

**OPEN & AFFORDABLE EDUCATION
COMMITTEE**

ANNUAL REPORT, 2019

Prepared by the
Iowa State University Open & Affordable Education Committee
for Provost Wickert

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EXECUTIVE SUMMARY

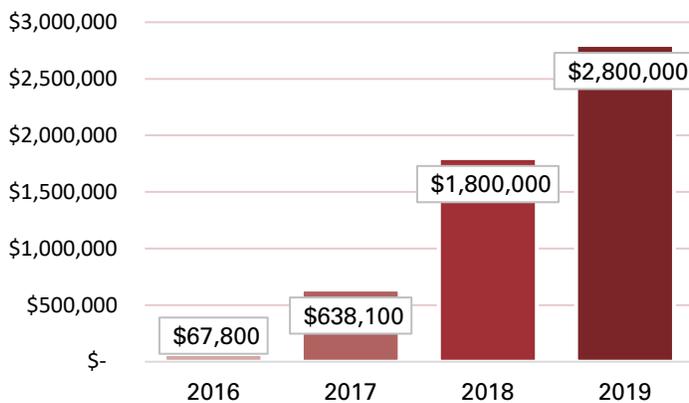
Iowa State University is poised to build a more systematic approach to reducing the cost of course content for our students by utilizing affordable materials such as Open Educational Resources (OER), library licensed materials, and Immediate Access content. Interest in both Immediate Access and OER has grown substantially in the years since each initiative began, and student savings have been growing steadily. The committee hopes to capitalize on this growing interest in 2020.

Over the past year, the partnership between the ISU Book Store, University Library, CELT, and other campus partners has had a meaningful impact on the Iowa State campus community. Key findings from our work suggest that **the continued promotion of affordable course content on campus could have a profound impact on Iowa State students.** Some of the key findings and outcomes from our work are highlighted below.

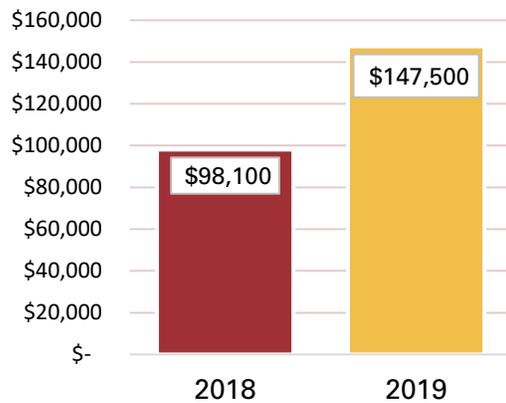
KEY FINDINGS

Use of Open and Affordable Course Content on Campus is Rising

Immediate Access Savings



OER Savings



In calendar year 2019, 32 courses have reported using open educational resources, up from only 14 courses in 2018. These 32 courses have saved students approximately **\$147,500** in 2019.

In calendar year 2019, 197 courses used the Immediate Access Program on campus, up significantly from 64 courses in 2018. These 197 courses helped students save **\$2.8 million** in 2019.

Open and Affordable Course Content Supports Student Success

By investing in support for instructors who want to use affordable course content, the Open & Affordable Education Committee hopes to make a high quality Iowa State education more attainable for our students.

Access to affordable course content has been shown to **enable higher enrollment numbers, lower drop rates, and better learning outcomes for students.**^{1, 2} This is not necessarily because affordable course materials are better overall, but because students who might not have been able to afford more expensive course content can access this material needed for their coursework.³

“By investing in these programs, we are investing in our students’ success and persistence through college.”

Open educational resources, book rentals, and content that is made available through the Iowa State Immediate Access program are all more affordable than their counterparts by design. By investing in these programs, we are investing in our students’ success and persistence through college.

Faculty Need Support to Find and Use Open and Affordable Course Content

The base of Iowa State University’s Affordable Course Content Initiatives lies in our outreach and support to the campus community. Through our partnerships with CELT, the ISU Book Store, and the University Library, our committee hopes to better support faculty as they change the course materials they use in the classroom.

Although using affordable course content can help students succeed in a course through access to their material, any change in a course’s design necessitates instructional design support as well. Our committee helps faculty through that change by offering consultations to instructors looking for OER, help getting an Immediate Access option for their course, support integrating content into Canvas, and more. One of the biggest barriers we’ve found is that faculty do not understand all of the affordable course content options available to them, or the differences between these options.

In 2020, our committee hopes to tackle this problem by continuing to present to departments across campus and by developing additional education and outreach materials about the affordable course content initiatives we support.

¹ Nicholas B. Colvard, C. Edward Watson, and Hyojin Park, “The Impact of Open Educational Resources on Various Student Success Metrics,” *International Journal of Teaching and Learning in Higher Education* 30, no. 2 (2018): 262-276. <http://www.isetl.org/ijtlhe/pdf/IJTLHE3386.pdf>

² Lane Fischer, John Hilton III, and Jared Robinson, “A multi-institutional study of the impact of open textbook adoption on the learning outcomes of post-secondary students,” *Journal of Computing in Higher Education* 27, no. 3 (2015): 159-172. <https://link.springer.com/article/10.1007/s12528-015-9101-x>

³ Phillip J Grimaldi, Debshila Basu Mallick, Andrew E Waters, and Richard G Baraniuk, “Do open educational resources improve student learning? Implications of the access hypothesis.” *PLoS ONE* 14, no. 3 (2019). <https://doi.org/10.1371/journal.pone.0212508>

INTRODUCTION

COMMITTEE CHARGE

The Open & Affordable Education Committee (OAEC) at ISU is a partnership formed in 2017 between the University Library, CELT, ISU Book Store, faculty, Student Government, and the Office of the Senior Vice President and Provost. Through our various initiatives, we aim to lower the cost of course materials for Iowa State students.

In 2019, the committee was charged to:

- Examine national trends regarding OER and make recommendations regarding best practices of their use.
- Examine the current use of OER across ISU and make recommendations to increase their use while respecting faculty rights and responsibilities.
- Identify any impediments to OER and other affordable course materials adoption at ISU.
- Explore additional affordable course material initiatives that could be developed in the future.
- Continue to lead and administer the committee's existing OER initiatives ([Open and Affordable Education Committee Charge](#)).

AFFORDABLE COURSE CONTENT DEFINITIONS



Figure 1: Open & Affordable Course Content Descriptions

- **Open educational resources (OER):** educational materials that are free of cost and access barriers, and which also carry legal permission for reuse. Materials can be accessed online or in print.
- **Immediate Access:** a program offered through the ISU Book Store that works with vendors to provide a discounted rate on a textbook and other learning materials by opting students in to pay for a digital package through their U-Bill.
 - **RedShelf:** an e-book platform that works with the ISU Immediate Access program to offer easy access to online textbooks.
- **Library licensed materials:** Content available through the University Library. This content may be used in a course or for research purposes.

- **Course Reserves:** a program offered through the University Library that sets aside library-licensed materials that are used by a class. These materials can include streaming videos, articles, e-books, and physical items such as books or CDs.
- **Auto-purchase programs:** These programs follow a similar business model to our Immediate Access program. Publishers institute a per-student fee to access content such as homework software, OER, and other course materials at an affordable rate, typically less than \$50. The OAEC does not actively support many of these businesses, as they often co-opt messaging around OER while still charging fees to access content. However, there are a few businesses we support that fall under this category (e.g., TopHat courseware, Lumen Learning).

COMMITTEE MEMBERSHIP

- Abbey Elder, University Library, Chair
- Heather Dean, ISU Book Store, Co-Chair
- Curtis Brundy, University Library
- Lesya Hassall, CELT
- Harrison Inefuku, University Library
- Roberta Johnson, Financial Aid Office
- Christine King, University Library
- Sayali Kukday, GDCB faculty
- Sarah Moody, Student Government
- Geoff Sauer, ENGL faculty
- Rob Whitehead, ARCH faculty
- Cyndi Wiley, Digital Accessibility
- Mason Zastrow, Student Government

ENVIRONMENTAL SCAN

As the cost of higher education has risen, institutions have targeted the cost of textbooks to improve college affordability for students. One of the first affordable course content types promoted by the committee was open educational resources (OER), defined by SPARC as “teaching, learning, and research resources that are free of cost and access barriers, and which also carry legal permission for open use.” The committee has since expanded our work to support other affordability programs such as Immediate Access and Course Reserves.

NATIONAL TRENDS

Affordability Is a Major Concern for Colleges

- College affordability has been a major concern for decades, but these concerns have been amplified in recent years as increases in tuition and fees, along with growing student poverty rates, have contributed to growing levels of student homelessness and hunger.^{4,5}
- In a recent survey by StudentWatch, 36% of students reported that they did not have any of their required course materials on the first day of class, and only 35% of students reported having all of their required course materials on the first day of class.⁶ This lack of preparedness can contribute to students falling behind on coursework and receiving worse grades.
- High textbook costs have resulted in a rise in piracy among college students, many of whom are choosing to download an illegal copy of their course text rather than purchase it.⁷

Affordability Initiatives Are Making an Impact

- Student spending on textbooks has begun a gradual decline over the past ten years, and students are increasingly using digital materials (i.e. ebooks, Immediate Access texts) and free course content (i.e., OER, Course Reserves), though full price, print texts are still commonly purchased.^{8,9}

⁴ Clare Cady, “Students shouldn’t have to choose between books and food,” *The Chronicle of Higher Education*, February 28, 2016, <https://www.chronicle.com/article/Students-Shouldn-t-Have-to/235519>

⁵ Wick Sloane, “Food Is a Basic Need: Dealing With Hunger on College Campuses,” *Higher Education Today*, May 31, 2017, <https://www.higheredtoday.org/2017/05/31/dealing-with-hunger-on-college-campuses/>

⁶ Julie Nemeč, “NACS Report shows 14% decrease in spending on college course materials,” Press Release, July 24, 2019, <http://www.nacs.org/advocacynewsmedia/pressreleases/tabid/1579/ArticleID/867/Student-Spending-on-Course-Materials-Declines.aspx>

⁷ Agnete Steine, “The Increased Problem of Textbook Piracy in Educational Publishing,” *Medium*, October 21, 2018, <https://medium.com/@17072902/educational-publishing-and-textbook-piracy-b3d2de3725e3>

⁸ Julie Nemeč, *ibid.*

⁹ National Association of College Stores, “Highlights from Student Watch Attitudes & Behaviors toward Course Materials 2017-18 Report,” n.d., <https://www.nacs.org/research/studentwatchfindings.aspx>

- Access to affordable course content can support higher enrollment, lower drop rates, and better learning outcomes for students, if this work is supported on campus.¹⁰
- Using open & affordable course content can benefit learners and educators beyond cost savings by allowing for further innovations in teaching and learning.¹¹

FACULTY PERCEPTIONS OF OER AT IOWA STATE

In 2019, a survey was conducted at Iowa State University through the Institutional Research Office to gauge faculty interest in the use of open educational resources. 118 faculty responded to the survey. Of these 118 faculty, 23 indicated that they currently use open educational resources in their classes and 71 faculty indicated interest in using OER in the future, if there is sufficient support available to help them make the change.

In addition to the survey mentioned above, a longer, qualitative survey was sent out in spring and garnered 60 faculty responses. The responses to this survey were similar, but brought out more data regarding barriers to faculty use of OER in the classroom. The disciplinary breakdown of Iowa State faculty who participated in the latter survey can be seen in Figure 2 below:

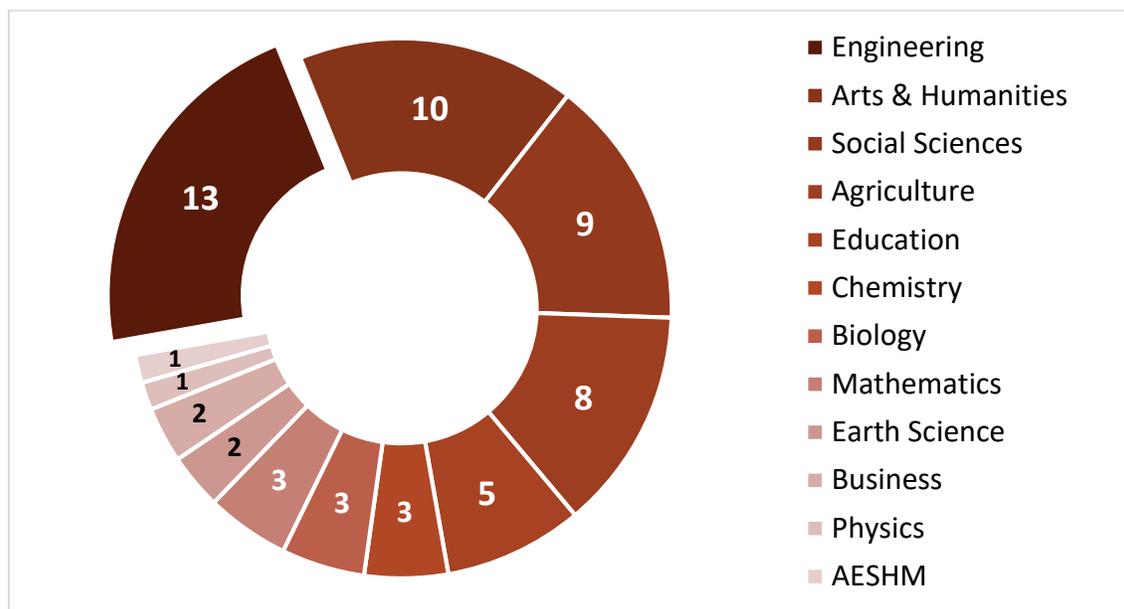


Figure 2: Faculty participants by discipline

¹⁰ Lane Fischer, John Hilton III, and Jared Robinson, "A multi-institutional study of the impact of open textbook adoption on the learning outcomes of post-secondary students," *Journal of Computing in Higher Education* 27, no. 3 (2015): 159-172. <https://link.springer.com/article/10.1007/s12528-015-9101-x>

¹¹ Online Learning Consortium, *2018 Digital Learning Innovation Awards*, 2018, <https://onlinelearningconsortium.org/about/olc-awards/2018-digital-learning-innovation-award-winners/>

Barriers

1. Lack of awareness about support available

<i>Perspectives on current support for OER on campus</i>				
	Our initiative is helpful	I know we have an initiative but I haven't worked with them	I'm unsure if we have an initiative	Our campus does not offer this support
ISU Faculty	15% (n=9)	18% (n=11)	57% (n=34)	10% (n=6)

- In addition to not knowing that there is an OER initiative in place on campus, 33% of faculty indicated that they would like to see a grant program on campus to support their development or use of OER, despite the fact that we do have a grant program in place.

2. Lack of time, discoverability

- Most faculty (n = 42/60) stated they cannot adopt OER because they lack the time to locate and assess available resources.

3. Lack of departmental or institutional support

- In addition to believing that our campus did not have any support available for faculty interested in pursuing OER for their course or other affordable course content options, some faculty felt that Iowa State University (and their department in particular) was averse to the idea.
- One faculty member went as far as to say:
“I like the concept of OER if I understand it correctly. However with my particular college faculty, **this concept goes against everything they are taught and everything that is expected in their P&T process.**”

Study Limitations

These two surveys were intended to explore perceptions around OER specifically, and lack detail on faculty perceptions around the other affordability initiatives supported at Iowa State. The committee is hoping to run a similar study next year to understand more of the faculty and student perceptions around all of our affordability initiatives, not just OER.

STUDENT PERSPECTIVES

To help understand how our work can help our students, members of the Open & Affordable Education Committee have worked on two projects over 2019: a survey and a series of video interviews around the student experience regarding textbook costs.

Student Stories Survey

In spring 2019, the University Library asked students to share their stories with textbook costs through an open-ended survey. This was not an official study and was intended only to explore the current campus climate around textbook costs. 23 responses were recorded, a few of which are highlighted below:

“textbook prices are generally too high to be worth paying for, and I've stopped purchasing them and instead pirate when I can.”

“I use discount websites to rent textbooks or I borrow necessary books from my peers; the cost of textbooks is needlessly prohibitive [sic] to students, and I try to cut costs however I can.”

“Books are getting so expensive and its [sic] honestly not affordable. As an out of state student, tuition is already high and with books to add to that, ugh. This semester I got 3 books from friends.”

Student Stories:

Share your Experience with Textbooks

Have you had a bad experience with expensive textbooks or a great experience with affordable textbooks? Want to share your story with your professors and others at ISU?

Visit our booth in the Library lobby from 1-3pm or fill out our anonymous Google survey right now:

<https://goo.gl/MgmAod>



Figure 3: Student Stories survey handout

Student Stories Videos

In addition, the committee has collaborated with the ISU Student Government on a series of video interviews with students about the cost of textbooks and how using free or low-cost textbooks has impacted their education.

Purpose: The videos were created to share how ISU students deal with high textbook costs and to raise awareness about how textbook costs are affecting out student body.

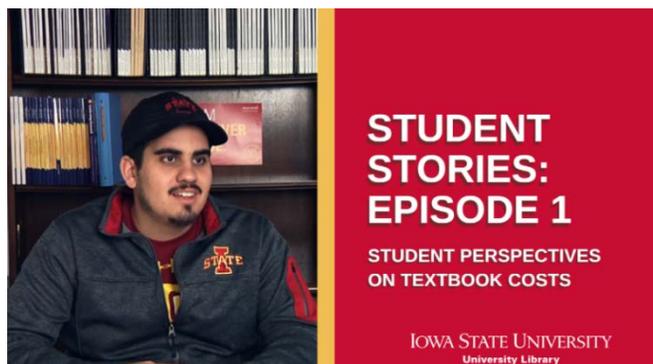


Figure 4: Student Stories video 1 thumbnail

Next Steps

In 2020, we are hoping to build upon this work by running a large-scale survey about student perspectives on textbook costs and the materials used in their courses.

STRENGTHS

- ISU's land-grant mission supports affordable education
- The OAEC is supported by campus administration
- Student Government supports and endorses our work
- Multiple affordable options give faculty options

WEAKNESSES

- Iowa State is a research-focused university and does not stress teaching in the tenure & promotion process
- Faculty that teach multi-section courses cannot make independent decisions about course material adoptions
- There is a general lack of understanding on campus surrounding the open & affordable course content options available for faculty

OPPORTUNITIES

- There are many general education courses that have "plug and play" affordable course content options available
- More affordable course content is being developed and published each year

THREATS

- There is a general lack of affordable content options for higher level courses
- Immediate Access is not available for all titles or publishers and some OER are not optimized for print
- Some textbook providers (Barnes & Noble, Cengage) are using the term "OER" for paid platforms that may confuse instructors

Figure 5: Affordable Course Content SWOT Analysis

CURRENT PROGRAMS AND SUPPORT

OUTREACH AND AWARENESS

Since the OAEC's inception in 2017, the group has worked consistently to promote the use of OER and other affordable course content on campus through marketing efforts, funding opportunities, and other support for faculty.

Websites

One of the projects that the OAEC completed in 2019 was the creation of a website on OER. As one of the newer resources promoted by the committee, OER can be confusing for faculty and myths about the resources are rampant. To educate stakeholders on these resources and provide information about the OAEC, this website provides:

- resources about OER, including an FAQ, information for students page, and several informational pages for faculty;
- a showcase of OER Trailblazers, showcasing [22 faculty members](#) who are currently using OER in their courses, or who have adopted OER for their courses in the past year; and
- an [About Us page](#) with information about the OAEC, our work, and the other affordable course content initiatives we promote.

On average, 85 unique individuals visit the OAEC's website each month (based on IP address). Most of the visits focus on the webpages for the Miller Open Education Mini-Grant Program and the OER Trailblazers showcase.

In addition to this website, there are also subpages related to our work in the following places:

- The Office of the Senior Vice President and Provost acknowledges our work through their websites' [Initiatives page](#).
- The ISU Book Store's website has a section on [Course Material Affordability](#) that hosts the [brochures](#) developed by our committee.
- The University Library has resources available for faculty about [Open Education and OER](#).

Presentations Across Campus

In the spring semester of 2019, Abbey Elder [LIB] and Heather Dean [BOOK] created a collaborative presentation highlighting OER and Immediate Access to present to departments that are considering either or both options for their courses.

- **Economics department** (September 2019)
 - **Feedback:** 1 instructor reached out with interest in OER options for their ECON 101 course after the presentation.

- **Psychology department** (October 2019)
 - **Feedback:** 1 instructor in the department stated that they were happy with the OER they currently use after the presentation.
- **Genetics, Development, and Cell Biology department** (November 2019)
 - **Feedback:** 2 instructors expressed that they were pleased with their current Immediate Access texts. 1 instructor reached out for more information about OER options for their course.

Other presentations given over this year included:

- **Faculty Senate Presentation** (November 2019) – Heather Dean [BOOK] and Abbey Elder [LIB] were given the opportunity to present collaboratively about their partnership and the OAEC’s work on campus during the November Faculty Senate meeting.
- **CELT Teaching Technology Conference** (October 2019) – Abbey Elder [LIB] and John Wierson [BOOK] presented alongside faculty discussing affordable course content options that can be used in Canvas.
- **Provost’s Council meeting** (April 2019) – Heather Dean & Rita [BOOK] updated the Provost’s Council on the impact Immediate Access has had on campus and Ann Marie Vanderzanden [SVPP] provided updates from the Open & Affordable Education Committee regarding OER in particular.
- **CELT Online Learning Community presentation** (March 2019) – Heather Dean [BOOK] and Abbey Elder [LIB] presented to faculty and staff at a meeting focused on online learning, Canvas, and instructional design with CELT.

News Articles

INSIDE IOWA STATE ARTICLES

- [Benefits of open-source, digital course content extend beyond savings](#) (March 2019)
- [New content is focus in second year of Miller OER grants](#) (August 2019)
- [From different angles, library and bookstore seek student savings](#) (November 2019)

YOUR LIBRARY NEWSLETTER ARTICLES

- [Open and Affordable Education Committee launches new website](#) (February 2019)
- [Librarian talks OER at state capitol](#) (March 2019)
- [Top three things to learn from Open Education Week 2019](#) (March 2019)

STATEWIDE OUTREACH & LEADERSHIP

- Abbey Elder (University Library) gave a presentation to the Iowa Legislature on OER and represents Iowa State University on a statewide committee for advancing OER use in Iowa.
- The ISU Book Store was one of the first institutions to adopt an Immediate Access program and they have innovated in that space.
- The Center for Excellence in Learning & Teaching (CELT) has helped to promote innovative teaching practices at Iowa State such as team-based learning and has broken new ground for advancing accessibility, online course design, and the effective use of Canvas at Iowa State.

MILLER OPEN EDUCATION MINI-GRANTS

The Miller Open Education Mini-Grants provide funding that enables faculty to create and use open educational resources (OER). Through the Miller Open Education Mini-Grants, faculty who are interested in OER are able to get additional support to develop or integrate OER into courses taught at Iowa State.

Projects: 23 mini-grants awarded to affect course materials used in 31 courses; 13 pilot projects have been completed; 10 projects are currently in development.

Mini-Grants Pilot Feedback

This first year of grant funding for OER at Iowa State yielded projects from several academic disciplines with different approaches to open education. For example, Michael Brown's project, "Opening Pathways to Data Science for Human Science Graduate Students" integrated the open source software R into the classroom to help students learn with a tool they can all afford to continue using after graduation. One of Michael's students commented:

"I enjoyed this class much more than I originally thought that I would. I would very much like to continue learning more about education statistics and research statistics in general, for more than just practical applications. I like being able to be a more informed consumer when it comes to reading and understanding research studies... This class definitely met all of my personal goals, and then some."

Meanwhile, in NREM 240, Adjunct Assistant Professor Peter Moore created a [Quantitative Problem Solving textbook](#) for his students that brought practical issues they would encounter in their professional work to the forefront. The textbook has been downloaded more than 400 times since it was published this summer and has already been used in a course at Drake University in Fall 2019.

In the reports grantees were required to submit at the end of their grants, they were asked to identify opportunities and barriers to their projects. A qualitative review of this feedback revealed the following themes among the requests for additional support:

1. Planning

Projects often started out small but grew in scope as instructors began their work; while this is a good thing for our program, it is not sustainable for projects.

2. Networking

Awardees expressed interest in meeting each other and former awardees early in the funding cycle to exchange ideas and learn from those with more experience.

3. Assessment

Many of the grant applicants had trouble understanding the different options available for assessing their projects, and needed to consult with CELT at the end of their grants.

We have used this feedback to structure support for the second round of mini-grant recipients already by offering pre-grant workshops and planning meetings. Further, the second round of mini-grant recipients have had regular check-ins with the University Library's Open Access Librarian throughout their project timeline.

STUDENT GOVERNMENT SUPPORT

Since 2017, the Student Government has stayed a steadfast partner of the OAEC, with a sitting representative on the committee each year. In addition to the resolution and proclamation in support of OER specifically passed in previous years, the Student Government is now looking to support faculty using open & affordable course content in their classrooms more proactively.

Affordability Award for Faculty

We are working with Student Government on the creation of a new award for instructors who use affordable course content and who students believe are devoted to affordability. Professors eligible for the award may use OER, Immediate Access texts, or free course materials in their courses.

- **Purpose:** To promote the continued use of open and affordable course content on campus by expressing appreciation for instructors who adopt these materials in their courses.

RECOMMENDATIONS

Based on the findings in this document, the committee has compiled the following recommendations to sustain and further develop our work:

SUSTAIN

1. Receive Regular Funding for the Miller Open Education Mini-Grants

The Miller Open Education Mini-Grant Program has helped faculty at Iowa State locate, develop, and integrate OER into their courses more effectively than they might have on their own. This impact, coupled with the requests for funding noted in our survey of faculty, show a clear need for continued support to help instructors adopt new and innovate materials that can be used at Iowa State.

After running the program for two years, we believe that our committee could continue to support the mini-grant program with \$20,000 per year. Because of this, we are requesting \$20,000 in annual funding from the Provost to sustain the Miller Open Education Mini-Grant Program.

SUPPORT

2. Develop an Institutional Resolution or Recommendation for Affordability

One of the concerns that came out of our discussions with faculty was the belief that Iowa State does not care about textbook affordability and that departments do not value faculty work to make their courses more affordable. One way this could be mitigated is through an institutional or faculty resolution to support the use of OER and other affordable course content on campus. As Skidmore (2019) states:

“Policies have the ability to reflect and support the culture of their institutions by establishing and codifying procedures that will sustain particular visions. Policy can be a grassroots tool as much as an administrative one, especially when we recognize that policy is often established in response to and part of an ongoing dialogue on topics of institutional importance.”¹²

Examples of such policies/recommendations are provided below:

- [John Hopkins Textbook Affordability Policy & Recommendation](#)
- [Ohio Faculty Council Textbook Affordability Initiative Resolution \[PDF\]](#)
- [Kwantlen Polytechnic University Open Education Strategic Plan](#)
- [Inclusion of OER in The University of British Columbia Tenure & Promotion Guide](#)

¹² James M. Skidmore and Myrto Provida, *A Place for Policy: The Role of Policy in Supporting Open Educational Resources and Practices at Ontario's Colleges and Universities*. (Ontario: eCampus Ontario, 2019). <https://www.ecampusontario.ca/wp-content/uploads/2019/08/2019-08-07-skimore-oe-policy-report.pdf>

GROW

3. Develop More Outreach & Education for Faculty

Although the Open & Affordable Education Committee has created events, programming, and workshops for faculty related to textbook affordability, we have found a lack of community around these topics on campus. In order to foster a Community of Practice for faculty interested in issues related to course content affordability, the Open & Affordable Education Committee will take the following approaches over the next calendar year:

1. Begin planning an **Affordability Summit**, a day-long event in Fall 2020 which will feature speakers, workshops, and research related to course content affordability. **Note:** Since the OAEC does not “belong” to any single campus unit, planning this event may require outside funding and need to be postponed until 2021, depending on how planning progresses in the spring semester.
2. Develop new **education & outreach materials** to help dispel confusion around the differences between Immediate Access, OER, Course Reserves, and other affordability options available to faculty. This will include the development of fact sheets, videos featuring faculty perspectives, and events hosted by the University Library and CELT. In addition, the committee will be collaborating with additional campus entities in spring, such as Financial Aid, New Student Programs, Institutional Research, and Admissions to assist in outreach and awareness building across campus.
3. Start a new **Faculty Learning Community** related to open & affordable course content, with an eye toward using these types of materials appropriately in the classroom and choosing the right content for your course. This is particularly important, as research has shown that instructors need to consider how changing the materials they use in their course will affect their students, whether they are switching to a digital-only approach or to new content altogether.¹³



Figure 6: Affordable Course Content Initiatives Framework, adapted from “[The Affordable Instructional Materials \(AIM\) Pillars](#)” by University of Central Florida’s [Center for Distributed Learning](#), licensed [CC BY-SA 4.0](#).

¹³ Matthew Pierce, “Looking at OER with a critical eye: Strengthening OER initiatives by focusing on student learning,” *Community and Junior College Libraries* 22, no. 1 (2016). <https://doi.org/10.1080/02763915.2016.1205391>