BLENDED LEARNING: WHERE ARE WE GOING?

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ABSTRACT

This paper addresses the unanswered questions about faculty implementation of blended learning in higher education. It recognizes that most educators are not familiar with blended learning courses. Recent experiences in developing and delivering online courses indicate that when blended learning is added to the learning environment, teaching will change—again. This raises the question about how faculty will approach blended learning, either as a learning enhancement or a panacea for meeting student expectations. Therefore, it is important to know what training will be required to bring faculty to competency in designing and delivering blended learning courses. The paper concludes that research should evaluate specific hypotheses about faculty attitudes and knowledge that will indicate the kinds of training required.

About the Author

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Blended Learning: A New Concept?

In the midst of an era of rapid change in teaching methods and the expanded use of technology in education, yet another new approach has emerged. Known as blended learning, this new approach combines the real-time, up-front features and benefits of the live classroom learning experience with the flexibility of internet-based learning.

But what do we mean when we say blended learning? Are we referring to instructional method? To delivery method? In fact, blended learning often means different things to different people. The concept of "blending" grew out of the successes and failures of e-learning. Although some instruction is appropriate for online delivery, there are still many contexts in which it appears that learning is best served by some combination of classroom, web-based training (WBT), synchronous online delivery, or other electronic resources (Douglis, 2002).

Blended learning involves balancing the learning process between the self-study that internet-based courses provide with the ability to conduct face-to-face discussions as follow-ups. Blended learning is usually seen as homework and practice (things usually performed outside the traditional classroom) followed by face-to-face review and evaluation (things usually done in the classroom). The combined effect of blended learning is intended to produce more and better learning with less direct classroom contact. It remains to be seen whether blended learning is better but clearly it is spurring innovation that is sustainable (Vignare, 2002).

As with most learning approaches, blended learning did not originate within the ivycovered walls of higher education, nor is it something carried through from K-12 systems, public or private. Blended learning began in the business world (where most things begin) as a delivery method for companies to train employees in specific disciplines. In industry, blended learning is accomplished by a number of different delivery methods, each chosen for what it can deliver best (Zenger and Uehlein, 2002). For instance, online training can often effectively provide learners with factual knowledge about a specific skill. However, the content and desired learning outcome should determine whether the practice of that skill is appropriately accomplished online, or better done in a classroom.

Industrial applications seek practical outcomes. In some cases, a "blended solution" is the economic and expedient choice. A blended solution works when all the instructional components are considered holistically. What is less successful, for instance, are e-learning modules just "bolted on" to existing instructor-led training (Douglis, 2002).

Blended learning in industry is usually viewed as a continuous process, not just a "learning event." Blended solutions provide flexibility of delivery method and the ability for learning to occur over time. Blended learning offers new opportunities to persons designing and delivering training, as well as those who are learning. Much of the industrial use of blended learning is aimed at skills and tasks; in other words, training, not education. Therefore, both the trainers and the learners will be practicing blended learning as they either develop suitable training or are the focus of it. In all cases, the key issue in industrial use of blended learning is to determine the right blend—that which results in specific performance outcomes (Vignare, 2002).

Blended Learning in Higher Education

Blended learning has suddenly become the latest "new horizon" in higher education. It is seen by many educators as the "step beyond" online learning. Many educators and researchers believe that the online learning environment enables better communication and interaction between and among teachers and students. Much of this has been facilitated by robust course management systems, which also provide useful management and administrative tools. However, some educators have offered reservations concerning the possibility that their sacred classrooms are at risk of being replaced entirely by asynchronous online learning. Moreover, not all faculty are convinced that it is superior to all-online course design. Nevertheless, many academics still believe that blended learning will be good for higher education, perhaps because it does involve some classroom teaching.

Students seem to like the moderate amount of technology that purely-online courses involve. They use course management systems for convenience and connection, and they like to have all their course materials in one location. They believe it is convenient to be able to get to the courses any time they want. They like having lecture notes and course materials available—particularly those students who, like military members, may have to access a course from multiple

locations. They like the ability to collaborate with other students, and to decide where and when to do their class work. Students are starting to get what they want, but are we really giving them anything new? Probably not, but that could change too (Vignare, 2002).

Many faculty and students still believe that the traditional classroom is a valuable delivery environment because it brings teacher and student face-to-face synchronously, where a real-time dialog can result in faster and deeper learning. In many schools, students now attend some courses in the classroom at main campuses or extended campus systems, and still other courses through effective online course management systems. When a specific classroom course in not available to fit students' needs for degree completion, they can often attend the same course online and continue their learning process. Up to recently, the two environments—classroom and online—were alternatives to one another for many courses. It was one or the other, but not both at the same time. Further, schools are discovering that for each student who enrolls in an online course, there is one more empty seat in a traditional classroom, and this presents new financial and scheduling problems for schools, departments and faculty.

Blended learning, already shown in industry to bridge the gap between all-electronic and real-time discussion, is now seen as a way for schools to offer the best of both environments. This does not mean that its implementation will be simple or inexpensive. Like current online course management systems, blended learning involves sizeable investments in technology, the internet, and the development of asynchronous elements of courses. It is not simply a matter of shunting some classroom work to online exercises, but it does reflect a shift in student demand that will require innovative teaching approaches as educators attempt to blend classroom lecture tools and methods with the already-present electronic environment.

On the positive side of the coin, faculty research indicates (Vignare, 2002) that many educators accept online teaching despite its asynchronous nature because they feel it will improve student communications and offer them more approaches to meeting their needs, more flexibility, more practice, and more schedule flexibility. All of these concerns are student-centered good instructional practices.

Unlike industry's often-used skill-based and attitude-based blended learning models, academe will employ a competency-based approach. This approach blends traditional classroombased learning with online collaborative learning events. At times, the nature of the content, as well as the desired outcomes (understanding and competency) necessitate the inclusion of collaborative learning that's facilitated through face-to-face sessions or technology-enabled collaborative events (Valiathan, 2002).

At the same time, these tools have allowed higher education to become more effective at teaching and therefore more productive (Vignare, 2002). But now we are considering bringing online learning into the classroom through blended learning, or perhaps conversely, attaching classroom lecture and discussion to the online learning experience.

Blended learning is a continuous process, rather than just a "learning event." Providing blended solutions allows for flexibility, not only of multiple delivery methods, but for learning to take place over time. Web-based modules can offer "pre-work" preceding a classroom training event. Online peer communities or e-mentoring can extend well past the live event, along with Web resource availability for learners (Douglis, 2002).

This means that teaching will be changing—again. The unanswered questions, therefore, are obvious. How will blended courses using online learning styles and classroom teaching methods change teaching? What can an instructor expect? More pertinently, what can we expect of instructors contemplating blended learning courses?

As Academe changes-again

The effects blended learning will have on teaching itself have not been determined. Much has been defined in the industrial use of blended learning, but it is a relatively new approach in academe. Very little of blended learning is focused on the faculty's credentials and academic disciplines; these are issues for certification but not delivery skills and methods. Therefore, the changes that might occur with blended learning are changes in the direct actions and attitudes of teachers. Those attitudes have not yet been assessed.

It is painfully necessary to address those faculty who are just now being offered or encouraged to take on blended learning methods. The same phenomena occurred when faculty

were faced with learning to develop and deliver online courses; some have yet to embrace online course development or instruction; others are comfortable with it. Some college faculty know something about blended learning, but it is likely that most only know what it is but not how to make it work. Therefore, at this point, it makes no sense to poll a faculty group for experiences or outcomes using blended learning. Furthermore, it makes no sense to attempt to train faculty in the development and use of blended learning courses, since we don't really know yet how they will respond to the idea. Thus, it does make sense that the first chore in asking faculty to develop skills in a new teaching methodology is to determine their attitudes concerning blended learning and how they see its potential, its main purposes and its possible limitations so soon after many of them have only recently become familiar with online course development.

Will faculty approach blended learning as a learning enhancement? Will they consider its potential for convenience of delivery or only see it as another workload? Will they see it as something that must be specifically designed into each course, or as a "boiler plate" panacea for meeting student expectations? Will faculty design courses with blended learning as a primary structure, or simply plan on offloading classroom activities to the internet that has added new technology to the learning environment in very recent years? Will they even recognize that there is a shift in student demand that calls for innovative teaching?

Before confronting faculty with blended-learning-or-else edicts, it is important to know how blended courses will actually change teaching. Online teaching becomes constantly visible to everyone with the right password—other instructors, administrators, deans and department chairs. Teachers often share their experiences about what they do, and how well innovative online methods work. But innovation is not automatically enhanced by a new teaching tool or environment. Innovation requires the right organizational structure, including having the proper technologies and adequate training. If blended learning is to continue the trend begun by online learning, we most of all need to assess the sizeable percentage of the faculty who have not been teaching online, as well as those who have embraced e-learning but may not want to move toward a blended approach (Vignare, 2002).

In all cases, blended learning will require training and support for faculty, despite academe's history of not providing much training while spending so much on information technology. We must also keep in mind that faculty of many teaching disciplines will be asked to adjust.

Blended learning requires faculty training, even though their teaching disciplines and topics are truly education-oriented and aimed more at understanding than skills. Therefore, it will require effective training in blended learning for educators to implement its full potential. In addition to training, faculty need to know what other faculty are doing or they will not share ideas and they will not be inspired to change their teaching methods.

Inspiring Change

Much of what is written about blended learning serves as general theory and training concepts. What is still needed is specific information about what faculty at a given institution believe about how this new concept will affect teaching methods. There is a serious lack of empirical data about it. Where blended learning in academe has already been attempted, there will be a first-attempt data base that reveals the problems and possibly suggests solutions. There is also a lot of useful information from industry, because developing blended learning educators. It is aimed primarily at developing specific tasks involving specific complex technologies, rather than the discovery and invention of knowledge that inspired the teaching disciplines. The information needed first, therefore, is about how faculty currently perceive blended learning, as an input into the process of inspiring change in teaching methods. The answers will not be the same as the answers these educators would give about classroom or asynchronous online courses.

The learning innovations are allowing higher education to get better at teaching and thus more productive. It remains to be seen whether blended learning is better but clearly it is spurring innovation that is sustainable. Bringing online learning into the classroom through blended learning gives higher education a very easy way to adapt, innovate and become more productive. (Vignare, 2002)

However there is much more to training teachers in effective blended learning than that required to make them reasonably successful in the classroom or online. What is apparent from the outset is that without knowing where they stand about the forthcoming changes, it will be very difficult to determine what training should be applied and what kind of support should be generated. Therefore, it makes sense to start with research within the education community aimed at assessing faculty attitudes and expectations about blended learning. Simply creating a new faculty training program that specifies process requirements will not inspire the necessary changes. If we want to know how to get where we are going, we had better know where we are.

Where Are We Now?

Where are we now with regard to implementing blended learning? That depends on what faculty tell us--if we ask the right questions. We must keep in mind that faculty present considerable diversity of experience, teaching disciplines and professional circumstances that include tenured full professors as well part-time adjunct faculty at distant teaching sites. If we do, then we will know where to begin. Otherwise, we will probably just throw blended learning at them and generate a one-size-fits-all version of adding online work to the lectures. They will probably like the idea of less time in the classroom, particularly those faculty who teach long sessions in evening courses that run into bedtime. But they will not use blended learning to achieve its true potential, and we will not know what to change in order to bring that about.

All improvement is change, but not all change is improvement. The first question about change is always "what to change?" Without assessing the current faculty knowledge and attitudes, we cannot know where to apply suitable training. Beyond that must come the answer to the second question about change, "to what to change?" It is unlikely that this has been clearly defined for blended learning. The third question is equally important but more difficult to answer, "how to cause the indicated change?" This translates to knowing what kind of training to apply to faculty to make them effective blended learning teachers. But first we need to know what to change, and it will require that we ask the faculty to find out.

It is therefore proposed that an institution contemplating a significant blended learning effort begin by surveying its faculty regarding their knowledge and attitudes about it. If we ask the

right questions, we will know much more about where they stand in terms of how they understand blended learning, what teaching methods might be changed, what specific tasks would be required of them and what they perceive to be its advantages and challenges. And we will know if they are willing to take on the changes that are required.

Conducting research or teaching students about research methodologies is part of the academic process in many disciplines. It usually employs the "scientific method" of evaluation of one or more hypotheses through data collection and analysis. When done right, it delivers strong statistical information about a population using data from samples within the population. With a somewhat-captive audience, data collection from a valid sample of a faculty should be relatively simple, thorough and inexpensive. If we are to determine a faculty's predispositions about blended learning, such research seems logical if not imperative. Fortunately, there is ample knowledge available from industry, and in some cases higher education, to construct training programs in blended learning for educators, provided we know what they know and how they feel about it now.

What Do We Want to Know?

This paper recommends formal research of existing faculty to determine a faculty's predisposition about blended learning. We want to know what they think about it right now before creating training that might not address their training needs. We also need to know what they think before scheduling blended learning courses and making significant adjustments in course content that will not result in effective us of this new dual environment.

It would be premature to develop an entire research project or a survey questionnaire without first knowing what information is needed. Good research begins with an understanding of the problem, plus a competent review of existing knowledge, literature and other research on the same topic. Furthermore, good research arrives at one or more hypotheses that can actually be tested by asking the right questions of the right people. Rather than suggest questions to ask of faculty, this paper concludes by providing a number of hypotheses about faculty and blended learning. These may change as other information and experience are discovered, but the following hypotheses, if evaluated, can lead to the questions needed to get the answers needed

to design suitable training programs that prepare faculty to develop and deliver blended learning courses:

- 1. Faculty do not know how to develop and deliver blended learning courses.
- 2. Faculty do not know what blended learning provides for the learning process.
- Faculty do not view blended learning as a favorable alternative to classroom-only or internet-only courses.
- Faculty believe that blended learning courses will require more preparation and additional work for teachers.
- 5. Faculty look forward to teaching blended learning courses.
- 6. Classroom-only faculty see blended learning mostly as a way to reduce class contact time.
- Faculty who currently teach mostly online courses believe the adjustment to blended learning will be simple and easy.

Evaluating these seven suggested hypotheses (and others) using suitable survey methods can provide academic planners and trainers with knowledge needed to prepare faculty to embrace and be competent at teaching blended learning courses. With these hypotheses in mind, a researcher should be able to ask the right questions to know where to begin.

The alternative is trial and error.

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