

**E-Textbook Working Group**  
**Summary of Activities for April 2010 – June 2011 and Recommendations**

Submitted to:

Maria Bonn, Associate University Librarian for Publishing  
Paul Courant, University Librarian and Dean of Libraries  
Lester Monts, Senior Vice Provost for Academic Affairs  
Laura Patterson, Associate Vice President and Chief Information Officer

June 8, 2011

by

Kortney Briske, Office of the Registrar  
Sean DeMonner, ITS  
Lisa Emery, ITS  
Kathleen Folger, University Library  
Susan Hollar, University Library, Chair  
Karen Kuffner, ITS  
John Leasia, University Library  
Sue McDowell, LSA Instructional Support Services  
Natsuko Nicholls, University Library

# Table of Contents

<b>Executive Summary</b> .....	3
<b>Recommendations</b> .....	3
<b>Summary of Activities Based on Charge to Working Group</b> .....	4
<b>Part I E-Textbook Trial</b>	
1. Introduction .....	6
2. Pre-pilot Faculty Interview.....	8
3. Pre-pilot Student Survey .....	10
4. Statistics on E-Textbook Use .....	11
5. Mid-pilot Student Survey .....	12
6. Post-pilot Student Interview.....	16
7. Post-pilot Faculty Interview .....	17
8. Recommendation .....	17
Appendices.....	19
<b>Part II Enhancements to UM Textbook Tools</b>	
1. Previous Findings and Recommendations.....	22
2. New Findings and Recommendations.....	22
Appendix .....	24
<b>Appendix A: Charge to E-Textbook Working Group</b> .....	27

## Executive Summary

In response to the charge (Appendix A, page 27) from Associate University Librarian Maria Bonn, the E-Textbook Working Group engaged in a number of activities including an analysis of the e-textbook landscape, a semester long trial of e-textbooks with five courses and an analysis of existing UM textbook tools. In the process, we identified a number of factors which could influence the wide-scale adoption of electronic textbooks including: cost, availability of content, student attitude and behaviors, funding models, technical issues, and the rapidly evolving e-textbook landscape. We also developed a series of recommendation which we believe will advance the campus' e-textbook strategy.

## Recommendations

1. Stay actively engaged with and develop community around the use of e-textbooks.
  - a. Continue to convene the E-textbooks Working Group through June 2012, shifting the focus to an advisory role. Review membership, and consider expanding membership to include CRLT and possible bookstore representation.
  - b. Conduct a second e-textbook trial in the Fall 2011 semester with a similar number of courses (4-5), including additional vendors. **This will likely require \$15,000 - \$20,000 to cover the cost of the content, as well as 1.0 FTE time commitment over the course of the summer and fall.**
  - c. Recruit courses to participate in the survey that are not directly involved in the trial, but that are using e-textbooks in their courses. This will provide us with data and feedback from a wider group on multiple platforms.
  - d. Establish a community of practice around use of electronic textbooks and content. Open to anyone on campus, it will be a venue for sharing experiences developing a community around e-textbook use.
  - e. Document our experiences with emerging systems for instructors, sharing information on e-textbook systems that we have vetted through pilots. Include information on integration with CTools using LTI.
  - f. Collaborate with Open. Michigan, MPublishing, and the campus MERLOT group, promote use of open materials to support teaching and learning as an alternative to the traditional textbook.
2. To provide campus with a more coherent picture of textbook availability and options, enhance textbook tools in CTools and MPathways. **Given the current University IT Governance Structure, work on these recommendations need to be approved by the Student Administration Domain Steward, Dr. Lester Monts.**

- a. Enhance use of WorldCat API to improve data accuracy and to display library holdings. (ITS: 200 hours @ \$10,000)
  - b. Build functionality for faculty to more easily place materials on reserve at the library through CTools and MPathways. (ITS -240 hours @ \$12,000; Library - 80 hours @ \$4,000)
3. To develop a more nuanced understanding of the economic and policy questions around the delivery of course content, establish a working group to research and advise on these issues. The group could research funding models in use at other institutions, conduct cost-benefit analysis studies, and assess tuition impacts and potential revenue streams.

### **Summary of Activities Based on Charge to Working Group**

In response to the charge (Appendix A, page 27) from Associate University Librarian Maria Bonn, the E-Textbooks Working Group engaged in many activities regarding e-textbooks between April 2010 and June 2011. Throughout this process, our understanding of the complexities of the print and electronic textbook environment deepened, realizing the many factors influence the adoption of electronic textbooks including: cost, availability of electronic content, student behaviors regarding textbook purchasing, needs of the large research university, technical issues, and the rapidly evolving e-textbook landscape.

Charge to Working Group: Conduct a review of electronic textbook aggregation and delivery services with a goal of recommending a pilot program with a limited number of courses in winter 2011. The assessment should include content, functionality and costs of integration if required.

#### ***E-Textbook Trial***

After reviewing the wide range of e-textbook platform offerings, we conducted a trial of e-textbooks (CourseSmart) with five courses during the Winter 11 semester. We originally planned to run the trial with a second platform, Coursload, but they could not provide the content we needed. Content was free to students (Library paid \$17,992.75) and delivered via CTools, using Learning Tools Interoperability (LTI) for access control. To gather feedback, we administered two surveys, focus groups, and interviews with instructors and students, to gauge their expectations for and experience with the-textbooks. Technically, the trial ran very smoothly. While many participants liked free access as part of pilot program, they expressed their hesitation to use the same e-text service without an improved interface and downloadable formats. A complete report on the trial is available in Part I starting on page 6 of this document. Potential next steps are summarized in recommendation 1.

Charge to Working Group: Assess and prioritize opportunities to integrate Library content with other campus systems.

#### ***Identification of Enhancements to Existing UM Textbook Tools***

Enhancements to existing Textbook tools in CTools and MPathways, and integration with University Library systems will provide the campus with a more cohesive picture of textbook availability and options. These are refinements to current tools and will need to be estimated and

scheduled accordingly, but initial indications are that they will not represent significant additional investment. A complete report on the trial is available in Part II starting on page 22 of this document. Potential next steps are summarized in recommendation 2.

Charge to Working Group: Assess and prioritize opportunities for integration of open content into the CTools environment.
---

We did not identify specific tools for integration of open content with CTools and this issue needs further exploration. Recommendation 1.f. suggests campus groups to collaborate with to promote use of open content to support teaching and learning. More investigation is required around tools and integration with campus systems.

## Part I E-Textbook Trial

### 1. Introduction

#### *1.1 About the E-Textbook Pilot Program*

The University of Michigan Campus-wide E-Textbook Working Group, which comprises representatives from the U-M Library, the Office of the Registrar, Information and Technology Services (ITS), and LSA Instructional Support Services, conducted an e-textbook trial during Winter 2011. The trial commenced in the beginning of January and concluded at the end of April 2011 in the following courses:

- English 229: Professional Writing
- Civil & Environmental Engineering 212: Solid & Structural Mechanics
- Mechanical Engineering 481: Manufacturing Processes
- SI 510-Special Topics: Data Security and Privacy: Legal, Policy and Enterprise Issues
- Urban Planning 539: Methods of Economic Development Planning

Students and instructors in these courses received electronic access to textbooks via CTools, using the CourseSmart platform. Table 1-1 provides pilot courses and e-textbook information. For the trial, there was no cost to students or instructors (Library funded).

Overall objectives of the e-textbook trial were:

- to test a new e-textbook service that creates better and more affordable access to textbooks for Michigan students.
- to collect information from students regarding their perceptions, expectations and opinions about e-textbooks.
- to identify the advantages and disadvantages of using e-textbooks in different courses from both quantitative and qualitative standpoints based on two student surveys and interviews.
- to assess the importance of digital course materials in terms of affordability, functionality, usability, and portability.
- to make recommendations about implementing e-textbook services at the University of Michigan.

#### *1.2 The Total Cost of Pilot and Cost Savings*

To offer 170 students free access to eight e-textbooks as part of the pilot, the Library paid CourseSmart \$17,992.75.

Today, many argue that e-textbooks are the answer to textbook affordability and that the average price of an e-textbook is approximately 50-60% of the list price for a new print edition. As shown in Table 1-2, e-textbooks from CourseSmart cost 56.2% on average of what the University Library paid for a new hard copy as part of their collections. Indeed, the average price of pilot e-textbooks lies within the oft-used range of 50-60%.

Table 1-2 also lists the price of a new paperback available from Amazon for the same title used in each pilot course. While there are two unusual cases in which new paperbacks cost less than electronic editions, the average price of an e-textbook from CourseSmart is about 60% of the print copies available from Amazon.

This leads us to believe that cost savings could be significant if e-textbooks were widely adopted. Yet, the question remains as to how affordable e-textbooks are and how much savings we would realize. The total savings from the pilot program is approximately \$13,500 given the assumption that all 170 students in the five pilot courses would have purchased new print textbooks at the same price that the Library paid for their collections. While it would be unrealistic to presume that every single student would have paid full price for a new print textbook, because students generally look for alternatives, including used print copies and library copies, it is probably safe to say that even current e-textbooks have the potential to increase textbook affordability.

**Table 1-1: Demographics of E-Textbook Pilot Study**

Course	#	Enrollment	Instructor	E-textbook Title	Publisher	ISBN
CEE	212	68	Radoslow Michalowski	Mechanics of Materials	Prentice Hall	978-0-13-602315-9
ENGLISH	229	23	Chris Gerben	Writing That Works	Bedford/St Martin's	978-0-312-61278-8
				The Business Writer's Handbook	Bedford/St Martin's	978-0-312-59021-5
MECHENG	481	46	Jyotirmoy Mazumder	Manufacturing Engineering and Technology	Prentice Hall	978-0-13-272010-6
SI	510	9	Don Blumenthal	Management of Information Security	Delmar	978-1-111-18546-6
				Readings & Cases in Information Security: Law & Ethics	Gale cengage	978-1-111-55038-7
UP	539	24	Scott Campbell	Economic development	Prentice Hall	978-0-321-55096-5
				Planning Local Economic Development: Theory and Practice	Sage Publications	978-1-4129-6093-9

**Table1-2: Textbook Price Comparisons and Cost Savings**

Course	Enrollment	E-textbook Title	CourseSmart E-text price (E)	Library copy print price (LibP)	Amazon paperback price (AmazonP)	E/LibP	E/AmazonP	Saving per book (E-LibP)	Saving per course (E-LibP)*Enrollment
CEE	68	Mechanics of Materials	\$73.20	\$153.37	\$126.12	47.7%	58.0%	\$80.17	\$5,451.56
ENGLISH	23	Writing That Works	\$37.95	\$86.12	\$68.41	44.1%	55.5%	\$48.17	\$1,107.91
		The Business Writer's Handbook	\$31.95	Library does not have	\$29.67	N/A	107.7%	N/A	N/A
MECHENG	46	Manufacturing Engineering and Technology	\$89.50	\$200.67	\$143.81	44.6%	62.2%	\$111.17	\$5,113.82
SI	9	Management of Information Security	\$57.99	\$124.07	\$106.49	46.7%	54.5%	\$66.08	\$594.72
		Readings & Cases in Information Security: Law & Ethics	\$19.99	\$41.68	\$33.46	48.0%	59.7%	\$21.69	\$195.21
UP	24	Economic development	\$96.43	\$133.31	\$91.46	72.3%	105.4%	\$36.88	\$885.12
		Planning Local Economic Development: Theory and Practice	\$54.95	\$61.27	\$59.31	89.7%	92.6%	\$6.32	\$151.68

## 2. Pre-pilot Faculty Interview

During this semester, we have also gathered feedback from faculty members who volunteered for the pilot. We interviewed five instructors participating in the pilot during the first week of January 2011 in Ann Arbor, Michigan. A summary of the information we obtained from interviews is as follows.

### **Civil & Environmental Engineering 212 Solid & Structural Mechanics Instructor: Professor Jyotirmoy Mazumder**

- 1) Teaching experience: 30+ years
- 2) Prior experience of using e-textbooks: None
- 3) Purpose of e-textbook: Required reading
- 4) Incentives for pilot participation:
  - Interest in trying something new (mostly for students).
  - Has experience using CTools and using digital materials for teaching.
  - Has experience using a projector in class (e-textbook could be also projected in class).
  - Confident of student's technological competence.
- 5) Expectations from the pilot:
  - To use pictures, diagrams, and charts out of e-textbook contents in preparing his lectures (PowerPoint slides).
  - Participation in pilot will be advantageous for students.
- 6) Concern about the pilot:
  - Personal desire to stick with a traditional print textbook.
- 7) Other considerations:
  - Prior to pilot, Professor used to scan print textbooks to digitize pictures, diagrams and charts for PPT slides.
  - Professor requested library purchase and checkout a print edition of the e-textbook.
  - Professor allows students to bring laptop computers to class and almost all do so.
  - Professor is an author of two books (not standard college textbooks).
  - Professor still prefers print textbooks for both academic and leisure reading.
  - Professor has never purchased and/or read e-books.

### **English 229 Professional Writing Instructor: GSI Chris Gerben**

- 1) Teaching experience: 8 years
- 2) Prior experience using e-textbooks: None
- 3) Purpose of e-textbooks: Required readings.
- 4) Incentives for pilot participation:
  - Recently engaged in OER and open textbook project with former colleagues at Stanford.
  - Has experience using CTools and using digital materials for teaching.
- 5) Expectations from the pilot:
  - Interface of e-textbooks is almost the same as what we see in print textbooks.
  - Student's engagement.
  - Saving student's money.
- 6) Concerns about the pilot:
  - Uncertain of how e-textbooks can be included in course.
  - Expiration of e-textbook subscription (Instructor raised concern about e-textbook subscription period, since he expects students to hold on to this book as a future reference).
  - Short period of subscription (Winter 2011 only for the pilot).
  - No downloadable PDFs (material unavailable when not online).
- 7) Other considerations:
  - Instructor is using a computer lab for his course due to pilot participation (as opposed to traditional classroom).
  - Instructor made an interesting note that his approach to textbook use in class influenced by textbook prices. If he assigns an expensive textbook, he feels obligated to utilize the textbook material in class. More affordable e-textbooks give instructors more flexibility.

### **Mechanical Engineering 481 Manufacturing Processes Instructor: Professor Radoslaw Michalowski**

- 1) Teaching experience: 30+ years
- 2) Prior experience of using e-textbooks: None
- 3) Purpose of e-textbook: Required reading
- 4) Incentives for pilot participation:
  - Interest in trying something new.
  - Dissatisfaction with current expensive thick print textbooks (too much text with too little substance).
  - Adoption to rapid change in teaching materials over the last decade.
- 5) Expectations from the pilot:

- Plans to use projector for the e-textbook content in class.
- To easily copy and paste e-text content to Word or PPT.
- Wants to test using an e-textbook on iPad with wireless projection.
- Benefits to students in both cost-saving and learning.

6) Concerns about the pilot:

- Student response or concerns and student reaction.
- Quality of e-text when using projector.
- Inability to easily copy and paste e-text content except using screen-capture tool.
- Uncertain of student's attention span and retention when using e-textbooks.

7) Other considerations:

- Prior to pilot, Professor always used black board to draw pictures, diagrams, and charts.
- Professor noted the "time-out" issue using CourseSmart.
- Professor noted usability issue re. CTools frame around e-textbook.
- Multiple format options should be given to students.

**School of Information 510**

**Special Topics: Data Security and Privacy: Legal, Policy and Enterprise Issues**

**Instructor: Lecturer Don Blumenthal**

1) Teaching experience: 3 years

2) Prior experience of using e-textbooks: None

3) Purpose of e-textbooks: Optional readings.

4) Incentives for pilot participation:

- Interest in trying a new format of textbooks.
- Has been a big fan of e-books.
- Confident that students are familiar with digital materials and would enjoy the pilot.

5) Expectation from the pilot:

- Students will like it.

6) Concerns about the pilot:

- Student response or concerns and student reaction.
- Unsure of how students will tackle the new concept of textbook.
- Print textbook and print/paper may still be easier to use.
- Students may prefer print.

7) Other considerations:

- Instructor owns an e-reader (Sony reader) and reads e-books.
- Instructor noted he has no concern of expiration of subscription because in his field, things change rapidly and students do not need to keep textbooks.

**Urban Planning 539**

**Methods of Economic Development Planning**

**Instructor: Associate Professor Scott Campbell**

1) Teaching experience: 10+ years

2) Prior experience of using e-textbooks: Some (Used many e-books thru ebrary service).

3) Purpose of e-textbooks: Optional readings.

4) Incentives for pilot participation:

- Interest in trying something new.
- Has experience using e-books for teaching.

5) Expectation from the pilot

- Downloadable PDFs.

6) Concern about the pilot

- Short subscription period.
- Limited print capability (CourseSmart allows users to print only 10 pages at a time).

7) Other consideration:

- Ebrary has been a great source for teaching materials.

### 3. Pre-pilot Student Survey

We have crafted a survey probing expectations from the pilot. This paper-based short survey, containing five questions, was administered in class during the first week of January 2011 in Ann Arbor, Michigan. It required a few minutes for a student to complete the survey (see Appendix 1, page 19, for a list of pre-pilot survey questions). All registered students in pilot courses were invited to respond (n=170). There was a very high response rate, 80%, to the survey. The survey respondents (n=136) are constituted by Civil & Environmental Engineering (38%), English (16%) Mechanical Engineering (21%), School of Information (6%), and Urban Planning (19%) as shown in Figure 3-1.

Figure 3-1: Student distribution by course

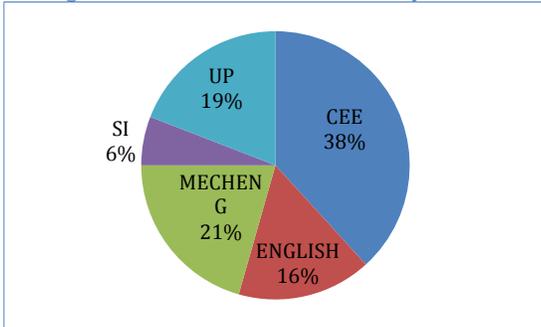


Figure 3-2: Student distribution by gender

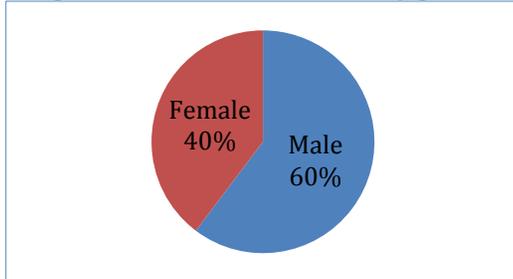
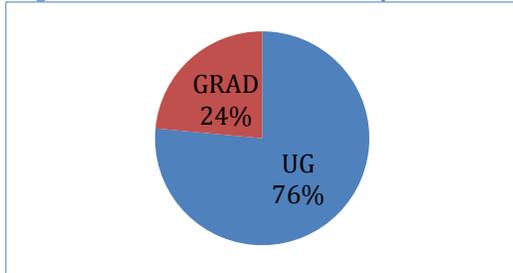


Figure 3-3: Student distribution by class level



Of all survey respondents, 60% of students are male and 40% are female (Figure 3-2); approximately three-quarters (76%) are undergraduate students (Figure 3-3).

In addition to demographic questions, we asked students about their previous experience with e-textbooks. The survey data show 31% reported they used e-textbooks in the past (Figure 3-4). The distribution of e-textbook experience by courses is shown in Table 3-1. Despite a small size of enrollment in the School of Information course, it is striking that none of the nine students is a first-time e-textbook user.

Figure 3-4: Prior experience with e-textbooks

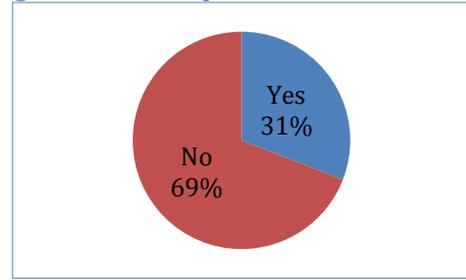
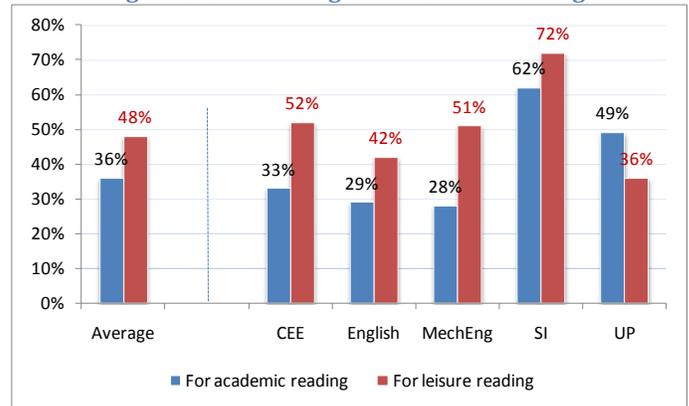


Table 3-1: Prior e-text experience by course

	CEE	English	MechEng	SI	UP
Yes	13%	18%	18%	100%	30%
No	87%	82%	82%	0%	70%

We also asked students about their reading style with the following question: Over the last 12 months, what percentage of your reading was on screen, including computers, netbooks, e-book readers, and mobile devices, as opposed to any printed copies? Students are asked to indicate a percentage between 0% and 100% for two purposes of reading: for academic and leisure reading. The average and differences across disciplines are shown in Figure 3-5. A little less than half read on screen.

Figure 3-5: Percentage of on-screen reading

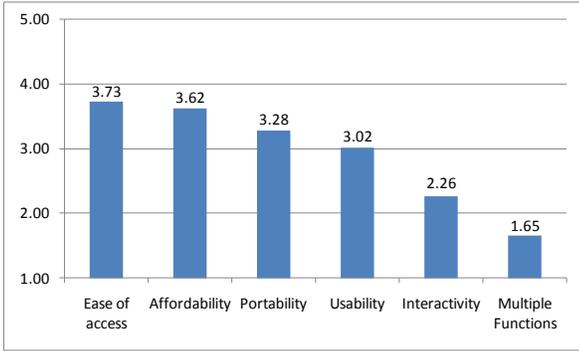


Finally, in the last question all survey respondents are asked to rate their expectation on the following attributes of e-textbooks on a scale of 1 to 5. Attributes include: (1) access (ease of access), (2) affordability (affordable than print), (3) usability (easy to use), (4) Interactivity (sharing notes), and (5) Multiple functions (note-taking, highlighting).

As presented in Figure 3-6, the data show that in using e-textbooks students had relatively high expectations concerning easy access, affordability, portability and usability. No statistically significant difference was found between genders and disciplines based on chi-squared test ( $p < .05$ ).

Prior to the pilot, students were ambiguous regarding e-textbook functions that allow students to digitally take notes, highlight and share those notes and highlights.

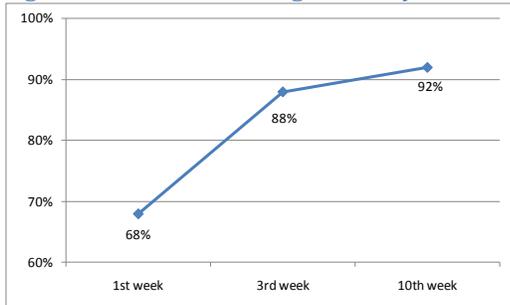
Figure3-6: Expectations from e-textbooks



#### 4. Statistics on E-Textbook Use

The Winter 2011 semester began on January 5, 2011. On January 12, a week after the first day of class, 68% of registered students had accessed their e-textbooks. As of January 25, 88% had accessed, and by the end of March, 92% had accessed their books as shown in Figure 4-1.

Figure 4-1: E-textbook usage trend by students



The latest data on usage in the textbook pilot as of March 31 are shown in Table 4-1 and Figure 4-2. Figure 4-3 shows the number of times the e-textbook tool was launched and accessed per student via CTools. According to the data, a majority of students accessed e-textbooks between 21 and 40 times during the semester. The average number of accesses is approximately 35 – per student throughout the pilot – much lower counts than initially expected. If sorted by course, e-textbook usage was most frequent among students in one of the Engineering courses as shown in Figure 4-4.

Table 4-1: E-textbook pilot user accounts (as of March 31)

	Course Site User Types				Total in course	# who have accessed	% use
	Student	Instructor	Assistant	Observer			
	CEE	68	2	2			
ENGLISH	23	1			25	22	88%
MECHENG	46	3	1		50	45	90%
SI	9	1		4	14	12	86%
UP	24	1			25	22	88%
Total	170	8	3	5	186	168	90%
# who have accessed	157	7	2	2			
% use	92%	88%	67%	40%			

Figure 4-2: E-textbook usage by user type

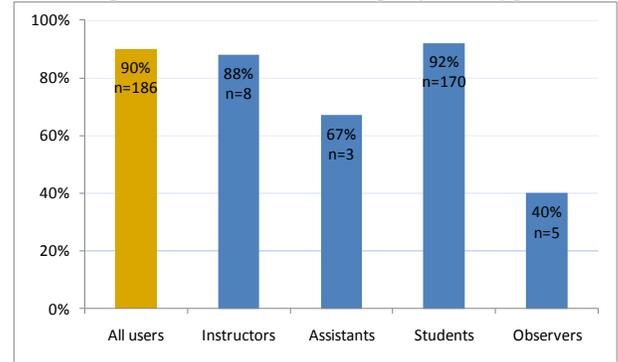


Figure 4-3: E-Textbook access counts per student during pilot

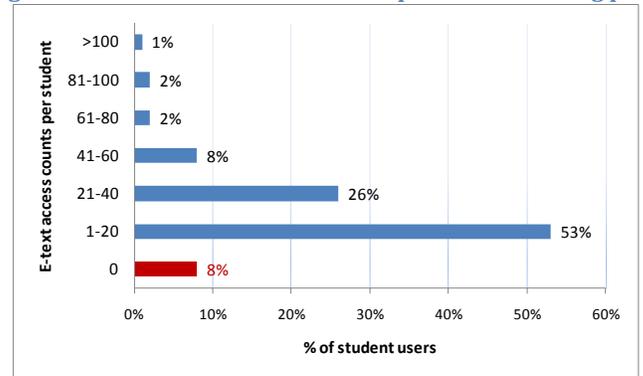
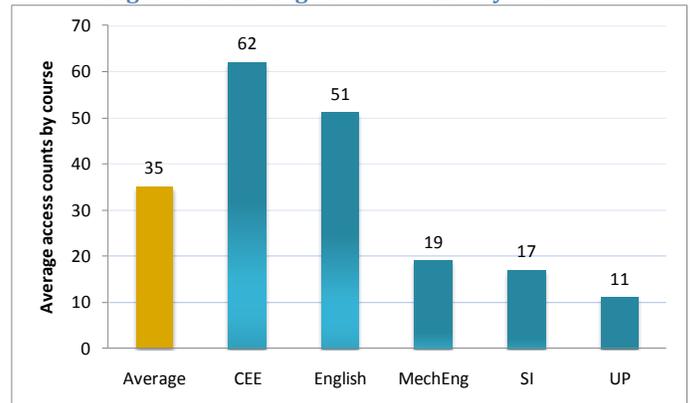


Figure 4-4: Average access counts by course



## 5. Mid-pilot Student Survey

### 5-1 Methodology

In March 2011, the Campus-wide E-Textbook Working Group conducted a second student survey containing twenty questions. A total of 170 students in five e-textbook pilot courses were invited to respond. 75 students responded to the survey, generating a 44% response rate. Despite a relatively high response rate for a web-based survey, we should note that only a portion of the student population participated in the e-textbook pilot and survey; therefore, results may not match the actual opinions of the entire Michigan student body.

In this survey, the students are asked questions to assess changes in perception and expectation of e-textbooks, the satisfaction (and dissatisfaction) with the use of functions like note-taking and highlighting, the reading experience, the impact of the e-text experience on student future textbook habits, and any suggestions for improvement. (See Appendix 2, on page 19, for a list of survey questions.)

Many of the measures included in this survey focus on experiences and perceptions. When interpreting this data, it is important to remember that differences across groups or across disciplines could be the result of real differences in experiences, different aspects or different perceptions of the same experience, or differing expectations. For instance, two students may have each experienced difficulty accessing their e-textbooks a few times in a month. When asked how often did you experience access difficulty, one of them might call that “very often” and the other “sometimes.” Likewise, a student asked to rate his/her satisfaction with e-textbooks may do so by considering different pros and cons about e-textbooks.

### 5-2 Demographics

As shown in Figure 5-1, the survey respondents (n=75) are constituted by Civil & Environmental Engineering (28%), English (36%), Mechanical Engineering (16%), School of Information (7%), and Urban Planning (13%). Note that this sample distribution is slightly different from the actual proportions of students in pilot courses; i.e. students from English are slightly overrepresented and those in Engineering are somewhat underrepresented. The gender distribution (male: 56%, female 44% as shown in Figure 5-2) in the sample is very similar to the actual proportion. The student distribution by class level is shown in Figure 5-3.

Figure 5-1: Student distribution by course

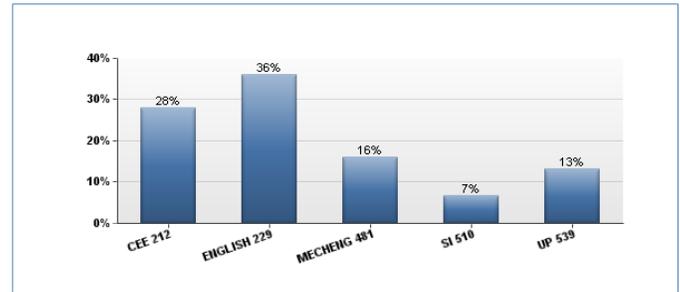


Figure 5-2: Student distribution by gender

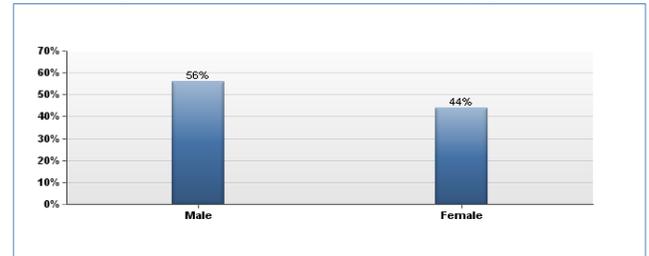
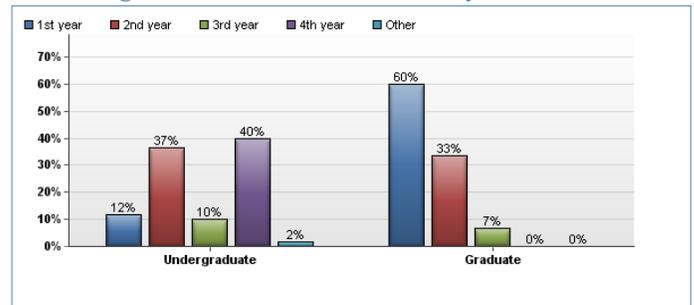


Figure 5-3: Student distribution by class level

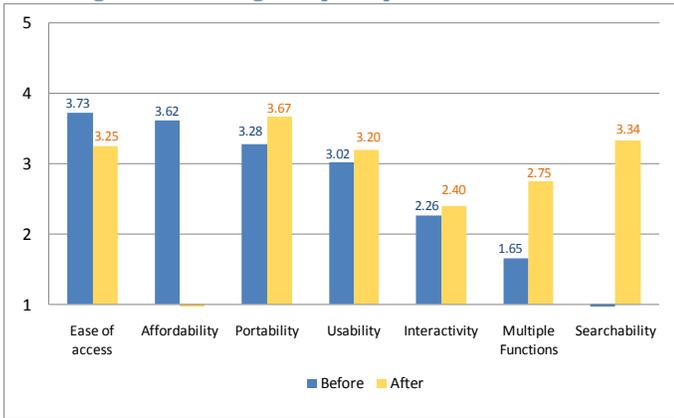


### 5-3 Changes in Perceptions of E-textbooks

The first set of questions served a **longitudinal purpose**. We asked a very similar set of questions probing student perception of e-textbooks in order to observe any changes over the course of the pilot. As presented in Figure 5-4, with a few notable exceptions, the data provide firm evidence that students view e-textbooks as easier to use, more portable and more interactive than initially expected at the outset of the trial. As opposed to this clearly defined trend, the change in “ease of access”, decreasing from 3.73 to 3.25, may be due to the fact that approximately 60% of students reported they experienced some difficulty in accessing their e-textbooks during the pilot.

Note that we dropped “affordability” from a set of choices, because we concluded that it would be difficult to fully assess cost issues when students are given free access to e-textbooks as part of the pilot program. Instead, we added “searchability”. The score of 3.34 signifies that student have a relatively high expectation of search capability from e-textbooks.

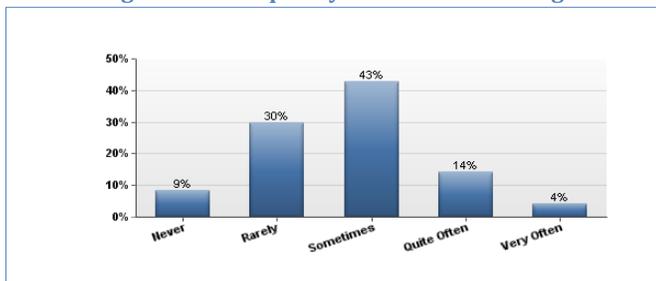
**Figure 5-4: Changes in perception of e-textbooks**



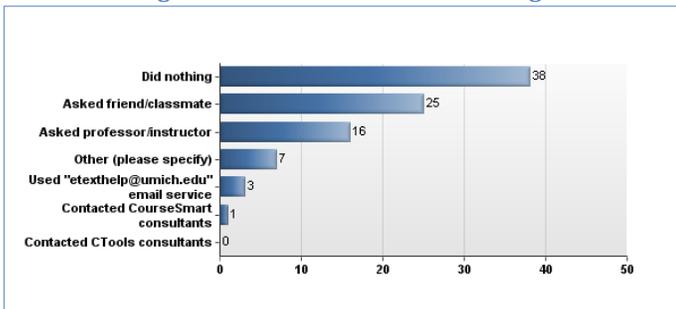
**5-4 Usability Experience: Product-specific and Technology-related Issues**

All survey respondents are asked about how often they have experienced trouble accessing their e-textbooks. Only 9% of students report they have never encountered any access difficulty, while 61% say they have experienced some kind of problems (Figure 5-5).

**Figure 5-5: Frequency of trouble accessing**



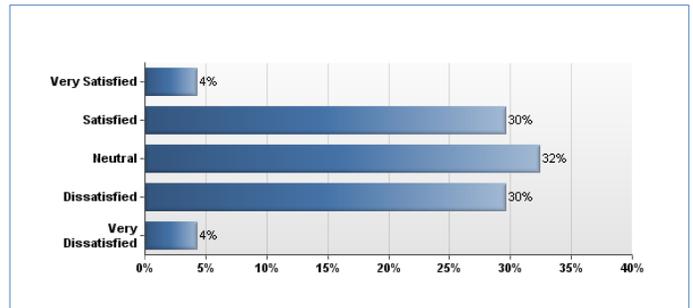
**Figure 5-6: Means of troubleshooting**



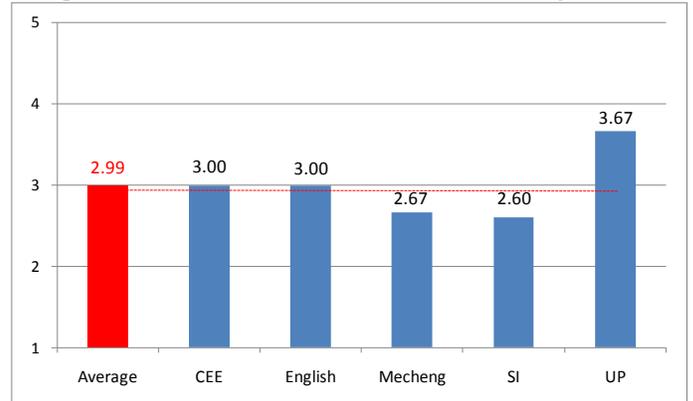
When asked about the means of troubleshooting, a majority report they did not take any particular actions or asked their friend, classmate, and instructor (Figure 5-6). Other options included; logging out of CTools, close and restart the browser. In fact, this is the troubleshooting measure that the e-textbook technical support team most frequently advised for students who contacted consultants via email (etexthelp@umich.edu). Throughout the semester, only a half dozen students contacted the e-text pilot technical support team via email for troubleshooting. On two occasions only were consultants required to seek technical support from CourseSmart. In most of the situations, access problems were solved within less than two hours.

The next two survey items were designed to measure overall and particular satisfaction amongst students with e-textbooks. Figure 5-7 demonstrate the interesting result that the three levels of satisfaction, (very) satisfied, 34% – neutral, 32% – (very) dissatisfied, 34%, are almost equally distributed, which tells us that students are quite divided in rating their overall satisfaction. Figure 5-8 shows the differences by course on a scale of 1 (very dissatisfied) to 5 (very satisfied) with the average score. While students in Urban Planning report being much more satisfied than those in School of Information, no statistically significant differences were found between genders and disciplines based on chi-squared test ( $p < .05$ ).

**Figure 5-7: Overall satisfaction-dissatisfaction with e-textbooks**



**Figure 5-8: Overall satisfaction-dissatisfaction by course**



Further, we asked students an open-ended question to tell us why they were or were not satisfied. Of 75 survey respondents, 51 students provided us with detailed, multiple comments to describe their experience. A significant number of students report they are happy with free access but unhappy with the e-textbook interface in CTools.

As noted previously, using the CourseSmart platform, students are provided the content via CTools, the University's Sakai-based Collaboration and Learning Environment (CLE), a.k.a. Learning Management System (LMS). Because both the University and CourseSmart have already adopted BasicLTI as a standard for operating with platforms like the Sakai LMS, the e-textbook bookshelf was directly integrated into the campus LMS with minimal effort on both sides. This allowed students a single sign-on authentication process, but unfortunately, it also limited flexibility in viewing their e-textbook from the CTools site.

The overwhelming qualitative feedback was related to the e-text viewing layout provided within CTools. One critique put forward by a student was that “I don't like the e-textbook that was in the CTools site; it made it harder to access, read, and flip through the pages. I would certainly prefer a separate window.” Likewise, another student says, “I didn't like how much of the browser CTools took up in addition to the CourseSmart borders, there was very little room left for the book, which resulted in having to constantly scroll up and down to see the entirety of one page.”

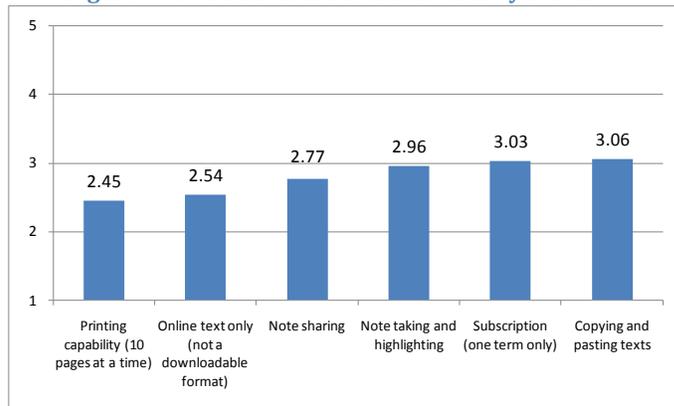
Other reasons for satisfaction and dissatisfaction are summarized in Table 5-1.

**Table 5-1: Reasons for satisfaction-dissatisfaction**

<b>Top Four Reasons for Satisfaction</b>
1. Free access (cost-saving)
2. Portability
3. Ease of access and navigation
4. Integration with course assignments in CTools
<b>Top Seven Reasons for Dissatisfaction</b>
1. E-text interface in CTools site
2. Internet connectivity required for access
3. No downloadable format available
4. Too much scrolling
5. Hard to flip/turn pages
6. Screen reading hard on eyes
7. Limited printing capability (10 pages at a time)

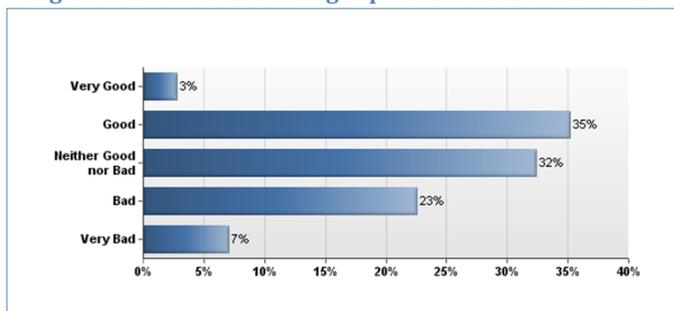
Furthermore, students were asked to rate their satisfaction with product-specific features and functions on a scale of one to five with 1 for very dissatisfied and 5 for very satisfied. Clearly, as shown in Figure 5-9, students are relatively dissatisfied with the current e-text format (online text only) as well as the limit on printing in ten-page increments. It is interesting to note this least-preferred feature of printing capability shows a statistically significant difference across disciplines ( $p \leq .05$ ). Three quarters of English students report being “very dissatisfied” with the printing inconvenience, which may be explained by their actual needs and experiences to print a part of e-textbooks for class.

**Figure 5-9: Satisfaction-Dissatisfaction by features**



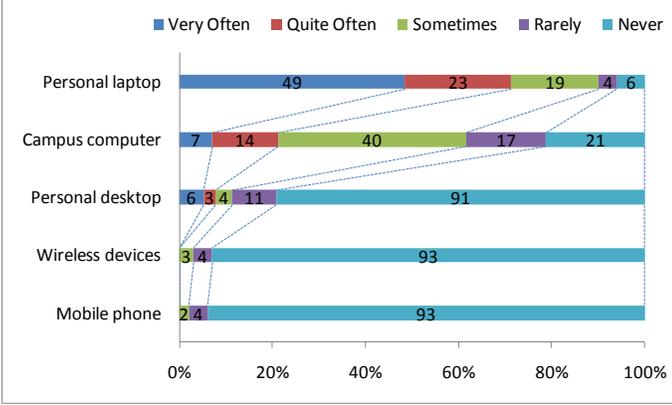
The next survey question was designed to help us assess student's overall reading experience with e-textbooks. 38% of survey respondents say they had a very good or good reading experience with e-textbooks (see Figure 5-10). We should note that there is a slightly positive correlation ( $r = .51$ ) between the two variables, overall satisfaction and overall reading experience, the latter measured on a scale of 1 (very bad) to 5 (very good). It is safe to say that those who had a good reading experience found the usability of e-textbook more satisfactory.

**Figure 5-10: Overall reading experience with e-textbooks**



To better understand the environment of e-textbook usability, we asked students about what devices they use to access and read their e-textbooks. According to the result, many students relied heavily on their own personal laptops (see Figure 5-11). Surprisingly, both mobile phones and wireless devices, including iPad and tablet computers, were used much less frequently by students in the pilot. This is probably because, while CourseSmart provides downloadable e-texts compatible with smart phones (iPhone) as well as iPad, Michigan pilot students were not provided with a downloadable format to read on portable devices where the e-text can be accessed outside the internet browser.

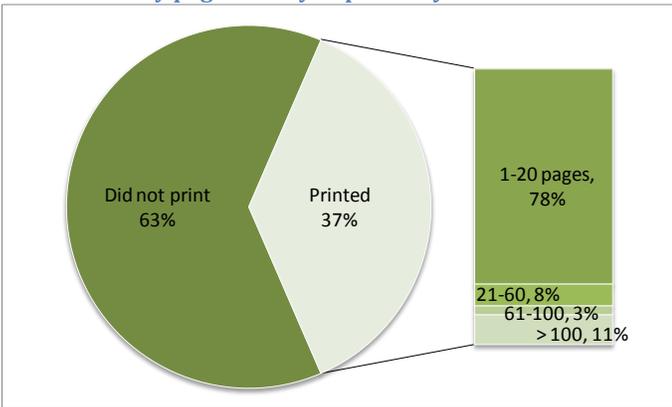
**Figure 5-11: Frequency by mode of access**



**5-5. Student Behavior toward Printing and Using a Print Edition of E-Textbooks**

There is a recent body of work on student preferences between print and digital. Some argue that students are not yet ready to give up their print textbooks despite being interested in and attracted to new ways of using their textbooks. In assessing the usability of e-textbooks, it is important to consider a print counterpart as an alternative. Given free access to an e-textbook, did Michigan students still use a print copy of the e-textbook? Did they print any part of their e-textbook? To answer these questions, we asked students whether or not they printed any part of e-textbooks during the pilot. Figure 5-12 demonstrates that more than a majority report they did not print any part of e-textbooks. When asked about the number of pages printed, of 28 students who said they printed some, nearly 80% printed less than 20 pages – equivalent of about one book chapter – while only a few students printed more than 100 pages.

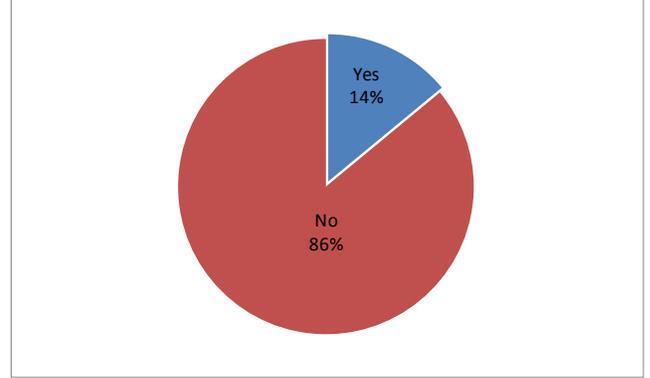
**Figure 5-12: Did you print any part of your e-textbook? How many pages have you printed your e-textbook?**



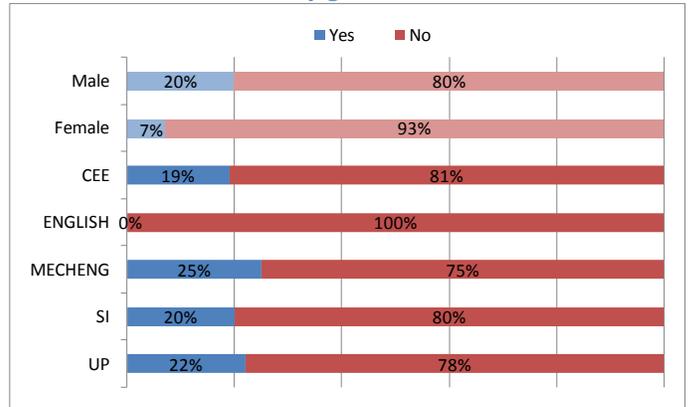
Next, in assessing student preferences between print and digital, we asked students whether or not they used the print edition as well as their e-textbook. As shown in Figure 5-13, only 14% of students report they used the print edition of their e-textbook, mostly obtained by purchasing a new or used print textbook online, or borrowing library copies. Figure 5-14 indicates differences between gender and

courses in using print textbooks – these differences are statistically significant ( $p \leq .05$ ).

**Figure 5-13: Use of print edition along with e-textbook**



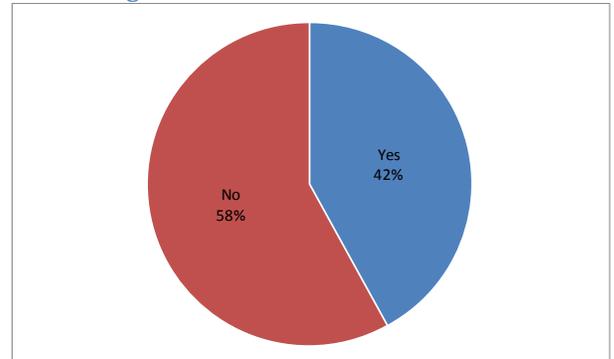
**Figure 5-14: Use of print edition, distribution by gender and course**



**5-6. Impact of E-Textbook Experience on Future Behavior**

Finally, a set of questions addressed the impact of today’s e-textbook pilot on student future behavior. The first question directly asked students whether or not they plan to use an e-textbook in the future based on their pilot experience. 42% of survey respondents said they will use an e-textbook.

**Figure 5-15: Future use of e-textbook**



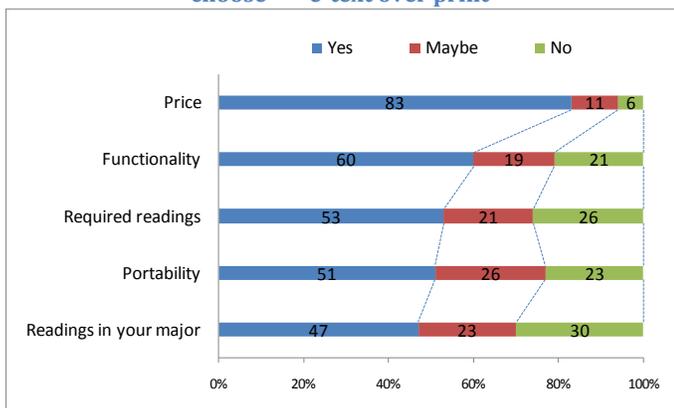
To an open-ended question of why/why not students plan to use an e-textbook in the future, 63 offered their opinions. In Table 5-2, major reasons and conditions for the future use of e-textbooks are summarized. Not surprisingly, the reasons for satisfaction and dissatisfaction listed earlier in

Table 5-1 are closely associated with the factors/features determining a student's future use of e-textbooks. From these two tables, it becomes apparent that some of the primary characteristics to this current e-textbook pilot, including: 1) required internet connectivity, 2) a lack of downloadable format, 3) limited flexibility in viewing an e-textbook from CTools, seem to remain a hurdle for students who might opt for e-textbooks in the future.

**Table 5-2: Influential factors/features determining future use**

<b><i>I would use an e-textbook again because...</i></b>
Cheaper than print
Portable
<b><i>I would not use e-textbook again unless...</i></b>
Cost-saving is significant
Internet connectivity is not required
A downloadable format is available
Easier to turn pages
Able to look at multiple pages at once
Viewing space for e-text is larger
Allowed to keep it forever as a future reference
Printing is more accessible
All of my textbooks are available from the same platform

**Figure 5-16: Influential factors/features for students to choose e-text over print**



The last survey question asks students whether or not particular factors based on the pilot experience would influence their decision to choose an e-textbook over a print textbook in the future. The data presented in Figure 5-16 indicate that student preference of digital over print is influenced by both endogenous and exogenous characteristics associated with textbooks. For the latter, types of readings (required or optional, major or minor) have a relatively strong impact on textbook format choices by students. Clearly, textbook costs continue to be a major determinant of a student's choice of one textbook format over another. Their feedback also suggested that students

use the print and e-text in different ways and with different objectives in mind.

In summary, a consistent theme throughout the survey responses has been the frustration expressed by students regarding the absence of a downloadable format.

## 6. Post-Pilot Student Interview

Four student interviews were conducted at the end of the semester as a follow-up to our mid-semester student survey. The interviews aimed to gather more in-depth information about student experience with e-textbooks. Participants were recruited via the second student survey and interviews were conducted by two members of the E-Textbook Working Group. During the course of an hour-long interview, a number of comments were made and key points from interviewees are summarized below.

### 1) Overall Feedback on the E-Textbook Pilot Experience

#### *Pros and Cons:*

- E-textbooks are more portable than heavy physical textbooks.
- E-textbooks' search feature is useful.
- E-textbooks help to save money.
- While many participants liked free access as part of pilot program, they expressed their hesitation to use the same e-text service without an improved interface and downloadable formats.
- The e-text platform has limited flexibility in viewing e-textbooks from the CTools site, causing too much scrolling to view an entire text
- Print textbooks are easier to highlight and can take notes in the margin.
- Print textbooks can be more portable and easier to access without worrying about internet connectivity.
- On-screen reading is hard on eyes.

### 2) Suggestions for Improvement

- Allow viewing of e-textbooks offline.
- Provide downloadable formats.
- Facilitate e-text convertible to e-readers, particularly Kindle, and iPad.
- Allow printing more pages at a time.
- Allow keeping e-textbooks longer.
- Allow bookmarking.
- Improve search capability.
- Allow faster page turning.
- Allow for viewing e-text outside of CTools interface.
- Disable time-out/logout feature.

### 3) Student Textbook Search and Purchasing Habits

In our interviews, we asked students about where they usually look for assigned textbooks. Some commented that library copies and course reserves, regardless of print or electronic books, are the first consideration. Our interview also revealed that student textbook purchasing behavior is likely influenced by the purpose of the textbook. If large portions of a textbook are assigned for reading, then students are inclined to buy the book. The inclination toward purchasing a book instead of using a library copy or renting one from local/online bookstores also depends on the student's goal and type of course. One student stated that that he likes to keep print textbooks for the courses in his major largely for future reference, but partly because books on his own bookshelf will serve as a conversation piece.

Throughout this pilot study, it became clear that the price factor remains a major determinant of student textbook purchasing habits. One student indicated his strong support and preference for e-textbooks if cost-saving is significant, adding that e-textbook prices should be even lower than used copies of textbooks.

#### 4) Other Comments

One student commented that, regardless of digital or print formats, something that you can buy and keep would be the best option. In answering the question of what would be a dream textbook, another student stated that ideally, all assigned textbooks and course materials should be loaded on one portable machine, being accessible via one standard e-text platform. Given today's complex e-textbook environment where a number of competing e-textbook platforms are available, his point is well taken. Most participants expressed their strong support for the e-text trial program to be continued. While it is clear that a student preference for print textbooks is undeniably present, students are increasingly interested in trying e-textbooks. At the same time, based on student feedback, to reach a tipping point where increasing demands and sales of e-textbooks exceed those of print textbooks, e-textbooks must do more and cost less.

## 7. Post-pilot Faculty Interview

Three faculty interviews were conducted at the end of the semester. Two members of the E-Textbook Working Group met with instructors of English 229, CEE 212, and SI 510 to talk about the faculty experience with e-textbooks as well as to provide their insights for the e-textbook use in Higher Education. Each interview session lasted between 20 – 30 minutes. Interview narratives are synthesized based on the three different themes.

#### 1) Overall Feedback on the Pilot Program

The two interviewees pointed out a lack of orientation from the Pilot Team prior to the onset of the Winter 2011 semester. More solid orientation of how to use the e-textbook platform could have helped the instructors get more familiarized. One faculty member said that once the semester began, there was no time for self-orientation on

using digital features (note-taking and highlighting) of e-textbooks. More preparation for using e-textbooks may have helped faculty participants take greater advantage of e-textbooks within CTools.

All three professors mentioned that they received a number of student complaints regarding e-text access issues. Among many, one of the major complaints concerned a lack of downloadable formats of e-textbooks.

The instructor of English 229, who taught his class in a computer lab so that all students could have access to e-textbooks in class, mentioned that access problems during class slowed down his teaching. The same instructor said that one of his students complained of being unable to complete an assignment on time due to the access issue, which the instructor then said put him in a difficult position for grading the late assignment.

#### 2) Impact of the E-text Use on Teaching

None of the interviewees mentioned that the use of e-textbooks in class significantly affected or changed their conventional teaching style. However, an Engineering professor remarked that his expectation to easily copy-and-paste tables, figures, and diagrams from e-textbooks remained unmet. For this particular reason, he continued to use both an e-textbook and a print copy in preparing for his class.

The instructor of English 229 commented that he assigned more chapters from e-textbook than he would have assigned if there was only a print textbook. Likewise, the School of Information instructor said he assigned three quarters of the chapters from his e-textbook. Both instructors did so, because they wanted to encourage students to try e-textbooks.

#### 3) Suggestion for Improvements

Almost unanimously, instructors noted that their student responses to the e-text pilot would have been more positive if students were given both online and downloadable e-texts. In other words, faculty thought students would have been even less satisfied with e-textbooks without the free access. Moreover, all three interviewees strongly suggested that we continue a similar e-text pilot program wherein students are given more textbook format choices. One faculty member said, to give students a choice between print and digital is good, but that to give a broader set of choices among print, online e-text, and downloadable e-textbook would be even better.

## 8. Recommendation

Based on the feedback received, the E-Textbook Working Group believes that while we are still a ways from e-textbooks replacing print, it is important that the UM community stay engaged with e-textbooks. Specifically, we recommend a second e-textbook trial (4-5 courses) be conducted in the Fall 2011 semester with downloadable books and a newer version of Learning Tools Interoperability (LTI) which includes better

layout/presentation options. We expect that students will respond more favorably with these enhancements in place. There will be a funding request in association with this trial (\$15,000) to cover the e-textbook costs.

While this trial is occurring, we will recruit courses to participate in the survey that are not directly involved in the trial, but that are using e-textbooks in their courses. This will provide us with data and feedback from a wider group on multiple platforms, as well as engage more of the campus.

## Appendices

### Appendix 1: Pre-pilot Survey Questions

**Q1. Please indicate your year in school.** (Circle your answer below.)

1. Undergraduate: 1<sup>st</sup> year    2<sup>nd</sup> year    3<sup>rd</sup> year    4<sup>th</sup> year    5<sup>th</sup> year    other (       )  
 2. Graduate

**Q2. What is your gender?** (Circle your answer below.)

1. Male  
 2. Female

**Q3. Have you ever used e-textbooks in class before taking this course?** (Circle your answer below.)

1. Yes: If yes, how many e-textbooks have you used in the past?    1-2    3-5    More than 5  
 2. No

**Q4. Over the last 12 months, what percentage of your reading was on *screen*, including computers, netbooks, e-book readers, and mobile devices?** (Please indicate a percentage between 0% and 100% for the following two purposes of reading.)

For academic reading \_\_\_\_\_%

For leisure reading \_\_\_\_\_%

**Q5. When using an e-textbook I expect it will be....**

	Strongly agree	Agree	Neutral	Disagree	Strongly disagree
Easy to use	1	2	3	4	5
Portable	1	2	3	4	5
More affordable than print	1	2	3	4	5
Easier to highlight and take notes	1	2	3	4	5
Easier to share notes	1	2	3	4	5
Difficult to access	1	2	3	4	5

### Appendix 2: Mid-pilot Survey Questions

Q1 Please indicate your year in school.

	1st year	2nd year	3rd year	4th year	Other
Undergraduate					
Graduate					

Q2 What is your gender?

- Male  
 Female  
 Other

Q3 Which class are you taking?

- CEE 212  
 ENGLISH 229  
 MECHENG 481

Q4 In using pilot e-textbook(s), I've found them to be....

	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree
Easy to use					
Easy to access					
Easy to highlight and take notes					
Easy to share notes					
Portable					
Easy to search for particular words					

Q5 Have you had difficulty accessing your e-textbook?

- Never
- Rarely
- Sometimes
- Quite Often
- Very Often

Q6 When having difficulty, what did you do to solve the problem? Please choose all that apply. (If you have not encountered any difficulty, please skip this question.)

- Used "etexthelp@umich.edu" email service
- Contacted CTools consultants
- Contacted CourseSmart consultants
- Asked friend/classmate
- Asked professor/instructor
- Did nothing
- Other (please specify) \_\_\_\_\_

Q7 Please rate your overall satisfaction with your e-textbooks using the CourseSmart platform within CTools.

- Very Satisfied
- Satisfied
- Neutral
- Dissatisfied
- Very Dissatisfied

Q8 Please describe why/why not satisfied?

Q9 More specifically, please rate your satisfaction with the following features of e-textbooks.

	Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
Online text only (not a downloadable format)					
Printing capability (10 pages at a time)					
Subscription period (one term only)					
Copying and pasting texts					
Note taking and highlighting					
Note sharing					

Q10 Please rate your overall reading experience with pilot e-textbook(s).

- Very Good
- Good
- Neither Good nor Bad
- Bad
- Very Bad

Q11 How often do you use the following devices to read your e-textbook?

	Never	Rarely	Sometimes	Quite Often	Very Often
Campus computer					
Personal desktop					
Personal laptop					
Mobile phone					
iPad, netbook, or other wireless device					

Q12 Do you use the print edition as well as your e-textbook?

- Yes
- No

Q13 If yes, how did you obtain the copy? Please choose all that apply.

- Purchased a new book
- Purchased a used book
- Purchased online
- Purchased at local bookstore
- Rented a book online
- Rented a book at local bookstore
- Borrowed library copies
- Borrowed a book from friend/classmate
- Other (please specify) \_\_\_\_\_

Q14 Did you print any part of your e-textbook?

- Yes
- No

Q15 If yes, how many pages have you printed so far? (If you are using two e-textbooks, please estimate the average.)

- 1-20
- 21-60
- 61-100
- >100

Q16 Do you plan to use an e-textbook in future?

- Yes
- No

Q17 Please describe why/why not?

Q18 Based on your current e-textbook experience, do you think the following factors/features will influence your decision to choose e-textbooks over print in future?

	Yes	Maybe	No
Price			
Portability			
Functionality			
Required readings (not optional)			
Readings in your major			

Q19 Do you have any suggestions for improvement of current e-textbooks, e-textbook platforms, and other related services?

## Part II Enhancements to UM Textbook Tools

### 1. Previous Findings and Recommendations

In October 2010, The E-Textbook Working Group issued the report titled, *E-Textbook Working Group Preliminary Report and Recommendations*. The first recommendation in the report was:

Enhancements to existing Textbook tools in CTools and MPathways, and integration with University Library systems will provide the campus with a more cohesive picture of textbook availability and options. These are refinements to current tools and will need to be estimated and scheduled accordingly, but initial indications are that they will not represent significant additional investment.

For more details, see Appendix on pages 24-6.

### 2. New Findings and Recommendations

The group has done additional investigation in this area and requests approval for the following work:

- 1) Enhance use of WorldCat API to improve data.

Why: The current search feature often returns inaccurate results, making it difficult for faculty and staff to identify the right materials. Further integration with WorldCat will also allow for the display of library holdings.

#### **Required Resources**

**ITS:** 200 hours (\$10,000)

Specific tasks include coding and testing changes to a new service and developing performance support materials to assist staff, faculty, and students with the change.

**CTools:** 40 hours (\$2,000)

Specific tasks include re-coding the existing Worldcat API to use a different service and testing the changes. The current interface does not need to change.

**Library:** Enhancement of the WorldCat API use does not require Library work.

**Total Effort:** 240 hours (\$12,000)

- 2) Build functionality for faculty to place materials on reserve at the library.

Why: Allow faculty to initiate a book be placed on reserve when entering textbook information into Faculty Center. Faculty will no longer need to initiate a separate reserves request via email or a web form, making the process more seamless and faster.

#### **Required Resources**

**ITS:** 250 hours (\$12,500)

Specific tasks include building logic that would pass data to a library web form when staff or faculty initiated the reserve process from the textbook entry page. Excluded

from the scope of this work is coding a data exchange back from the library when the reservation is confirmed. The majority of reserves are successful, so we will handle any exceptions through a manual process. We will also need to include performance support effort to write new documentation instructing staff and faculty on using the new process.

**CTools:** No effort required.

**Library:** 80 hours (\$4,000)

Specific tasks include development of a web form which will be populated with textbook data from Faculty Center; identifying a process for sending reserves requests to the appropriate physical location (University Reserves; Fine Arts; Art, Architecture, and Engineering, etc.); communicate with staff in reserves units on the new process.

**Total Effort:** 330 hours (\$16,500)

We are seeking your support for these efforts and request your assistance in giving these efforts a high priority within the Teaching & Learning and Administrative Domains.

## **Appendix**

### Data Source Project Overview

Staff and faculty have had the ability to enter information about textbooks and other materials in Wolverine Access since October of 2008. The project was successful in getting textbook data into a central system and allowing students to view textbook information during registration. However, there are major issues identified with the data source, the WorldCat xISBN service:

- 1) The search feature does not contain the most up-to-date catalog of materials
- 2) The search feature often returns too many results, making it difficult for faculty and staff to identify the right materials
- 3) The data contains many inconsistencies, especially for the publisher information, making it difficult to report on the data
- 4) The service does not include book price, which was mandated by the Higher Ed Act

The goal of this project was to review alternate data services to determine if there is a better option to use for the textbook search tool. The project was conducted over six weeks during Fall 2010.

### **Scope of Trial**

Four services were evaluated: Bowker, GoogleBooks, ISBNdb and WorldCat (WorldCat as currently used in MPathways and using different WorldCat services). Several sessions were held to collect feedback from faculty and administrative users who are currently entering textbook information. In addition, sample ISBNs from production incidents and errors were tested with the various services.

### **Results**

All services can provide all data elements currently collected in MPathways for a textbook, but we found some to be better than others. ISBNdb.com was less likely to have newer titles. Bowker had the best data quality and they were also the only service to provide the Manufacturer's Suggested Retail Price (MSRP). The other services can link to 3<sup>rd</sup> party sites, such as Amazon or Half.com to get their prices.

The user sessions revealed two new insights. First, cover images are very important to the users. Most users are currently going to Amazon, looking up the book title, finding the result with the right cover image, and copying the ISBN from there. Second, we learned that users are unable to copy the ISBN from Amazon and paste it into Wolverine Access because the ISBN in Amazon contains hyphens. Wolverine Access currently does not allow hyphens, so users must do extra work to strip out the hyphens.

Finally, we conducted additional research about ISBNs and discovered that there are ways to use the ISBN to determine information about the book, including the publisher. Using the ISBN for reporting could result in more consistent reporting results and less reliance on data quality in other fields, such as publisher.

### **General Recommendation**

#### *General Recommendation Summary- Enhance use of WorldCat*

We recommend that we modify the MPathways system to use a different WorldCat services to address some of the current search issues. The issue of recently published books not always being available, will continue to exist with any of the service providers. The issue with inconsistent

publisher values, will continue to exist, but at the time that publisher data becomes important, ad hoc solutions can be investigated. Also, there will be no additional service cost with this recommendation.

To address the additional concerns identified in the user sessions, we recommend two enhancements to the MPathways Faculty Center and administrative search functions. These are included in the estimate below. They are: 1) allow ISBNs to be entered with hyphens, 2) provide the WorldCat URL book link in the search results to show the book cover and other book details and 3) provide only one search button to simplify the page.

*General Recommendation Estimate*

Tasks to enhance use of WorldCat	Hours	Cost Estimate
Requirements	10	\$500
Design	10	\$500
Code/ Unit Test	90	\$4,500
System Test	70	\$3,500
Performance Support	10	\$500
Management	5	\$250
CTools system changes	40	\$2,000
Total one-time development cost	235 hours	\$11,750
Annual Service Fee	n/a	\$3,000/yr

*General Recommendation Open Issue*

We are still unable to display the price of the book (MSRP). We would continue with the current workaround of providing links to the preferred bookstores, and optionally could provide students with a link to WorldCat, which would display the prices at 3<sup>rd</sup> party websites like amazon.com.

If it is determined that storing and displaying the MSRP is important, we should consider using Bowker as the search provider. With this option there is the cost of implementation will be higher than the recommended option, there are large additional service fees, we can store book retail price and it provides consistent publisher values. Below is an estimate:

Tasks to implement Bowker	Hours	Cost Estimate
Requirements	10	\$500
Design	15	\$750
Code/ Unit Test	155	\$7,750
System Test	120	\$6,000
Performance Support	10	\$500
Management	10	\$500
Ctools system changes	100	\$5,000
Total	420 Hours	\$21,000
Annual service fee	n/a	multi-year agreement-- \$14,500 for Year 1 or \$15,225 for Year 2 or \$16,000 for Year 3

### **Additional Options**

- No changes. Faculty and staff will continue to encounter the identified textbook entry issues.
- Change to ISBNdb as the search provider. With this option there is no added search value, the cost of implementation will be higher than the recommended option and there will be additional service fees.
- Use GoogleBooks to retrieve cover images and display them with the search results. This could provide better service to staff and faculty who are currently going to Amazon as a first step. We are not recommending consideration of GoogleBooks as a search provider because it requires the display of advertisements and issues with the technical implementation of their search function.

### **Final Considerations**

Any changes should be timed to align with the University's textbook calendar. Textbook information is needed by the bookstores by mid-April for Fall term classes and end of October for Winter term classes.

Additional work could be done to improve the integration between MPathways and the Library for placing textbooks on reserve and for displaying library holdings. Adding a link to display library holdings in the staff, faculty, and student pages would take an estimated 200 hours of effort (\$10,000) and a project to automate the reservation process and display reservations to students would take an estimated 500 hours of effort (\$25,000).

Finally, the e-textbook initiative is likely to result in recommendations for integrating MPathways with an endorsed e-textbook vendor. These changes are estimated to be 500 hours of effort (\$25,000).

The Teaching & Learning domain and the Administrative Domain will need to consider the effort for these projects and prioritize it among other requested efforts.

## Appendix A: Charge to E-Textbook Working Group

March 31, 2010

For those who don't know me, let me introduce myself, I am the relatively new Associate University Librarian for Publishing at the University Library. Part of my portfolio is to lead the Library's efforts in the textbook arena. I have quickly come to realize that possible textbook programs and services, particularly opportunities for electronic delivery of textbooks are important to many parts of the university, but none of those parts are formally responsible for coordinated decision-making. Therefore, in consultation with Paul Courant, Dean of Libraries and Lester Monts, Senior Vice Provost for Academic Affairs, I am convening a university working group to evaluate and prioritize textbook related initiatives and partnerships. You have either indicated interest in this group or have been recommended to serve.

Textbook availability and pricing are an important concern for many campus units who advocate for and offer service to students, including the Library, the schools and colleges, ITS/MAIS, the CTools group, and the registrar's office. All of these groups see opportunities for improving the textbook environment, but there is no formal coordination mechanism for evaluating local and third party proposals and partnerships or for recommending priorities for integration with the course management system.

The Textbook Working Group will serve as a venue for coordinated discussion and recommendation in this area and for articulation of a coherent campus e-textbook strategy. It will be a place for evaluation of content, business terms and utility of textbook aggregator and publisher proposals. It will also serve as a mechanism for making recommendations for new, locally-created textbook services.

Specifically, the group will:

-- conduct a review of electronic textbook aggregation and delivery services with a goal of recommending a pilot program with a limited number of courses in winter 2011. The assessment should include content, functionality and costs of integration into if required.

-- assess and prioritize opportunities to integrate Library content with other campus systems

-- assess and prioritize opportunities for integration of open content into the CTools environment

I have asked Susan Hollar, the Curriculum Integration Coordinator at the University Library, to convene the group. Susan will keep the agenda as well as run the unenviable process of getting the meetings scheduled. She and I will work together to make sure that the various stakeholders across campus are informed of the groups efforts and progress.

One task for the group will be to determine how often it will meet. My thought is biweekly, with evaluation after a year to see if the work of the group should be ongoing, and, if so, whether the membership and charge should be revised. I will ask for recommendations on those points.

Please confirm your participation by email to me with a cc to Susan. Once we have the working group membership finalized, we'll be in touch with details about the first meeting.

I look forward to meeting you all,  
Maria

Maria Bonn  
Associate University Librarian for Publishing  
University of Michigan Library  
mbonn@umich.edu.