Last-minute faculty hiring and;
- Few if any means of ensuring faculty compliance with the law.

According to the bookstore managers who were consulted as part of this work group's research, late ordering on the part of faculty is a primary driver of costs.

When the required instructional materials are ordered mere days before the start of the term, ISBNs cannot be published on the bookstore's website or other publicly available forum in time for students to search for lower cost options. In public testimony, students clearly expressed that they cannot avail themselves of the existing used and lower-cost textbook markets without sufficient lead-time to research those options.

A policy mechanism that can reduce this scale of this cost driver is described in section IX of this report. The work group recommends this or a similar mechanism be adopted as policy by the State Board of Higher Education, and recommends adoption

by community colleges through the Oregon Community College Association (OCCA), which provides advisory services to Community College Boards.

#### b. Bundling

Of the directed topics, bundling was the most difficult to address given the time constraints imposed on the work group, available expertise, and the need to limit the scope of our investigation to Oregon.

HEOA 2008, section 112 provides that any publisher who offers textbook "bundles" (two or more instructional materials sold as a single unit) must also offer these same materials separately.

ORS 337.506 makes the same provision regarding textbook bundles as HEOA 2008. ORS 337.506 further provides that any publisher of textbooks must also disclose the availability of textbook items for separate purchase, as well as in bundles.

Note that in both cases there is no statement about the pricing of the bundles and the separately available items. The bundled items typically have a lower price than the sum of the individual components.

Bundling like this is most effective, from the seller's point of view, when purchasers have diverse opinions about the value of the bundled materials. In the context of learning materials, this means that it is effective if, for example, some of the students value textbooks very highly and others value workbooks more highly.

Publishers are very adept at pricing products and bundles of products. These practices have, in the past, been found lawful and not in violation of the of Section 1 of the Sherman Antitrust Act or Section 3 of the Clayton Antitrust Act, but recent changes in what was being sold may open this practice to new action.

Ten years ago, the item being sold was a textbook, or a textbook and a workbook. Each of these items is subject to the first sale doctrine. The publisher's rights are exhausted after sale to the student. The secondary markets and libraries can provide a safety valve, allowing students to purchase used books from someone other than the publisher, and examine the material on a short-term basis.

Modern publishing has moved beyond the first sale doctrine and is now a web of services. Instead of purchasing a textbook, students have a licensing agreement that gives them access to the book on-line for six months. Instead of purchasing a workbook, there is another licensing agreement to have access to a publisher-managed CMS. Neither of these are covered under the first sale doctrine, and the traditional safety valves of the secondary markets and libraries don't exist.

While there is no clear need for a change to Oregon law, what is required is a party willing to test the legality of bundling in the new environment of end user agreements on educational services. Such an entity should be sought out.

#### c. Statewide bulk purchasing of textbooks

The task force recommends no legislative action on this matter. The managers of four different college bookstores attended the September 13 hearing at the State Capitol. When this possibility was brought up, the bookstore managers were unanimous in saying bulk purchasing would not lead to a reduction in final textbook costs.

Whatever savings could be achieved by buying more copies of a single title for all institutions would be lost because of several factors. First, staff would need to be hired to coordinate the orders between the college bookstores. Second, to get the best discount from publishers, the books would need to be shipped to a central location. Those shipments would then need to be taken out of the original boxes, counted, repackaged, and re-shipped to their final destination. Returns of unsold books would have to go through a similar process. Then bills and accounts would need to be reconciled. Whatever savings would be found in a bulk purchase would be lost in administration.

#### d. Statewide used book exchanges

The work group does not recommend the legislature set up a statewide used book exchange. Work group members discussed this option among themselves, and verified through a convenience survey of a hundred students that there already exists a robust online and 'brick and mortar' market to buy and sell used textbooks. Examples of online sites include Amazon, Craigslist, Half.com, and Chegg.com. One of these vendors, CampusBooks.com, also offers a free service showing students where textbooks may be obtained from local libraries or bookstores.

For 'Brick and Mortar' bookstores, there are already wholesalers such as Nebraska Book Company that provide used book sale and buyback programs. Nebraska Book Company advertises that it has an inventory of 6 million textbooks that are sold to 2,500 college bookstores throughout the nation. Campus bookstores have also long held their own used book buy-back programs.

The work group saw no benefit in adding another option to this robust market.

Used book sales are complicated by the adoption of 'Custom Edition' texts. These books typically existing textbooks in which some of the chapters or material is removed to suit the educational needs of the instructor. While this sometimes reduces the initial cost of the texts, it effectively limits the resale market to that individual institution, or even future students of a particular instructor. Section IX, 'Recommendations for Future Study', discusses the problems of Custom Editions in detail.

# e. Use of lower cost instructional materials, such as open source textbooks and other open source materials

There are several organizations that provide open source, downloadable textbooks for various general studies courses, typically (but not always) taken by college students in their first and second year. Most of these organizations provide texts and supplemental materials, such as study guides, practice problems for math and sciences and similar materials. Nationally, instructors have had concerns about the quality of many of these free and low cost materials, and only a small percentage of instructors have chosen to use open source textbooks.

Several collections show promise. The list below should be considered representative rather than comprehensive.

**OpenStax** (http://openstaxcollege.org) is supported by Rice University, the Gates Foundation and the William and Flora Hewlett Foundation. These deep pockets are allowing them to develop high-quality, peer-

reviewed texts that are available as open source materials, meaning they can be freely adapted by faculty for use in their own classrooms. OpenStax also sells printed copies. Currently however, only two books are available: Physics (\$50 for a printed version) and Sociology (\$30).

Flatworld Books (http://www.flatworldknowledge.com/), which until recently, had the model of free online textbooks supported by the sales of printed versions of these books at \$20-\$30 each. This business model did not work and Flatworld dropped its free ebook offer in November of 2012. It remains to be seen if the company can be supported by print textbook sales. Flatworld says its materials have been adopted by "4,000 classrooms in 2,000 schools."

California and Washington recently passed laws to help create and provide free access to open source textbooks for common lower-division courses, and to create an online library to provide them to the public. The California program has generated a lot of press, and this awareness might prove to be the "tipping point" that will lead to more common adoption of open source texts. However, there are concerns about whether the money to launch the California projects will be found, as the laws require that private funds be raised to equal the amount allocated by the state before the program goes into effect and authors are hired to write the textbooks.

Washington's "Open Course Library" (https://sites.google.com/a/sbctc.edu/opencourselibrary/) is organized more by course than book. It is further developed than California's system, but should not be consider a mature product. As of November 2012, there are 42 courses available. Career and Technical Education texts for Electricians and other fields are under development, but not yet available.

Except for the two publications from OpenStax College, the quality of the texts examined was erratic, and the materials were sometimes difficult to manage. At this point, it is difficult for the work group to recommend that Oregon commit resources in this area. However, there is a strong possibility for the future, and the topic should be revisited in a few years.

The work group's recommendations on this topic are embedded within section IX, "Other Incentives and Mechanisms to Encourage Faculty to Reduce Costs", and in the list of topics that should be explored in the future.

# f. Promotion of instructor-created open source textbooks by Oregon faculty or teams of Oregon faculty

Authoring books is already a digital process. It is technically possible to simply make any newly published book or other instructional materials available electronically.

University staff could be employed with contracts that specified compensation for the production of the educational materials, giving the academic institution royalty free use for current students, while the faculty member retained copyright for use elsewhere including publication with a creative commons license.

The HECC can provide the Legislature, OEIB, and the State Board of Higher Education a valuable service to be a focal point for examining this potential initiative in cooperation with OUS, private colleges, faculty,

students, and publication professionals.

Once again, this work group's recommendation may be implemented at several levels. The legislature may provide funds for this activity. The Oregon Education Investment Board (OEIB) may consider this to be a cost reducing educational investment or the individual institutions may find this a better way of managing the costs associated with financial aid. The HECC may be the proper place to coordinate this activity to maximize the benefits to the state.

#### g. Use of statewide or campus-wide licenses for textbooks and supplemental materials

While statewide licenses for textbooks and supplemental materials have the same problems of bulk purchasing of textbooks, there is a real opportunity to save student dollars by having the institution purchase a license for an ebook version or a text, and accompanying supplemental materials, or just licensing access rights to the supplemental materials. (Study guides, video tutorials, and the like.)

Supplemental materials are often bundled with textbooks, and while they have value as a teaching aid, they can be expensive. Many of these materials are only available online, requiring access through a barcode. While Oregon law requires that items in textbook bundles be available for separate purchase, there is no provision to make sure the prices of the individual parts need to be reasonable, or reflect in any way the cost of a bundled package. In addition, because access to online supplemental materials cannot be transferred to future users, the students cannot recoup any part of this investment by selling the access rights to another.

A solution to this problem would be for the institution (college, university, or academic department) to license access to a text and/or online supplemental materials over a period of years. Students who take the course can then be given a barcode to access the material over the term. At the end of the term, this access is transferred (via barcode or login) to a student taking the class in the next term. If the institution is unable to pay for the access outright, financing could be provided by having the students pay an additional fee for the class, similar to what is done with laboratory sciences. As long as this fee is less than the cost of the current licensing system, the students would save money. Textbook publishers may find this offer attractive because they would be guaranteed that their text would be used for several consecutive years.

Western Governor's University (<a href="http://www.wgu.edu/">http://www.wgu.edu/</a>), an online institution based in Utah, follows this practice for many of its courses, using a vendor called CourseSmart. At Western Governor's University, access to these materials is included in tuition and fees. CourseSmart (<a href="http://www.coursesmart.com/">http://www.coursesmart.com/</a>) is a joint venture owned by five major publishers, Pearson, Cengage Learning, McGraw-Hill Education, John Wiley & Sons and Bedford, Freeman and Worth Publishing Group (Macmillan). It provides ebook versions of commonly used lower-division academic texts.

It is important to note that Western Governor's is a private not-for-profit university, and so details of the financing between them and CourseSmart are not public information. Still, the idea has merit, and should be explored. The Oregon University System and Community College Board (or a potential state agency of postsecondary education) should consider offering grants to schools that want to try this approach.

In section X, the work group proposes to make a fuller investigation in the future.

# h. Use of shared online materials; and Creation of a statewide central repository allowing instructors to locate and use free or low-cost materials

The University of Minnesota has taken on this task, launching a product called the "Open Academics Textbook Catalog." (https://open.umn.edu/opentextbooks/). To be included in this catalog, items need to be openly licensed (Creative Commons or similar organizations), complete, available for adoption outside the author's institution—and because many students prefer print editions—available in print. Because the quality of open resource material varies, Minnesota pays its instructors \$500 to write detailed reviews of online course materials. A count of materials linked through the catalog had a total of 78 items. Give the cash incentive to review, it is surprising that only six of the titles had been reviewed, although these reviews were useful. (For example, the review of a FlatWorld books Psychology text mentioned that it had typographical errors, the links to some videos did not work, and the printed version used by the reviewer fell apart before she finished reading it.)

Given that this project was launched just six months ago, (May 2012), and has the support of a major university, the work group thinks it best to let this project have a chance to develop, with links to more of these materials, and let more reviews be written.

#### i. Use of textbook rentals

Textbook rentals may be an effective method of reducing the cost of instructional materials for some but not all classes. The instructor's choice of content delivery must be very textbook centric and not include publisher provided CMS or other licenses as a requirement for evaluating student learning.

It is also only effective if the student's preference is to not keep the text as a reference. This means that rental is ideal for many lower division and general education courses but not for upper division courses within a major. The textbook must also be frequently used on a term-to-term basis, otherwise renting is virtually the same cost to the student as purchasing.

There are many for-profit textbook rental services, e.g., Chegg and Amazon, with excellent coverage of the major publishers. In addition to these national services, all OUS campus bookstores have rental programs. As was mentioned in the section on bundling, this is another safety valve that the first sale doctrine allows, giving students access to textbooks from a source other than the publisher.

While the work group recommends no action with respect to encouraging the use of textbook rentals, we want to emphasize the fundamental legal underpinnings of this market. The long-term survival of this market depends on the continuing use of traditional textbooks rather than the model of licensing access to material that the publishers are actively pursuing.

#### j. Facilitation of peer-to-peer textbook sales

Peer-to-peer textbook sales are an old tradition in colleges and universities. Students post flyers of the books they have for sale, and utilize Craigslist and other online sources to accomplish the same purpose. On occasion student unions and student governments will try to organize or coordinate peer-to-peer sales, but according to task force member Ken Brown, such programs soon discover the difficulties in handling money and keeping track of inventory and sales. They are typically short-lived affairs.

Some college bookstores do have a facilitator role in peer to peer exchanges, for example Clark College in Vancouver WA, and the University of Wyoming. These essentially serve as the platform for online sales advertisements. Both bookstores make it clear that they are not responsible for accuracy or condition of advertised texts. A software solution proposed by a group at City University of New York has the goal of helping the sale of 1,000 books per semester between the students of New York City's total of 250 colleges and universities. If a program in academically dense New York has a goal of helping sell 4 books per college per term, applying a similar situation to Oregon seems pointless.

#### k. Use of print on demand services for book publishing (Ken)(Jamie Ghostwriting)

Print on Demand (POD) services exist at Portland State University and other institutions. POD has high startup costs and may not reduce costs to students. Publishers maintain the power to set prices and, absent a long-term commitment to drastically lower prices, POD texts are frequently priced the same as traditionally printed books.

This is a classic "holdup problem." One party, in this case the publisher, is able to capture most of the cost reduction benefits of another party's investment, in this case the bookstore, after the other party commits to the investment.

At the Portland State University bookstore POD services were originally established but few publishers wished to participate. Royalty rates were set to nearly the price of a new book printed by the publisher. The end result was no cost savings for students, higher costs for the bookstore, since they provided the printing services, and higher margins on sales for the publisher, since they no longer faced printing costs.

Individual bookstores, such as the Portland State University bookstore, cannot profitably operate a print shop with the low margins demanded by the publishers after the original agreement. It may be possible for POD to survive if the POD center is a larger, regional entity.

# 1. Partnering with other state, regional and national organizations in adopting textbook cost-savings strategies

The work group heard testimony from the Oregon Alliance of Independent Colleges and Universities ("The Alliance"), representing nineteen of the state's not for profit independent colleges. Private college students across the state and country face the same instructional material cost pressures as public institution students. Alliance President Larry Large stated, "Alliance institutions are prepared to participate in conversations and programs that address the rising cost of textbooks." Moreover, numerous regional and national initiatives are underway regionally and nationally. The work group could explore partnerships of this nature, with more time.

#### VIII. Current Recommendations

The Textbook Affordability Work Group's recommendations are made after extensive discussion and research; more remains to be done. In general, we find very few specific points for new legislation, but stronger incentives for faculty, departments, and institutions to comply with existing legislation (particularly HEOA 2008) may be warranted (see Recommendations b and c).

The work group also finds that the current and emerging policy environment (the creation of a "seamless" P-20 state system, the adoption of Common Core, 40/40/20) for education may soon require a more coordinated approach statewide for the provision of instructional materials for high-enrollment required classes at the upper secondary and early postsecondary levels.

Coordination is essential given the different expectations of academic freedom for secondary and postsecondary instructors. In secondary institutions, instructional materials are most frequently fully specified by the school district. In postsecondary institutions where the same classes are taught, the instructor commonly has full control over the choice of instructional materials.

If such coordination were to be implemented, digital and open educational resources should important components of that effort. OUS, HECC, the state Department of Education, and the proposed state Department of Postsecondary Education would likely be the key organizations to begin that conversation.

Our present recommendations follow.

#### a. Partnering on Other Open Source Initiatives

Research needs to be coordinated with other states that are looking at the same issues. As noted above many states have undertaken efforts that are similar to Oregon's. More time is needed to look into these efforts.

#### b. A Proposed Policy Mechanism for Ensuring Greater HEOA Compliance

While late textbook orders may seem inconsequential to the cost of textbooks, they are in fact a significant cost driver. Textbook prices, particularly used textbook prices, vary from day-to-day and are seasonal, with price spikes at common times for semester and quarter schedule schools. These spikes are the result of simple supply and demand. Many purchasers entering the market at one time will push up textbook prices.

Students have developed strategies to avoid purchasing at these peak prices but each of these strategies requires significant lead-time. When students find out about the required text at the last minute, they are forced to purchase textbooks when prices are highest.

It is the considered opinion of this work group that there are insufficient incentives for faculty and their academic units to submit textbook orders in a timely fashion. As noted above, timely textbook orders allow

full HEOA compliance, thus "decreasing costs to students and enhancing transparency and disclosure" of the price of instructional materials.

A 2010 OUS report found OUS institutional compliance with HEOA Section 112 "to the maximum extent practicable." 5

In the interval since that report was published, campus bookstores and other policy advocates have continued to study this issue and propose new solutions. While full academic unit-level compliance with HEOA provisions may not be achievable, this work group has concluded that more can be done now that policy makers have access to several years' worth of information regarding compliance.

The current policy of institutional responsibility is ineffective. Consultation with faculty representatives showed that mandatory faculty level responsibility would also engender resistance.

The work group recommends that a policy similar to the one below be adopted by the State Board of Higher Education and that communication be made with the Oregon Community College Association and other Community College leadership groups to encourage adoption by member boards. Additional communication with The Oregon Alliance of Independent Colleges and Universities should be made to encourage adoption of similar policies in the private college sector.

The sample policy is intended to create a set of default textbook adoptions at the lowest level possible—the academic unit larger than an individual faculty member—to account for the major causes of non-compliance with the HEOA textbook provisions.

The smallest academic unit larger than an individual faculty member shall designate a committee responsible for timely adoption and publication of course materials. Rules shall be established for publication of the course material information, including publication of default course materials, by the due date when: The assigned faculty member has failed to make an adoption for a new course by the established deadline; The assigned faculty member has failed to make an adoption for a course previously taught and; When a faculty member has not been assigned to the course.

The intent is to create defaults choices for the vast majority of the causes of late adoptions. Please note that the policy does not require a specific solution but only that a default choice be made.

At least one academic department has adopted this policy and has chosen to vest the office manager with the responsibility of both reminding faculty of the deadlines and submitting all textbook adoptions. The department also established default texts for all courses where faculty are frequently assigned at the last minute and that the most recent textbook adoption will be published if a faculty member does not change their adoption by the deadline. These default adoptions have resulted in nearly 100% compliance.

Clearly, there are many policies that will produce similar results; this is merely a sample that may be applied.

Should the OEIB, HECC, or other entity wish to consider investments to mitigate higher education cost drivers, adherence to the HEOA textbook provisions is a good place to start. Because educational compacts

-

<sup>&</sup>lt;sup>5</sup> Joe Holliday (OUS) (2010). OUS Campus Responses on Textbook Affordability.

are voluntary for many institutions, such as the for-profit and independent institutions, the legislature will have to consider another mechanism for regularly reporting this information.

The simplest reporting mechanism can be created by changing ORS 348.205, which covers the operation of the Oregon Opportunity Grant Program, to require reporting of adherence rates for all institutions and subunits from all institutions with students receiving grants under that program. This will create the kind of transparency that the Federal law does not provide.

#### c. Other Incentives and Mechanisms to Encourage Faculty to Reduce Costs

Given the misaligned incentives around adoption decisions of instructional materials, the strong possibility that faculty are incompletely informed about all the instructional materials, and the belief that the cost of instructional materials is not always indicative of quality, the work group recommends the creation of incentives for cost reductions. These may take several forms and take place at several levels—including the State Board of Higher Education, Legislature, and possibly Higher Education Coordinating Commission (HECC).

Several mechanisms can be used to align all the incentives in instructional materials choice. Hypothetical solutions are frequently so contrary to the normal functioning of an institution as to be beyond use. For example, the instructor could be given a relatively high fee per student and then expected to pay for all instructional materials and services, including textbooks and the wages of teaching assistants, and be able to pocket the remainder. This is clearly not a practical solution.

What can be implemented are solutions that are reasonable given the information available to the agents and the institutional constraints. One of these solutions is a stipend paid to the instructor to reduce the instructional materials cost to students by some specified amount through course redesign. The intent of the stipend is to:

- Make the faculty more aware of student costs;
- Loosely connect student benefits and tradeoffs to their own benefits; and
- Through a subject matter instructional materials expert give them greater access to the wealth of options and costs.

This mechanism intended to be temporary, given the assessment that the student cost of instructional materials is too high, until other more comprehensive solutions can be found.

Institutions should assess the total instructional materials cost to students, per course and per sequence, as determined by the materials submitted under the HEOA requirement. A small grant should be made available to faculty members if they are willing to reduce the per student cost by a minimum of 25% for six academic terms or four semesters, by making changes in their instructional materials including:

- Use of alternate textbooks and instructional materials, e.g., lower cost texts, Creative Commons licensed books and online resources;
- Making judicious use of the Fair Use exemption under US copyright law;
- Making fuller use of institutionally licensed online resources like JSTOR;
- Using the university-provided, rather than publisher-provided, Course Management System;
- Committing to multi-year custom textbook agreements with publishers;
- Other methods to be determined.

The grant should provide the faculty member with a consultant who can guide the faculty member to lower costs materials, and help to facilitate their use. The cost of the consultant and grant should not exceed the expected aggregate cost savings to students.

Similar systems are already in place at some of Oregon's private non-profit institutions. Funding and implementation of this may take place through several channels. First, the legislature may enact this as a grant administered by the HECC and available to all institutions in the state.

Second, the HECC can make textbook costs one of its key metrics to monitor in its recommendations about postsecondary educational compacts.

Third, the State Board of Higher Education, Department of Education, and Community College Boards may consider grant programs like these to make more efficient use of student aid allocations.

#### IX. Recommendations for Future Study

Because of the very short time horizon on this report, many issues will require additional study, and the work group will need to seek expert advice on some specific topics.

1. Alter the tuition and fee formula at OUS schools so that fees include the instructional materials for the course. This is similar to the system use in the Western Governors University and would require changes in fee setting rules within institutions and legislative limits on those fees. A cost-sharing rule could realign incentives.

Western Governors University has an all-inclusive, all-you-can-eat fee schedule, where you can take as many classes as you wish and all educational materials are included in that fee. Clearly, this is a different funding model that you see elsewhere, per class fees with many of the extra costs of educational materials borne by the student.

This particular model of procurement is far from optimal but a modified system with higher per course fees across all courses when students are able to purchase the required instructional materials at a large discount, say 80%, with the higher across the board fees funding these discounts.

This helps realign the incentives of institutions. Using the same example explored in "Incentive in Instructional Materials Choice and Use," if an institution increases class size and decreases technical support, which induces faculty to choose a commercial CMS for the course rather than the university provided CMS, the cost of the commercial CMS will be borne partially by the institution rather than wholly by the student.

2. Creation of Open Educational Resource web archive or wiki or portal. An online resource (created and curated by Oregon faculty) for the largest enrollment courses might increase faculty awareness of the rich array of low-cost or free high-quality instructional materials available.

While there are for profit and not for profit sources for these materials, the work group feels that there may be some advantages for Oregonians beyond the partnerships suggested above. Key to this assessment is the provision that this is a wiki—a multi-author, curated, online resource. Wikis are intended to be edited by readers and not just a central editor. They can have provisions for peer review, voting on and promoting certain posts, as well the concept of an owner or market maker for individual topics.

A wiki or portal of resources that changed on a weekly basis as new resources were located, evaluated by users and promoted by users, may be a valuable tool in reducing student instructional materials costs.

3. Create a cost of instructional materials index. We lack reliable, easily found information on instructional material costs for each institution and the state as a whole. Such a resource might be created using the HEOA required data and standard methodology for weighting and combining costs by a weighted geometric mean. A more credible cost index could replace the misused expenditure surveys that are frequently cited.

One of the issues that arose repeatedly in testimony was the variability of different information sources on price trends and student spending. A Nebraska Book Company survey, for example, showed a slight spike in prices while student spending essentially remained flat between 2010 and 2011.<sup>6</sup> This information was at odds with the CPI new textbook price index. Neither is a wholly satisfactory measure of the price level of instructional materials.

Expenditure surveys are effectively price multiplied by the quantity, and price increases tend to reduce the quantity purchased. According to recent OSPIRG surveys, nearly 7 in 10 of students responding say they decided not to purchase one or more required instructional materials because of cost. At the same time the new textbook price index includes only a fraction of instructional materials and does not take into account the options of purchasing a used textbook or renting—it is not an instructional materials price index.

Because HEOA requires data, and we can produce a basket of instructional materials that takes into account some of the trade-offs students face (such as whether to rent or purchase) we can use a methodology similar to that used in the creation of the Consumer Price Index to produce a cost of instructional materials index for each institution.

If the Oregon Legislature, OUS, or the HECC wish to use this measure to develop targets and incentives for cost reductions or for decision making about other investments, it would be available for that use.

4. Review and strengthen existing textbook affordability policies created by OUS and the Board of Higher Education. Similar to HEOA, these policies may not have strong enough enforcement mechanisms.

This work group did not have sufficient time to explore the institutional initiatives already in place at all institutions in the state. These policies are not always well documented or even well known within the institutions. There may be some worthwhile model policies in existence with a history of effective implementation. These model policies would be helpful to other institutions in reducing the costs of instructional materials to students.

**5. Perform a cost-benefit analysis of the use of library reserves of required texts.** There are several pilot programs and data on the cost effectiveness of these programs can only be made after an initial trial period.

Several pilots have taken place, notably Portland Community College, and an expansion started in the fall of 2012 as this report was being written. A continuation of this work group should assist and compile the experiences of those schools piloting providing all required texts on library reserve.

While it will not be possible for academic libraries to have textbooks to lend to all students who want one, they can address questions of access by providing a few copies of required texts for short-term loans. North Carolina State University library launched such a program in 2009, and found it successful. A short trial at Portland Community College showed promise. Additional study to see how textbook reserve programs can provide students with access to course materials, if these programs can be scalable, and how these programs could be funded is recommended.

<sup>&</sup>lt;sup>6</sup> Nebraska Book Company (2012). College Student Tracking Survey: Market Research Summary. Nebraska Book Company is the current wholesaler and management company for Portland State University's bookstore and many others across the country.

- 6. Explore cost savings from promoting the production of instructional materials, not just textbooks, with both Creative Commons and traditional copyright and licensing rights. Faculty are often faced with high costs to create these materials. Support, in the form of course releases for example, compensated by non-cost licensing to Oregon institutions could result in higher quality, lower cost instructional materials.
- 7. Negotiate statewide licenses, not for individual textbooks, but for full access to a publisher's library. This is essentially taking the Netflix model of movie rental and applying it to books. Such licensing arrangements are currently offered by major college textbook publishers.

Textbook rentals, even when they are accessible online for a limited amount of time, cost the student a large fraction of the purchase price of a textbook. While it is true that textbooks are the result of a team of writers, editors, graphics designers, marketers and others, the rental price of these products is several degrees of magnitude larger than similar products.

We are able to rent full catalogs of movies from several online services, and are able to watch, if we had the time, hundreds of movies per month for less than the cost of a single textbook rental. Those movies are also an expensive collaboration of writers, editors, designers, and marketers.

Negotiating for statewide licenses over a publisher's full catalog, with every student able to access any book, at any time, may be a way of truly leveraging the state's negotiating power to transform a market.

#### 8. Investigate the possible abuse of "custom editions" by faculty and publishers.

"Custom Editions" are texts in which an instructor or academic department takes an existing text and typically omits material that they do not intend to teach, reducing the size and cost of the book.

While there are examples of customized textbooks leading to considerable savings, this does not appear to be typical. A customized edition may include new material inserted by the instructor, but there is no guarantee of that. While customizing theoretically makes textbooks more useful or affordable, custom editions can cause more problems than they solve. Savings of these texts sometimes occur at the initial purchase, however, customized editions fragment the used-book market, and limit re-sale of these texts to students of the same institution, or even the same instructor. This reduces re-sale value, and makes real cost savings dubious.

Royalties that are paid to the faculty member or the department encourage this practice. The state of New York has investigated this common practice and is implementing policies to prevent its continued use.

#### X. Conclusion

The Textbook Affordability Work Group believes there is more research and discussion needed in several areas, but the first and best course of action would be to create and enforce policies that encourage compliance with existing law, particularly the Higher Education Opportunity Act, section 112.

System level and institutional policies that incentivize early textbook ordering, and the use of low-cost institutional subscription resources and open educational resources are the first and easiest measures that can be taken to mitigate unnecessary and avoidable cost drivers for textbooks.

If the state's higher education institutions can act in a more coordinated way to negotiate with publishers for access to publisher's libraries online, this might be an intervention that changes the market for students for the better.

The work group reaffirms faculty choice of instructional materials as a core value of academic freedom. Choice must of course be motivated by good information, and many of the recommendations in this report seek to create a stronger information base so that faculty may consider the final cost to students when they choose required books and instructional resources.

#### **Sources**

Advisory Committee on Student Financial Assistance. May 2007. Turn the Page. Making College Textbooks More Affordable. Pg: 8-9; 20-21. http://www2.ed.gov/about/bdscomm/list/acsfa/turnthepage.pdf

Campbell, Alex. "New Digital Tools Let Professors Tailor Their Own Textbooks for Under \$20." Chronicle of Higher Education, 9 October 2011.

Clark College Bookstore. www.clarkbookstore.com/swap main.asp

Commonwealth of Pennsylvania, State Board of Education. Report of the College Textbook Policies Advisory Committee. May 2012

Florida. Office of Program Policy Analysis and Government Accountability. (OPPAGA) Report No. 08-29; page 4 April 2008. http://www.oppaga.state.fl.us/MonitorDocs/Reports/pdf/0829rpt.pdf

Hechinger, John. "As Textbooks go 'Custom,' Students Pay." Wall Street Journal, 10 July 2008.

Illinois Board of Higher Education. January 2007. A Report on the Feasibility of Textbook Rental Programs and Other Textbook Cost-Saving Alternatives in Illinois Public Higher Education. Pg: 25-26. http://www.ibhe.state.il.us/Board/agendas/2007/February/Item12TextbookReport.pdf

Kentucky. Legislative Research Commission. The Costs of College and High School Textbooks in Kentucky. Report No. 356. Pg: vii. http://www.lrc.ky.gov/lrcpubs/rr356.pdf

Minnesota Office of Higher Education. January 2011. Reducing Textbook Costs. Pg 9-10. http://www.ohe.state.mn.us/pdf/ReducingTextbookCosts2011.pdf

Mississippi Institutions of Higher Learning; Report of the Textbook Task Force. July 2007 pg 6-8. http://www.ihl.state.ms.us/finance/downloads/textbook\_taskforce.pdf

University of Michigan. Report on Implementation of Recommendation of the Task Force on Textbook Costs. June 19-20, 2008. Board of Regents Meeting. Agenda Item #3. Page 1-24. http://www.provost.umich.edu/reports/Textbook\_Task\_Force\_Final\_Report.pdf

University of North Carolina. Report on the Cost of Textbooks, Submitted with Campus-Based Tuition and Fee Increase Requests. February 2012. Pg 5-8.

http://www.northcarolina.edu/finance/textbooks/2011\_Textbooks\_Report.pdf

University of Texas. "Custom-Publishing 306 Materials." http://www.drw.utexas.edu/ucc/sites/www.drw.utexas.edu.ucc/files/Custom-PublishingaTextbookARecommendationReport.pdf

University System of Maryland. Report on the Textbook Law of 2009. Pg 6-8. http://dlslibrary.state.md.us/publications/Universities/SB183Ch520(3)HB85Ch521(3)\_2009.pdf

"University Students Local Text Book Exchange Challenge." http://applicationsforgood.org/challenges/university-students-local-text-book-exchange-challenge/

University of Wyoming Bookstore. www.uwyobookstore.com