Making Online Happen at Your Institution: Strategies and benefits of implementing online programming

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1. ABSTRACT

Online instruction has changed the way people work, teach, and learn. By expanding traditional instructional methods and environments it has also created tremendous opportunities for teacher and learner alike. Meanwhile, an increasing number of school districts, colleges, organizations, agencies, and businesses seek to take advantage of the unique quality and convenience made possible through online delivery methods.

When faced with the question of how to incorporate the strategies and benefits of online programming, institutions must weigh the rival advantages of outsourcing online training needs versus developing an internal and ongoing infrastructure of resources and knowledge.

In 2003, The College of St. Scholastica (CSS) provided its first online course for students. Since then, CSS has expanded its online programming to its current array of programs in Health Information Management, Nursing, Education, and Computer Information Systems. Fully online courses are also available in areas of Business Management, Religious Studies, Social Work, and other areas.

Currently, CSS uses both internal and outsourced approaches to deliver online programs. For those institutions seeking to establish their own human-resource-base of knowledge and skill, this case study will provide a transferable set of ideas and resources to assist them in these efforts.

Keywords: eLearning, online, training, education, multiple intelligences, teaching, human resource.

2. INTRODUCTION

The Institutional deployment of online training and course content delivery involves both advantages and challenges. After the selection of a course management system (CMS) to develop and deliver online courses, one of the first challenges is to identify and develop effective faculty and trainers.

Such functions can of course be outsourced; Yet, some institutions prefer to build their own capabilities in order to position themselves for long-term independence and growth in this area. Training in the practical and pedagogical aspects of online course design and instruction is essential, and it can be applied to fully-online distance education or to online resources that will be used to augment classroom experiences.

Institutions may want to consider implementing online professional development programs for their most valuable resource – their employees. This can be especially useful for those with many employees or multiple sites.

In the area of education, online instruction involves practical and pedagogical demands and benefits. As in any other institution, whether to use an online course management system to develop a supplemental, hybrid, or fully online approach to delivery depends very much on the students, locations, and content involved.

At some colleges and organizations, on the teaching staff may see less need for travel and the provision of 24/7 training as a great convenience for teachers and students alike. For these practicing educators who welcome online training, the challenge will be: (1) to provide tools and strategies that will help them translate their existing training to the online environment, and (2) to help them expand their thinking to encompass and address the resources involved in a course that is situated in the information-rich environment of the Internet.

Other newcomers to the field of professional development and instruction may have different strengths and weaknesses to address. While they may take a fresh and enthusiastic approach to incorporating Web sites, articles, videos, and other resources into their courses, they may have greater concerns about their role and the processes of instruction and instructional design. For example, they may be effective in locating resources and using the technology, but may be less adept in areas such as basic instructional methods, the expectations of students, and the effective presentation of course materials.

To support institutions and individual trainers in their efforts to master online delivery methods, this paper will describe the program that is now in place at The College of St. Scholastica (CSS.) Its purpose is to prepare faculty, staff, and graduate students to teach in the online environment. Although we will touch upon a range of

training strategies, our primary focus is a description and analysis of strategies used in two fully online courses. One is a professional development course for faculty and staff entitled "Teach Online with WebCT Blackboard." The other is entitled, "Online Teaching Methods" it is taught to graduate-level college students from a variety of disciplines. The former has been taught regularly since November 2004.

3. TRAINING AND SUPPORT FOR ONLINE INSTRUCTORS

Convenience and control are key elements of success in any instructional program (Kravik, Caruso, & Morgan, makes access to our online CMS universally available.

The overall instructional program for faculty and staff is developed and maintained by the Academic Technology Coordinator (ATC), and its components include non-technical as well as technical strategies. Spring "Tours" of online classes, sharing sessions for faculty who use the online environment to teach blended classes and/or to extend the reach and support of a traditional face to face (F2F) are a few strategies used.

2004). For this reason, efforts to encourage voluntary learning and use of our online course management system has involved a variety of approaches intended to address the full range of needs, learning styles and schedules of faculty and staff at the college. It is important to note that, in addition to the ongoing training opportunities, the College's Information Technologies (IT) department automatically generates a WebCT Blackboard site for every course that is being taught. While this is a practical as opposed to pedagogical innovation, it is significant in that it

The programs described are intended to recruit online instructors and improve their comfort and competence in the online teaching and learning environment. However, many of these approaches are also transferable to the needs of businesses, organizations, and agencies seeking to implement online training programs that may involve employees who are home-based or who work at a variety of sites.

Please see Table 1 for details.

Table 1. Training Opportunities for Online Instructors and Trainers (Practical and Pedagogical)

Open Labs & Training Sessions	At a designated time each week, faculty and staff can stop by the computer lab for training and help. The Open Labs are generally attended by 1-5 people, making it possible to provide individual attention and to meet the needs of advanced as well as new users of the technology. The sessions are advertised in the college's daily email announcements and are also posted on the Training page of the Academic Technology Center Web site.
Workshops	CSS has campuses at five sites across Minnesota. For this reason, site directors from the different campuses schedule annual or bi-annual workshops to ensure that faculty and staffs who prefer at least some face to face support will have access to these professional development opportunities. Workshops are also offered on the main campus in Duluth, Minnesota, and they are generally requested by individual departments, with the content to be adapted to address a specified set of teaching and learning goals. For example, one workshop might focus on general approaches to setting up a basic site and presenting resources to students while another workshop may emphasize strategies and reasons for presenting surveys or quizzes in the online environment. Based on campus or departmental needs, workshops are designed and presented by the Academic Technology Coordinator, and may take place in the evenings or Saturday as well as during the regularly scheduled work day.
One-on-one help by appointment	Scheduled sessions, workshops, or online training opportunities such as a moderated or self-paced course may not meet everyone's needs. For this reason, invitations to open labs and online learning opportunities are always appended with the invitation to meet on an individual basis if preferred. The option for individual meetings and support may be needed due to scheduling conflicts but also some people may feel uncomfortable working in a group setting with an unknown technology and often a friendly personal meeting can alleviate this discomfort.
Telephone and email support	Faculty and staff are welcomed to contact the Academic Technology Coordinator via telephone or email if they need help with their use of WebCT Blackboard. If the issue relates to an administrative request, such as a request for a WebCT Blackboard site or a problem with the system, the ATC will refer the caller to the WebCT Administrator who handles such matters. Calls and email messages from faculty and staff seeking help generally range from 3-7 requests per day. These calls or email messages may come from faculty on campus or adjuncts who are located at a satellite campus or who may be working from home. Faculty may have questions on specific user issues, such as "why can't my students see their grades" to "what would be the best approach to generate online student discussion of my topic".

	Our Computer Support Help Desk provides student support and (along with several computer support technicians) these student-workers assist general callers with the technical aspects of logging in, conducting browser checks, etc.
Self-paced online orientation course	Our CMS has provided us with a self-paced orientation course. This fully online course provides 24/7 access to needed training. Although it does not replicate the look and feel of an actual moderated course with its associated level of community and interaction, it is a good way for some faculty to gain familiarity with the navigation, tools, and features of the CMS used for online teaching and learning.
Four-week, fully online course entitled "Teach Online with WebCT Blackboard"	This course is fully online and is available free of charge to interested faculty on a 1X per semester basis. In its effort to model and replicate a true student experience, it involves a significant amount of discussion and activity within the online community. The course also includes online assignments, quizzes, surveys, and course content that includes audio and visual components as well as the inclusion of text and Web-based resources. As part of the learning experience, each participant is given their own developmental site (a.k.a. a sandbox site) and they are guided in the development of a simple course. The time commitment is approximately 5-7 hours per week, and at the end of the course, participants receive a *Certificate of Completion* signed by the Dean of Faculty. The certificate can also be applied to continuing education credits.
Special Events	**Faculty Technology Showcases:** In an effort to demonstrate the successful use of WebCT Blackboard, the college holds periodic brown bag events in which an invited faculty presenter showcases their use of technology. On several occasions demonstrations have featured the use of WebCT Blackboard. **The WebCT Blackboard Spring Tour**: For this festive celebration, the ATC invites nominated faculty members to display their WebCT Blackboard course sites as part of the WebCT Spring Tour. Scheduled in early May, this is a gala event, with 21 courses set up at different computer stations around the room. Champagne punch, chocolate and other treats are served, and we usually have a large turn-out of faculty and staff who stop by to view the various WebCT Blackboard sites, chat with the faculty, and enjoy the refreshments. Since all of these courses are available online, a "virtual tour" of the honored courses is made available for a full week after the event.

The Online Courses

The combined approach of having a main instructional site that models and delivers course content in conjunction with a second site where individual learners can develop their own online course is an engineered approach to creating competence and understanding among learners.

The two online courses that we will describe in detail, attempt to model and teach basic methods and procedures for teaching online. The courses include: (1) a graduate-level course for CSS students who seek to develop both practical and pedagogical skills needed to teach in the online environment and (2) the four week "Teach Online" course for faculty.

Implicit in the modeling strategy used in both of these courses is the fact that the main instructional site and learning experience presents students of online pedagogy (or andragogy) with an outcome or end product to adapt or emulate. The fact that student-trainers experience an online site from a learner perspective means that these students will continue to benefit and expand their understanding of day-to-day and long range processes associated with courses that may span weeks or months.

At CSS, instructional staff and faculty who had never experienced an online course as a student before commented on the value of this dynamic first-hand experience as a learner or end-user of this online course. In a follow-up survey from the November 2007 session of the "Teach Online" course for teachers, one faculty member noted, "It was good to experience being on the other end of instruction."

Anatomy of an Online Course

Key components of these online courses include a syllabus, discussion area, interactive course content in the form of online lessons or learning modules, chat room for informal discussions or virtual office hours, an assignment-area where the instructor and students can exchange information and files relating to assignments, links to Web sites, quizzes, surveys to evaluate how well the course is meeting learner needs, and an online grade book that provides each student with individualized information on his or her status or grade in the course.

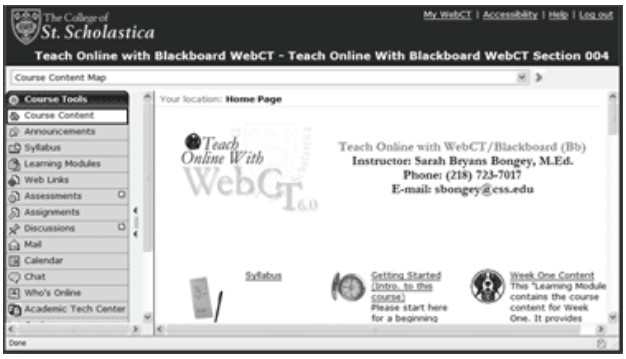

Figure 1. Home Page of *Teach Online with Blackboard WebCT*, an online course for instructors.

Helping faculty, staff and students master the technical aspects of constructing a course has been accomplished by providing each student with his or her own developmental site. This site (which is also commonly referred to as a "sandbox") resides outside of the main course, but instructions in the course include interactive tutorials and printable modules that can serve to guide the student through a pre-set array of activities each week. The instructor visits the site at the end of each module, provides comments, and enters additional feedback in the form of grades in the online course grade book. Although some faculty-learners may seem uncomfortable with the grade book at first, they later realize that the intent is to model its benefits. Participants are always given the chance to "opt-out" of the use of a grade book, but since the time the course was first offered in November, 2004, no one has ever availed themselves of this option.

Our online professional development course has been offered each semester since Fall 2004. Based on our experiences, the following are some developments, discoveries, and suggestions that have proved applicable in the establishment of effective eLearning strategies:

Model Best Practices: If you are planning an online course to teach instructors how to teach online, try to identify and use a key set of tools that will meet your institution's needs and support your course objectives. Although our college has not established an official set of standards or requirements, tools that have been discussed as basic to the needs of fully online courses include:

- A syllabus or other document providing an overview of the learning activities, expectations, instructor contact information, and where to go for technical help. The syllabus also includes links to a Web site and quiz on the topic of "netiquette" or Internet etiquette.
- Orientation Materials. These include
  - ✓ A WebCT Blackboard tutorial that incorporates reading materials, demonstrations and quizzes aimed at getting the new user comfortable with the online learning system.
  - ✓ A general orientation module for online learners (developed by the ATC). This module acts as a learning object in that it can easily be placed in any online course taught at CSS.
  - ✓ An instructor-created "Getting Started" overview that introduces the instructor, describes the course plan and layout, and includes basic resources that will assist the students in the successful completion of the course.
- A Chat Room. This area supports two or more people in a synchronous or 'real time' discussion. Although it may have some applications for students scheduling their own group meetings, its primary use in this course is for virtual office hours. These typed conversations can be logged for future reference.
- Discussions. New discussion topics are graded and posted weekly, ungraded discussion areas include Q&A, a blog that the instructor updates three times per week, and a cyber café for off-topic or casual conversation.
- Course content. Instructional materials and activities are delivered as online lessons or learning modules. Although some of the learning work will be done away from the computer, narrated presentations, instructor-compiled links and information and other Web-based resources are also used to deliver the instruction.
- Web Links. In WebCT Blackboard, this is an easy way of compiling and presenting a list of Web Links.
- Rubrics and grading expectations are provided for the faculty-training course as well as for the 16-week student version of the course.
- Quizzes – In the course for student-trainers, one online quiz is included to demonstrate the various question types, including multiple choice, calculated, matching, and jumbled sentences.
- Self Tests – Self tests show students how they did on a quiz or test, but it is for their information only. No grade information is stored in the system.
- Surveys – Surveys are anonymous and we use them to check in with students to see how they are doing in the course. It's important to tell students in the survey instructions that the survey is anonymous. Otherwise, they may expect help that may not be forthcoming!
- Assignments – In our CMS, students upload assignments to an assignment area. When the instructor reviews and grades the assignment, s/he can "publish" it to the course so that others can benefit from the information. We use this to facilitate resource sharing such as assigning students to submit favorite links for online instructors and then publishing them to the course.

- Grade Book – a survey of undergraduate students at our college revealed that the Grade Book is greatly appreciated by students. Students commented that it allowed them to know where they stand at any given time and some stated that it helps them do better in the course as a result. For the corporate or non-academic environment, instructors can opt to use the grade book to provide comments as opposed to letter grades.

Tap the expertise of course participants as well as others in your organization: In addition to modeling best practices and making use of key tools and WWW resources to enhance online teaching and learning, online courses transcend the boundaries of time and distance and allow instructors to tap human resources ranging from students to guest-experts from around the world.

"That adult educational themes of empowerment, critical reflection, experience and collaboration can inform distance learning activities is evident from case studies of practice that are emerging." (Brookfield, 1995).

In both of the courses described here, participants are encouraged to team up on projects and discussions and share their questions and discoveries. This exchange often takes place in the form of asynchronous online discussions, and sometimes the people who may have been the quietest in person have the most to say in the online discussion forum. The final weeks of each of online course for future online-instructors involves enrolling fellow students into the developmental sites where all members of the learning community experience the online learning activities and provide feedback and encouragement through peer review.

The course for instructors also seeks to tap expert human resources and expand the student experience by inviting colleagues to come in and host the asynchronous discussion area as "Guest Experts". As shown in Figure 2, the Guest Speaker is introduced in the weekly course content module, and (for a one-week time period) they interact with students. In previous sessions, the Teach Online course invited a textbook author to serve as our Guest Speaker. With online courses that involve no need for travel, the possibilities for identifying and hosting such experts are abundant.

Figure 2: Course Content includes a biography of the weekly Guest Expert who hosts discussions

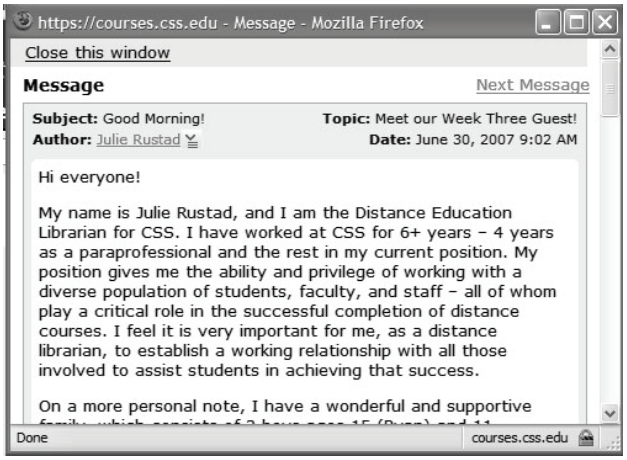

Figure 3: Discussions are asynchronous and generate informative questions and answers.

In the four week course for faculty, special guests are recruited to come in and monitor the discussion area in the following areas: (1) Welcome to Online Teaching and Learning, (2) Setting Expectations; (3) Copyright, Library Resources and Services, and (4) Technical Q & A with the Experts.

Although there are many discussion areas that are open for informal sharing and inquiry, some the discussions with weekly experts are graded to encourage participation. In follow-up surveys at the end of the course, participants universally agree that they "found the online discussions with others meaningful".

Identify foundational skills and knowledge and provide added support if needed: When instructing an online course, you will want to take steps to ensure that students begin the course with needed foundational skills. One way to ensure this is to develop pre-tests or self-assessment surveys that can stand alone or be a part of a larger orientation module. This can help you design and adapt your curriculum to meet the needs of your online classroom.

Because students in a single course often have a wide-ranging set of skills and interests, it is important to consider and address this in your course design. For example, you might include a Student Orientation for beginners that covers a full range of information aimed at participants who are at the beginner level. Likewise, consider providing enrichment activities and a folder

of resources that more advanced users can explore and draw from. Enrichment activities provided for advanced students in the online teaching methods courses have included information about the advantages and techniques used to incorporate sound or video in an online class. Your subject matter may vary, but the principle remains the same – support your beginning learners while at the same time providing enough new and engaging content to keep your more advanced or experienced students interested and learning. By ensuring that the learner is in his or her "zone of proximal development" (Hanfmann, Vakar, & Vygotsky, 1962), you will increase the chances that your instructional goals can be met.

Move beyond text-based instruction and use diverse approaches: In his theory of Multiple Intelligences (MI), Howard Gardner (2004) addresses the existence of a variety of intelligences. The potential to apply MI strategies (e.g., using sound, narration, music and other audio to appeal to the auditory learner) in the online course environment is addressed by Howard Gardner himself in a recent article from *Teachers College Record.*

> "I do harbor the hope for two new lines of practical work: 1) applications of multiple intelligences in the workplace (Gardner, 2004; Martin, 2000) and 2) the use of high speed, multimedia computers, virtual realities, and other kinds of simulations to allow more effective presentation of lessons and more veridical forms of assessment. In this context, I should note that many technologically oriented experts have considered how computers and other modern media might address or embody the multiple intelligences. My own guess is that the chief educational applications of MI theory lie in the construction of powerful new technologies and that this initiative has yet to coalesce." (p.213, 2004).

In considering new applications, such as virtual worlds, social software, online chat or discussions, videos provided by YouTube or TedTalks, image editing, mathematical modeling, online simulations, mind mapping programs, and so many resources, instructors and designers can avail themselves of opportunities to address multiple intelligences in an online environment.

While our own courses at CSS do not yet integrate all of these tools, we do seek to address learner needs through the use of multimedia resources that are incorporated throughout the course. Even bodily kinesthetic intelligences involving physical action can be addressed by having students participate in activities that take place in the "real world". Activities can be recorded or students can use their experience to create a project or report on the experience.

In terms of the online environment, many of these are free or low cost video and interactive tutorials. Table 2 provides some specific what, why, where examples of multimedia used to address the needs of learners with a wide range of intelligences.

Table 2. Examples of Multimedia Used in Online Teaching Methods Courses

What	Where/Why	Source
Audio included in Welcome Announcement	This pop-up announcement includes a narrated greeting and picture of the instructor. The message described procedures for beginning the course (text was also provided)	Recorded using low cost audio editing software (Sony Sound Forge Studio 8) and a Logitech USB headset/microphone. Free audio editing software can be obtained from www.audacity.com Other courses incorporate links to MP3 files and podcast resources.
Interactive tutorial on how to navigate in WebCT Blackboard	This three minute tutorial was incorporated in the "Getting Started" modules for the courses. Because it was interactive, it provided an engaging way for students to learn the basics of how to get around in the course.	WebCT Blackboard, our CMS provided this and many other tutorials used in the course.
Content-rich learning modules	Learning modules included text that was chunked in small, accessible pages. Pictures, Web links, and graphics were also used to emphasize or communicate information.	These were created by the course instructor/designer using WebCT's built-in course development tools. Learning modules also included images, Web links, audio, and video from a variety of sources.

Narrated presentations	Course Content can be custom-created when you create a PowerPoint and narrate it for presentation online.	These were created by the course instructor/designer using PowerPoint and a Logitech USB headset/microphone.
Video segments	We used videos in several places to present course content.	Aside from making your own, free quality videos may be found at www.ted.com Also, YouTube and TeacherTube have some high quality videos available. As with all resources, you will want to screen materials for content and quality before incorporating them in your course.
Online flash cards, crossword puzzles, word jumbles and other interactive games.	These simple games add interactivity and provide a fun way for course participants to learn new vocabulary of the online course environment.	Although there are many types of game creation software, the one we use is StudyMate. Free trial-versions are available. www.respondus.com
Learning Objects	A learning object is just about anything that can be re-used. We used an interactive tutorial on Bloom's taxonomy found from WISC-Online. We also have a repository of library PowerPoints and content modules that have general appeal to CSS instructors and students.	Make your own or refer to Merlot's Federated Search, www.wisc-online.com or a variety of other sources.
Web links	Great Internet resources are often multimedia-rich. The online netiquette quiz and other Web sites are woven throughout our discussions and our course content.	WebCT Blackboard allows you to easily add, categorize, and present Web links. You can also incorporate them within your online lessons or learning modules
The College of St. Scholastica maintains a site entitled MORF (Multimedia Online Resources for Faculty) and it is available at: http://www.css.edu/x17208.xml		

4. CONCLUSION

In concluding this case-study description of research-based strategies and methods for *making online happen*, we recognize – as Howard Gardner stated – that virtual, online or computer-based media and methods hold great promise for effective instruction designed to address the needs of multiple intelligences.

From a practical standpoint, online teaching and learning holds exciting potential for governmental agencies, businesses, and educators who seek the convenience and control that is available through online programming (Kravik, Caruso & Morgan, 2004).

From a student perspective and from the perspective of those who seek an educated work force – online instruction promises to uplift communities and to make education accessible to many who -- due to schedules, location, or other factors -- may have been unable to pursue it in the past.

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