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# The Trouble With Online Undergraduate Business Degrees In Traditional Regional Universities

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#### **ABSTRACT**

Because of the surging demand for undergraduate business degrees and the increasing availability of effective online educational content, many traditional regional universities have added, or are now considering adding, online undergraduate business degree programs to their classroom programs. Through a review of the literature bearing on that decision, this paper enumerates many of the heretofore-unreported risks unique to such programs and suggests methods to mitigate these risks. The paper argues that online undergraduate business degree programs in traditional regional universities, if not carefully promoted and managed, can be so troublesome that they are unlikely to add long-term economic value to either the community or the university. The arguments presented in this paper suggest many future areas for empirical work.

**Keywords:** Business Degrees; Trouble with Online; Ethics; Regional Universities; Undergraduate; Higher Education; Online Education; Traditional Universities; Degree Programs

#### INTRODUCTION

nline learning is one form of distance education. It involves the use of computer networks and course management software to share educational content among students, teachers, administrators, and support staff. Other forms of distance education include interactive TV and teleconferencing. Online learning, via the advent of internet tools such as search engines, social networks, uploading technology (e.g. YouTube, Wikipedia), and course management networks, has revolutionized and popularized distance education (Friedman, 2005, 2013). As a result, online learning has become a global pop-culture phenomenon - Stanford University recently attracted more than 150,000 students to a free, but non-credit, *MOOC* (massively open online course) (Pappano, 2012; Rosenthal, 2013). This emerging culture, together with accelerating demand for college degrees, has caused the incidence of online courses to explode.

According to Columbia University's Community College Research Center, as of 2006, one-third of all college students were enrolled in online courses (Jaggars, 2006), and there were more than 90,000 online college courses. As of 2010, 89% of public four-year business colleges offered at least one course online (AACSB International, 2010). Most of these online courses are part of what are called hybrid degree programs - those that blend traditional classroom courses with online or hybrid courses. Hybrid courses are those that blend online with classroom activities and they typically meet only once per week. Hybrid degree programs, although they involve many asynchronous courses, make possible the proctoring of exams. Most research indicates that hybrid courses can often be superior to classroom-only courses. However, in part because of the expense of exam proctoring, an increasing number of traditional regional universities are offering what are called asynchronous degree programs. These programs do not require students to work at an exact time or place, nor do they require or support the proctoring of exams. Because of the large market for undergraduate business degree programs, these are often the first in the university to be offered asynchronously. This paper refers to these strictly online business degree programs as asynchronous undergraduate business degree (AUBD).

It is useful to characterize the market for AUBD programs as three broad segments. Market segment 1 consists of self-motivated working adults without access to a quality classroom education. It was segment 1 that gave rise to the for-profit colleges such as *Devry University, University of Phoenix, University of Maryland University College*, and many others. Market segment II, on the other hand, consists of younger tech savvy students who prefer online programs only for convenience.

In addition, this paper hypothesizes a significantly different third market segment. It is comprised of younger, weaker business students preferring an AUBD from a traditional regional university - rather than from a for-profit university - for three reasons:

- 1. These students are attracted by the established brand name of the traditional regional university.
- 2. These students do not have the academic credentials needed for admittance to a traditional state, national, or international university.
- 3. These students prefer asynchronous programs because they believe them to be less academically rigorous than classroom programs.

This paper hypothesizes that the size of segment III is increasing and is doing so, in part, because of the decisions of traditional regional universities to compete head on with the for-profit online universities. Many traditional university administrators initially saw online courses as a low cost means to serve a high quality educational product to student segments I and II. However, it is likely that many of these administrators settled for low quality online courses because of the unexpected costs of high quality courses (for an example, see Rivard, 2013). If student segment III exists, it is, in part, because those students are attracted to un-proctored exams. The emergent segment III culture is evidenced in this quote from an a recent article describing one of 250 students accused of cheating on an un-proctored exam: "He said that he also discussed test questions with other students, which he acknowledged was prohibited, but he maintained that the practice was widespread and accepted." (Pres-Pena, 2012).

Many university policy makers are influenced by the numerous pro-online learning editorials, written by other administrators, that have appeared regularly over the years in newspapers such as the *Chronicle for Higher Education, Biz Ed,* and *Inside Higher Ed* (for example, see del'Etraz, 2010). Perhaps "group-think" is one reason these decision makers have been found unfamiliar with much of the empirical literature around online learning and its strategic implications for their institutions (McCarthy & Samors, 2009; Parent & Reich, 2009; Kulchitsky, 2008; see also Redpath, 2012, p. 133).

Despite the challenges in administering online degree programs, many more traditional universities are now considering them. Public universities facing budget cutbacks are quite likely to be adding online programs and, incidentally, there is evidence that the number of online courses a university offers is inversely proportional to the amount of state appropriations awarded to them (Byrd & Mixon, 2012).

The purpose of this paper is, first, to enumerate the problems and challenges associated with online business degree programs in traditional regional universities. Second, the paper proposes many ideas for future empirical work related to the costs of online degree programs. Finally, the paper suggests how to mitigate the risks of offering online business degree programs. It begins with a review of the most well respected literature around online business degree programs.

#### LITERATURE REVIEW

The many empirical studies comparing online to classroom learning outcomes typically measured one or more of the variables shown in Table 1. Results of these studies are equivocal. Proponents of online courses cite primarily the 2009 meta-analysis published by the U.S. Department of Education (US Department of Education, 2009). The primary popular conclusions drawn from that analysis are that, independent of all other variables, there are no significant learning outcome differences between online and classroom delivery.

**Table 1: Empirical Research Categories** 

Measures	Methods	Article Examples
Learning Outcomes	direct or indirect	Arbaugh, 2000b; Aragon, Johnson, & Shaik, 2002; Joy & Garcia, 2000; Sautter, 2007; Lim et al., 2007
Student Satisfaction	indirect	Allen et al., 2002; Lim et al., 2007; Vamosi et al., 2004)
Grades	direct	Lim et al., 2007
Faculty Satisfaction	indirect	Allen & Seaman, 2008, 2009; Kim & Bonk, 2010; Liu et al., 2007; Seaman, 2009; Tanner et al., 2009

However, the US Department of education study alone does not sufficiently inform the strategic decision to offer an online business degree program. A more complete literature review shows that many variables interact to determine the success of any particular online learning program (Arbaugh et al., 2010d; Jahng et al., 2007).

The most studied such variable is course subject matter (Arbaugh, Bangert & Cleveland-Innes, 2010a; Arbaugh, 2010d; Cagne & Shepard, 2001; Peltier et al., 2003; Friday et al., 2006). Research suggests that under the right conditions, online courses in applied qualitative courses, such as management and marketing, can be as good as classroom courses (Arbaugh et al., 2010 a.d; 2006; Ivancevich et al., 2009; Mullen & Talent-Runnels, 2006; Peltier et al., 2007; Weber & Lennon, 2007). On the other hand, research suggests that online courses in quantitative subjects, such as math, economics, finance, and accounting, do not compare favorably to classroom courses (Arbaugh et al., 2010a; Rivard, 2013).

## **The Delivery Costs of Online Courses**

Research indicates that course subject matter effects are likely due to the sensitivity of course learning outcomes to the amount of student-teacher social interaction (Arbaugh et al., 2010c). In fact, the degree of effective social interaction between student and teacher is one of the most accurate predictors of online learning success (Arbaugh, 2010c; Kim & Bonk, 2010; Ke, 2010; Nemanich et al., 2009; Shea et al., 2010). However, when online teachers are overloaded or otherwise unable or unwilling to take the extra time needed for high quality online teaching, course quality declines and then the student and community suffer economic opportunity costs (Redpath, 2012). These hidden costs should be included in evaluating the true cost of any online college course.

The quality online teacher takes the time to provide explicit structure and rules for social interaction; otherwise, student participation will be lower than in the classroom (Sautter, 2007). Research also shows that for effective online collaboration, the teacher must create a sense of "being there" through rapid response to individual student questions (Ke, 2010). The quality online teacher actively facilitates discussion boards and group projects. This includes identifying areas of agreement and disagreement, encouraging and reinforcing contributions to learning, promoting exploration of ideas and productive dialogue and prompting probing and reflection (Ivancevich et al., 2009). This may require the teacher to monitor several simultaneous discussions, while providing timely feedback and concluding the discussions, when appropriate, to avoid dysfunctional group dynamics such as social loafing (Brower, 2003; Kellogg & Smith, 2009). Such work requires a delicate sense of timing and balance among these various instructional roles (Liu et al., 2005; Shea et al., 2010). Too much or too little teacher involvement may have a negative effect on the quality and quantity of online student participation (Ke, 2010; Kellogg & Smith, 2009; Mazzolini & Madison, 2007).

Good online teachers provide a strong rationale for online group work and a good balance between group and individual assignments (Mullen & Tallent-Runnels, 2006). In addition, research shows that if teachers do not grade group assignments in near real-time, low online student participation is likely (Brower, 2003). There is also evidence that low participation in discussion boards is likely when students do not value their classmates' opinions (Ke, 2010). Online teachers have reported feeling overwhelmed by the requirements of good online instruction and often respond to this pressure via coping behaviors, such as superficial student performance evaluation and avoidance of complex topics (Brower, 2003; Ke, 2010).

Although many university administrators initially viewed online degrees as a means to achieve economies of scale, the true cost of high quality course delivery may be greater for online courses than for classroom courses. One of the most well respected studies, which was conducted by the Association of Public and Land-Grant

Universities, found that 64% of thousands of college teachers said it takes more delivery effort to teach effectively online than it does to teach in the classroom (Seaman, 2009). Furthermore, there is research indicating, as is the case for classroom courses, an inverse relationship between online class size and student learning satisfaction (Hewitt & Brett, 2007).

#### **Online Course Development Cost**

There is also evidence that the development cost of high quality online courses exceeds that of an equivalent classroom course. For example, the online *MOOC* development project that San Jose State conducted with Udacity, a start-up company specializing in open educational resources, was suspended in July 2013 when it was found that the time to develop a single reusable mathematics course exceeded 350 hours - and even then, student performance was significantly worse than the corresponding classroom course (Rivard, 2013).

### **Technology Infrastructure Costs**

High quality online course delivery requires investments in secure information system infrastructure that far exceed those required for classroom course delivery. These include secure high capacity local area networks with internet access, robust course management software, and the associated support resources (Alavi & Gallupe, 2003; Redpath, 2012). These costs are one of the highest in the university budget.

Regrettably, investments in course management software are unusually risky for the following reasons. Today's course management software industry consists of organizations, such as *Blackboard, Moodle, Udacity Coursera*, and Edx, which distribute products positioned as network platforms, as well as numerous textbook publishers who distribute platform components such as *Connect and Wiley Plus*. These products each present a unique user interface, have overlapping capabilities, and do not interoperate well. Furthermore, they are not designed to integrate smoothly and dynamically with the explosion of valuable new open educational resources now available (Haluk & Goul, 2010; Machado & Tao, 2007). This means that online teachers often must use more than one course management product, which can discourage them from developing expertise in any single one. Thus, the very features required for high quality online learning, such as assessment, video conferencing, calendar management, and learning outcome alignment, often go unlearned and unused.

In addition, today's online course management software is not state-of-the-art in analytics, course evaluation, security, privacy, vigilance, and student motivation management (Li, 2007). This happened because the course management software industry has stagnated in relative immaturity because of the enduring lack of consumer market power (Porter, 2008). Survey research shows that students and teachers have complained for years about these deficiencies in online course management systems (Haluk & Goul, 2010; Ioannou & Hannafin, 2008). Unfortunately, these complaints have fallen on deaf ears. As a result, many online degree programs operate not only by physically isolating students from teachers, but also by socially isolating them - and it is unclear which course management software platform will improve enough to become standard.

### **Attrition Rates and Ethical Issues in Online Programs**

Besides the high tangible costs of quality online degree programs, there are also many hidden costs, such as declines in faculty morale, student confidence, and community good will (Clift, 2009; McCarthy & Samors, 2009; Rivard, 2013). Greater student attrition rates are perhaps the biggest hidden costs of online courses. For example, non-credit *MOOC*s have been shown to have an attrition rate of 90% (Rosenthal, 2013) and the attrition rates for online for-credit undergraduate business courses are significantly higher than those for classroom programs. Students who enroll in four-year undergraduate business degree programs often spend their first two years in community colleges. The Community College Research Center at Columbia University has done nine studies covering thousands of programs in Washington and Virginia (Rosenthal, 2013). That research indicates that online community college students are significantly more likely to fail or withdraw than are classroom students. Those studies also found that low-performing students fell further behind in online courses than those in classroom courses (Rosenthal, 2013). One of these Columbia University studies, published in 2011, tracked 51,000 students enrolled in Washington State community colleges over five years. It found that those who took higher proportions of online

courses were less likely to earn degrees or transfer to four-year colleges. Among the reasons cited were that students were attracted to online courses, in part, because of their lack of English and time-management skills.

Administrators should also consider the hidden costs of the negative faculty perceptions of online courses. Such costs have prevented many leading business colleges from offering online programs, especially asynchronous ones (Alfred & Rovai, 2002; Allen & Seaman, 2009; Clift, 2009; McCarthy & Samors, 2009). For many years now, leading academics have expressed direct and strong opposition to strictly online course delivery, viewing it as the harbinger of commoditization and commercialization of higher education (Clift, 2009; Cox, 2005; Noble, 1997; Stahl, 2004). Some have warned that online learning may lead to a growing achievement gap between those who can afford classroom courses and those who cannot (Allen & Seaman, 2010; Carr-Chellman, 2005). Furthermore, the public at large has a negative opinion of online college degree programs.

## **Public Perceptions and Accreditation Problems**

Public opinion has long been negatively affected by media accounts of cheating scandals, diploma mills, fake degrees, and the aggressive advertising of for-profit online colleges (Blumenstyk, 2005; Carnevale, 2002a; Pres-Pena, 2012; Rosenthal, 2013; Vault, 2001; Wilner & Lee, 2002). It has been widely reported that some online programs have faced legal accusations of false advertising (Bartlett & Smallwood, 2004a, b; Carnevale, 2002b; Koolan & Smith, 2003). An example of the bad press online degrees are now getting regularly is a recent NY Times editorial, which asserts that courses delivered solely online:

may be fine for highly skilled, highly motivated people, but they are inappropriate for struggling students who make up a significant portion of college enrollment and who need close contact with instructors to succeed".... "Lacking confidence, as well as competence, these students need engagement with their teachers to feel comfortable and to succeed. What they often get online is estrangement from the instructor who rarely can get to know them directly. Colleges need to improve online courses before they deploy them widely. Moreover, schools with high numbers of students needing remedial education should consider requiring at least some students to demonstrate success in traditional classes before allowing them to take online courses". The online revolution offers intriguing opportunities for broadening access to education. However, so far the evidence shows that poorly designed courses can seriously shortchange the most vulnerable student. (Rosenthal, 2013, pp. 1-2)

The business press has been especially critical of business college programs, in part because of the downturn in the economy. It is said that such programs do not provide enough qualified graduates. In return, prestigious universities have defended their business programs by criticizing the online programs of the less prestigious regional business colleges; consider this quote from the dean of the Oxford University business college (Barker, 2010):

First and foremost, business education should be collaborative. Consider Oxford University's MBA program in which a class has about 240 students, each with about six years of work experience, who represent nearly 50 countries and almost all sectors of the economy. That amounts to some 1,500 years of experience. The pedagogical opportunities in sharing it are obvious"... "and they require an environment in which students actively work together and learn from one another..." in a collaborative learning environment where the people around you are more than just colleagues and friends; they are an explicit and valuable part of your educational experience. It follows from this that effective business education cannot be delivered exclusively online. (Barker, 2010, pp. 52-60)

Due, in part, to the negative publicity online business programs have recently gotten, asynchronous undergraduate business degree (AUDB) programs face an increasingly difficult time getting accredited (AACSB International, 2007; Popovich & Neel, 2005; Redpath, 2012). Exacerbating the AUDB image problem, inconsistencies in the US higher education system have allowed many business colleges to operate without recognized accreditation. Efforts to stop non-traditional accreditation practices have led to tough state legislation, ranging from mandating additional accreditation requirements to barring the use of unaccredited degrees on job applications (Bartlett & Smallwood, 2004a, b; Smallwood, 2004). Media rankings also contribute to the negative public opinion of online programs. For example, the *Financial Times MBA Rankings* exclude executive MBA programs (EMBA) that do not have 50% or more of their curriculum delivered in classrooms (*Financial Times*,

2010). Instead, they relegate them to a separate list of unranked EMBAs that receive far less attention (*Financial Times*, 2011).

#### The Market Value of Online Degrees

The negative public opinion of AUDBs extends to employers as well; they have been reluctant to hire graduates of purely online business degree programs (Carnevale, 2007, 2005). To many employers, online business degrees (and before that, correspondence degrees) are synonymous with lower quality degrees. Adams and Defleur (2006) addressed the question of whether a job applicant with an online bachelor's degree has the same chance of being hired as one who completed their degree entirely in the classroom. Respondents were asked to choose one of a pair of candidates based on the three descriptions shown in Table 2. The first pairing, which had Descriptions 1 and 2, showed that 96% (258 managers) reported they would choose the classroom educated candidate over the online educated candidate. The second pairing had Descriptions 1 and 3. In that pairing, 75% of managers reported that they would prefer the 100% classroom educated applicant to the 50% classroom educated applicant.

#### **Table 2: Job Candidate Descriptions**

Description 1: "Applicant A has the necessary degree. The degree was awarded by a college or university where 100% of the applicant's courses were completed via traditional classroom and lab instruction."

Description 2: "Applicant B has the necessary degree. The degree was awarded by a "virtual university." This university does not have a campus, classrooms, labs or library, and 100% of the applicants' courses were taken online."

Description 3: "Applicant C has the necessary degree. The degree was awarded by a college or university where 50% of the applicant's courses were taken online and the other 50% were completed via traditional classroom and lab instruction."

The same study analyzed respondents' written comments; see Table 3 for examples. They indicated that the lack of social interaction and classroom experiences were respondents' most troubling perception of online coursework, but institution accreditation was also an important influence on hiring.

#### **Table 3: Comments About Hiring Decisions**

The academic experience requires interaction between students, professors, and local businesses. The internet, even when properly authenticated and accredited, creates a "sterile" learning environment. Opportunities to circumvent traditional learning methods (interaction, role-play, quizzing) create opportunities for less honest individuals to increase their credentials.

In my opinion, a lot more than just the coursework is gained from classroom instruction - feedback, interaction with others, participation, public speaking, etc. It is my belief that this is lost through on-line learning.

Personal interaction between instructors and students presents a more real world approach to learning. There are no jobs in this organization that are completed over the Internet only.

Students lose team experience and the ability to learn from each other. Part of learning is interaction with peers and teachers. These skills are extremely useful in my work environment and I would prefer candidates who have them.

One-third of respondents commented that an applicant with a mix of online and classroom coursework was "more acceptable" than one with only online courses, and many responses suggested that online courses from a known "traditional" college were "more acceptable" than those from an unknown.

Although there have been few published accounts that explain the cognitive processes at work when hiring decisions are made, existing research implies that a majority of employers view online undergraduate business degrees with suspicion. In another of their national surveys, DeFleur and Adams (2005) found graduate school admission administrators extremely reluctant to accept students with online bachelor degrees; only 7% of administrators in the public institutions and 11% of private institutions indicated that they would admit such an applicant.

In review, the perspective gained from an analysis of the most important literature comparing online to classroom business degree programs reveals several things. First, there are some scenarios where high quality, purely online courses are more economically costly per student (if not prohibitively so) than classroom courses. These are courses where the subject matter is abstract and non-intuitive, thus requiring a higher degree of social interaction. For business programs, examples are courses in statistics, systems design, and accounting. In addition,

capstone courses based entirely on case discussions are ill suited for online delivery. In these scenarios, course content deflation occurs when faculty do not have the extra time, assistance, compensation, skills or training needed for quality online course development and delivery (Redpath, 2012; Rivard, 2013). This has been so often the case that most faculty, from across the entire university, have considered online courses inappropriate for their discipline (US Department of Education, 2009).

Secondly, the literature describes ideal scenarios in which purely online courses can be as effective as classroom courses, and there are some faculty proponents of online teaching. One such proponent nicely summarized the conditions where online learning can be as effective as classroom learning:

The lack of face-to-face interaction [in online delivery] can be overcome by creating a context where students can learn collectively and collaboratively. Communication immediacy and richness, typically an advantage of classroom learning, can be overcome by effective online instructional techniques and students' ability to adapt to online environments. The use of humor, personal anecdotes, the shorthand and emoticons that are part of the lexicon for online communication can counteract the absence of body language in online environments. Instructors can create safe environments for meaningful and honest communications by establishing a sense of trust and fairness, disclosing more about themselves and their interests and employing a variety of pedagogical and social roles that facilitate online collaboration and learning. Particular attention must be paid to minimizing instructor time devoted to technical and course administration support". "Training alone will not be sufficient to support effective online teaching. Creation of an active online learning community where faculty can share experiences on a continuous basis is more likely to sustain faculty commitment and skills development. (Redpath, 2012, p. 134)

#### DISCUSSION

Thus far, this paper has documented some of the many challenges associated with the incorporation of purely online business degree programs in traditional regional universities, including the high costs of technology infrastructure, course development, and delivery. To mitigate these risks and achieve high quality online education outcomes, universities should consider the following steps.

#### **Managing Community Expectations**

In keeping with the university's mission of social responsibility, administrators should promote online degree programs only to self-motivated, older, non-traditional, and/or stronger students. Weaker students just out of high school or community college should be dissuaded from enrolling in online courses, especially those of asynchronous undergraduate business degree (AUBD) programs. As this paper has documented, there is mounting evidence that these students are far more likely to quickly fall behind, drop out, or graduate without a good job waiting for them. Furthermore, if not managed carefully, AUDB programs can damage the brand of traditional regional universities, dissuading appropriate students from enrolling in their high quality courses. Accordingly, universities offering AUBD programs should differentiate and market them as such to help prevent the community from confusing them with classroom programs.

## **Agency Costs Unique to Some Online Programs**

Nevertheless, to save costs, many universities do not separately promote and manage their purely online undergraduate business degree programs. These "hybrid" programs simply offer all their courses periodically online as an option for students. Students are free to choose as many, or as few, online courses as they want and there are no distinctive designations on their degrees or transcripts. However, these programs can lead to unique agency costs (Jensen & Meckling, 1976), most of which are related to course scheduling.

Online Course Scheduling in Hybrid Programs

Online course scheduling, because there are no real estate and time point constraints, can be much less time consuming than classroom course scheduling. Thus, schedulers in hybrid programs may schedule online courses excessively. This, in turn, can cannibalize classroom course enrollment. This is especially the case for business

degree programs marketed to young weaker, traditional students at regional universities. If they believe business degrees from a school with a valuable brand to be their quickest ticket to their first good paying job, they may not wait for a future classroom course if their needed course is immediately available only online. The best practice is to ensure that the person scheduling courses is not the same person deciding the course delivery mode. This separation-of-duties control in these hybrid degree programs can give students a better choice between online and classroom course offerings. These student preferences can be used for continuous course improvement programs.

Another course scheduling agency cost unique to hybrid degree programs arises when there is not enough motivated and trained faculty willing to teach online. In these situations, online courses may be offered to any willing faculty. Unfortunately, it is quite likely that some teachers will choose online courses primarily because they can spend less time on them than they would for classroom courses. Furthermore, many teachers may prefer online courses primarily because they do not teach well in the classroom. These risks can be mitigated by robust teacher performance evaluations and student opinion surveys carefully controlled for response bias.

A final agency cost unique to any online course arises when under-motivated online teachers excessively schedule asynchronous assignments. For example, these teachers may reduce their own labor by using unsupervised discussion boards instead of more effective, but time-consuming, synchronous activities such as conference calls, teleconferences and web conferences. Therefore, administrators should encourage teachers to use some synchronous activities in their online courses.

Online Course Exam Proctoring and Course Content Deflation

Many undergraduate online business degree programs do not support exam proctoring. In these situations, students may take exams any place that has internet access. This, of course, promotes student cheating. To control cheating in these situations, teachers often use timed speed tests, which can damage student performance, self-confidence, and perpetuate course content deflation. Administrators of online programs should provide proctored testing centers for online students.

#### CONCLUSION

In summary, this paper identified caveats in online undergraduate business degree programs born by recent empirical research and published practical experiences. It focused on traditional regional universities, because most of the students vulnerable to the risks of online courses are enrolled there. Contrary to the expressed opinions of many university administrators, the empirical literature suggests that the cost per-student of a single high quality online course is higher than the corresponding classroom course. Thus, it is safe to conclude that a high quality online undergraduate business degree program is likely to cost significantly more than an equivalent classroom based program, especially if the hidden economic costs to the community are considered. Furthermore, the long-term student attrition rates of online courses may offset any short-term university revenue increases.

Another conclusion that can be drawn is that, because the empirical literature clearly enumerates the many conditions that must be in place to deliver a single effective purely online college course, it is unlikely that a strictly asynchronous undergraduate business degree (AUBD) program will be as effective as either a classroom or a hybrid program. Instead of adding value to the university and community, an AUDB can surreptitiously subtract value from them, hiding the increased costs in the unseen extra labor of dedicated faculty or in the opportunity cost of deflated course content. Other high costs of online programs in traditional regional universities are the information technology infrastructure, underutilized physical facilities, and damage to the institution's brand.

Despite the popularity of online learning and the strong demand for undergraduate business degrees, investments in these programs, if not managed carefully, are risky in the long term, both for the university and for the community. Experience has shown that, although online technology can add value to almost any single college course, the true marginal value of a strictly asynchronous online business degree (AUDB) program may be negative, especially for traditional regional universities. There are many ethical reasons why schools that cannot afford high quality online degree programs should avoid them.

Business colleges should take a cue from large corporations - where online training has been quite successful. Large corporations, realizing that synchronous online training can add great value to asynchronous training, also use conference calls, teleconferences, and live webinars. University administrators should encourage the same. These synchronous activities can greatly improve the quality of online courses, making hybrid degree programs the preferable alternative to AUDB programs.

This paper makes several contributions to the literature. It is the first to enumerate and discuss how to control the agency costs unique to hybrid online degree programs; in such programs, asynchronous courses and activities may be over-scheduled. This hypothesis is worthy of future empirical work. This paper is the first to discuss student "market segment III" which consists of younger, weaker students who enroll in the AUDB programs of traditional regional universities. It is important that future research determines the relative size and the detailed characteristics of this market segment because there are ethical and legal problems associated with recruiting students from this market. The paper hypothesizes that many of these students see the less rigorous online business degree as their only ticket to their first good paying job, while hoping that the brand name of the traditional regional university will overcome employers' reluctance to hire the business graduates of the lesser-known for-profit schools. This hypothesis is also worthy of empirical work.

#### **AUTHOR INFORMATION**

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#### REFERENCES

- 1. Association to Advance Collegiate Schools of Business (AACSB) International. (2007). Quality issues in distance learning. Tampa: AACSB International. Retrieved from http://www.aacsb.edu/publications/whitepapers/quality-issues-distance-learning.pdf on 3/14/2013
- 2. AACSB International. (2010). AACSB member schools are increasing online program offerings. In *eNewsline*: Management education news from AACSB. AACSB International.
- 3. Adams, J., & DeFleur, M. H. (2005). The acceptability of a doctoral degree earned online as a credential for obtaining a faculty position. *The American Journal of Distance Education*, 19, 785.
- 4. Adams, J., & DeFleur, M. H. (2006). The acceptability of online degrees earned as a credential for obtaining employment. *Communication Education*, *55*, 32-45.
- 5. Alavi, M., & Gallupe, R. B. (2003). Using information technology in learning: Case studies in business and management education programs. *Academy of Management Learning and Education*, *2*, 139-153.
- 6. Alfred, A., & Rovai, P. (2002). A preliminary look at the structural differences of higher education classroom communities in traditional and online courses. *Journal of Asynchronous Learning Networks*, 6. Retrieved 3/14/2013 from http://sloanconsortium.org/jaln/v6n1/preliminary-look-structural-differences-higher-education-classroom-communities-traditional
- Allen, I. E., & Seaman, J. (2008). Staying the course: Online education in the United States. Needham, MA: Sloan Consortium.
- 8. Allen, I. E., & Seaman, J. (2009). Learning on demand: Online education in the United States. Needham, MA: Sloan Consortium.
- 9. Allen, I. E., & Seaman, J. 2010. Class differences: Online education in the United States. Needham, MA: Sloan Consortium. Retrieved 3/14/2014 from http://sloanconsortium.org/publications/survey/pdf/class\_differences.pdf
- 10. Aragon, S. R., Johnson, S. D., & Shaik, N. (2002). The influence of learning style preferences on student success in online versus face-to-face environments. *American Journal of Distance Education*, 16, 227-244.
- 11. Arbaugh, J. B., Bangert, A., & Cleveland-Innes, M. (2010a). Subject matter effects and the community of inquiry framework: An exploratory study. *Internet and Higher Education*, *13*, 37-44.

- 12. Arbaugh, J. B. (2010b). Do undergraduates and MBAs differ online? Initial conclusions from the literature. *Journal of Leadership and Organizational Studies*, *17*, 129-142.
- 13. Arbaugh, J. B. (2010c). Sage, guide, both, or even more? An examination of instructor activity in online MBA courses. *Computers and Education*, *55*, 1234-1244.
- 14. Arbaugh, J. B., Desai, A., Rau, B., & Balakuntalam, S. (2010d). A review of research on online and blended learning in the management disciplines: 1994-2009. *Organization and Management Journal*, 17, 39-55.
- 15. Barker, R. (2010). No, management is not a profession. *Harvard Business Review*, 88, 52-60.
- 16. Bartlett, T., & Smallwood, S. (2004a). Titling at diploma mills. The Chronicle of Higher Education, 50.
- 17. Bartlett, T., & Smallwood, S. (2004b). Let me be honest with you. *The Chronicle of Higher Education*, 50.
- 18. Blumenstyk, G. (2005). For-profit education companies brace themselves for '60 Minutes' expose. *Chronicle of Higher Education, 51*, A28. January 31.
- 19. Brower, H. H. (2003). On emulating classroom discussion in a distance- delivered OBHR course: Creating an online learning community. *Academy of Management Learning and Education*, 2, 22-36.
- 20. Byrd, J., & Mixing, P. (2012). Revenues and e learning: Do universities need an online presence? *Journal of Higher Education Policy and Management*, 34(6), 601-609.
- 21. Carnevale, D. (2005). Employers still prefer traditional degrees over online learning, study finds. *Chronicle of Higher Education*, 52, A43.
- 22. Carnevale, D. (2007). Employers often distrust online degrees. Chronicle of Higher Education, 53, A-28.
- 23. Carnevale, D. (2002a). Questions linger over rise and fall of online program. *Chronicle of Higher Education*, 49, A27. January 25.
- 24. Carnevale, D. (2002b). Colleges demand that fake degrees remove their names from its web site. *Chronicle of Higher Education*, 49, A44. September 6.
- 25. Carr-Chellman, A. (Ed.). (2005). *Global perspectives on e learning: Rhetoric and reality*. Thousand Oaks, CA: Sage.
- 26. Clift, E. (2009). I'll never do it again. *Chronicle of Higher Education*. Retrieved 3/14/2013 from http://chronicle.com/article/Ill-Never-Do-It-Again/44250
- 27. Cox, R. (2005). Online education as institutional myth: Rituals and realities at community colleges. *Teachers College Record, May 21, 7,* 1754-1787.
- del'Etraz, P. (2010). What can an online program do for you? *BizEd, Nov-Dec*, 34-39. Retrieved 8/14/2013 from http://www.deanstalk.net/files/online-program-7-reasons-to-blend.pdf
- 29. DeFleur, M. H., & Adams, J. (2004). Acceptability of online bachelor's degrees as criterion for admission to graduate school. *Journal of Computing in Higher Education*, *16*, 150-163.
- 30. Gagne, M., & Shepard, M. (2001). A comparison between a distance and a traditional graduate accounting class. *The Journal Online*, April.
- 31. Financial Times (2010). *EMBA rankings* (2010). Retrieved 3/14/2013 from http://rankings.ft.com/businessschoolrankings/emba-rankings-2010b
- 32. Financial Times (2011). *Online MBA 2011 listing*. Retrieved 3/14/2013 from http://rankings.ft.com/businessschoolrankings/online-mba-2011
- 33. Friday, E., Friday-Stroud, S. S., Green, A. L., & Hill, A. Y. (2006). A multi-semester comparison of student performance between multiple traditional and online sections of two management courses. *Journal of Behavioral and Applied Management*, 18. Retrieved 3/13/2009 from http://ibam.com/pubs/jbam/articles/vol8/no1/JBAM\_8\_1\_4.pdf
- 34. Friedman, T. (2005). The world is flat: A brief history of the 21st century. Farrar, Straus & Giroux.
- 35. Friedman, T. (2013). The professors' big stage. *NY Times*, Mar. 6, 2013. Retrieved 5/27/2013 from http://www.nytimes.com/2013/03/06/opinion/friedman-the-professors-big-stage.html?\_r=1&
- 36. Haluk, D., & Goul, M. (2010). A reference model for sustainable e-Learning service systems: Experiences with the Joint University/Teradata Consortium. *Decision Sciences Journal of Innovative Education*, 36, 1.
- 37. Jaggars, S. J. (2006). Online courses in community colleges. *Communication Education*, *55*, 1. Retrieved 3/14/2013 from http://ccrc.tc.columbia.edu/Online-Education-Instructional-Technology.html
- 38. Joy, E., & Garcia, F. (2000). Measuring learning effectiveness: A new look at no-significant-difference findings. *Journal of Asynchronous Learning Networks*, 4, 1. Retrieved 12/20/2004 from http://www.sloan-c.org/publications/jaln/v4n1\_joygarcia.asp. Accessed (03/14/13).

- 39. Koolan, L., & Smith, S. (2003). State reviewing degree assertion by health lab chief. *The Boston Globe, Nov. 12*, A-5.
- 40. Hewitt, J., & Brett, C. (2007). The relationship between class size and online activity patterns in asynchronous computer conferencing environments. *Computers and Education*, 49, 1258-1271.
- 41. Ioannou, A., & Hannafin, R. (2008). Time for users to get what they need. *TechTrends*, 52(1).
- 42. Ivancevich, J. M., Gilbert, J. A., & Konopaske, R. (2009). Studying and facilitating dialogue in select online management courses. *Journal of Management Education*, *33*, 196-218.
- 43. Jahng, N., Krug, D., & Zhang, Z. (2007). Student achievement in online distance education compared to face-to-face education. *European Journal of Open, Distance and E-Learning*.
- 44. Jensen & Meckling (1976). A theory of the firm. *Journal of Financial Economics*, 3(4), 305-360.
- 45. Ke, F. (2010). Examining online teaching, cognitive, and social presence for adult students. *Computers and Education*, *55*, 808-820.
- 46. Kellogg, D. L., & Smith, M. A. (2009). Student-to-student interaction revisited: A case study of working adult business students in online courses. *Decision Sciences Journal of Innovative Education*, 7, 433-455.
- 47. Kim, J., & Bonk, C. J. (2010). Towards best practices in online teaching: Instructional immediacy in online faculty experiences. *International Journal of Instructional Technology and Distance Learning*, 7. Retrieved 3/14/2013 from http://www.itdl.org/Journal/Aug\_10/article02.htm
- 48. Kim, K., & Bonk, C. J. (2006). The future of online teaching and learning in higher education: The survey says... *Educause Quarterly*, 29(4), 22-30.
- 49. Kulchitsky, J. D. (2008). High-tech versus high-touch education: Perceptions of risk in distance learning. *International Journal of Educational Management*, 22, 151-167.
- 50. Larson, D. K., & Sung, C. H. (2009). Comparing student performance: Online versus blended versus faceto-face. *Journal of Asynchronous Learning Networks*, 13, 31-42.
- 51. Li, X. (2007). Intelligent agent-supported online education. *Decision Sciences Journal of Innovative Education*, *5*, 311-331.
- 52. Lim, D. H., Morris, M. L., & Kupritz, V. W. (2007). Online vs. blended learning: Differences in instructional outcomes and learner satisfaction. *Journal of Asynchronous Learning Networks*, 10, 27-42.
- 53. Liu, S., Kim, K., Bonk, C. J., & Magjuka, R. (2007). What do online professors have to say about online teaching? *Online Journal of Distance Learning Administration*, *10*. Retrieved 3/14/2013 from http://www.westga.edu/~distance/ojdla/summer102/liu102.htm
- 54. Liu, X., Bonk, C. J., Magjuka, R. J., Lee, S. H., & Su, B. (2005). Exploring four dimensions of online instructor roles: A program level case study. *Journal of Asynchronous Learning Networks*, 9, 29-48.
- 55. Machado, M., & Tao, E. (2007). Blackboard vs. Moodle: Comparing user experience of learning management systems. Proceedings of the 37th ASEE/IEEE Frontiers in Education Conference. School of Information Technology and Communication Design. California State University. Oct. 10-13, Milwaukee, WI
- 56. Mazzolini, M., & Maddison, S. (2007). When to jump in the role of the instructor in online discussion forums. *Computers & Education*, 49(2), 19-213.
- 57. McCarthy, S. A., & Samors, R. J. (2009). Online learning as a strategic asset, a resource for campus leaders. In A report on the Online Education Benchmarking Study. *APLU-Sloan National Commission on Online Learning*. Washington, DC: Association of Public and Land-Grant Universities, Office of Public Affairs.
- 58. Mullen, G. E., & Tallent-Runnels, M. K. (2006). Student outcomes and perceptions of instructors' demands and support in online and traditional classrooms. *The Internet and Higher Education*, *9*(4), 257-266.
- 59. Nemanich, L., Banks, M., & Vera, D. (2009). Enhancing knowledge transfer in classroom versus online settings: The interplay among instructor, student, content, and context. *Decision Sciences Journal of Innovative Education*, *7*, 123-148.
- 60. Noble, D. (1997). Digital diploma mills: Part 1. The Automation of Higher Education.
- 61. Parent, M., & Reich, B. (2009). Governing information technology risk. *California Management Review*, 5(3), 134-152.
- 62. Pappano, L. (2012). The Year of the MOOC. *NY Times*, Nov. 2. Retrieved 3/29/2013 from http://www.nytimes.com/2012/11/04/education/edlife/massive-open-online-courses-are-multiplying-at-a-rapid-pace.html?pagewanted=all&\_r=0

- 63. Peltier, J. W., Drago, W., & Schibrowsky, J. A. (2003). Virtual communities and the assessment of online marketing education. *Journal of Marketing Education*, 25, 260-276.
- 64. Peltier, J. W., Schibrowsky, J. A., & Drago, W. (2007). The interdependence of the factors influencing the perceived quality of the online learning experience: a causal model. *Journal of Marketing Education*, 29, 140-153.
- 65. Popovich, C. J., & Neel, R. E. (2005). Characteristics of distance education programs at accredited business schools. *American Journal of Distance Education*, *19*, 229-240.
- 66. Porter, M. E. (2008). The five competitive forces that shape strategy. *Harvard Business Review, January*.
- 67. Pres-Pena, R. (2012). Harvard students say cheating was accepted. *NY Times*, Aug. 31, 2012. Retrieved 3/13/2013 from http://www.nytimes.com/2012/09/01/education/students-of-harvard-cheating-scandal-say-group-work-was-accepted.htmlPriluck, R. (2004). Web-assisted courses for business education: an examination of two sections of principles of marketing. *Journal of Marketing Education*, 26, 161-173.
- 69. Redpath, L. (2012). Confronting the bias against online learning in management education. *Academy of Management Learning & Education*, 11(1), 125-140.
- 70. Rivard, R. (2013). Udacity project on 'pause'. *Inside higher Ed*. Retrieved 8/6/2013 from http://www.insidehighered.com/news/2013/07/18/citing-disappointing-student-outcomes-san-jose-state-pauses-work-udacity//
- 71. Rosenthal, A. (2013). The trouble with online college. *NY Times*, Feb. 19, A22. Retrieved 3/29/2013 from http://www.nytimes.com/2013/02/19/opinion/the-trouble-with-online-college.html? r=0
- 72. Sautter, P. (2007). Designing discussion activities to achieve desired learning outcomes: Choices using mode of delivery and structure. *Journal of Marketing Education*, 29, 121-131.
- 73. Seaman, J. (2009). Online learning as a strategic asset, the paradox of faculty voices: Views and experiences with on-line learning. Online Education Benchmarking Study Conducted by the APLU-Sloan National Commission on Online Learning. Washington, DC: Association of Public and Land-Grant Universities, Office of Public Affairs.
- 74. Shea, P., Hayes, S., Vickers, J., Gozza-Cohen, M., Uzuner, S., Mehta, R., Valchova, A., & Rangan, P. (2010). A re-examination of the community of inquiry framework: Social network and content analysis. *Internet and Higher Education*, *13*, 10-21.
- 75. Sitzmann, T., Kraiger, K., Stewart, D., & Wisher, R. (2006). The comparative effectiveness of web-based and classroom instruction: A meta-analysis. *Personnel Psychology*, *59*, 623-664.
- 76. Stahl, B. C. (2004). E teaching: The economic threat to the ethical legitimacy of education? *Journal of Information Systems Education*, *15*, 155-161.
- 77. Sweeny, J. C., & Ingram, D. (2001). A comparison of traditional and web-based tutorials in marketing education: An exploratory study. *Journal of Marketing Education*, 23, 55-62.
- 78. Smallwood, S. (2004). Maxine Asher has a degree for you. *The Chronicle of Higher Education*, 50(June 25), A42.
- 79. Tanner, J. R., Noser, T. C., & Totaro, M. W. (2009). Business faculty and undergraduate students' perceptions of online learning: A comparative study. *Journal of Information Systems Education*, 20, 29-40.
- 80. Twining, P. (2009). Exploring the educational potential of virtual worlds: Some reflections from the SPP. *British Journal of Educational Technology*, *40*, 496-514.
- 81. U.S. Department of Education. (2009). *Evaluation of evidence- based practices in online learning: A meta-analysis and review of online learning studies*. Washington, DC: Office of Planning, Evaluation, and Policy Development.
- 82. Vamosi, A. R., Pierce, B. G., & Slotkin, M. H. (2004). Distance learning in an accounting principles course: Student satisfaction and perceptions of efficacy. *Journal of Education for Business*, 79, 360-366.
- 83. Vault, Inc. (2001). Is an online degree worthwhile? Retrieved 5/22/2013 from http://www.employmentcrossing.com/article/230990/Is-an-Online-Degree-Worthwhile/
- 84. Weber, J. M., & Lennon, R. (2007). Multi-course comparison of traditional versus web-based course delivery systems. *Journal of Educators Online*, *4*. Retrieved 3/14/2013 from http://www.thejeo.com/Volume4Number2/Weber%20Final.pdf
- Wilner, A., & Lee, J. (2002). *The promise and the reality of distance education*. Update Washington, DC: National Education Association, Office of Higher Education, 8(3).