

Annual Report

July 1st, 2015 - June 30th, 2016

Educational Technologies at Missouri (ET@MO)

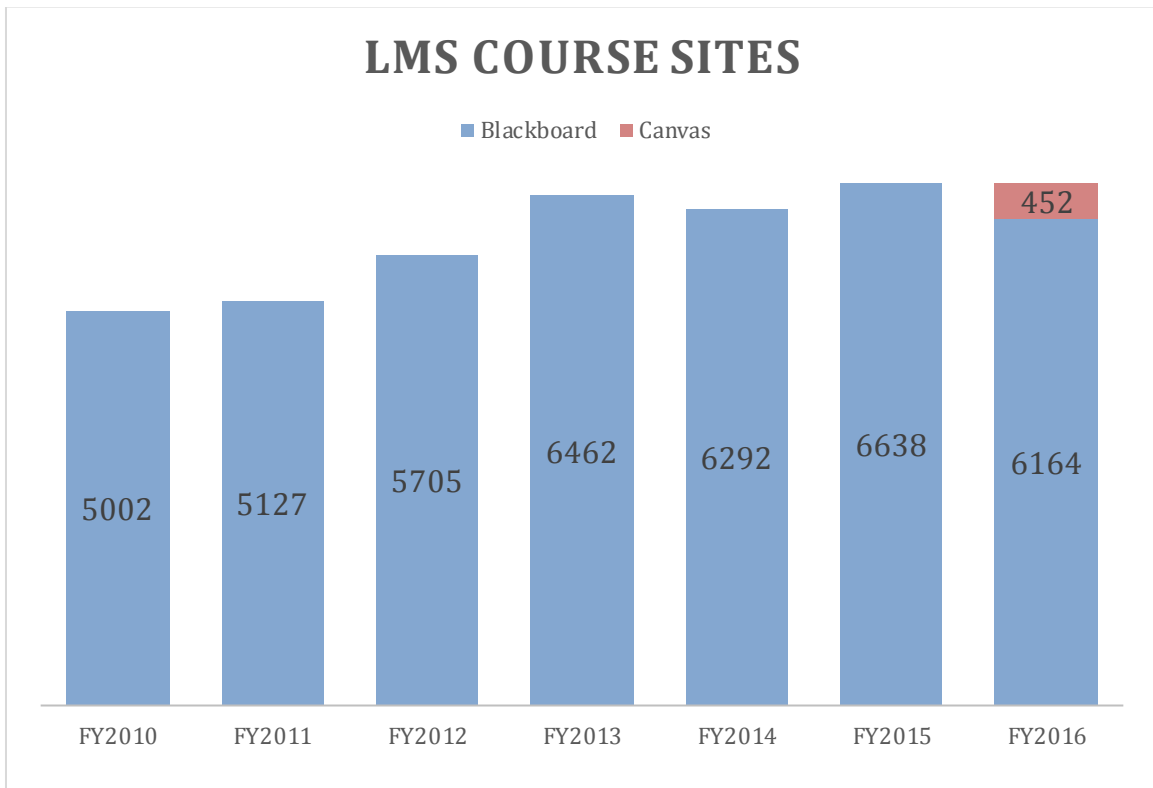
Dr. Danna Vessell
Director

ET@MO advances the meaningful use of educational technologies in teaching and learning at Mizzou through various programs, consultations and activities. We serve the learning technologies needs of MU faculty members, staff and students.

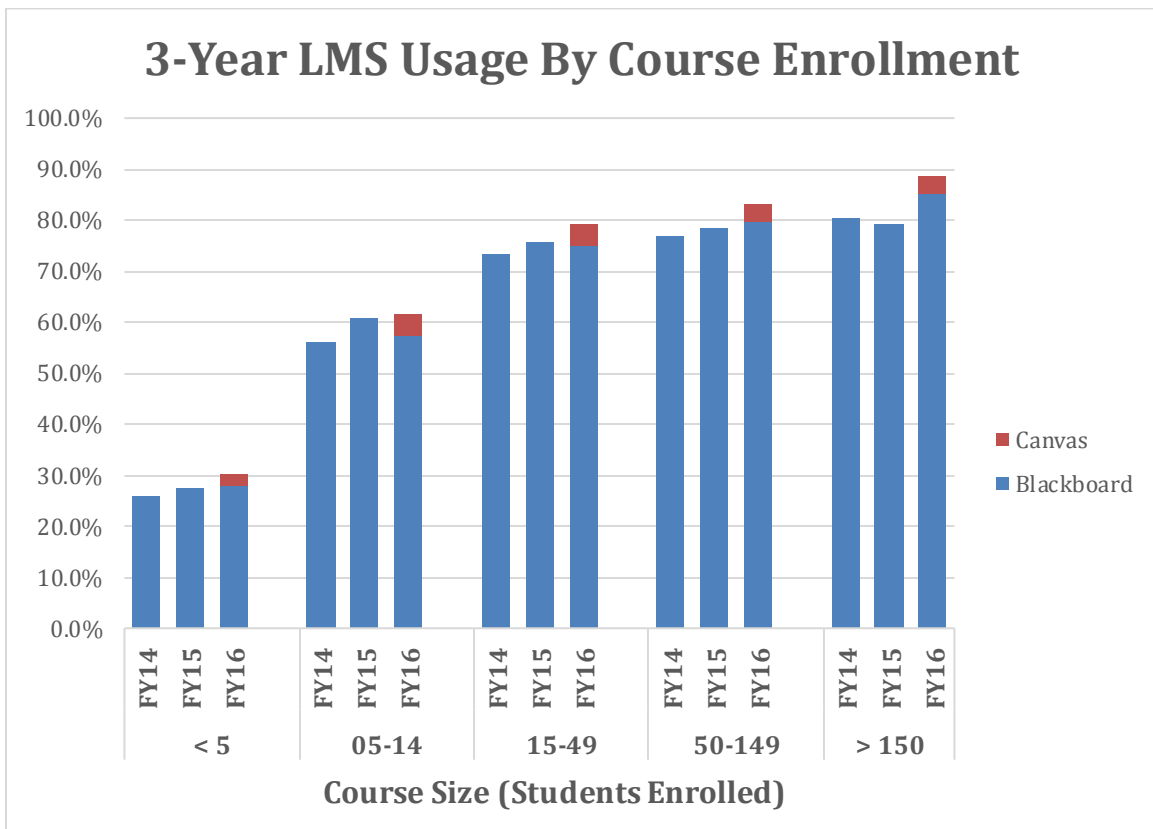
The professional staff at ET@MO continually strive to:

- 1) Provide an inclusive center for teaching well with technology.
- 2) Provide high quality technical and pedagogical support for instructors teaching with technology and second-level educational technology support for students.
- 3) Promote and maintain excellence in course design and development.
- 4) Work to increase and enhance web-assisted, hybrid, and online courses offered at Mizzou.
- 5) Support innovation in teaching with technology.
- 6) Advance faculty development at Mizzou.
- 7) Promote the scholarship of teaching and learning.

LMS COURSE SITES



3-Year LMS Usage By Course Enrollment



Educational Technology Use @ Mizzou		
	FY2015	FY2016
<i>Learning Management (Blackboard)</i>		
Percent of MU Courses using Bb	78%	74%
Percentage of MU Students w/ Bb Account	94%	100% ^[1]
Student Enrollments in Bb Course Sites	270,835	267,187
<i>Learning Management (Canvas Pilot)</i>		
Canvas Course Sites	[2]	488
Students using Canvas	[2]	11,066
Student Enrollments in CNVS Course Sites	[2]	14,643
<i>Lecture Capture (Tegrity)</i>		
Course Sites Utilizing Tegrity	1,102	1,129
Media Views by Students and Faculty	489,198	529,168
<i>Synchronous Collaboration (Bb Collaborate)</i>		
Students using Collaborate	17,714	24,231
<i>e-Portfolios (Sakai)</i>		
New Sites Created	148	103
<i>Media Encoding & Distribution (Kaltura)</i>		
Media Views by Students and Faculty	153,124	194,941
Students and Faculty using Kaltura	10,172	15,947
<i>Media Blogging (VoiceThread)</i>		
Student Enrollments in Voice Thread sites	2,846	3,034
<i>Student Response Systems</i>		
Courses Using i>Clickers	139	100
<i>Originality Checking & Plagiarism Detection (TurnItIn)</i>		
Instructors using TurnItIn in their courses	132	981
Students using TurnItIn	2,147	19404
<i>Mid Semester Instructor Feedback (MoCAT)</i>		
Course Surveys	752	706
<i>Student Retention (MU Connect)</i>		
Instructors Using MU Connect	[3]	1,738
Appointments Created Using MU Connect	[3]	144,729

Instructional & Pedagogical Support		
	FY2015	FY2016
Unique Instructors Who Consulted with an Instructional Designer or Instructional Developer one or more times	336	475
Unique Courses Worked on by an Instructional Designer/Developer	174	367
<i>Quality Course Reviews</i>		
Courses Reviewed	9	13
Est. Yearly Student Enrollments Impacted by Reviewed Courses	[3]	1344
<i>Online Teaching Foundations Program</i>		
Participants	[2]	71
<i>Course Redesign</i>		
Courses Funded	4	4

Faculty Development, Training, & Recognition		
	FY2015	FY2016
<i>Participation at Faculty Development and Training Events</i>		
Celebration of Teaching Registrations	460	425
Teaching and Technology Sessions (TnTs) Attendees	[3]	55 ^[5]
TeAchnology Fellows	5	3
Teaching Renewal Attendees	[2]	100
New Faculty Orientation Attendees	[4]	80
<i>Instructor Awards Facilitated by ET@MO</i>		
Excellence in Teaching with Technology Award Winners	4	4
Teaching with Technology Innovation Fund Awardees	11	11

Notes

- 1 Every student is automatically enrolled in Blackboard.
- 2 New Initiative for FY16
- 3 Data Element Not Tracked in FY15
- 4 Not Coordinated by ET@MO in FY15
- 5 5 Sessions Offered. Per session attendance average was 11.

Program Highlights

ET@MO plays a vital role in teaching and learning at the University of Missouri for both on-campus and online courses. ET@MO works with all MU faculty on course design, content development, technical consultations and support. These range from correcting a simple technology issue, to working with faculty over months on an in-depth design and development course collaboration. Together, the members of ET@MO provide deep expertise needed to perform the overall mission of the department with a rich diversity of experience that faculty can draw upon to support them in whatever teaching and learning need may arise.

After an extensive review and recommendation process, the faculty at Mizzou, ET@MO, DoIT, and the Provost agreed to further explore Canvas by conducting a pilot of the learning management system over the summer and fall semesters of 2015. As a result all members of ET@MO have devoted a significant time investment over the past fiscal year into acquiring deep expertise of the Canvas LMS, and supporting the faculty members who are exploring it, as well as compiling the data received in the pilots and developing a final recommendation (<http://lmsreview.missouri.edu>). This included supporting the two Canvas pilots as well as working with multiple groups at the university to make and vet the decision.

We hosted approximately 3,000 students in Canvas for the summer session, and around 5,000 for the fall 2015 semester. That number grew again in the spring, and continues to rise.

The pilots determined that instructors enjoyed the simple, easy interface with Canvas, and most preferred Canvas over Blackboard. Students also preferred Canvas, although by a smaller margin. Based on multiple sources of data from the pilots, the decision was made to award a five-year contract to Canvas and begin an 18 month conversion process to move all MU courses to the new system. We have been doing extensive planning for the transition, and will continue to support the faculty members so that this is a seamless switchover.

This is in addition to our normal activities supporting faculty through instructional design and development, pedagogy and technology support, professional development opportunities and recognition, which are detailed throughout this document.

Strategic Conversations

The staff members at ET@MO were able to assist with the dissemination, coordination, and strategic planning of issues surrounding teaching and technology on multiple levels by serving on or chairing the following campus committees:

- Technology Evaluation subcommittee
- MU Information Technology committee
- Campus IT coordination committee
- UM eLearning Academic council
- Learning Spaces committee
- LMS Review working group
- Learning Technologies Intercampus consortium
- Distance Education operations committee
- Disability Advisory committee
- Wireless Presentation in the Classroom committee
- Mizzou Online Advisory Council
- Mizzou Online Operations group
- Mizzou Online Proposal committee
- UM System Course Sharing
- Nursing Curriculum Redesign committee
- Accessibility Standards working group
- MU IT Transition organizational structure subcommittee
- Campus Writing Board
- Title IX Hearing Panel
- Open Educational Resources (OER) Committee

ET@MO staff members also volunteer to serve on a number of committees internal to ET@MO designed to garner deep expertise on a variety of topics that are salient to the educational technology domain today including:

- Mobile Learning committee
- Digital Citizenship committee
- eTextbooks committee
- ePortfolios committee

Instructional & Pedagogical Support

The instructional designers, instructional developers, and media production personnel at ET@MO provide a wide range of services and support for Mizzou faculty including course design & development, video production, interface and graphic design, quality course reviews, and program redesign. They also consult with faculty on a variety of topics such as course learning objectives, instructional alignment, student engagement, course accessibility and usability, assessment, syllabus construction, and creating or redesigning content.

In providing these services to faculty, designers and developers consulted with 475 different faculty members regarding an online, hybrid, or traditional F2F classes being taught here at Mizzou. This resulted in 367 unique courses being worked on by Instructional Designers and/or Developers.

This past fiscal year also saw the construction and rollout of the new lightboard technology in the Instructional Media Studio. This technology allows the production of instructional videos where instructors can draw highly visible diagrams and equations, annotate graphics, and write, all while facing their students.



The first course offering of the Online Teaching Foundations (OTF) program launched in Fall 2015 and was extremely popular with faculty, such that we easily filled the 25 available spots. In Spring of 2016 demand for the OTF course almost doubled such that we added a second section so as to accommodate the additional faculty. In total, 46 individuals participated in the program in SP16, giving us a total of 71 program participants in the first year. The OTF program is designed for Mizzou instructors that are interested in enhancing their online teaching skills.



This last year also saw a continuation of the work on our first Program Redesign project with the Sinclair School of Nursing. In this project, instructional designers from ET@MO worked with Nursing faculty and staff to create recommendations for enhancing the online option of the RN-BSN program.

In addition, ET@MO continues to offer the Course Redesign initiative to faculty, which provides an additional funding opportunity to support redesigning courses into a hybrid or fully online semester based course. The primary focus of the Course Redesign funds is to support substantive—preferably transformative—enhancements in the pedagogy or technology of individual courses, and the funds can be used for faculty release time and/or summer salary.

Newly Funded Course Redesign Projects (FY16)

ARCHST Green Building Science Lab (Laura Cole)
ARCHST 4440: Design Precedents after Indust Rev (Asha Kutty)
F_C_MD 8423: Clinical Research Methods II (Robin Kruse)
ISLT 9450: Intro to Research Methods in LIS (Jenny Bossaller)

It is estimated that these courses will impact approximately 80 students over the next fiscal year.

Faculty Development & Recognition



The annual Celebration of Teaching saw 425 registrations this year and once again had overwhelmingly positive reviews from the attendee feedback. ET@MO also assumed the responsibility of coordinating both the New Faculty Orientation and Teaching Renewal campus events, both of which were well attended with approximately 80 and 100 faculty attendees respectively.

2016 ERNEST L. BOYER INTERNATIONAL AWARD FOR EXCELLENCE IN TEACHING, LEARNING, AND TECHNOLOGY

“The Boyer award honors the world's most highly creative men and women who have contributed significantly to teaching, learning, and technology in higher education. An international panel of distinguished faculty reviews all nominations for the award and selects the winner, who is honored at the International Conference on College Teaching and Learning with a trophy and a \$5,000 cash award.” – <http://teachlearn.org>

2016 Boyer Award Winner
Anne Alexander, School of Law

For the third year in a row, and for the fifth time in the past 6 years, a Mizzou faculty member has won the Ernest L. Boyer award for Excellence in Teaching, Learning, & Technology. Anne Alexander joins past winners Sarah Bush (2015), Newton D’souza (2014), Bethany Stone (2012), and Elizabeth Baker (2011).



Anne Alexander

2015 ASSOCIATION FOR DISTANCE EDUCATION & INDEPENDENT LEARNING (ADEIL) HELEN WILLIAMS AWARD

“The Helen Williams Award honors the most outstanding college level credit course that opened during the previous year. The award recognizes the accomplishment of the instructor, author, primary editor and/or course developer who worked together to create an exemplary course.” -- <http://www.adeil.org>



Erin Anderson

Course: *ACCTCY 2026: Accounting I*
Instructor: **Erin Anderson**, Accountancy
Designer: **Marcie McGuire**, ET@MO
Developer: **Sandy Hockenbury**, ET@MO

EXCELLENCE IN TEACHING WITH TECHNOLOGY AWARD

The Excellence in Teaching with Technology Awards recognize excellence in the efforts of faculty, staff, teaching assistants and graduate instructors involved in using educational technologies to meaningfully improve teaching and learning.



Graduate Teaching Award
Anne Alexander, School of Law

Courses Highlighted:

- Law 5080: Legal Research & Writing
- Law 5085: Advocacy & Research



Undergraduate Teaching Award
Corey Webel, Learning, Teaching, & Curriculum

Course(s) Highlighted:

- LTC 4300: Learning and Teaching Number and Operation in the Elementary Classroom
- LTC 4310: Learning and Teaching Geometry and Measurement in Elementary Schools



Graduate Instructor/Teaching Assistant Award
Jessica Kettenbach, Biological Sciences



Staff Support Award
Jason Hall, Academic Support Center

E MENTOR PROGRAM

These individuals work with ET@MO to help facilitate good teaching with technology among their faculty colleagues through presentations, mentoring, and assisting with course reviews. The new cohort of eMentors includes:

Matt Ballou, *Art*

Tony Barbis, *Learning, Teaching & Curric.*

Elizabeth Behm-Morawitz, *Communication*

Jenny Bossaller, *Info. Sci. & Learning Tech.*

Tony Castro, *Learning, Teaching, & Curric.*

C.B. Chastain, *Veterinary Medicine & Surgery*

Jennifer Fellabaum, *ELPA*

Dale Fitch, *Social Work*

Robin Harris, *Nursing*

Dorina Kosztin, *Physics*

Linda Lair, *Health Professions*

Alexandra Lewis, *Social Work*

Kerri McBee-Black, *Textile & Apparel Mgmt.*

Gina Oliver, *Nursing*

Jacquelyn Sandone, *Romance Languages*

Bethany Stone, *Biological Sciences*

Jenna Wintemberg, *Health Sciences*

Technology Support

ET@MO provides administration, integration expertise, and faculty support to a growing list of educational technologies that comprise the current learning technology stack at Mizzou. This centrally supported technology stack includes:

- Learning Management Systems
 - Blackboard
 - Canvas*
- Electronic Portfolio System
 - Sakai
- Student Response Systems
 - i>Clicker REEF
 - Top Hat
- Student Retention Solutions
 - MU Connect (Starfish)
- Synchronous Collaboration
 - Bb Collaborate
- Lecture Capture
 - Tegrity
- Media Transcoding and Distribution
 - Kaltura
- Originality Checker
 - TurnItIn
- Student Feedback System
 - MoCAT
- Media Blogging
 - VoiceThread
- Publisher Tools
 - Various tools from Pearson, McGraw-Hill, Wiley, Macmillan, Norton, and Cengage



* *Piloting in FY16*

In FY2016, the technology resource coordinators at ET@MO responded to over 7,455 support requests concerning educational technologies from MU faculty, staff, and students. This represents a 17% increase in support requests from FY15, which was likely due to an increase of faculty questions surrounding the new Canvas LMS as part of the LMS pilot last year.

In working to help make the Canvas pilot successful, ET@MO staff played a critical role of integrating all of our learning technology stack currently used in Blackboard, to also work with Canvas. They also created new processes to aid in course provisioning, technology support, and administration of the Canvas LMS.



Another learning technology improvement we saw this past year was the upgrade of our virtual classroom technology, Blackboard Collaborate, to the new Collaborate Ultra. This upgrade included a new user interface, as well as removal of the Java dependency, which made the Collaborate platform much more accessible and easier to use for both faculty and students.

In addition to phone, email, and face-to-face consultations and support, technology resource coordinators provided over 72 training sessions surrounding our supported technologies, as well as group training sessions for departments and classes. ET@MO staff also provided consulting expertise on the new UM system course sharing initiative. Additionally, ET@MO staff help produce written and video documentation for faculty on the use of various technologies to be published on the etopics.missouri.edu website.



Our META team, comprised of graduate and undergraduate Mizzou students, continues to provide educational technology support for faculty members through phone, email, and in-office support. Additionally, every Thursday from 1-3 the META team assists in staffing the ET@MO open lab hours for faculty.

Scholarly Work

The professional staff at ET@MO continued to contribute to the national discourse on teaching with technology by publishing in academic journals and presenting at national and regional conferences focused on learning and technology issues.

Kammer, J. & Khanal, N. (2016). Assessment at a distance: In theory and practice. ACRL Distance Learning Section.

Liu, Y., Dannecker, E., & Kwon, K. (2015). Visualize presentation of your arguments: Connecting the dots. EdMedia 2016-World Conference on Educational Media and Technology, Montreal, CA.

Zhou, G. (2016). What the Journal Articles would Reside?: An Analysis of Journal Articles Sharing Issue. The Instructional Systems Technology Conference, Indiana University Bloomington

Zhou, G. (2016). Increasing Open and Public Access for Scientific Journal Articles, Poster for iConference, Philadelphia, PA

Zhou, G, Johnson, B. (2016). Fragmented Learning? Making the Most Out of Course Design with Instructional Alignment, Online Learning Consortium, New Orleans, Louisiana.

In addition, some professionals at ET@MO also volunteered their expertise and scholarship within the teaching and learning domain by serving as a(n):

- Tech Columnist for Informed Librarian Online
- OLC Online Learning Journal Reviewer
- Quality Matters Master Reviewer

Teaching and Technology Trends

ACTIVE LEARNING & FLIPPED CLASSROOMS

For the past few years the terms active learning and flipped classrooms have been popular buzzwords in academia. This year is no different as we see instructors continue to look for ways to make learning during their face-to-face class time more active and less passive. ET@MO continues to help assist faculty with these challenges, offering a number of individual consultations as well as group training sessions on these topics.

LEARNING ANALYTICS

We are seeing rapid development and interest from various learning technology vendors and publishers in creating and incorporating more robust learning analytic dashboards for instructors and institutions. These dashboards allow instructors to drill down student activity and interactions with course content, assessments, and class activities. We are continuing to explore these dashboards as we further seek to understand their long-term impact on teaching and learning.



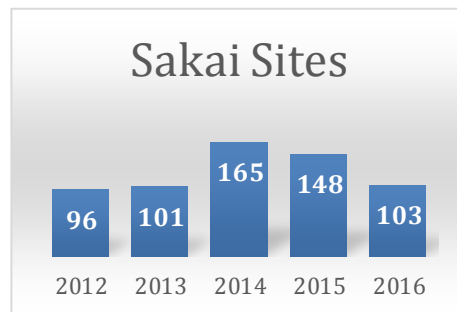
Screenshot of Canvas Course Analytics Dashboard

ADAPTIVE & PERSONALIZED LEARNING

Another trend we have seen, particularly from the big publishing companies, is the creation and marketing of adaptive and personalized learning products such as myLab, Knewton, and Learnsmart. These products attempt to use feedback from assessments to personalize the content presented to the learner. As an example, based on mastery of a concept, a personalized learning system may present remediation in the form of additional content with highlighted areas to indicate to the learner the concepts they need to review further. At Mizzou we have not seen widespread adoption of these tools, but we have seen an increase in publisher interest and marketing in these areas.

SAKAI PHASE OUT CONTINUES

As we continue to phase out Sakai, we have now moved most of the non-portfolio course sites off of Sakai and either back to Blackboard, or to Canvas as part of its pilot. By Fall 2016 we anticipate only a few non-portfolio course sites running on Sakai, with the remainder of sites being full e-Portfolio sites. As part of the Canvas LMS review, we have a couple faculty members trying out the ePortfolio solution on Canvas to see how it meets their needs.



Goals for ET @MO in 2016-2017

During the past twelve months, we are proud to share that ET@MO has accomplished much towards the goals we set at the beginning of last fiscal year. We have completed the core course and electives for the Online Teaching Foundations program, and offered the first session to faculty starting in fall 2015. We now have a final decision on the LMS which has been vetted with all the proper administrative levels, and a signed contract with Canvas. We also received the results of an external program review, which was helpful in determining our strategic directions going forward.

The goals for this year include:

- Support faculty through the transition to Canvas
 - Work to make this potentially difficult transition as easy and seamless as possible for our faculty and students. This will include significant planning for support, hiring additional help, transitioning many of the courses ourselves, and communicating and marketing the change effectively. This will occupy an enormous amount of time and effort over the next year.
 - Concurrent with this transition, we will further explore ePortfolio options and other third party technologies with the chosen LMS setup and make a recommendation regarding those.
- Continue to market and expand our many faculty professional development opportunities, such as our “Teaching n’ Technology” Series and Teachnology, as well as our services that promote excellence in course design and development, such as Quality Course Reviews, the Instructional Media Studio, and Course Redesign. We will also join the effort to have a common calendar among all the VPUGS units, and will market our opportunities and services through that channel as appropriate.
- Develop a formal strategic communication plan, as recommended by our program review, either by working closely with our staff members or by having a marketing student or the AdZou team develop one. In particular, the plan will highlight some of our higher priority services and news;
 - The transition to Canvas
 - Quality Course Reviews
 - Instructional Media Studio
 - Course Redesign
- Examine the data sources available to us and determine best fit for each type in order to support overall strategic decision making. In particular, develop new ways of looking at faculty satisfaction with and usage of the programs and services offered by ET@MO.
- Continue our work over the next year in helping faculty members “teach well with technology” by supporting innovation in teaching and learning, providing excellent design and technology assistance and furthering strategic conversations around excellence in teaching wherever possible.