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The Professional Journey:
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The Professional Journey:
Mapping the Future

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PART I
REFEREED RESEARCH PAPERS

Assuring E-Learning Quality

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Abstract

Survey research was conducted to examine the business educators' and distance learning coordinators' perceptions regarding the extent that quality assurance benchmarks are present in institutions that offer business education courses and programs. The study revealed that quality assurance benchmarks developed by the Institute for Higher Education Policy (IHEP) that were most present in the educators' and coordinators' e-learning courses and programs include institutional support, course development, teaching and learning, course structure, and faculty support. The participants considered additional Web-based quality benchmarks including rich course content and interaction very important factors to address when assessing the quality of e-learning courses and programs

Introduction

Many schools and institutions are using e-learning as a mode of delivering instruction. This method of teaching and learning has become increasingly popular since it offers students accessibility, flexibility, and convenience in their pursuit of continuous learning as well as economic incentives for educational institutions (Yeung, 2002). According to Allen and Seaman (2006), at least 96% of the largest postsecondary institutions offer e-learning courses. As a result of the growing popularity of e-learning, it has become critical to educators that quality instruction and successful learning are occurring in the virtual environment. With the continuous thrust to integrate e-learning into our curricula, effective assessment methods and strategies are also critical concerns for educators.

Review of Literature

Quality assurance is defined as an evaluation process that "judges, measures, or assesses the quality of the development and delivery of online courses/learning environments focused on appropriate design and best practice, and is aimed at self-improvement ensuring quality instruction in a non-threatening way" (Quilter & Weber, 2004, p. 64). Quality assurance is often mandated by the government, such as the No Child Left Behind Act, and is also required by most accreditation agencies (Bush & Lambrecht, 2008; Anderson, 2008). Moreover, Quilter & Weber (2004) contend that online course objectives should be aligned to the accreditation standards. Quality assurance assumes that the evaluation outcome will be used for continuous improvement that ensures high quality instruction.

Two terms that are often used synonymously, assessment and evaluation, must be addressed. Assessment refers to assessing student performance which should include self-evaluation (Palloff & Pratt, 2007). Evaluation deals with assessing the course and the "quality of instruction, as well as the technology being used, including its functionality and user-friendliness" (Palloff & Pratt, 2007, p. 205). Much attention has been placed on student assessment and learning evaluation in the literature. However, educators must place just as much emphasis on evaluating the quality of their e-learning courses.

Several organizations and accreditation agencies that have established standards, guidelines, and benchmarks for quality e-learning education are the Sloan Consortium, the Council for Higher Education Accreditation, and the Council of Regional Accrediting Commissions (Wang, 2006; Yeung, 2002). Wang (2006) determined that some of the key benchmarks common to these organizations are learning outcome assessment, curriculum and instructional development, institutional commitment, student support, and faculty support. Enhancing the e-learning environment and promoting quality online instruction requires understanding and addressing these key e-learning quality benchmarks.

Learning Outcome Assessment

Educators tend to focus on two areas of learning outcome assessment: student assessment and course evaluation. The purpose of student assessment is to determine what students have mastered and to obtain essential feedback that will enhance continuous learning (Morgan & O'Reilly, 1999). Much research has been conducted on student assessment because it provides educators with practical data that can be immediately used to improve student learning (Byrd & Lott, 2003; Corgan, Hammer, Margolies & Crossley, 2004; Wilkinson, Crews, & Hemby, 2005; McEwen & Gaytan, 2006). According to Henderson and Chapman (2007), best practices used to assess student learning include multiple assessment techniques, hands-on projects, elec-

tronic portfolios, reflective writings, collaborative projects, standardized assessment instruments, rubrics or checklists to aid assessments, and course management systems (CMS) to monitor mastery of learning objectives.

To evaluate a course, many institutions require a summative evaluation after the duration of the semester. Often these evaluations fail to determine whether course objectives were met. Instead, the evaluation often reveals whether a student liked the teacher or enjoyed the course measuring popularity opposed to the learning achievement (Palloff & Pratt, 2007). Thus, in addition to focusing on learning outcomes, course and/or program evaluation should focus on "the quality of instruction, as well as the technology being used, including its functionality and user-friendliness" (Palloff & Pratt, 2007, p. 205).

Curriculum and Instructional Development

Thorough planning should include assessment procedures during the early stage of curriculum and instructional development when designing an online course. During this phase, research should be conducted to determine the appropriate mode of course delivery such as Web sites or commercial course management systems (CMS), such as Blackboard and D2L (DesireToLearn). These systems have been popular with institutions because they provide user-friendly communication and management tools. However, many schools are choosing inexpensive open-source course management systems, such as Moodle, that provide similar functions. Additional factors that should be considered are course goals, objectives, and policies, enrollment parameters, interaction, feedback, and evaluation (Henderson & Chapman, 2007). Although a well-designed online course is fundamental to e-learning success, having the commitment from the institution is paramount.

Institutional Commitment

"Institutional buy-in" or support from institution administrators is required to develop a quality e-learning environment. In addition to budgetary and policy commitment, adequate infrastructure and technical support for faculty, staff, and students should be present. Also, an organization should be available to ensure that e-learning courses meet legal and regulatory requirements, such as being ADA (American Disability Act) and copyright compliant (Wang, 2006). Providing students and faculty support must be a top priority to ensure successful e-learning environments.

Though many e-learning students take only one or two courses online, some students plan to complete their total degree program online. Thus, it is imperative that e-learning students have access to the services typically found on college campuses. Services such as library access, tutoring, academic advising, and career counseling should be provided online (Wang, 2006). Making these services accessible online can be costly and validates the need for institutional commitment.

Faculty support is vital to developing a quality e-learning environment. While course design support and ongoing technical training/support may be considered minimum requirements to teach online, many institutions fail to offer guidelines and technical support for faculty (Gaytan, 2007). Other essential areas of support include compensation, faculty workload, intellectual property, evaluation, and professional development opportunities (Cavanaugh, 2002; Wang, 2006).

Purpose of the Study

Business educators have been forerunners in the area of distance learning and Web-based instruction (Tesone, Alexakis, & Wayne, 2003). Business educators tend to work closely with distance learning coordinators at their institutions to offer quality e-learning courses and programs. Online instruction and its effectiveness has been widely researched and has shown that that online instruction is as effective as traditional instruction (Russell, 1999; Allen & Seaman, 2004; Henderson, 2005; Henderson & Chapman, 2007). However, there are limited studies that deal with how quality is measured. This study will examine the extent that measures or benchmarks are used to assure the quality of e-learning business education courses and programs.

Research Questions

The following three research questions were addressed in the study: (1) What are the personal and employment characteristics of business educators and distance learning coordinators who offer business education programs at their institutions? (2) To what extent are quality assurance benchmarks present in institutions that offer business education programs? and (3) To what extent are additional quality assurance benchmarks considered important by business educators and distance learning coordinators?

Assumptions

The researchers assumed that the business educators and distance learning coordinators had the online teaching experience and professional knowledge to provide meaningful responses on the research instrument.

Limitations

The findings of this study are limited to the population of business educators and distance learning coordinators employed in AACSB and NABTE member universities in the United States and one Canadian institution involved in this research. No attempt was made to generalize to a larger population.

Methodology

The pilot study was completed by seven business educators and three distance learning coordinators who were in two different states. An email message was sent to the pilot study participants

with a link to the online survey. The participants were given one week to complete the survey. Based on the comments from the educators and coordinators, minor changes were made to the survey instructions and a survey question. The study used the following research design, population and sample, instrumentation, data collection, and data analysis procedures:

Research Design

This research study sought to determine (1) the extent that the Institute for Higher Education Policy's (2002) Web-based quality benchmarks are present in online business education courses and programs, and (2) whether business educators and distance learning coordinators considered additional quality benchmarks important.

Population and Sample

The population included 64 business educators and 62 distance learning coordinators from AACSB and NABTE member schools in United States higher education institutions and one Canadian institution that offer business education online courses. The convenience sample of educators and coordinators were randomly selected through the Distance Education Directory on the educational institutions' Web site.

Instrumentation

The e-Learning Quality Assessment Survey included 24 Web-based quality assurance benchmarks identified in the Institute for Higher Education Policy's (IHEP) (2002) and Yeung's (2002) research studies to be important. Also, 19 additional quality assurance benchmarks found by Yeung (2002) to be important when assessing Web-based instruction were included in the survey. The participants were asked to respond to three research questions: (1) What are the personal and employment characteristics of business educators and distance learning coordinators who offer business education programs at their institutions? (2) To what extent are quality assurance benchmarks present in institutions that offer business education programs? and (3) To what extent are additional quality assurance benchmarks considered important by business educators and distance learning coordinators? To answer the second research question, the respondents were instructed to rank the 24 IHEP benchmarks on a rating scale as follows: 1 = strongly disagree, 2 = disagree, 3 = agree, 4 = strongly agree, and NA = not applicable. For the third research question, the educators and coordinators were instructed to select the three of the 19 additional Web-based quality benchmarks that they considered most important.

Data Collection

After the researchers received Institutional Review Board approval, data were collected during the 2008 spring semester through a Web-based survey. To encourage non-respondents to complete the survey, four weekly follow-ups messages were emailed to the remaining non-participants. Of the 126 participants, 33 of the 64 business educators and 16 of the 62 distance learning coordinators completed the survey. The 49 total responses resulted in a 39% response rate.

Findings

The findings were categorized by the three research questions: (1) What are the personal and employment characteristics of business educators and distance learning coordinators who offer business education programs at their institutions? (2) To what extent are quality assurance benchmarks present in institutions that offer business education programs? and (3) To what extent are additional quality assurance benchmarks considered important by business educators and distance learning coordinators?

Concerning research question one (see Table 1), the majority (51.5%) of the business educators were female, taught in non-research universities (43%), were mostly adjunct professors (57.7%), and one was a full professor. Most of the educators hold PhDs (48.5%) were over 52 years old (66.7%), and the majority (27.3%) worked in business schools with an enrollment of 500 to 1,000 students. The majority of the business educators (54.5%) had taught at the university/college level over twenty years and most (51.5%) had taught online one to five years.

Of the distance learning coordinators, the majority (68.8%) were female, employed in four year colleges (37.5%), and hold a master's degree (43.7). Half of the coordinators reported "other" since they were administrators. The majority (31.2%) were over 52 years old and twenty-five percent had not taught at the university level, twenty-five percent had taught one to five years, and twenty-five percent had taught over twenty years. Fifty percent of the coordinators worked in business schools that had an enrollment of more than 2,500 students. Most (75%) of the coordinators had taught online courses for one to five years.

Table 1
Respondents' Demographic Profile

	Coordinators		Educators	
Categories	**n**	**Percent**	**n**	**Percent**
Gender				
Female	11	68.8	17	51.5
Male	5	31.2	16	48.5
Institution				
Research	4	25.0	11	33.0
Non-Research	4	25.0	14	43.0
4-Year College	6	37.5	7	21.0
Other	2	12.5	1	3.0
Rank				
Full professor	2	12.5	1	3.0
Associate professor	1	6.2	4	12.1
Assistant professor	3	18.8	8	24.2
Adjunct professor	2	12.5	19	57.7
Other	8	50.0	1	3.0
Education Level				
Batchelor's degree	2	12.5	0	0.0
Master's degree	7	43.7	3	9.1
Ph.D.	4	25.0	16	48.5
Ed.D.	3	18.8	13	39.4
Post Doctorate	0	0.0	1	3.0
Age				
28-32	4	25.0	0	0.0
33-37	2	12.5	2	6.1
38-42	1	6.2	0	0.0
43-47	2	12.5	4	12.1
48-52	2	12.5	5	15.1
Over 52	5	31.2	22	66.7
Years of University Teaching				
None	4	25.0	0	0.0
1-5	4	25.0	2	6.1
6-10	2	12.5	4	12.1
11-15	0	0.0	2	6.1
16-20	2	12.5	7	21.2
Over 20	4	25.0	18	54.5
Business School Enrollment				
Over 2,500 students	8	50.0	6	18.2
2,000-2,500	1	6.2	3	9.1
1,500-2,000	2	12.5	4	12.1
1,000-1,500	3	18.8	6	18.2
500-1,000	1	6.2	9	27.2
Under 500	1	6.2	5	15.2
Years Taught Online				
1-5	12	75.0	17	51.5
6-10	2	12.5	8	24.2
11-15	2	12.5	6	18.2
16-20	0	0.0	0	0.0
Over 20	0	0.0	2	6.1

Concerning research question two (see Table 2), the business educators and distance learning coordinators "strongly agreed" that the following quality assurance benchmarks were the most present in their courses and programs:

* *Institutional Support*. A documented technology plan that includes electronic security measures (i.e. password protection, encryption, back-up systems) is in place to ensure both quality standards and the integrity and validity of information.

* *Course Development*. Courses are designed to require students to engage themselves in analysis, synthesis, and evaluation as part of their course and program requirements.

* *Teaching/Learning*. Feedback to student assignments and questions is constructive and provided in a timely manner.

* *Teaching/Learning*. Student interaction with faculty and other students is an essential characteristic and is facilitated through a variety of ways, including voice-mail and/or email.

* *Course Structure*. Students have access to sufficient library resources that may include a 'virtual library' accessible through the World Wide Web.

* *Faculty Support*. Technical assistance in course development is available to faculties, who are encouraged to use it.

Furthermore, the business educators and the distance learning coordinators perceived differences in two quality assurance benchmarks. The distance learning coordinators "agreed" and the business educators "strongly agreed" that the following institutional support and student support benchmarks were present in their online business education courses and programs:

* *Institutional Support*. A centralized system provides support for building and maintaining the distance education infrastructure.

* *Student Support*. Students receive information about programs, including admission requirements, tuition fees, books and supplies, technical and proctoring requirements, and student support services.

The business educators' and distance education coordinators' "agreed" that the remaining quality assurance benchmarks were present in their business education online programs.

Table 2
e-Learning Quality Benchmarks (IHEP, 2002) Reported by Mean

Institutional Support Benchmarks	Coordinators	Educators
A documented technology plan that includes electronic security measures (i.e. password protection, encryption, back-up systems) is in place to ensure both quality standards and the integrity and validity of information.	3.62	3.52
A centralized system provides support for building and maintaining the distance education infrastructure.	3.38	3.55
The reliability of the technology delivery system is as failsafe as possible.	3.25	3.24
Course Development Benchmarks		
Courses are designed to require students to engage themselves in analysis, synthesis, and evaluation as part of their course and program requirements.	3.59	3.50
Instructional materials are reviewed periodically to ensure they meet program standards.	3.44	3.33
Guidelines regarding minimum standards are used for course development, design, and delivery, while learning outcomes—not the availability of existing technology—determine the technology being used to deliver course content.		
Teaching / Learning Process Benchmarks		
Feedback to student assignments and questions is constructive and provided in a timely manner.	3.71	3.56
Student interaction with faculty and other students is an essential characteristic and is facilitated through a variety of ways, including voice-mail and/or email.	3.59	3.56
Students are instructed in the proper methods of effective research, including assessment of the validity of resources.	3.30	3.07
Course Structure Benchmarks		
Students have access to sufficient library resources that may include a "virtual library" accessible through the World Wide Web.	3.76	3.94
Students are provided with supplemental course information that outlines course objectives, concepts and ideas, and learning outcomes for each course are summarized in a clearly written, straightforward statement.	3.47	3.44
Faculty and students agree upon expectations regarding times for student assignment completion and faculty response.	3.10	3.06
Before starting an online program, students are advised about the program to determine (1) if they possess the self-motivation and commitment to learn at a distance and (2) if they have access to the minimal technology required by the course design.	2.79	3.06
Student Support Benchmarks		
Students receive information about programs, including admission requirements, tuition fees, books and supplies, technical and proctoring requirements, and student support services.	3.44	3.50
Throughout the duration of the course/program, students have access to technical assistance, including detailed instructions regarding the electronic media used, practice sessions prior to the beginning of the course, and convenient access to technical support staff.	3.21	3.20
Questions directed to student service personnel are answered accurately and quickly, with a structured system in place to address student complaints.	3.13	3.12
Students are provided with hands-on training and information to aid them in securing material through electronic databases, interlibrary loans, government archives, news services and other sources.	2.65	2.81
Faculty Support Benchmarks		
Technical assistance in course development is available to faculties, who are encouraged to use it.	3.61	3.50
Faculty members are assisted in the transition from classroom teaching to online instruction and are assessed in the process.	3.02	2.88
Instructor training and assistance, including peer mentoring, continue through the progression of the online course.	2.94	2.94
Faculty members are provided with written resources to deal with issues arising from student use of electronically accessed data.	2.76	2.57

continued on next page

Institutional Support Benchmarks	Coordinators	Educators
Evaluation and Assessment Benchmarks		
Intended learning outcomes are reviewed regularly to ensure clarity, utility and appropriateness.	3.08	3.12
The program's educational effectiveness and teaching/learning process is assessed through an evaluation process that uses several methods and applies specific standards.	2.91	2.94
Data on enrollment, costs and successful/innovative uses of technology are used to evaluate program effectiveness.	2.86	3.00

Note: Means were determined using the following rating scale:
1 = strongly disagree 2 = disagree, 3 = agree, 4 = strongly agree, NA = not applicable was not used in the calculation.

Concerning research question three (see Table 3), the business educators considered "rich content" and "interaction" very important and "reliability" and "flexibility" important e-learning quality benchmarks. Also, the distance learning coordinators considered "rich content," "interaction," and "user friendliness" the most important and "reliability," "flexibility," "technical support," and "informative," important quality assurance benchmarks. The educators and coordinators indicated that "popularity," "fun," "creativeness," and "capacity" were the least important e-learning quality assurance benchmarks.

The educators' and coordinators' perceived differences in the "user friendliness" and "technical support benchmarks." The educators considered "user friendliness" somewhat important and the coordinators considered it important. For "technical support," the educators considered it one of the least important and the coordinators considered it important.

Table 3
Important e-Learning Quality Benchmarks

	Coordinators		Educators	
e-Learning Benchmark	**n**	**Percent**	**n**	**Percent**
Rich Content	16	100.0	9	27.3
Interaction	14	87.5	9	27.3
Reliability	10	62.5	6	18.2
Flexibility	8	50.0	6	18.2
Informative	7	43.8	3	9.1
User Friendliness	15	93.8	3	9.1
Stability	4	25.0	2	6.1
Interesting	0	0.0	2	6.1
Technical Support	8	50.0	1	3.0
Accuracy	4	25.0	1	3.0
Consistency	3	18.8	1	3.0
Feasibility	2	12.5	1	3.0
Attractiveness	2	12.5	0	0.0
Innovation	3	18.8	1	0.0
Popularity	1	6.3	0	0.0
Fun	1	6.3	0	0.0
Creativeness	1	6.3	0	0.0
Capacity	0	0.0	0	0.0

Conclusions

The study revealed that the majority of the business educators and distance learning coordinators are female. The majority of the business educators were adjunct professors holding doctorate degrees with over 20 years of teaching experience in non-research universities. The majority of the distance learning coordinators were females holding master's degrees with limited teaching experience.

The findings revealed that the business educators and distance education coordinators believe that the IHEP (2002) quality assurance benchmarks such as institutional support, course development, teaching and learning, and course structure are present in their business education courses and programs. Furthermore, findings indicated that the business educators and distance learning coordinators considered additional e-learning quality benchmarks previously researched by Yeung (2002) important factors to consider when assessing online courses and programs. They both considered the e-learning quality benchmarks: rich course content, effective interaction, excellent reliability, and efficient user-friendliness very important.

Quality assurance will warrant more attention from educators, distance education coordinators, and researchers of all disciplines as e-learning becomes increasingly popular. As administrators continue to search for less expensive ways to deliver instruction, offering quality e-learning courses to students is critical. Ensuring that quality assurance benchmarks are present in e-learning courses is one way to ascertain that our educational courses and programs are delivering high-quality instruction to our students.

Recommendations for Further Research

Based on the findings of this research study, the following recommendations are made for future research: (1) Identify additional e-learning factors that educators could use to assess student learning in the virtual environment and (2) Identify ways that an educators' teaching style in the online environment influences their students' learning experience?

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Current Status of Business Teacher Education Programs in the United States

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Abstract

The purpose of this study was to determine the status of business teacher education programs which provide initial teacher certification in the United States. Two hundred sixteen institutions were surveyed. Respondents reported demographic information about their institutions and their programs, the frequency of their offering initial certification through undergraduate, graduate, and non degree programs in both traditional and alternative certification formats, the numbes of students enrolled in the programs, and placement rates for those who have completed the programs.

Introduction

A major component of delivering business education to students has always been the business teacher. Business teachers "play a prominent role in preparing students to become responsible citizens capable of making astute economic decisions that benefit their personal and professional lives" (National Business Education Association, 2007, p. vii).

Study Objective and Research Questions

For decades, initial business teacher certification programs have been delivered by colleges and universities through traditional baccalaureate programs. Recently the certification process has been expanded to include alternative certification programs, some of which are offered at the graduate level. Little research has been completed to determine how initial certification requirements are currently being met.

The study will respond to the following research questions:

1. What demographic qualities exist among collegiate institutions which offer initial certification in business teacher education?

2. With what frequency do institutions offer business teacher education programs with initial certification at bachelor's, master's, specialist/CAS, doctorate, and non degree levels?

3. What enrollment levels exist for traditional and alternative certification business teacher education programs which offer initial certification in business teacher education?

4. What job placement rates exist for graduates of business teacher education programs?

Literature Review Related to the Initial Certification of Business Teachers

Although completing a baccalaureate degree is still the path most students choose to become certified business teachers, the number of institutions that educate business teachers in the traditional manner has steadily decreased (Anderson & LaBonty, 2007). The National Center for Education Statistics (2007) reported that between 1995-1996 and 2005-2006 the number of business teacher education undergraduate degrees conferred declined by more than 50%. During the 2001-2002 academic year, the National Association for Business Teacher Education (NABTE), which collects data only from member institutions, reported a 57% decrease in degrees that were awarded over a ten-year period starting with 1992-1993 (Chalupa, 2003).

Alternative routes to certification have been evolving over the last 25 years as a way to address both teacher shortages (Anderson & LaBonty, 2007) and the decline in the number of certification programs offered by colleges and universities. Approximately two-thirds of alternative certification programs are offered by collegiate schools while the remainder are provided by other groups such as local school districts, non-profit organizations, etc. (Walsh & Jacobs, 2007). By 2007, all 50 states and the District of Columbia had implemented some type of alternative route to teacher certification (National Center for Alternative Certification, n.d.). People who have a bachelor's degree in a field other than education may be given a provisional certificate and immediately put into a teaching situation. A sequence of professional education courses is often completed while the person is teaching so that pedagogical competencies are aligned with teaching skills from colleges and universities (Anderson and LaBonty, 2007). These courses are offered in the evening or on weekends, and they are sometimes delivered at a satellite campus of a college or university (Szuminski, 2002). Upon the successful completion of the alternative certification program, a master's degree may be awarded along with initial teacher certification.

Methodology

The target population for this study was business teacher education programs in the United States. A survey instrument was developed by the researchers based on previous research and contained demographic questions and questions regarding types of programs offered to prepare students for initial certification in teaching business education. The survey was reviewed by a panel of business teacher education professors, a business teacher education administrator, and a survey design professional, and it was refined to eliminate ambiguous questions and directions. Subjects were contacted by email and asked to participate in the study. A link was provided to access the web-based survey. Personnel representing the researchers' human rights committee indicated that IRB approval was not needed since the survey was concerned with programs and not individuals. The questionnaire included a paragraph describing the purpose of the survey and possible benefits to the respondents. A definition of initial certification in business education was included since the survey was concerned with both traditional and nontraditional programs.

The population consisted of 216 institutions reported to offer business teacher education programs. The list was based on contact information prepared by Dr. Wayne Moore (Moore, n.d.). Each institution's website was used to verify if a business teacher education program existed. Additions and deletions were made based on this research. All of the institutions were contacted via email. A total of 69 surveys were returned for a response rate of 31.94%. Three of the institutions reportedly no longer offered programs in business teacher education.

Findings

The findings were organized around the four research questions.

1. What demographic qualities exist among collegiate institutions which offer initial certification in business teacher education? Respondents represented 44 public and 22 private collegiate institutions, and a high number of the programs were reported to be located in colleges or schools of education. The frequency of public and private institutions being reported as well as the location of the business teacher education programs are reported by institution size in Table 1.

2. With what frequency do institutions offer business teacher education programs with initial certification at bachelor's, master's, specialist/CAS, doctorate, and non degree levels? Responses indicated programs providing initial certification in business teacher education as part of an undergraduate degree were the most frequent offerings with 71 being reported. The frequency in which programs offered undergraduate, graduate, and non degree programs is reported by institution size in Table 2.

3. What enrollment levels exist for traditional and alternative certification programs which offer initial certification in business teacher education? Respondents from 58 institutions reported a total of 1879 students were being prepared for initial certification in business teacher education at their institutions. The number of students being prepared in undergraduate, graduate, and non degree programs is reported in Table 3.

Table 1
Demographic Information for Business Teacher Education Programs in the United States

Institution Population	Type of Institution		Location of Program		
	Public	Private	Business	Education	Technology
Under 1,000 (5)	0	5	2.5	2.5	0
1,000—5,000 (21)	6	15	7	13	0
5,001—10,000 (10)	10	00	3	6	0
10,001—20,000 (14)	12	2	5	5	2
Over 20,000 (16)	16	0	3	11	2
Total (66)	44	22	20.5	37.5	4

Table 2
Frequency of Institutions Reporting Programs Offering Initial Certification in Business Teacher Education

Institution Population	Initial Certification Offered				
	Bachelor's	Master's	CAS/Specialist	Doctorate	Non Degree
Under 1,000 (5)	5	0	0	0	0
1,000—5,000 (21)	18	5	0	0	5
5,001—10,000 (10)	9	3	0	0	3
10,001—20,000 (14)	13	7	1	1	5
Over 20,000 (16)	14	10	0	0	4
Total (66)	59	25	1	1	17

Table 3

Average Size of Traditional and Alternative Certification Business Teacher Education Programs in the United States

Institution Population	Program Size Traditional/Alternative Certification Programs				
	Bachelor's	Master's	CAS/Specialist	Doctorate	Non Degree
Under 1,000	21/4	0	0	0	0
1,000—5,000	104/17	47/17	0	0	18/3
5,001—10,000	221/15	48/37	0	0	0/0
10,001—20,000	313/28	159/15	2/0	2/0	14/8
Over 20,000	432/40	165/45	0	0	44/60
Total	1,091/104	419/114	2/0	2/0	76/71

What job placement rates exist for graduates of business teacher education programs? Respondents from 60 institutions reported an average placement rate of 85 percent or higher for students who received initial certification to teach business education. The average placement rates for undergraduate, graduate, and non degree programs appear in Table 4.

Table 4

Average Placement Rates for Graduates of Business Teacher Education Programs in the United States

Institution Population	Average Placement Rates Traditional/Alternative Certification Programs				
	Bachelor's	Master's	CAS/Specialist	Doctorate	Non Degree
Under 1,000	87.5/100	NR	NR	NR	NR
1,000—5,000	90.75/90	85/97/5	NR	NR	NR
5,001—10,000	93.75/100	99/97.5	NR	NR	NR
10,001—20,000	97.5/100	98.33/96.67	NR	NR	NE
Over 20,000	90/95	90/75	NR	NR	NR/100

Conclusions

1. Business teacher education programs in the United States have a high representation among public institutions and within the education divisions of institutions which offer those programs. The size of institutions varies widely among those which offer initial certification in business education.

2. Most programs which offer initial certification in business teacher education are part of bachelor's or master's degree programs.

3. While many future business education teachers complete certification requirements through alternative certification programs, most earn initial certification in business teacher education through traditional programs.

4. Placement rates among business teacher education programs are high with programs typically reporting placement rates in excess of 80 percent.

Recommendations

1. Recruitment should continue for students to enroll in traditional programs which offer initial certification in business teacher education.

2. Students who plan to complete initial certification in business teacher education should look to bachelor's and master's degree programs as the most plentiful source for providing that licensure.

3. Alternative certification has become a viable option for business teacher education programs to offer, and institutions should consider this option.

4. Those who market business teacher education programs should indicate that graduate placement rates are very high among those who receive their initial certification to teach business education.

5. The study should be replicated to keep up with changes in the field of business teacher education.

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Evaluation in Entrepreneurship Education: A Pilot Study at the W. P. Carey School of Business

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Abstract

This study was based on a model developed by Cooper and Lucas (2006) to identify changes in self-efficacy and entrepreneurial intent among entrepreneurship students. An instrument was developed and administered to undergraduate business students enrolled in three entrepreneurship courses to compare their pre- and post-test scores on self-efficacy (feasibility of launching a venture) and entrepreneurial intent (desirability of launching a venture). Scores were analyzed using the Wilcoxon test for rank order. Scores on five of the six subscales of self-efficacy significantly increased at the end of the semester, and two of the four subscales for entrepreneurial intent significantly increased.

Introduction

This study involved developing and administering an assessment instrument to evaluate entrepreneurship courses at the W. P. Carey School of Business at Arizona State University, where entrepreneurship is a university-wide initiative currently being implemented across all academic units, including business, engineering, liberal arts, nursing, design, and education. This assessment was created to evaluate changes in student perceptions of self-efficacy in performing a variety of entrepreneurial activities and perceptions of the desirability, feasibility, and intent of entering an entrepreneurial career path. This study was initiated to assess the effectiveness of the university's course offerings in entrepreneurship and to enhance entrepreneurship instruction across disciplines.

Rationale

Entrepreneurship education in the United States has rapidly increased in recent years, encompassing approximately 2,200 courses at more than 1,600 colleges and universities, 44 specialized entrepreneurship academic journals, and more than 100 centers for entrepreneurship (Kuratko, 2005). Entrepreneurship is not a long-standing, established discipline; as such, entrepreneurship educators have a great deal of flexibility to be creative in their instructional design decisions and in developing new instructional strategies. Educators must reflect on how they teach and how their students learn, explore best practices in pedagogy, and evaluate the effectiveness of their teaching., particularly in the discipline of entrepreneurship. In contrast to long-established curricula in disciplines such as accounting and economics, the entrepreneurship curriculum varies widely in its learning outcomes, content, and teaching strategies, which are generally left to the discretion of the instructor because no common body of knowledge, or universal standards, have yet been widely accepted for the discipline. Entrepreneurship education has broadened from its traditional emphasis on starting small businesses to encouraging creativity, innovation, and high-growth ventures, including social entrepreneurship and "intrapreneurship" within existing large organizations.

Literature Review

Cooper and Lucas (2006) built on the model of Krueger and Brazeal (1994) that self-efficacy is a key predictor of entrepreneurial intent and concluded that the intent to start a venture is central to entrepreneurship. In their research on entrepreneurship programs at the Massachusetts Institute of Technology and in the United Kingdom, Cooper and Lucas (2006) found that self-confidence generated by their programs persisted when surveyed six months after completing the programs. By evaluating programs using the methodology of Cooper and Lucas, institutions can determine how entrepreneurship programs influence students and identify the skills and abilities their students are acquiring.

The literature on entrepreneurship education reveals a "widespread deficit in evaluation practice" (Kailer, 2005, p. 1). Researchers have not agreed on methods of evaluating teaching in entrepreneurship. One study found that three-quarters of the evaluation initiatives for entrepreneurship education were only descriptive, involving examining course descriptions and syllabi (Kailer, 2005).

Early research focused on identifying the demographic and personality characteristics of entrepreneurs and attempted to create models of behavioral and situational factors. Researchers now focus on examining intentions and attitudes as better predictors of entrepreneurial behavior, rather than merely examining demographic factors such as age, gender, education, and experi-

ence (Cooper & Lucas, 2006; Peterman & Kennedy, 2003). As Peterman and Kennedy observed, "Despite the recognition that education and prior entrepreneurial experiences influence people's attitudes toward starting their own business, the impact of entrepreneurship or enterprise education, as distinct from general education, on attitudes or perceptions of entrepreneurship has remained relatively untested" (Peterman & Kennedy, 2003, p. 129).

Methodology

Cooper and Lucas (2006) developed a methodology for measuring the effectiveness of entrepreneurship education experiences. Building on the models of Krueger and Brazeal (1994) and Bandura (1997), their model is based on the notion that desirability and feasibility (self-efficacy) predict entrepreneurial intent (Cooper & Lucas, 2006). Cooper and Lucas applied their methodology to evaluate Enterprisers, a five-day, extracurricular program supported by the Cambridge-MIT Institute, designed to enhance students' entrepreneurial capabilities and intent. They collected data from participants through a pre-, post-, and six-month follow-up survey to measure the impact of the program on the students.

Entrepreneurial Intent

Entrepreneurial intent is an important factor to analyze because "in the psychological literature, intentions have proven the best predictor of planned behavior, particularly when that behavior is rare, hard to observe, or involves unpredictable time lags" (Krueger, Reilly, & Carsrud, 2000, p. 411). Although situational factors may temporarily discourage individuals from pursuing specific behaviors such as becoming entrepreneurs, an examination of entrepreneurial intent can predict future entrepreneurial behaviors (Krueger, Reilly, & Carsrud, 2000). The predictive power of entrepreneurial intent is strong because entrepreneurship is a behavior chain, and it captures "long-run tendencies by canceling variations in situations over time" (Krueger, Reilly, & Carsrud, 2000, p. 414). Intentions are considered an unbiased predictor of behavior and action, even in situations where time lags exist (Bagozzi, et al., 1989). Krueger, Reilly, and Carsrud (2000) justified their theory as follows: ". . . a strong intention to start a business should result in an eventual attempt, even if immediate circumstances such as marriage, child bearing, finishing school, a lucrative or rewarding job, or earthquakes may dictate a long delay."

Perceived Desirability and Perceived Feasibility

Perceived desirability is "the personal attractiveness of starting a business, including both intrapersonal and extrapersonal impacts" (Shapero, 1982, as cited in Krueger, Reilly, & Carsrud, 2000). This factor can be measured by asking questions about how attractive it would be for the individual to start a new company (Cooper & Lucas, 2006).

Perceived feasibility is defined as "the degree to which one feels personally capable of starting a business" (Krueger, Reilly, & Carsrud, 2000). This measure is based on self-efficacy and addresses the individual's self-confidence in entrepreneurial tasks. Measuring this factor involved asking how confident the student is at performing a specific task such as setting the price for goods and services provided.

Together these two measures have predictive power to analyze how likely an individual will be to pursue entrepreneurship (Cooper & Lucas, 2006). Based on their experiences with the instrument over several years at the Cambridge-MIT Institute, Cooper and Lucas have identified the predictive ability of these measures to determine how effective entrepreneurial programs are at actually creating entrepreneurs.

The Instrument

This study examined students' changes in entrepreneurial self-efficacy and entrepreneurial intent after completing a one-semester course in entrepreneurship at the W. P. Carey School of Business at Arizona State University. The instrument was administered at the beginning and the end of the spring 2008 semester in three classes, two intermediate-level survey courses in entrepreneurship and one intermediate-level speaker series course in entrepreneurship and leadership. A set of items was chosen in consultation with Dr. Lucas, based on his experience with the items at the Cambridge-MIT Institute. The majority of the items on the instrument were identical to those on an earlier instrument developed by Cooper and Lucas and used with their permission. The Cooper and Lucas instrument has been validated and used at MIT and in the United Kingdom over an eight-year period.

The items on the instrument were refined to place less of an emphasis on money and profit and to include items that were sensitive to the fields of social entrepreneurship and intrapreneurship. Items were also revised to reflect an emphasis on creativity and innovation as important factors in entrepreneurship. The revised items were examined for face validity prior to data collection.

The individual sections of the instrument were developed based on the work of Cooper and Lucas (2006) and Bandura (1997). A section on identifying information collected demographic information including gender, class year, major, and whether or not a parent, other relative, or close friend had ever operated their own business. A five-point scale was used to determine the frequency of students' experiences with business and entrepreneurship.

Self-efficacy was examined in several sections of the instrument. Students were asked to rank themselves in comparison with other students on their ability to perform specific tasks related to success in entrepreneurship on a six-point scale ranging from poor

to excellent and rate their confidence for other tasks on an eleven-point scale ranging from 0% to 100%. Data were collected on the desirability of entering an entrepreneurial career path, with a seven-point Likert scale addressing items such as "At least once I will have to take a chance and start my own venture" and "If I see an opportunity to start a venture in the next few years, I'll take it." Entrepreneurial intent was modeled on a five-point scale ranking the attractiveness of an opportunity, ranging from "a very unattractive opportunity" to "a very attractive opportunity" for items such as "being employed in a newly started venture," "being the founder of a not-for-profit organization," "being a part-owner and member of a management team in a small new business," and "being on a small company management team working to grow and then sell the business."

Procedures

This study was part of a larger assessment initiative at Arizona State University and the other campuses funded by the Kauffman Foundation. The University of Kansas is coordinating data collection for a longitudinal study of entrepreneurship education at 19 Kauffman campuses, including Arizona State University.

Human subjects approval was granted for the study by the Institutional Review Boards of the University of Kansas, Lawrence Campus, and Arizona State University. Students completing this survey were assured that information they provided would remain confidential with regard to their identity and would be used only as consolidated, aggregated data. Unique identifiers were created to match student responses from the pre- and post-tests, to prevent the possibility of identifying participants. The same form of the paper test was administered in the first and last weeks of the course. Test-retest reliability was not a major concern because more than four months separated the pre- and post-test data collection.

A total of 119 students participated in the pre-test questionnaire and 102 of those students (86%) also completed a post-test questionnaire. The 14% rate of attrition was attributed to students' withdrawals and absences. Data were analyzed only for participants who completed both the pre- and post-test. Pre- and post-test data were recorded on a spreadsheet and analyzed with SPSS, using a Wilcoxon test for rank order.

Findings

The Wilcoxon test revealed that students enrolled in the three entrepreneurship courses had a significant increase in scores on self-efficacy and intent. On five out of the six self-efficacy subscores, ability to "design something novel and innovative," "start a successful business if you want," "understand what it takes to start your own business," "work on collaborative projects as a member of a team," and "lead a group with members who strongly disagree with one another," participants had a significant increase from pre- to post-test scores, as shown in Table 1.

Participants who rated their skill to design an innovative product as good to excellent increased from 51.0% to 65.7%. Similar increases exist for the ability to start a successful business if desired (81.4% to 87.3%), the ability to understand what it takes to start a business (72.5% to 93.1%), the ability to work on collaborative projects as a member of a team (96.1% to 97.1%), and the ability to lead a group with members who strongly disagree with one another (80.4% to 86.3%). Among the students in these courses, no change was found in the ability to listen to the ideas of others with an open mind, possibly because students were already at a high level of success prior to the start of the course (scores remained constant at 96.1%). Approximately half (ranging from 29 to 55) of the 102 students showed an increase in their ratings of their entrepreneurial skills. All changes were statistically significant at the .05 level or less.

On two of the four intent items, "high risk/high reward ventures appeal to me" and "I often think about ideas and ways to start a venture," students' scores significantly increased over the semester, as shown in Table 1. Those students expressing agreement or strong agreement that "high risk/high reward ventures appeal to me" increased from 32.4% to 39.2%. "I often think about ideas and ways to start a venture" increased from 47.1% to 61.8%. Participants also increased their agreement with the statement, "I come up with my best ideas when I don't have to work with others," possibly because they learned from guest speakers and from working on group projects that working with a team presents many challenges.

Discussion and Conclusion

Through careful program evaluation, stakeholders involved in entrepreneurship education can gain a valuable understanding of how and why entrepreneurship should be taught. The methodology refined by Cooper and Lucas can be used to assess specific skills and traits taught in entrepreneurship courses and to determine how the program has impacted student self-efficacy. By analyzing how entrepreneurship is taught and how students learn, faculty members can improve their teaching and universities can improve their curricula in entrepreneurship.

Results of this pilot study will be used to implement a longitudinal assessment procedure for all entrepreneurship programs throughout the University. The longitudinal assessment will provide information to help entrepreneurship instructors determine the effectiveness of a variety of teaching materials and strategies.

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Table 1
Self-confidence in Entrepreneurial Skills and Intent

A. Self-confidence in skills	**Percent ranking skill "Good" to "Excellent"**			**Response changes from pre- to post-test, Wilcoxon analysis**		
Post-test N = 102	**Pre**	**Post**	**N**	**Number increase**	**Total changes**	**Z value**
Design something novel and innovative	.51.0%	65.7%	102	47	69	2.889***
Start a successful business if you want.	81.4%	87.3%	102	45	68	2.547**
Listen to the ideas of others.	96.1%	96.1%	102	29	49	1.143
Understand what it takes to start your own business.	72.5%	93.1%	101	55	75	3.926***
Work on collaborative projects as a member of a team.	96.1%	97.1%	102	33	48	2.454*
Lead a group with members who strongly disagree with one another.	80.4%	86.3%	102	44	63	3.024**
B. Entrepreneurial Intent	**Percent who agree or agree strongly**		**N**	**Number increase**	**Total changes**	**Z value**
High risk/high reward ventures appeal to me.	32.4%	39.2%	101	41	65	1.985*
I often think about ideas and ways to start a venture.	47.1%	61.8%	101	41	59	2.864**
At least once I will have to take a chance and start my own venture.	69.6%	67.6%	99	26	51	0.000
If I see an opportunity to start a venture in the next few years, I'll take it.	52.0%	66.7%	100	29	52	0.693

* p<.05; ** p<.01; *** p<.001.

Integrating Instruction in Ethical Reasoning into Undergraduate Business Courses

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Abstract

This research was designed to identify non-intrusive teaching practices that can be used by business instructors to positively affect levels of moral reasoning in undergraduate students enrolled in business foundational courses. By "non-intrusive" is meant that the classroom interventions could be integrated into an instructor's course plan without causing a major displacement of the content which is normally taught in the course nor require extensive instructor training in ethical theory. Funded by the Lilly Endowment, the research, was conducted over five semesters at a Midwestern university and resulted in the development of teaching methods and materials that can, when properly sequenced and integrated into undergraduate foundational business courses, increase levels of student moral reasoning.

Introduction

This article presents findings from a series of research studies designed to identify non-intrusive teaching practices that can be used by business instructors to positively affect levels of moral reasoning in undergraduate students enrolled in business foundational courses. By "non-intrusive" is meant that the classroom interventions could be easily integrated into an instructor's course plan without causing a major displacement of the content which is normally taught in the course nor require extensive instructor training in ethical theory. Funded by a Lilly Endowment Promising Scholars Grant, the research, conducted over five semesters at a Midwestern university, resulted in the development of teaching methods and materials that can, when properly sequenced and integrated into undergraduate foundational business courses, increase levels of student moral reasoning as measured by the revised version of the Defining Issues Test, the DIT-2 (Rest, Narvaez, Bebeau & Thoma, 1999). .

Importance of the Research

AACSB has resisted requiring any courses in ethics and/or corporate social responsibility. Basing its argument on the notion that each business school knows best how to structure ethics training for its business students, AACSB simply offers standards to be met. Business schools accredited by AACSB must, in their accreditation plans, meet expectations delineated by Assurance of Learning Standard 15: Management of Curricula, which states that ethical understanding and reasoning abilities need to be taught in AACSB-accredited institutions, but the standard does not specify the delivery structure, content, or credit-hour requirements that are purposely left up to each school of business ("Eligibility Procedures," 2007).

At the same time, this indefinite delineation of the AACSB ethics education requirement leaves schools to find their own ways through several areas of disagreement about how to teach business ethics. One area of disagreement deals with whether a trained ethicist, sometimes from outside the business school, should teach a course in ethics to business students. Arguing for this arrangement, some contend that only individuals trained in the nuances of ethical theory should teach ethics (Bok, 1988; Klein, 1998; Norman, 2004). Some contend that the complex set of variables that exist within organizational and business structures, i.e. hierarchies of authority and roles of employees, stakeholder groups and influences, company politics, and organizational heuristics and biases, dictate that a business professor can and should learn the nomenclature of ethics and take on the role of teaching ethics to business students (Buono, Burton, Cunningham & Freadrich, 2005; Carroll, 2005; McDonald & Donleavy, 1995; Morse, 1999).

A second point of concern deals with the academic level at which ethics instruction should be introduced to business students. Some schools introduce it at the undergraduate level; others only offer it at the postgraduate or MBA level. Another area of concern is how to fit ethics education into already loaded undergraduate and graduate programs, and whether ethics should be taught as a stand-alone course or integrated throughout the curriculum. If a stand-alone ethics course is being considered, often the next major decision is whether it should be required or offered as an elective. Offering ethics only as an elective may demean the perceived worth of the course in the eyes of students and those students who may indeed need the insights from such a course would likely not enroll in it. Isolating the discussion of ethics from other business disciplines in a separate stand-alone course has also been criticized "for its potential to give students a false impression of the world of business by separating ethical considerations from real-world business consequences (McDonald, 2004, p. 373).

Integration of ethics instruction into core courses has been tried by several schools of business, but has met with less than desired outcomes because of the sustainability problem (Wilhelm, 2005). Professors who may agree to go through training in ethical reasoning in order to teach a course with integrated ethical content may subsequently leave an institution and newly appointed instructors may not agree to take on the added responsibility of teaching ethics in their courses. Still other programs face resistance from existing faculty members who are adamant that ethics is not part of their discipline other than as laid out in professional codes of ethics or legislation relevant to their discipline. There seems to be no consensus on how best to teach ethics in business schools. For those institutions that face the daunting task of effectively integrating learning experiences in ethical understanding and reasoning abilities into undergraduate programs, this article may provide some insights.

Research Objective

Extensive use of the Defining Issues Test in thousands of studies over several decades have confirmed the positive affect that formal education has on the development of higher levels of moral reasoning (Rest & Narvaez, 1979; 1994; 1998; Rest et al., 1999). University professors, therefore, – who have likely completed advanced degrees through formal education - would seem to have the capacity for moral reasoning at advanced levels. In fact James Rest pointed out that, "discussions of the morality of professionals usually assume advanced psychological maturity" (Rest & Narvaez, 1994, p. ix).

The goal of this research was to develop teaching materials that could be successfully integrated into foundational business courses taught by business professors who did not possess specialized training in ethics to accomplish two objectives of moral reasoning: student awareness to ethical issues and reasoning competence. While some have pointed to a distinction between philosophically oriented courses that train students in moral reasoning and courses that focus on developing awareness of moral issues in contextual situations such as business (Weber, 1990; McDonald, 2004), both competencies, i.e. moral reasoning and moral sensitivity, should be taught in business courses dealing with social issues.

Ethical theories used in the teaching materials developed for this research were selected based on those ethical theories most prominently taught in the top-fifty business schools in the United States (Wilhelm, 2005), i.e. deontology: ethics as duty, the teleological or utilitarian approach, personal virtue theory, and conventional moral rules and law. The ethical decision-making framework initially employed in this research (used by permission) was the framework utilized at Babson College, "A Framework for Ethical Decision Making" (Livingstone, 2003) which also reflected the ethical theories identified above.

Research Design

Each study in this series is a result of a continuing attempt to refine instructional methodology (interventions) for effectively teaching ethical decision-making theory and engaging undergraduate business students in reflective analysis so as to improve moral reasoning as measured by the revised version of the Defining Issues Test (DIT-2) (Rest et al., 1999). Based on research into methods used to teach business ethics in the top-fifty business schools in the United States (Wilhelm, 2005), the methods employed in this research included a combination of assigned readings, lecture (using presentation software) and classroom discussions, and reflective case analyses using an ethical decision-making framework. Cases relevant to each specific course discipline served as a basis for applying the ethical decision-making framework.

Assessment of improvements in moral reasoning was based on pretest – post-test comparisons of two key indicators on the revised version of the Defining Issues Test (DIT-2): the post-conventional P score and the new N2 score. After each study was completed, adjustments and refinements were made to the instructional methodology (intervention) based on findings from each previous study and debriefings of student participants and instructors. Convenience samples used for each study consisted of students in a range of undergraduate core business courses from foundation business disciplines at a mid-sized Midwestern university.

To detail the specifics of each of the five semesters of study, which included 16 different classes and several variations on the interventions used, is beyond the scope of this proceedings article. Details of all of the studies in the research have been published by the researcher (Wilhelm, 2008) in an article in the Journal of Business Ethics Education and may be viewed at http://misnt.indstate.edu/wilhelm/Ethics/PUBLISHED-JBEE.pdf. The interventions used, however, all consisted of some variation the following elements:

- Reading assignment in the form of an article or essay containing explanations of Western ethical theories and a step-by-step ethical decision-making framework
- Instructor lecture (with or without presentation software) further explaining the reading assignment and framework
- Cases related to each content area but also containing ethical elements or dilemmas
- Variations on the use or non-use of reflective writing assignments based on case analyses
- Variations on the use of quizzes to test comprehension and grades on reflective writings

Findings and Conclusions

There were five sequential studies carried out in 16 classes during the development of the instructional methodology (teaching methods and materials) in this research. The research did result in the development of an instructional methodology that eventually yielded statistically significant increases in student moral reasoning as measured by the DIT-2. Instructional materials and a discussion of their use are available at http://misnt.indstate.edu/wilhelm/Ethics/Promising_scholars_grant.htm. These five studies will be briefly discussed.

Study One

The first of the five sequential studies (Wilhelm & Czyzewski, 2006) tested two different interventions in a nonequivalent control group quasi-experimental design which can be used when true randomization of subjects and extraneous variables cannot be achieved (Campbell & Stanley, 1963). Three sections of the same undergraduate accounting course taught by a single instructor were used as the sample (n_1 = 15, n_2 = 28, n_3 = 29). There were no significant improvements in DIT scores for either of the intervention groups in comparison to the control group. Based on instructor and researcher observations and student debriefing, several adjustments to the intervention were made. Graded reflective writing assignments based on the ethical cases analyses were incorporated into the intervention, and the rigor of the ethical content in the choice of accounting cases was in increased.

Study Two

The second study in the series utilized a similar research design and was initiated the following semester in two sections of the same accounting course with the same instructor (n = 62). The intervention (which included graded reflective writing assignments based on 10 ethics accounting case analyses) did increase levels of student as measured by the DIT-2, but not significantly. The researcher and instructor observations and student debriefing yielded recommendation for further improvements to the intervention. Ten cases were too many for a basic accounting course, so the number of case studies was reduced significantly. The length of the reading assignment on ethical theory and ethical decision-making framework was reduced. The researcher prepared an article that synthesized information from several authors into a 15-page article (reduced from a 33 page essay). Graded written reflections were determined to be a critical part of the intervention.

Study Three

The third study was undertaken in the following semester in one business communications class section (n = 21) taught by the researcher. Students were given the revised essay (Wilhelm, 2005a), instruction in its use, a step-by-step decision-making protocol based on the framework, and four cases containing ethical dilemmas. There were statistically significant increases in levels of moral reasoning from pre test to post-test in both measures in the DIT-2. The paired samples T-test showed that, at p = .05, the level of significance in the P score increase was .017 and .022 for the N2 score; both were statistically significant. The 34 percent increase in the P score (18.9524 pretest to 25.4286 posttest) and 36 percent increase in the N2 score (20.0332 pretest to 27.2557 posttest) seem to indicate that the adjustments in the intervention did indeed elicit significant increases in moral reasoning in the students, and other content area professors were recruited to apply the methodology in their business courses in the fourth study.

Study Four

The fourth study sampled three different disciplines through three different courses (one course in each discipline). Two sections of Buyer Behavior in the marketing program taught by a single instructor (n = 31), three sections of a business communications course taught by two instructors (n = 44), and one section of a senior capstone management course taught by one instructor (n = 14) made up the samples. An analysis of variance was conducted to determine if there may have been pre-existing differences between the groups. The ANOVA results showed that there were no differences. All instructors used the ethical decision-making instructional materials provided by researcher. Materials included those used in the previous study with some minor modifications. The essay on ethical theory and decision-making used in the third study was refined for publication and used in this study (Wilhelm, 2005b). Supporting this article was the handout and worksheet detailing the steps in the decision-making framework. Instructors also received a copy of the ethics PowerPoint lecture with details and explanations for the instructor incorporated into the application's notes pages. Importantly, instructors had discretion regarding how to integrate the ethical teaching materials provided by the researcher into their courses and the cases used.

In the Buyer Behavior student sample, the paired samples T-test showed that, at p = .05, the level of significance in the P score increase was .299, not statistically significant. However, the T-test significance level for the N2 score was .050, which is statistically significant. The 8.5 percent increase in the P score (30.1935 pretest to 32.7637 posttest) and 18.3 percent increase in the N2 score (27.1480 pretest to 32.1166 posttest) seem to indicate that the intervention did elicit moderate increases in moral reasoning in the students.

In the three sections of Business Report Writing, there were statistically significant increases in levels of moral reasoning from pre test to post-test in both measures in the DIT-2 for the three combined sections of the business communication course. The paired samples T-test showed that, at p = .05, the level of significance in the P score increase was .002 and .001 for the N2 score; both statistically significant. The 28.4 percent increase in the P score (25.6576 pretest to 32.9321 posttest) and 29.6 percent increase in the N2 score (25.4037 pretest to 32.9204

posttest) strongly indicate that the intervention did indeed elicit significant increases in moral reasoning in the students.

The instructor of the management class used the ethical decision-making framework only as a loose guide for discussing two ethics cases in management, and no grade values were assigned to the ethical reasoning element of the course. While there were increases in both the P score and the N2 score post-test results for the management class sample, they were not statistically significant. The paired samples T-test showed that, at $p = .05$, the level of significance in the P score increase was .581 and .120 for the N2 score; both statistically insignificant. The 8.1 percent increase in the P score (24.7133 pretest to 26.7143 posttest) seems to indicate that the intervention as it was applied in the management class did not elicit an improvement in student moral reasoning. The N2 score's increase of 28.6 percent (20.0243 pretest to 25.7607 posttest), while showing a much greater degree of improvement than did the P score, still did not approach significance sufficiently to warrant a claim that the intervention was effective.

Conclusions derived from the fourth study were that As demonstrated in the two marketing classes, students were able to apply the ethical decision-making framework during reflective classroom discussions of ethical case dilemmas and, as a result, increased their levels of moral maturation. However, as demonstrated in the three business communications classes, the requirement of several individually written reflective case analyses using the decision-making framework seemed to help students increase their levels of moral reasoning much more significantly. Further, application of the framework over a short period of time and with less intensive application in only a couple of simple cases as demonstrated in the management class did not seem to help students increase their levels of moral reasoning. When grades are not part of the ethical analytical work in a content course, motivation to engage in ethical analysis is not present to the degree necessary for students to feel that the ethics component is a necessary part of the course and not just a distraction from the course content.

Study Five

A fifth one-semester study was conducted in three different courses. One class section in finance ($n = 12$) and one class section in management information systems (MIS) ($n = 20$) were selected to again test if the teaching materials developed for this research when integrated into the courses could be effective at increasing student levels of moral reasoning. In addition, one section ($n = 18$) of Business and Society, a required course for management majors that focused on business ethics and corporate social responsibility, was selected to be used as a comparison group that would not receive the intervention from this research, but rather would assess the instructional methodology developed specifically for that course which was very similar to the methodology being investigated in this research. The recommended instructional methodology recommended to the instructors of the finance and MIS course was the same as used in study four with the exception of the ethical decision-making essay. The essay used in this study was very similar to the previous study, but was a copy of a published article by the researcher (Wilhelm, 2006.) An analysis of variance was conducted to determine if there may have been pre-existing differences between the groups. The ANOVA results showed that there were no differences.

There was a statistically significant increase in the P score for the Business and Society course. The paired samples T-test showed that, at $p = .05$, the level of significance in the P score increase was .032. The T-test results and the 22.9 percent increase in the P score (24.0000 to 29.4966) seem to indicate that the teaching methodology used by the instructor did indeed elicit increases in the level of moral reasoning in the students. While the N2 score also changed with a similar but slightly less 22.2 percent increase (24.8926 to 30.4240), the paired samples T-test significance at .086, when considered with the significant increase in the P score, cannot be dismissed as statistically insignificant. DIT-2 literature points out that college samples suggest that P scores and N2 scores tend to behave very similarly (Thoma, 2006). It must therefore be assumed that the improvement in moral reasoning in the Business and Society class was indeed significant as reflected in the P score and N2 score increases.

While there were slight increases in both the P score and the N2 score post-test results for the finance class sample, they were not statistically significant. The instructor used only the article as assigned reading in the course in order to challenge the students not to cheat on assignments. There were no cases used in the class for student reflective analysis while using the ethical decision-making framework. The ethical reasoning methodology was not integrated properly or used as recommended.

In the one-semester management information systems introductory course required for all business majors ($n = 20$), instruction in ethical decision making was incorporated into only three weeks of the course, but with only one case analysis and no required written reflective case analysis. There were no grades associated with any of the ethical decision-making activities. There were decreases in both the P score and the N2 score post-test results for the MIS class sample. The decreases could have happened by chance; however, the intervention was not effective at increasing student moral reasoning. The instructional methodology departed from the previously successful recommended intervention.

To summarize the conclusions drawn from the fifth study, while the materials developed for this research can be effectively used in content courses to significantly increase student moral reasoning, they must be used in such a manner that students have sufficient time to learn the ethical decision-making theories and concepts, and to apply those concepts in a deliberative, reflective and repeated process of ethical case analyses.

Recommendations

Business content course instructors can successfully integrate ethical reasoning components into their courses without sacrificing course content and without special instructor training in ethical theory if the following techniques are used:

- The most frequently used theories in Western ethics should be taught, i.e. i.e. deontology: ethics as duty, the teleological or utilitarian approach, personal virtue theory, and conventional moral rules and law

- Students should complete assigned readings that present the above theories clearly and concisely. The readings should also introduce a step-by-step ethical decision-making framework that is logical, concise, and utilizes the evaluative components from the ethical theories.

- After students have completed the assigned readings, the ethical theories and decision-making framework should be presented in class by the instructor in one or two class sessions using lecture and modeling (with sample case) to clarify the ethical theories and how to use the decision-making framework. Class discussion should follow the lecture in order to help ensure student understanding.

- Several case studies (more than two but less than six) containing robust ethical dilemmas that are also related to the course content should be assigned for students to analyze using the ethical decision-making framework.

- Grade-related assessments of students' written case analyses and reflective justifications should be conducted. Additionally, a grade-related assessment in the form of a test or quiz over the assigned readings and lecture about the ethical concepts taught should be completed.

- While the introduction of the ethical components into the course may take only one or two class sessions, time foe students to reflect upon the ethical concepts and apply them to cases containing ethical dilemmas should extend throughout the semester as much as possible. Students should be provided several opportunities to employ the decision-making framework and to reflect upon their decision justifications.

- Additional courses in the business core should be identified for further study using the instructional methods developed through this research. The studies should also employ similar pretest – post-test designs using the DIT-2 in order to gather comparison data.

- As demonstrated in the research findings, while professors need not be specialists in ethics in order to elicit positive changes in levels of student moral reasoning in the business classroom, they must dedicate considerable effort and attention to case analyses employing an ethical decision-making framework. The question naturally follows, then, whether ethics taught across the curriculum can be effective even when individual instructors may not invest all the time and effort that this study found necessary. In such curricula wherein ethics instruction is integrated throughout, additional research is needed to determine if individual professor's efforts, which may be inadequate in and of themselves, might collectively add up to something that is also effective.

While significant increases in student moral reasoning (as measured by the DIT-2) cannot be ensured through the integration of these concepts and teaching activities, there exists a strong likelihood that student moral reasoning will increase. Also, if content area instructors teach these ethical decision-making concepts in their classes and stress the importance of employing a sound ethical decision-making framework in deciding courses of action in business dilemmas, they cannot help but impress upon both students and other faculty members the importance of proper ethical behavior through sound ethical decision making. While the findings in this research demonstrate that faculty members who are not specialists in business ethics can effect positive increases in student moral reasoning in non-ethics business courses, significant time and effort need to be invested in case-based moral decision making in the classroom, and grade incentives for students to engage the use of an ethical decision-making framework are required.

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Mapping Business Communication: The Journey Ahead

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Abstract

Instructional delivery of business communication courses has evolved as technology has provided alternatives to the traditional classroom setting. This study examines how business communication faculty members are modifying their instructional delivery to utilize changing technology.

Changes in Business Communication Instruction

The teaching/learning environment for the business communication class has changed dramatically since the early 1980's. Twenty-five years ago, students wrote business letters by hand in the classroom and consulted a dictionary for assistance in spelling. Teachers used a chalkboard or perhaps an overhead projector to illustrate key points. Research involved physical trips to the library, with hours spent using a card catalog or index, and hunting through the stacks for publications.

By contrast, today's business communication class may not be in a classroom at all. Students may use an electronic platform through the Internet to study at their convenience, to interact with other students, and to communicate with the instructor. The instructor may hold online discussions by posting questions for responses from students in lieu of face-to-face classroom discussions. The responsibility for learning has shifted from the teacher and the institution to the individual student. Today's learning environment requires technology not even dreamed of in the past.

Just as it has provided a more dramatic change in the teaching/learning environment in the past quarter-century than in the years before, technology will continue to have a compelling impact on academics in the years to come. May (2007) predicts that information management will be at the center of civilization by 2035. To support that prediction, he reports that online instruction currently has an enrollment of approximately 500,000 participants and that the average family currently owns 12 technological devices. Projections are for technology to continue to be paramount in our lives. Success will be gauged by how well an individual manages technology and information.

As technology assumes the pivotal point in our lives, some question whether communication in general and business communication in particular will be more or less effective (Gordon, 2006; Quible & Griffin, 2007; and Rieber, 2006). As students become more proficient in texting, will they develop writing deficiencies? Reinsch and Turner (2006) propose a reorientation of business communication as technology changes the business environment. Business communication faculty must embrace technology and incorporate it into course instruction. Although numerous opportunities for improving instruction in business communication abound, many find the challenge to be daunting. An examination of current teaching methodology is needed in order to map future directions for the discipline. Is the business communication discipline still operating with the standards and technologies of yesteryear? Is it embracing technological change? Or is it somewhere between the two?

Purpose

The purpose of this study was to understand the current teaching environment in the business communication classroom to determine the direction of future modifications. Factors investigated include technology availability, instructional materials, electronic applications, communication channels, and supplementary resources.

Procedures

The data for this study were collected via an electronic survey of members of the Association for Business Communication. The initial instrument was developed to solicit faculty usage of technology and was administered to all members of the Association for Business Communication—Southwestern United States. In this pilot study, respondents were asked to describe their classroom settings and the technologies they use in the classroom as well as identify the frequency of usage.

The pilot study, conducted in February, 2008, yielded a response rate of 35.7%. Based on the findings of this study, the survey instrument was revised and administered electronically to 650 members of the Association for Business Communication in July, 2008. Because the data collection was through an electronic survey, only those members whose email addresses were available through the online membership directory of the Associa-

tion were included. These participants represented the nine international regions of the association. Members who did not have email addresses in the directory were not included.
Of the 650 messages sent, six were returned as undeliverable resulting in a revised total of 644. Participants were asked to respond by August 31, 2008. The number who responded was 136 resulting in a response rate of 21.2%. Because the survey response procedure was completely anonymous, any reminder messages would have to have been sent to the entire population. A second message was not sent as the researchers would have been unable to determine if a participant had completed the survey twice.

Findings

The respondents were asked how frequently they used a list of items in the business communication classroom. When combining using the computer and projection system in every class with those who used it weekly or often, a total of 91.9% used this method to present information in class. Additionally, only 1.5% of the respondents indicated that they did not have a computer or projection system in the classroom.

The overhead projector which was once a staple in the classroom has been eclipsed by both the chalkboard/marker board and the computer projection system. Of the respondents, 11.7% said they no longer had an overhead in the room while 26.6% indicated that they used it in every class or weekly/often. Electronic platforms such as Blackboard have made inroads as 66.2% indicated they are used in every class or weekly/often. Additional information is shown in Figure 1 below.

The business communication instructors were asked what instructional materials they were using in class. The top five responses appear in Figure 2. The bottom five responses indicating that they did not use this item in class were electronic quizzes, activities, etc. that accompany text (50.0% of 116); Study guide for students (55.8% of 113); No textbook—use readings, web sites, etc. (64.2% of 106); Combination of both traditional and electronic textbooks (64.6% of 113); and electronic business communication textbook (74.6% of 114).

Figure 1
How Frequently Are These Items Used in Business Communication Classroom?

Item	Every class	Weekly/Often	Seldom Use	Never Use	Not in room	# of Respondents
Computer & projection system	63.2%	28.7%	5.1%	1.5%	1.5%	136
Chalkboard/marker board	35.2%	39.8%	20.3%	3.9%	0.8%	128
Electronic platform (i.e. Blackboard)	33.1%	33.1%	14.7%	14.7%	4.4%	136
Internet connection in classroom	20.9%	48.5%	23.9%	5.2%	1.5%	134
Overhead projector	10.2%	16.4%	24.2%	37.5%	11.7%	128
Elmo Projection	6.2%	16.3%	17.1%	28.7%	31.8%	129

Figure 2
What instructional materials are used in class?

Item	Required	Optional	Do Not Use	Do Not Use Now But will in future	# of Respondents
Traditional textbook	80.6%	9.3%	9.3%	0.8%	129
Powerpoint presentations	75.6%	14.5%	9.2%	0.8%	131
Handouts available on electronic platform	70.2%	9.7%	16.9%	3.2%	124
Powerpoint presentations for student access	63.7%	16.1%	17.7%	2.4%	124
Handouts distributed to class in hard copy	62.5%	18.8%	18.0%	0.8%	128

Survey respondents were asked to indicate what features of electronic platforms such as Blackboard they used most frequently. Email received the highest response with 74.6% of 114 respondents using the item regularly. Email was closely followed by assignments with 73.9% of 115 respondents. The third largest use was of the gradebook at 69.2% of 107 respondents. The item that was seldom or not used was chats (77.2% of 101).

When the question of how do you communicate with your students outside of class was posed, the largest choice was by email with 49.6% indicating three or more times a week and 41.5% (135 respondents) indicating about once a week. Face-to-face visits in office hours was the next highest media with 21.5% visiting three or more times per week, and 28.1% visiting about once a week. Voice mail messages were used just a few times a semester by 33.3% of the respondents (129). Eighty-five percent or more of the respondents indicated that they never communicate with students using instant messaging, text messaging, or fax messages. Having students call at home was not used by 69% (129 respondents). Having students call your cell phone was used periodically by 45.5% of the respondents (132) and never used by 54.5%.

Faculty members were asked how students used computers in the business communication classroom. The largest percentage of respondents indicated that 92.4% (of 132) had students use computers outside of class for course requirements. Of the respondents 30% (129) indicated their classes were always or frequently taught in a computer lab. Sometimes (always or frequently) the class met in a computer lab on specific days for assignments according to 23.8% (118) of the respondents. According to 130 of the respondents, students seldom (42.3%) or never (22.3%) brought computers to class.

When asked about the impact of online teaching in business communication, 92.4% of the 131 respondents indicated that they taught traditional sections of business communication. About 23.6% of the respondents indicated that they taught online sections of business communication. Another 31.7% said that they taught a hybrid course that was part online and part traditional. When asked if their school offered online sections of business communication, 132 respondents indicated as follows: yes, 47.7% (63); no, 45.5% (60), and maybe 6.8% (9).

Demographics of Respondents

When asked the enrollment of the university, 29.5% (39) indicated 10,000 or fewer students; 33.3%(44) indicated 10,001 to 20,000 students; 17.4% (23) stated 20,001 to 30,000 students; and 19.7% (26) said 30,001 students and over. The typical enrollment in a business communication classroom for the 135 respondents was 20 or less students, 17.0% ; 21-25 students, 30.4%; 26-30 students, 26.7%; 31-35 students, 14.1%; 36-40 students, 4.4%; and 41 or more students, 7.4%.

Respondents were asked how many sections of business communication they typically taught in a school year. Of the 133 respondents who answered this question, 12.8% said one section; 28.6% said two to three sections; 30.8% said four to five sections; 19.5% said six to seven sections; and 8.3% said eight or more sections. All of the respondents taught at least one section.

Figure 3 compares the respondents with the surveys distributed by geographic region. The region with the largest response was the Southeastern United States with Respondents were asked about faculty rank with the following results: Professor, 27.6%; Associate Professor, 18.7%; Assistant Professor, 11.9%; Visiting Professor, 2.2%; Instructor, 26.1%; and adjunct faculty, 10.4%. Of the 134 respondents, 1.5% indicated their institution had no rankings.

Figure 3
Respondents by Geographical Region

Region	Surveys Distributed	Respondents
Asia Pacific	78	3
Caribbean, Central and South America	6	1
Canada	18	4
Europe	60	8
Eastern United States	104	23
Midwestern United States	101	32
Southeastern United States	115	30
Southwestern United States	76	21
Western United States	92	13
Skipped question		1
Total	650	136

Conclusions

The lower response rate for the survey could have resulted from the fact that the focus of many members is oral communication, consulting, training, and theoretical areas. These members may not be teaching a basic business communication course; only members who taught business communication were asked to complete the survey. Those teaching a basic business communication course individuals could not be identified prior to the survey distribution.

Regarding the status of the business communication classroom, it is safe to say that the new standard is a projection system with computer. The majority of classrooms have Internet access and over two-thirds use that access in every class or weekly/often. The traditional textbook is used by over eighty percent of the instructors.

While three-fourths of the instructors used powerpoint presentations, only about 64% provided student access to the powerpoint presentations. Over seventy percent indicated that their handouts were available on electronic platforms.

Email was the most common way of communicating with students outside of class. Over 85% of the instructors never used technologies such as instant messaging, text messaging, or faxing to communicate with students outside of class.

Over ninety percent of the faculty indicated that students used computers outside of the classroom for course requirements. A little less than one-third of the respondents indicated that they held their classes in computer labs. About a quarter of the respondents had the class meet in a computer lab on specific days for some assignments. Interestingly, nearly two-thirds of the students seldom or never brought computers to class.

When asked about online teaching, less than one-fourth of the respondents taught online courses. At this time about half of the schools offer business communication as an online course and half of the schools do not.

Recommendations for Future Research

Future research could focus on the application of technology in the business communication classroom. Will current and future technology impact the way the content of the business communication course is offered. For example, to what extent will shortcuts in email and texting change the way we prepare future business writers?

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MySpace, Facebook, and Other Social Networking Sites: How Are They Used by Human Resource Personnel?

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Abstract

Social networking sites (SNS) are beginning to impact how human resources personnel (HR) are interacting with potential job applicants (Daniel, 2005; Scanlon, 2007). It also appears to be a growing practice for employers to fire employees for questionable information contained on social networking sites (McGee, 2005; Shapira, 2008). And furthermore, few companies have policies in place to govern the use of such sites in HR practices.

Although there is minimal knowledge about the prevalence of HR personnel's use of SNS for the purposes of recruiting and selection, the purpose of this study is to gain a better understanding of the different ways in which HR professionals are using SNS for HR functions of performance evaluations. Armed with this greater understanding, educators and students will be better able to develop strategies for "managing and monitoring" their online persona (Beal & Strauss, 2008).

Introduction

Advances in technology have greatly changed how we communicate in the workplace. Once novel, e-mail is now viewed as a traditional means of communication (Vile & Collins, 2004). In addition, organizations are being presented with new opportunities and challenges with communicating through instant messaging, text messaging, blogs, wikis, podcasts, and Really Simple Syndication (RSS) feeds (Holtz, 2005-06).

Social networking sites (SNS) such as MySpace, Facebook, and Friendster are very popular and are impacting how human resources personnel are interacting with potential job applicants (Daniel, 2005; Scanlon, 2007). It also appears that some companies are giving considerable weight to information found on these sites in the employee selection process (Williams & Morrow, 2008; Zeidner, 2007). Equally not as clear, is how these social networking blogs are being used by human resource personnel post-hire to make decisions about performance evaluation and retention.

The Society of Human Resource Management (SHRM) conducted a survey of its members in 2007 to learn more about their use in e-recruiting (Scanlon, 2007). SHRM found that more than half of the organizations surveyed used online recruiting as well as used search engines to review online information posted about job candidates (p. 18). One in five of the organizations that searched for information posted online, reported eliminating a job candidate based on the information found online (p. 18).

College advisors and online career sites are warning job applicants that employers may conduct a virtual background check by searching online for information about them (Lenard, 2006; Nichols, 2007). Therefore, educators and recruiters are urge students to manage their online reputations (Beal & Strauss, 2008; Hargis, 2008).

More and more frequently, human resource (HR) personnel are using social networking sites for recruitment of job applicants. Two surveys were found relevant to online recruitment. A 2007 CareerBuilder.com survey found 45 percent of employers use online sources. A Vault.com found that 44 percent of surveyed employers had examined social networking profiles of job applicants with 10 to 40 percent of employers reporting using social networking sites as a source of background information on applicants with more predicting its use in the future (Maciag, 2008; NACE, 2007; Scanlon, 2007).

Additionally, recent headlines indicate a growing practice is for employers to fire employees for information contained on social networking sites (McGee, 2005; Shapira, 2008). Research found that few companies have policies in place to govern the use of such sites in HR practices.

Purpose and Research Questions

Presumptively, employers and employees need to have a greater appreciation of how technology and communication is evolving in the workplace. Although we know a little about the prevalence of human resource personnel's use of social networking sites for the purposes of recruiting and selection, the purpose of this exploratory research is gain a better understanding of different ways in which HR professionals are using social networking sites for the additional HR functions of performance evaluation and retention. Specific research questions addressed are:

1. For which HR functions (recruiting, selection, performance evaluation and retention) are HR professionals using social networking sites? How frequently?

2. How do companies guide the use of social networking sites by HR personnel?

Literature Review

Social networking sites are websites that connect people who share personal, professional, or other interest in common (Webster, 2008). In the United States, the most common sites are MySpace and Facebook. MySpace reported 100 million accounts and over 1 billion page views a day (Byrnside, 2008). Facebook, once primarily a social networking site for college students, also reports over 100 million active users and more than half of its users outside of college (Facebook, 2008). Internationally, Friendster is a popular site, particularly in Asia, with more than 70 million members (Friendster.com 2008). These sites have grown from an online venue where social information is exchanged into an online open forum allowing career networking and companies to niche market products to consumers who share common interests.

Human resources personnel are beginning to tap into this new gathering of people online to find employees for their companies. To assist with recruitment, new sites are being created, such as LinkedIn.com, for the purposes of career networking (Daniel, 2005; Scanlon, 2007). E-recruiting activities can range from posting a job announcement online to actively reviewing profiles posted on social networking sites and contacting people who seem like a good fit for the company. Some believe that social networking sites are best for finding "passive candidates and for filling positions that are too specialized to be filled via traditional methods" (Daniel, 2005). Some of the sites allow online search engines such as Google and Yahoo! to search member profiles by facilitating the search for potential candidates not actively looking for a job (Murphy, 2007).

Once an interested person has been drawn to a company, HR personnel are using online technology to facilitate the application and screening processes. Companies can provide potential applicants with more information about their organization and the job by leading people to candidate-oriented sites (Glube & Huxtable, 2002). A company can offer a virtual tour of the office, allow candidates to e-mail current employees, and develop relationships with potential candidates even though a current opening is not available.

Companies are also conducting internet searches (Googling the applicant) and reviewing social networking sites for background information about an applicant (Capwell, 2008; Murphy, 2007). Employers see the use of the virtual background check as an opportunity to get a glimpse of the real person before making a decision to hire him or her (Matejkovic & Matejkovic, 2006; Murphy, 2007). Others describe it as getting a glimpse of the personality of the applicant (Glube & Huxtable, 2002) or a character check (Maciag, 2008). Employers also argue they have a legitimate need to be sure that what an applicant has reported on a résumé is correct. Conducting an internet search is an inexpensive way of meeting this need for verification (Murphy, 2007).

Not everyone encourages the use of the virtual background check (Capwell, 2008; Greenwald, 2008). Capwell (2008) cautions that there is little ability to ensure that the information posted on the web is factual (see also Davis, 2006-07). A general quality assurance issue is a concern for any type of background check (Wells, 2008), but it is heightened for online information where it is possible for an anonymous source to create a social network site in another person's name (Byrnside, 2008). As an employer, how do you know that you are viewing the correct information about the correct applicant? Unchecked use of social networking sites may open up an employer to claims of discrimination, invasion of privacy, violation of union contracts, or other implied contracts (Davis, 2006-07; Sprauge, 2007).

Many firms are outsourcing their recruitment, screening, and background check functions (Wells, 2008). Few companies have policies in place to guide a contractor about when to search for information about a job applicant online, how to verify the information, or who may have access to any information that is found. Few companies have policies on whether to inform the job applicant that such a virtual background check will occur. The National Association of Professional Background Screeners has emerged since 2003 to standardize and improve the practices of companies providing background-screening services through self-regulation (Wells, 2008). Such efforts do not relieve HR professionals from ensuring the information they consider in an employment decision is accurate.

There is little discussion of how HR personnel are using social networking sites to gather information about current employees to be considered in the performance evaluation process. A survey conducted by Vault.com, a media company focused on careers, indicated that 39% of employers surveyed reported looking up a social networking profile on a current employee (Greenwald, 2008) but the survey failed to ask what was done with the information. Capwell (2007) encourages firms to conduct periodic post-hire background checks on employees in certain high-risk job categories to mitigate risks to the business. It is probable that such post-hire screens would include a virtual component.

From media reports, it is clear that social networking sites are a source of information that leads to an employer's decision to end a relationship with an employee. Employees are being dismissed for postings on social networking sites negative information about their employer, for posting pictures that are viewed as being risqué or inappropriate, for expressing dislike for coworkers, or for using language deemed inappropriate (Sprague, 2007). It is unknown how frequently employers

conduct routine virtual reference checks on current employees and whether such a check is part of annual performance evaluations.

The increase in dismissals based on what employees post on their personal blogs is stirring a public debate. Is it an invasion of privacy for an employer to view this information? Are the posts a form of free speech? Is the employer considering information that should be excluded from the decision and opening itself up to a discrimination claim? Since many employment situations are employment-at-will situations, employers are legally allowed to dismiss an employee for these postings as long as not based on a discriminatory reason. Free speech protections only apply to government employers, and the US Supreme Court has recently ruled that "governments can fire employees if their speech harms the workplace's mission and function" (Maltby, 2005; Spahira, 2008). Despite the legal and policy debate, few employers have developed polices to guide HR personnel on when such information should be sought and used in making retention decisions (McGee, 2005). Capwell (2007) encourages firms to develop a well-thought out policy for post-hire and reoccurring background checks.

Methodology

Participants

Participants of a Career Fair for 2007-2008 school year at Middle Tennessee State University (MTSU) were included as the population pool for this study. The researchers chose to use only those listed as HR personnel or recruiters. The population pool consisted of 2,425. Of this number, 104 responded with a 4% response rate. Of the 104 that responded, only 98 completed the entire survey.

Instrument Development

A researcher-designed survey was used to collect data. The survey was designed after literature research found no appropriate surveys for this study. The survey was divided into sections that included: communication with job applicants, communication with current employees, and demographic questions.

The first section explored how the respondent's HR department communicates with job applicants. Social networking sites were identified for the respondents as web sites that support the creation of online communities, with examples given such as MySpace, FaceBook, Bebo, Friendster, and Hi5. The next section questioned how the HR department communicates with current employees about the performance evaluation process as well as the results of the process. In the demographics section, data were collected that included: size of company, age of company, size of HR department, tenure of person with company answering survey, position (title) of person answering the survey, and gender of respondent.

The study was given to a panel of experts that included HR professionals and educators of business. This panel validated the content of this survey instrument and determined that the instrument did address the research questions.

Data Collection

The survey instrument was sent out via email to all participants on the Career Fair list during June-July 2008. The Jennings A. Jones College of Business Survey Management System was used to store and collect the data. The researchers accessed the system to retrieve results.

Findings

The findings of the study are reported in the following order: (a) demographic profile of respondents; (b) use of social networking sites by HR personnel for job applicants; (c) use of social networking sites by HR personnel for current employees; and (d) company guidance using social networking sites by HR personnel. These correlate to the research questions.
The findings from Research Question One are found in Table 2 and 3: *For which HR functions (recruiting, selection, performance evaluation and retention) are HR professions using social networking sites? How frequently?* The findings from Research Question Two are found in Table 4: *How do companies guide the use of social networking sites by HR personnel?*

The survey identified social networking sites (SNS) as those web sites that support the creation of online communities. Common examples were given as MySpace, Facebook, Bebo, Friendster, and Hi5.

In Table 1, the data shows that 44.9% of the companies responding to the study are from companies with more than 200 employees. Six respondents replied that their companies were 50 to 99 employees, which was the smallest group in this category. When asked about the size of the HR department, 54.1% reported that they have less than three employees. Eight companies did report that they had more than 30 employees in their HR departments. There were more female (67.3%) than male (32.7%) respondents. Most of the respondents were either HR personnel (38.8%) or in other management positions within their company (33.7%). These other management positions included Executive Vice Presidents, middle management, executive directors, office managers and other upper management positions. Recruiters represented 17.3% of the respondents. While 29.6% of the respondents reported that their companies was more than 50 years old, the remaining responses ranged between three to forty years. Only four companies were less than three years old. Of the 98 respondents, the largest group answered that they had been in their positions for one to three years (36.7%) or seven to ten years (24.5%). Only two percent of the respondents had been in their positions more than 30 years.

Table 1.
Demographic Profile of Respondents

	Categories	*Frequency*	*Percentage*
Size of Company			
	Less than 10 employees	9	9.2
	11 to 20 employees	8	8.2
	21 to 49 employees	15	15.3
	50 to 99 employees	6	6.1
	100 to 200 employees	16	16.3
	More than 200 employees	44	44.9
Age of Company			
	Less than 3 years	4	4.1
	3 to 10 years	16	16.3
	11 to 20 years	19	19.4
	21 to 30 years	14	14.3
	31 to 40 years	11	11.2
	41 to 50 years	5	5.1
	More than 50 years	29	29.6
Size of HR Department			
	Less than 3 employees	53	54.1
	4 to 6 employees	16	16.3
	7 to 10 employees	14	14.3
	11 to 20 employees	6	6.1
	21 to 30 employees	1	1.0
	More than 30 employees	8	8.2
Tenure of person with company answering survey			
	Less than 1 year	12	12.3
	1 to 3 years	36	36.7
	4 to 6 years	18	18.4
	7 to 10 years	24	24.5
	21 to 30 years	6	6.1
	More than 30 years	2	2.0
Position of person answering the survey			
	Human Resource personnel	38	38.8
	Recruiter	17	17.3
	Other management personnel	33	33.7
	Unspecified	10	10.2
Gender of person answering survey			
	Male	32	32.7
	Female	66	67.3

n=98

The focus of Table 2 is the use of SNS by HR personnel for job applicants. When proactively recruiting applicants for a position in the company, 67.3% responded that they had not used social networking sites. Of the respondents, 16.3% responded that they had used SNS one to five times a year. No response was given by 4.1% of the respondents. When asked if HR personnel used social networking sites to gain additional information about one or more job applicants, 58.2% responded that this had not been done (0 times). However, 20.4% had used social networking sites one to five times a year. No response was given by one. The same type of response was given concerning the use of SNS to verify information, with 72.4% responding that they had not (0 times). When conducting a general search for existing information on an applicant, 41.8% stated that they had not (0 times) while 31.6% had one to five times a year, or 13.3% responding six to ten times a year.

When asked about the next 12 months, 40.8% responded that it is not very likely they will use SNS to recruit applicants for their companies. On the opposite end of the spectrum, 22.5% responded that it was very likely they would use SNS to recruit applicants for their companies. The same spread can be seen in the response to using SNS to gain additional information about job applicants with 29.6% responding that it was not likely, while 25.5% responded it was very likely.

Table 2.
Use of Social Networking by Human Resource Personnel for Job Applicants

Question	Frequency	Percentage
In the past year, how often did you or someone in the HR department use social networking sites to proactively recruit applicants for a position in your company?		
0 times	66	67.3
1 to 5 times a year	16	16.3
6 to 10 times a year	3	3.1
11 to 15 times a year	2	2.1
More than 15 times a year	7	7.1
No response	4	4.1
In the past year, how often did you or someone in the HR department use social networking sites to gain additional information about one or more job applicants?		
0 times	57	58.2
1 to 5 times a year	20	20.4
6 to 10 times a year	7	7.1
11 to 15 times a year	3	3.1
More than 15 times a year	10	10.2
No response	1	1.0
In the past year, how often did you or someone in the HR department use social networking sites to verify information provided by one or more job applicants?		
0 times	71	72.4
1 to 5 times a year	16	16.3
6 to 10 times a year	2	2.1
11 to 15 times a year	2	2.1
More than 15 times a year	6	6.1
No response	1	1.0
In the past year, how often did you or someone in the HR department conduct a general search using Google or another search engine to determine what information existed on one or more job applicants?		
0 times	41	41.8
1 to 5 times a year	31	31.6
6 to 10 times a year	13	13.3
11 to 15 times a year	6	6.1
More than 15 times a year	7	7.1
In the next 12 months, how likely is it that you or someone in the HR department will use social networking sites to recruit applicants for your company?		
Not very likely	40	40.8
Somewhat likely	17	17.3
Neither unlikely or likely	8	8.2
Somewhat likely	10	10.2
Very likely	22	22.5
No response	1	1.0
In the next 12 months, how likely is it that you or someone in the HR department will use social networking sites to gain additional information about job applicants?		
Not very likely	29	29.6
Somewhat likely	17	17.3
Neither unlikely or likely	11	11.2
Somewhat likely	16	16.3
Very likely	25	25.5

n=98

The second part of research question one focused performance evaluation and respondents were asked about the performance evaluation process and the used of social networking sites by HR personnel for their current employees. In Table 3, the questions begin with use over the past year, in the next twelve months, and then to verify information about a current employee. When asked how often they have used SNS to gain additional information about one or more current employees as part of the performance evaluation process, 84.6% stated they would not (0 times). To the same question, 10.2% responded one to five times a year SNS had been used to gain information as part of the performance evaluation process. Following that direction, 83.8% responded that they had not (0 times) conducted a general search using Google or another search engine to determine what information existed on one or more employees as part of the performance evaluation process.

In the next 12 months, 66.4% of the respondents were not very likely to uses SNS to gain additional information as part of the employee performance evaluation. However, 10.2% responded it was somewhat likely, while 12.2% responded that is was somewhat likely they would use SNS to gain additional information as part of the employee performance evaluation.

The last question posed to the HR personnel focused asked if information was brought to their attention about an employee, would they use a SNS to verify the information. The largest group of respondents (42.9%) responded that is was not very likely. The other respondents were grouped together with 17.3% responding that it was somewhat likely, 13.3% neither unlikely or likely, 13.3% somewhat likely, and 12.2% very likely.

Table 3.
Use of Social Networking by Human Resource Personnel for Current Employees

Question	Frequency	Percentage
In the past year, how often did you or someone in the HR department use social networking sites to gain additional information about one or more current employees as part of the performance evaluation process?		
0 times	83	84.6
1 to 5 times a year	10	10.2
6 to 10 times a year	1	1.0
11 to 15 times a year	0	0
More than 15 times a year	2	2.1
No response	2	2.1
In the past year, how often did you or someone in the HR department conduct a general search using Google or another search engine to determine what information existed on one or more employees as part of the performance evaluation process?		
0 times	82	83.8
1 to 5 times a year	7	7.1
6 to 10 times a year	6	6.1
11 to 15 times a year	1	1.0
More than 15 times a year	1	1.0
No response	1	1.0
In the next 12 months, how likely is it that you or someone in the HR department will use social networking sites to gain additional information about one or more employees as part of the performance evaluation process??		
Not very likely	65	66.4
Somewhat likely	10	10.2
Neither unlikely or likely	7	7.1
Somewhat likely	12	12.2
Very likely	3	3.1
No response	1.	1.0

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Question	Frequency	Percentage
In the next 12 months, how likely is it that you or someone in the HR department will conduct a general search using Google or another search engine to determine what information exists on one or more employees as part of the performance evaluation process?		
Not very likely	61	62.3
Somewhat likely	16	16.3
Neither unlikely or likely	6	6.1
Somewhat likely	11	11.2
Very likely	3	3.1
No response	1	1.0
If information is brought to your attention about a current employee, how likely is it that you or someone in the HR department will use social networking sites to verify the information?		
Not very likely	42	42.9
Somewhat likely	17	17.3
Neither unlikely or likely	13	13.3
Somewhat likely	13	13.3
Very likely	12	12.2
No response	1	1.0

n=98

Table 4 is focused on company policy towards social networking sites. Questions asked here refer to company guidance in the use of social networking sites by HR personnel. These questions required the respondent to simply answer 'yes' or' no.'

The majority (95.9%) responded that their companies does not have a formal policy or procedure in place for the use of SNS for HR purposes, nor is there a formal policy or procedure regarding the use of SNS to gain additional information on employees for use in the performance evaluation process. The responses were divided almost equally when asked if discussions had been conducted in the HR department about the use of SNS for HR purposes (49% Yes and 51% No). When asked about attending training on the benefits or challenges of using social networking sites for HR purposes, 17.3% responded 'yes', while 82.7% responded 'no'.

Table 4.
Company Guidance Using Social Networking Sites by Human Resource Personnel

Question	Frequency	Percentage
Does your company have a formal policy or procedure in place regarding the use of social networking sites for human resource purposes?		
Yes	4	4.1
No	94	95.9
Does your company have a formal policy or procedure in place regarding the use of social networking sites to gain additional information on employees for use in the performance evaluation process?		
Yes	**4**	**4.1**
No	**94**	**95.9**
Have there been discussions in the HR department about the use of social networking sites for human resource purposes?		
Yes	48	49.0
No	50	51.0
Have you or someone in the HR department attended training on the benefits or challenges of using social networking sites for human resource purposes?		
Yes	17	17.3
No	81	82.7

n=98

Discussion

The findings to Research Question 1 indicates that although HR personnel more often have not used SNS to proactively recruit applicants, 16.3% have done so in the past year. The same can be said to gain additional, to search for existing, and to verify. The majority has not used SNS to gather information but several indicate they have begun to use SNS for gathering information.

Moving from the job applicant to the current employee, the respondents indicate that in the past year SNS have not been used to gain additional information or to find existing information as part of the performance evaluation process. However, in the next twelve months there is a noticeable increase in the use of SNS to gain additional, to search for existing, or to verify information.

In both these cases, job applicants and current employees, the responses point to a trend toward an increase in usage of social networking sites. Although there is an indication of increased usage, companies do not have formal policies or procedures in place for the use of SNS for human resource purposes. There is a sign that discussions have begun to take place on the use of SNS for HR purposes because the split on 'yes' responses (49.0%) and 'no' responses (51.0%) were almost even. Some respondents or someone in their offices (17.3%) have been to training on the benefits or challenges of using SNS for HR purposes.

Implications for Educators of Business

When looking at the literature review and findings, there are strong indications that human resource personnel are increasing their usage of social networking sites as part of the job application process and considerations in current employee performance evaluation. This increase shows educators what is becoming important for students who are entering the job market or are currently in the workforce about how they should best present themselves in social networks such as MySpace, Facebook, Friendster, or even LinkedIn.

Since social network sites each support more than 100 million users, educators cannot presume that students in their classrooms do not have their own SNS or are a "friend" on someone else's social network site. In business classes, it is important to teach students about "managing and monitoring" their persona online (Beal/Strauss, 2008). Students need to be presented with facts about how human resource personnel are using SNS to obtain or reject job applicants.

Recommendations

Based on the findings of this study, the following recommendations are made:

1. Continued research should be considered to monitor the use of social network sites by human resource personnel.

2. Additional research should be undertaken to look at the development of formal policy or procedures for the use of social networking sites in human resource procedures such as job applicant searches and employee performance evaluation.

Further studies will help students and job applicants understand the impact of social networking sites in the employment process, as well as the employee performance evaluation process.

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PART II
REFEREED INNOVATIVE INSTRUCTIONAL PRACTICES PAPERS

Eastern Illinois University's Alternative Route to Business Teacher Certification

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Abstract

As the number of business education programs decline, states are trying to find ways to satisfy the need for qualified secondary business teachers. Eastern Illinois University has developed a unique program to try to meet the needs of the schools that have openings for business teachers and business professionals who have decided to change careers and enter the field of education. The objective of this paper is to provide an overview of how this Alternative Route to Teacher Certification enables adults who have difficulty meeting the demands of a traditional education program achieve their goal of teacher certification.

Introduction

Business education is facing a problem—a lack of teachers. The supply of postsecondary institutions offering business teacher education programs and the decrease in supply of business teachers for secondary business programs has resulted in states looking for alternatives to certify teachers or risking losing their secondary programs. The National Association for Business Teacher Education (NABTE), the institutional division of the National Business Education Association, consists of public universities offering certification programs for secondary-level business teacher education. "In 1981, NABTE had approximately 300 institutional members; today, that number is only about 100" (Anderson & LaBonty, 2007, 38).

In the recommendations for the reauthorization of the Carl D. Perkins Act, the Association for Career and Technical Education noted teacher shortages are growing in all areas of career and technical education (Sander, 2007). As a result of the need for more qualified teachers, states have created alternative routes to teacher certification for content areas that lack the necessary supply of teachers. Each state has developed its own guidelines, but the ultimate goal is the same—to continue providing quality education to students in all educational areas.

Alternative routes to teacher certification provide those who decide later in life that teaching is their career choice a way to enter the field without pursuing certification through the traditional routes. In addition, the students have teachers who have experience applying their content in the work world. Typically, the route is no less demanding than a traditional route and because the learners are older and have additional responsibilities, they face many more obstacles. Still, the number of teachers using an alternative certification process continues to increase. In 1990 the number of teachers using alternative certification was 5,600; this grew to 59,000 teachers in 2006 (Anderson & LaBonty, 2007, 39).

Background

Alternative certification programs are nothing new. Early programs began in the 1980s in New Jersey and Texas (Sander, 2007). Administrators and education agencies began recognizing that teacher shortages were placing our nation's youth in the hands of understaffed schools and teachers were being assigned to teach outside their areas of expertise (Darling-Hammond, 1994; National Commission on Excellence in Education, 1983). There were often people who were interested in teaching, but the traditional path to teacher certification made it virtually impossible for them to pursue the career change. Courses were offered during the day, which meant giving up their current jobs. In addition, the semester of student teaching required them to give up their income for that length of time.

In 2002 when Eastern Illinois University was considering establishing the alternative certification program, the teacher supply and demand numbers were overwhelming. Nationwide the estimates indicated that by 2010, public schools would need to hire at least 2.2 million new teachers (Hirsch, Koppich, & Knapp, 2001). The data specific to Illinois was no less comforting (Rohn, Bower, Reid, & Kestner, n.d.). According to the Illinois State Board of Education (2000), the Illinois teaching force was getting older. In the fall of 2000, the average age was 44 with those 50 and older comprising nearly 40% of the total. Age and experience was also going to make 40% of the teaching force eligible for retirement by 2003. In September 2000, districts reported a total of 2,637 unfilled positions even though the number of Illinois teachers certified annually exceeds that of vacancies. Many who obtain certificates pursue other careers instead (Rohn, et. al, n.d.).

Alternative Routes to Teacher Certification

Illinois defines traditional teacher preparation as "completing the certification requirements through a full undergraduate pro-

gram of study or an approved graduate-level teacher preparation program after completing a bachelor's degree" (ISBE, 2008, 76). The State requires that alternative certification programs be offered by Illinois colleges and universities that are accredited and approved to offer teacher preparation programs. The program participants must hold at least a bachelor's degree and the programs take less time to complete than the traditional program, while ensuring the state requirements and standards are met (ISBE, 2008, 76).

The 2002 Illinois School Code requires the Alternative Route to Teacher Certification program course of study to include the current content and skills contained in a university's current courses for certification It must contain three phases: (a) an intensive course of study offered in education theory, instructional methods, and practice teaching; (b) the person's assignment to a full-time teaching position for one school year, including a mentor teacher to advise and assist the person with the teaching assignment; and (c) a comprehensive assessment of the person's teaching performance by school officials and program participants and a recommendation by the higher education institution to the State Board of Education that the person be issued an initial teaching certificate.

The State of Illinois has three different types of programs: Alternative Certification, Alternative Route to Teacher Certification, and Resident Teacher Certification. All three are developed by accredited institutions offering teacher preparation programs, but the difference between the three in this regard is the Resident Teacher Certification program must be developed by an institution with an approved master's degree teacher preparation program. There are two areas in which the three programs differ considerably: partnership and mentors. The Alternative Certification program has to have a partnership with one or more not-for-profit organizations, and the Resident Teacher program is required to have a partnership with a school district, while the Alternative Route to Teacher Certification is not required to have a partnership. In regard to mentoring, Alternative Certification programs are not required to have mentors for teacher candidates. Alternative Route to Teacher Certification programs provide mentors to advise and assist teacher candidates. Teacher candidates in Resident Teacher Certification programs have certified teachers who serve as mentors.

There are some things that all three program types have in common. Participants must have: bachelor's degrees, passing scores on the Illinois Test of Basic Skills and the Illinois Content Area Test, and five years of work experience. All teacher candidates participate in a full-time, paid internship. Through the Alternative Certification and Alternative Route to Teacher Certification programs, the internships last one year. For the Resident Teacher Certification program, the internship can last up to four years.

According to the Directory of Approved Programs for the Preparation of Educational Personnel in Illinois Institutions of Higher Education (Illinois State Board of Education, 2008), there are nine institutions that offer undergraduate studies in business education. Six of the nine have National Council for Accreditation of Teacher Education (NCATE) Accreditation. Four of the six offer an alternative certification program.

Eastern Illinois University began its Alternative Route to Teacher Certification Program in the summer of 2003. The program prepares teachers in accordance with the standards for professional preparation as approved by the Illinois State Board of Education. The program is aimed at helping school districts find a new source of teachers in the areas of business, family and consumer sciences, foreign languages, math, science, and technology, through a cohort program. All teacher candidates enrolled in the program have a bachelor's degree but no teacher certification.

Eastern's Admission Process

Candidates for Eastern's Alternative Route to Teacher Certification complete a formal application process. This includes submitting an application, transcripts, and a criminal background check. Transcripts must verify the candidate has graduated from an accredited college or university with a bachelor's degree (GPA 2.65 or higher on a 4.0 scale) and a major or minor in the intended area of certification. They must also provide documentation that they have been employed for a period of at least five years in an area requiring application of their education. Passing scores on the Illinois Basic Skills Test and the content area exam must also be submitted. In addition, candidates must secure a commitment from a school district to be hired and paid as a full-time teacher for the internship that begins in the fall after successful completion of the course of study.

District Expectations

School districts that agree to participate in the program will be expected to do the following:

* Nominate candidates for admission to the program, making a commitment to hire the candidate as an intern upon the candidate's successful completion of the eight-week summer program

* Select an individual to serve as a mentor for the candidate

* Provide release time for the candidate and mentor to meet on a regular basis

* Provide a set of resources for the candidate to bring to Eastern at the beginning of the eight-week on-campus summer program consisting of curriculum materials, relevant state and district standards and assessments, and other resources necessary for the candidate to prepare for teaching during the internship year

* Grant the candidate permission to visit the school district during the Web-based course to complete projects that include classroom observation, as well as participate in a variety of activities typical of those required of teachers in the district

Intensive Course of Study

Phase I consists of 16 semester hours of coursework. Candidates study education theory, instructional methods, and practice teaching. Candidates enroll in four courses: Introduction to Teaching, Foundations of Teaching, General Teaching Methods, and Methods of Teaching in the Discipline. CTE candidates also enroll in an additional course specific to their emphasis area.

Introduction to Teaching is a Web-based course that addresses the Illinois Professional Teaching Standards of collaborative relationships and reflection and personal growth. This course is completed in May, preceding the eight-week course of study on campus. Candidates must earn a grade of B or better before they may enroll in the remaining courses.

Foundations of Teaching addresses the Illinois Professional Teaching Standards in the social, cultural, historical, and psychological foundations of teaching. General Teaching Methods covers Illinois Professional Teaching Standards of student diversity, language arts/reading, and technology. The Methods of Teaching in the Discipline course covers the Illinois Professional Teaching Standards in the content area of intended certification. Multiple sections of this course are offered—one each for career and technical education, foreign languages, math, and sciences. Career and technical education candidates will then take an additional course that covers the methods for their specific emphasis area—business, family and consumer sciences, or technology.

Throughout Phase I, times are set aside for field experiences. Candidates work with secondary-age students in traditional and non-traditional classroom settings and spend time working with students from diverse backgrounds and ability levels, including individuals with exceptionalities and physical challenges. Candidates work with students who are attending area summer school classes and the Upward Bound program on Eastern's campus. In addition, for an hour each morning the candidates attend a class on problem-based learning. These experiences provide candidates with the opportunity to ground the theory and application from their coursework in actual experience with students.

During the second half of the eight weeks, there are times scheduled for peer teaching. Candidates are required to teach their content to peers who are pursuing teacher certification in other content areas. This provides the candidates with an opportunity to teach to students who may not know the content and to receive feedback from a professor in their content area.

Internship

The second phase consists of a year-long internship. Candidates enroll in two semesters of internship. This is a paid teaching position in which they have full responsibility for teaching. Candidates are treated contractually as though they were first-year teachers. They are supported throughout the internship by three mentors, one from the school district, one from the College of Education and Professional Studies, and the third from the department representing their field of certification.

During the internship, candidates participate in a series of seminars that focus on special topics chosen to support them during their internship. The seminars are both Web-based and face to face, either on campus or a central location for the candidates. Some examples of past topics include building character (includes classroom management and student motivation), engaging students in critical thinking, creating and using effective student assessment tools, serving special populations, communicating with parents, and developing and pursuing a professional development plan.

Comprehensive Assessment

Upon completion of the internship, candidates enroll in Program Assessment, an on-campus course completed during the first two weeks of the summer session. This culminating experience requires candidates to complete and submit electronic portfolios, design research, and analyze data that is related to the ongoing longitudinal research that is part of the program. Candidates also undergo interviews as part of the assessment and make presentations to the cohort of candidates who have begun Phase I of the next alternative certification cohort. Those who successfully complete the program after the internship will obtain the four-year Initial Teaching Certificate (Type 09) from the state of Illinois.

Program Enrollment

During the program's existence, the career and technical education (CTE) numbers have consistently been about half of the total enrollment. Table 1 shows the CTE and the number of total CTE that have been in business each year.

Table 1
Career and Technical Education Enrollment

Year	CTE	Business
2003	8	7
2004	11	6
2005	14	10
2006	9	7
2007	10	6
2008	10	5

Summary

The number of traditional business teacher education programs has continued to decline over the years. Alternative certification programs are being used by each state with variations in the requirements of the programs. Eastern Illinois University offers a unique program that tries to fill the void of secondary business teachers in the state of Illinois with high quality teachers.

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E-Bucks: A Simulated Classroom Economy

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Abstract

Experiential learning provides opportunities for students to apply their knowledge and build essential real-world skills needed in the 21st century. E-Bucks is an experiential learning activity that encourages students to become actively involved in their education. This article discusses the literature that supports experiential learning as an effective instructional practice and describes a semester-long activity entitled E-Bucks, a simulated economy for business and marketing classes at the secondary level.

Introduction

Business curricula should connect to relevant issues and constantly create opportunities for students to be actively engaged in class. John Dewey, father of the progressive education movement, maintained that schools should reflect real-life experiences in society (Columbia Electronic Encyclopedia, 2007). According to Dewey, "traditional education often became detrimental to the growth of children" because the student was not actively involved in ways which contribute to the student's growth in society (Dewey, 1916, as cited in Simpson, 2001, p. 192). Experiential learning, or "learning by doing," is a highly effective instructional practice (Rowen, Byrne, & Winter, 1980). This article discusses the advantages of experiential learning and describes E-Bucks, a simulated classroom economy for business and marketing classes.

Advantages of Experiential Learning

Experiential learning is an effective instructional strategy that is complementary to traditional classroom learning and can engage students in ways much better than information delivered in lectures and/or read in a textbook (Waggoner & Rader, 2005). One of the challenges facing teachers today is the need to increase student engagement in the learning process. When students are active participants in authentic projects, they learn to process academic information effectively and apply what they have learned (Hakeem, 2001). Experiential learning encourages students to become actively involved in class by participating in nontraditional classroom activities, including cooperative and "goal-oriented" projects with their peers (Hamilton, 1980, p. 179). In additional, experiential learning activities "can provide the increasingly growing numbers of nontraditional learners as well as traditional learners with valuable opportunities to apply theory to practice" (Hakeem, 2001, p. 95).

Students may increase their motivation and commitment by participating in experiential learning activities (Lee, 2003). Experiential learning focuses on the practical application methods that provide opportunities for students to work with others and learn to adjust socially (Leventhal, 2004). In addition, experiential learning activities may make abstract knowledge more usable for students because it provides hands-on opportunities to apply it in a setting similar to the workplace (Hamilton, 1980; Lee, 2003).

Learning by Doing

Experiential learning or "learning by doing" is defined as "the process whereby knowledge is created through the transformation of experience" (Kolb, 1987, p. 359). These experiences are provided through challenging hands-on real world activities, which are referred to in the literature as authentic projects (Kraft, 2005). Authentic projects appeal to "a variety of learning styles" and "meaningful learning, connecting new learning to students' past performance" (Kraft, 2005). When students are actively involved through hands-on learning simulations and projects, their level of personal commitment is increased (Emerson & Taylor, 2004). Experiential learning is an effective strategy for motivating students and "narrows the gap between ends and means (and the gap) between acquisition and application" (Hamilton, 1980, p. 183) by allowing students to participate actively in authentic class projects. Moreover, authentic projects encourage students to learn and prepare themselves to be successful in the business world (Breault, 2003).

Furthermore, experiential learning provides students with multiple opportunities to build transferable business skills needed as preparation for the business world. Dewey observed that "Education is neither a 'drawing out' nor a 'pouring in,'

but a 'taking hold' of the activities that stem from instincts" (Simpson, 2001, p. 185). In other words, when a student has an opportunity to participate in hands-on experiential activities, the student is "taking hold" (or developing ownership) of his or her own education and learning. Experiential learning activities provide many ways for students to apply their knowledge, develop critical thinking skills, and solve problems in an authentic classroom environment. These activities foster a learning environment that creates opportunities for students to connect the concepts they have learned to real-world situations that lead to "greater retention and more thorough understanding" (Hamilton, 1980, p. 185).

Token Economies

Experiential learning activities such as token economies offer unlimited possibilities for students to learn about life, business, and the world. A token economy is a "behavior modification plan that uses tokens as a primary reinforcer" (Gallagher, 2005, p. 13). Token economies provide students with extrinsic motivation through a reward system that is embedded in the token economy. In addition, token economies "facilitate the development of new (unexpected) skills" (Ward-Maguire, 2007, p. 2). The E-Bucks simulation exemplifies a token economy designed to capture the attention of students and apply the subject material taught in class to the real world.

E-Bucks Simulation

The E-Bucks simulated economy is an innovative experiential learning strategy that was developed at two large urban high schools in Arizona and implemented in 15 marketing, entrepreneurship, computer applications, and cooperative education classes over a four-year period. The simulation has been utilized successfully for the past four years and is currently being expanded to involve additional teachers and students.

The E-Bucks simulation has allowed students to experience hands-on business practices
by creating "task focused" opportunities to receive tokens for desired individual behaviors. Just as adults earn a wage or salary for working in the real world, the E-Bucks simulation compensates students with token rewards for performing various tasks and desired behaviors. The simulation helps students understand how their education relates their actions and consequences to concepts learned in the classroom. Furthermore, the E-Bucks simulation fosters and creates a cooperative and goal-oriented environment in the classroom.

E-Bucks Money/Rewards

Students earn E-Bucks, which are play money designed and printed by the business teacher, as rewards for good behavior and achievement. Students redeem E-Bucks for class privileges and to "buy" small items in the "store" or bid on items such as gift cards donated by local businesses at "auctions" that take place in class each quarter. E-Bucks are printed in denominations from $10 to $100.

E-Disclosure

At the beginning of the year, the teacher distributes copies of an "E-Disclosure" statement that specifies the E-Bucks policies and procedures. The teacher explains the E-Disclosure statement to the students and also posts it in the classroom. The E-Disclosure statement includes the following policies: (1) Students are individually responsible for storing their E-Bucks; if a student's E-Bucks are lost, stolen, or damaged, he or she becomes bankrupt (forfeits all accumulated E-Bucks); (2) E-Bucks cannot be gifted or loaned to other students; (3) All E-Bucks must be used by the end of each term and cannot be carried over to the next term; and (4) The teacher may change the E-Disclosure statement at any time.

E-Criteria for Earning Money

Students can earn E-Bucks in a variety of ways that are specified on an E-Bucks Criteria handout. For example, (1) All students can earn 10 E-Bucks a day for being on time to class and in their assigned seat before the bell rings; (2) If students ask higher level questions to guest speakers, they can earn 15 E-Bucks per question; and (3) Students who demonstrate school spirit on Fridays can earn 10 E-Bucks.

E-Balance Sheet

Students are required to keep accurate weekly records of their E-Bucks. The E-Balance Sheet is an assignment that the teacher collects each Friday to ensure accountability in the economy. Students record all debits and credits on a daily basis to learn the importance of recordkeeping. A student who fails to turn in the E-Balance Sheet is fined 40% of his or her net worth for the first violation and becomes bankrupt if it happens again.

E-Fines

Students are fined in the E-Bucks Simulated Economy for any violation to school policies and classroom procedures such as coming late to class, chewing gum, wearing a hat, inappropriate language, rudeness, late work, dress code violation, food or drinks in class, etc. The E-Fine amount is determined by the teacher; a student receives successively higher fines for repeated violations and may eventually become bankrupt.

E-Student Roles

During the first two weeks of the semester the teacher assumes all duties in the E-Bucks simulation to model the procedures that allow the system to work properly. After the second week of modeling the E-Buck procedures in class, the teacher hires students to perform various job duties such as banker, sheriff, insurance agent, auditor, and cashier. Students cannot repeat

the same job for two consecutive weeks because all students need an opportunity to apply for work. Job postings are posted at the beginning of each week, and students sign up for various positions, as follows:

Banker. The banker stands by the classroom door and pays each student 10 E-Bucks for being on time and sitting in his or her assigned seat. When the last bell rings, the banker returns the remaining money to the teacher and the bank is officially closed. If the banker is absent, no one gets paid, and the banker is fined for his or her absence. The salary for the banker position is 50 E-Bucks per week.

Sheriff. The sheriff is responsible for reporting all rule violations to the teacher on a daily report log. Violations consist of failure to follow school policies such as no gum, no hats, no electronic devices, and no food in the classroom. The teacher works with the sheriff to identify the violators. Based on the sheriff's report, students are fined for each violation. If the sheriff is absent, he or she loses pay. The sheriff position pays 60 E-Bucks per week.

Insurance Agent. The insurance agent is responsible for selling insurance each week, drawing disasters, recording student debts, and collecting debts from the uninsured or underinsured each day. At the beginning of the semester, the teacher assigns each student to create 10 disaster cards identifying possible events that could occur, with a specific E-Bucks amount of money gained or lost in each disaster. Disasters include events such as floods, automobile accidents, tornadoes, and hurricanes. As an example, the insurance agent may sell natural disaster insurance one week and then offer personal loss insurance the following week. The disasters apply only to rows of students rather than the entire class or a specific individual. The teacher determines how many disaster cards will be drawn each day on a random basis. For example, row one might experience a tornado that costs each student in that row 50 E-Bucks unless they had purchased property insurance. The students quickly learn the importance of purchasing insurance. If the insurance agent is absent, he or she loses pay, the teacher draws the cards, and no one is covered by insurance. The insurance agent's salary is 50 E-Bucks per week.

Auditor. The auditor is responsible for auditing students whose names are randomly drawn weekly from a bowl. When a student is audited, the auditor closely examines his or her E-Balance sheet and all of the corresponding daily entries. If a student is missing one daily entry, he or she is fined up to 40% of his or her total net worth. The auditor position pays 60 E-Bucks per week.

Cashier. The cashier is a "seasonal" position that depends on the teacher's financial resources at various times. The teacher may open the classroom "E-Store" on Fridays and sell various merchandise such as pencils, bottled water, stickers, candy, etc. Profits from the E-Store are used to purchase additional items as prizes or to sell in the store. The cashier operates the store and is paid $50 E-Bucks per week.

E-Real Estate

Students have the option to rent their seat to different students for a maximum of three days in a week. Rental prices are predetermined by the teacher and posted based on classroom "zip code" areas. For example, the seats closet to the teacher's desk are the least expensive, and the seats farthest away from the teacher's desk are the most expensive. Students are required to pay real estate taxes each semester based on their zip code area. At the beginning of each term or semester, the teacher randomly assigns seats to the students; at midterm the teacher randomly reassigns different seats to the students.

E-Income Taxes

All students must pay income taxes based on their total amount of E-Bucks each term/quarter. The teacher determines the income tax brackets. For example, a student with a total of 100 or less E-Bucks may have to pay 10% income taxes, and a student with a total of 101-300 E-Bucks may have to pay 20% income taxes each term.

E-Bucks Rewards

E-Bucks Rewards are explained, distributed to all students, and posted in the classroom because students need to make the connection between E-Bucks and the rewards exchanged for desired behavior. Students can purchase various E-Bucks Rewards for privileges such as late points, dropping one low test score per term, purchasing extra credit points one time per term, buying out one homework assignment or writing a thank you-letter to a guest speaker, etc. The rewards cost different prices, and students must pay a luxury tax for each reward purchase. For example, the price for allowing a student to drop his or her lowest test score is 350 E-Bucks plus a 30% luxury tax.

E-Auction

At the end of each term, the students can participate in the E-Auction if their Balance Sheet matches their actual E-Bucks. The teacher determines the E-Auction day. If students are absent, they cannot purchase anything. The E-Auction takes place one day during the last week of each term/quarter. The teacher is responsible for purchasing or soliciting items from local businesses for the E-Auction such as gift cards, college wear, movie tickets, candy, school supplies, etc. The students cannot carry E-Bucks over to the next term/quarter and must spend their E-Bucks by either purchasing rewards or auction items. Students do not have to pay taxes on E-Auction items. Students participating in the E-Auction must sign an auction rules form and hold up their number to bid on items they are interested in purchasing.

Summary

The E-Bucks simulated classroom economy is an effective instructional method that rewards students for performing various desired behaviors on a daily basis in class. The simulation consists of a management system, student roles, and a rewards system. The goal of E-Bucks simulated classroom economy is to increase student engagement and achievement.

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Strategies for Developing Online High School Business Courses

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Abstract

Creating an online course can be a daunting task when an instructor does not know where to begin; and online courses at the secondary level provide unique challenges. This paper provides framework for instructors to work from when creating an online course and guides them through the preplanning, instructional design, unit and lesson design, and course management process. This paper is directed at secondary education instructors, however many of the strategies can be applied to the postsecondary level.

Introduction

In 2006 nearly 3.5 million college and university students were enrolled in one or more online courses (Sloan Consortium, 2007), and approximately 700,000 public school students were enrolled in an online and/or hybrid course (Sloan Consortium, 2007). Several virtual high schools, such as the nationwide Virtual High School (VHS) and Primavera in Arizona, offer the entire high school curriculum online, including business courses. Students take online courses at the high school level for several reasons a few of them include: the desire to get ahead or graduate early, a schedule conflict with the in-person class, need an additional a class to graduate, remediation of a course, inability to attend school for health reasons, or the course is not offered on their campus. Online courses at the secondary level must align to state and local standards, and be able to provide evidence that students attained the standards. The course also needs to be consistent with course content including instruction, assignments, and assessments with similar courses in the district. Courses at the secondary level must prepare students for local common course final exams, state high stakes tests, and Career and Technical Education assessments. Frequent grading is a requirement for online courses in secondary education; teachers need to check for student understanding of the concepts before they complete a large project, and also to ensure the student is on task and not behind. Online high school instructors need to provide frequent course and grade updates to student and parents, in addition to district progress reports, quarterly grades, and semester grades. Before an instructor creates an online course, he or she should first teach a traditional face-to-face section, to establish a frame of reference for the course structure as he or she begins to plan the online version of the course. This paper focuses on teaching online instruction at the high school level and discusses preplanning, instructional design, lesson delivery, assessment, feedback, and course management.

Preplanning

Before an instructor begins to teach an online or a traditional face-to-face course at the high school level, he or she must align the course with state or national Career and Technical Education standards, school district standards, academic standards, and curriculum maps. The curriculum alignment process may occur either at the district level or at the local level. Preplanning includes the following steps: determine course framework, allocate time for units, and select a learning management system.

Determine Course Framework

After standards have been determined, the instructor should identify the learner outcomes, and the key activities and assessments for each unit as they occur in a traditional face-to-face course. Not all of the units' activities and assessments are identified in this step; the instructor identifies more pieces of the instruction in the assessment section of the unit and lesson design heading. After the course framework has been set, he or she must determine if traditional face-to-face activities and assessments are conducive to an online setting; if not, the activity or assessment may need to be modified, or an alternate activity must be developed to accomplish the learner outcomes for the unit.

Allocate Time for Units

The next step is to determine the approximate length of time a student needs to complete a unit. An instructor should be aware that the first unit may take a student longer than anticipated since he or she is learning how to navigate the course and understand the level of expectations. All of the unit time lengths added together should not equal the course length of time because enough time must be allocated for activities such as reviewing

for the final, taking the final exam and dealing with any unforeseen course difficulties that may occur.

Select a Learning Management System

The last step of the preplanning process is to select a learning management system. A *Learning Management System* (LMS) is a software system that organizes administrative tools, course development features, course content and student information. Examples include Blackboard, ANGEL®, FirstClass®, TaskStream, or Moodle. If an instructor does not have the opportunity to select the learning management system, he or she should tour the website of the software to become acquainted with its features as this might guide the instructor's course organization and instructional design since each system is unique.

Instructional Design

Course layout is one part of the instructional design process, which is similar to the process one goes through in planning a trip. One must select his or her destinations and determine the routes to take. Course layout includes how students maneuver throughout the course and the destinations they encounter. Instructional design includes course layout, content organization, assignment and test location, release of course content, and assignment availability.

Course Layout

Two types of course structures are *time-based layouts* and *modular layouts*. A *time-based layout* divides the curriculum into appropriate time-based units such as days, weeks, months or quarters, depending on the course length. This type of layout can help keep students on track as long as they know what day or week they are on when they log into the course. If the instructor selects a time-based layout, he or she should display the current day, week, month, and or quarter as a welcome message or announcement when the student logs into the course. For example, when a student logs in to a courses on Monday, November 12, the course announcement should state "Welcome to month three, week eleven of the course (week of November 12) please complete the assignments for week eleven by the beginning of week twelve, Sunday, November 18. Thank you." A *modular layout* segments curriculum based on logical groupings of course curriculum such as units in a textbook, software in a computer course, periods in time, parts of the world, or names of units in the course. Setting course due dates and milestones are even more important in a modular layout. Students need to know when they should start each module and the expected completion date of each unit. Using announcements similar to the time-based layout can help keep students on track. For example, a sample announcement or e-mail for a modular layout might be: "Welcome to the week of November 12. You should continue working on the Supply and Demand Unit. Your review worksheet is due Wednesday, and your Supply and Demand analysis project as it is due next week. Thank you". This message can give students guidance to help them stay current in the course.

Content Organization

Another part of instructional design is determining what information is accessible on the main page and subpages as well as how many subpages the course contains. The more subpages the deeper into the course the student has to go to find the information, and the more likely the student is to become lost or confused. Organizing the course content requires finding a balance between the amount of content on a single page and the number of subpages that contain the rest of the information. Items that can be used in a online course that instructors may need to find a place for include, but are not limited to course calendar, glossary of terms, assignments, discussion board, live chat, e-mail, tests, quizzes, self-tests, lessons and course content, calculator, grades, student progress, student presentations, student webpages, last page visited, announcements, Really Simple Syndication (RSS) feeds, group work area(s), tutorials, frequently asked questions (FAQs), and helpful websites. Finding a user-friendly place to list all course items requires some thought and planning ahead.

Assignment Drop Boxes and Test and Quiz Location

In addition to the organization of the course content, the instructor needs to determine the location and function of the assignment drop boxes. Three options for assignment drop boxes, depending on the LMS, include (1) a link on the main page with one single drop box for all assignments, (2) a link on the main page for the assignment drop boxes with a sub page that contains an individual drop box for each assignment or group of assignments, or (3) multiple drop boxes within the course content where they appear in the unit or week the assignment is completed. Tests and quizzes include the following options: (1) a link on the main page that contains a subpage where all the tests and quizzes are housed or (2) placement of a test or quiz within the course content where the test or quiz appears in the unit or week in which it should be taken.

Release of Course Content

After the instructor has determined the course organization, one of the final stages of instructional design process involves the release of course content. Instructors should determine if all the course content is available at the beginning of the course or if it becomes available in stages as the student progresses throughout the course. Content can be released based either on performance or date. A students could be required to pass a unit test in order to progress to the next unit, or the content can be released by date. For example, unit one and two might be available at the beginning of the course, and a few weeks later unit three is available and the fourth unit becomes available the following week.

Assignment Availability

Assignments usually have three different formats of time release: (1) always open and never closes, (2) opens at the beginning of the semester and closes on the due date or soon after (depending on the instructor's late work policy), or (3) opens and closes with specific dates therefore the assignments are only available for a set period of time during the course. Some LMS allow course developers to have an open date for assignments or when the assignment becomes available, a due date and a close date, which can be different from the due date. This feature can be used when the instructor has implemented a late work policy that allows late work up to a set amount of time: for example 48 hours past the due date. When setting dates for assignment, and other course features, some LMS require not only a date, but also a time deadline: for example, an assignment might be due on October 15 at 10:00 pm. If the instructor is setting deadlines he or she, needs to consider what time items are due and inform students well in advance. Before determining course content availability and assignment release dates the instructor needs to determine how the course will be used in the district. If the course is open entry/open exit, it may be beneficial to have all assignments available at all times and course content available either at all times or selective release. For example, the next unit does not appear until the student takes the unit test. If the course is available only at the beginning of the semester and no new students can be added to the course, then the instructor can use dates for content availability, and assignment open and/or close dates. If a new cohort of students starts after the initial group for the semester, the instructor needs to determine if the students are placed in the course that started at the beginning of the semester. An alternative is to create a copy of the course shell, in which the instructor has a separate course for each section. If a copy of the course is made each time, then the instructor can adjust the dates. After the instructor has a schematic for the course layout and navigation, the unit and lesson design can be determined.

Unit and Lesson Design

Unit and lesson design encompasses constructing student learning experiences, lesson delivery style, types of informal and formative assessments, summative assessments and feedback methods. Each unit should contain the corresponding standards, unit objectives, and essential questions that student should be able to answer after successful completion of the unit. Essential questions are open-ended, without a specific right answer, and encourage the student to apply the knowledge gained in the unit to their lives and the real world. The unit standards, objectives, and essential questions should be listed at the beginning of the unit or as a link on the main page of the unit.

Constructivist Learning

In an online learning environment, the instructor needs to be the facilitator of learning helping guide students through the journey of online learning. The instructor cannot be the single giver of information, nor can they hold each students hand throughout the process, which is why constructivist learning works well in an online course. Providing constructivist activities are essential in an online course to prevent the student from "going through the motions" of watching a presentation, completing a worksheet, and taking a quiz, otherwise the online course becomes a correspondence course. Constructivism involves having students take responsibility to create connections with their current learning to their prior concepts and their world, and constructing meaningful knowledge by reflecting and working with others (Gueldenzoph, 2003 & Garrison, 1993). While students may not set the objectives in an online course, the instructor can plan instruction to enable students to have a chance to discover and interpret information, as well as construct new knowledge (Tallent-Runnels, Thomas, Lan, et al., 2006). Students need to interact with other students and not just the instructor and course content. There are three types of interaction in a distance education course, as identified by Michael Moore in 1989; they are; learner –content, learner – instructor, and learner –learner (Blocher, 2005). These interactions are two-way interactions. Therefore, students need to have the opportunity to interact with other students and the curriculum and actively create connections between the curriculum and their lives. Students should also have the opportunity to process what they are learning with activities such as a reflection journal. Instructors need to create opportunities for students to apply their knowledge in real life applicable situations, and may have more than one solution. Keeping in mind that students need chances to interact with each other and the curriculum, the instructor can start designing the curriculum.

Lesson Delivery

Although an instructor may use lecture with discussion in a face-to-face course, a recording of a live class lecture and discussion may not be the best method of delivery in an online course. Four options for lesson delivery are through a presentation, a Podcast, a video, or through reading. (1) Presentations created with Microsoft PowerPoint, Adobe Flash, Adobe Presenter, or other presentation software are effective methods of online lesson delivery. The presentation can be text only; text and content related graphics, such as magazine advertisements from the 1950s; or contain mostly images. The presentation can include audio that contains information that is complementary to the text and graphics in the presentation. (2) A Podcast is another form of lesson delivery that may be useful when the content of the lesson does not need visual representations. This delivery system could be a recording of a face-to-face lecture or a condensed version of a lecture created for an online podcast. (3) Videos that include ones created for education, such as those available from United Streaming, segments from newscasts or television programs. The instructor may decide to create the video if he or she is demonstrating a process such as a completing a task using a specific piece of software or a lab experiment. (4) Lesson content can also come

from course textbooks, articles from newspapers, magazines or online journals. If the course includes current events, the instructor may have students subscribe to an RSS feed, customize their browser to display headlines, such as widgets available in iGoogle, or read a specific blog. Many LMS incorporate some of these features, such as RSS feeds, to keep students within the LMS and course constructs.

Instructors also need to consider how lesson content, assignment information, and related files open the within the course. For example, a presentation could be opened as a presentation within the course, opened in a new window, or the document can be saved as a webpage and opened within the course. Lessons can be delivered synchronously where all students are logged into the course at the same time through the LMS or other software such as Adobe Connect. This software enables the instructor teach the material using audio, video and a virtual whiteboard. Teaching synchronously allows the students and teacher to interact simultaneously and answer questions as they occur. The instructor should always upload the presentation and any lesson related files before the synchronous activity to avoid any technical difficulties (Glenn, 2007). After the lesson material has been disseminated to the students, the instructor must determine if students have read, listened to, or watched and understood the material(s), this by using an appropriate assessment.

Assessments

Informal assessments are a way for the instructor to check the students' understanding before the students apply the information to a project or larger assignments. Discussion posts, worksheets, self-tests or quiz, self assessment, peer assessments, and reflection logs are examples of informal assessments. Self-assessments may include self-quizzes, crossword puzzles, flash cards, and other review games to check the students' comprehension of the material. Formative assessments provide information to the instructor to monitor student progress, determine if any course content or lesson delivery needs to be adjusted, and to provide feedback to the students. Summative assessments can include individual or team projects, tests and portfolios. Other examples of these formative and summative assessment include discussion posts, worksheets, self-tests, reflection logs, and team projects.

Discussion Boards. These board are used to simulate discussions that might take place in a face-to-face course. Discussions can be centered around the lesson presentation, current events, or applying learned knowledge to the real world. Discussions used as formative assessment are more in-depth than those used as an informal assessment, and may require responding to other posts. When an instructor creates online discussions the instructor can give the students options as to which discussion question(s) they respond. Discussion board needs to include follow-up questions to keep the conversation going and students do not answer the question and stop (Tallent-Runnels, Thomas, Lan, et al., 2006). Instructors can also have students or teams take turns leading the discussion for each unit. Synchronous (real-time) chats simulate live classroom discussions and enable the instructor to give instant feedback, answer student questions, and allow for personal interaction and opportunities for personalities to manifest (Al-Bataineh, Brooks, & Bassoppo-Moyo, 2005).

Formative Assessments. Worksheets, small assignments, and projects can be used as formative assessments. The students can complete the worksheet while watching, reading or listening to the lesson. Completing the worksheet after the lesson can serve as a review of the material presented. Assignments include graphic organizers, fill in the blank, opened questions, scenario based questions, or application questions. Graphic organizers are used to help organize information and provide a construct for knowledge and how the presented information relates (part to whole & whole and pieces) to the unit or course content. Assignments can include items from the text, assignments used in face-to-face courses, worksheets (from the text or teacher created worksheets) or a written paper such as a letter or a small essay on an ongoing reflection log. A reflection log checks the comprehension level of the student and requires them to reflect and process the information and apply it to their lives, the real world, or other learning. Assignments also include individual projects, which tend to be more comprehensive than an assignment. Projects include large written papers such as an essay, simulations where students participate in the simulation then write about and reflect upon their experiences, case studies which include identifying the problem and proposing solutions, and other real-world projects. Team projects are another category of formative assessments. Before instructors begin a group project, they need to decide if students can select their own groups or if the instructor or LMS software assigns the groups. Group projects may require the use of other technologies such as wikis, web conferencing, or synchronous chat to enable students to work in virtual groups. Some LMS contain features such as team rooms to assist with team projects. Tests can be used as a formative assessment and the LMS software can usually grade the multiple choice or true/false portion of the test.

Summative Assessments. Given the end of a quarter or semester are comprehensive in nature and provide a summary the content learned in a course, such as a final exam, a portfolio or a capstone project. Align summative assessment with the course standards and enable students to view objectives they have met. (Glenn, 2007). Midterm and final exams are examples of summative assessments. Portfolios used as a summative assessment typically include examples of student work produced in the course along with a reflection on why they selected the piece of work and what skills the piece demonstrates. A capstone project, such as a business plan or an in-depth case study and analysis, also allows students to demonstrate the knowledge learned in the course. After the instructor has selected the formative and summative assessments he or she needs to select the type of feedback they use for the assessment.

Feedback

Feedback can be communicated in an online course by various means including: grade posts, rubrics, discussion posts, e-mail and sending electronic files. When an instructor posts a grade in an online course, the LMS usually has a place for comments where the instructor can provide feedback to the student. Rubrics are a useful tool for providing formative feedback, because they help to keep grading consistent and inform the student ahead of time of the grading criteria expectations. The rubric can be either be a holistic rubric that grades the project as a whole, checklist of criteria or an analytic rubric that contains levels for several different criterion. Discussion boards can also be used to provide feedback. The instructor should actively participates in the student discussions and guide them when posts indicate students are not understanding the material. In some cases, e-mail might work best for providing feedback if a few students missed the mark on an assignment. Sending individual e-mails to each student after every assignment is very time consuming. Another way to provide feedback to students is by sending them an electronic file with feedback, that may include sending written or audio comments in a word processing program, sending a podcast with recommended changes or suggestions, creating a video demonstrating changes, or how to complete a task in the software such as Jing, Camtasia, or Captivate.

Online Course Management

Just as instructors prepare for a traditional course they determine the rules for the course, introduction material, and icebreaker activities. In an online course all policies need to be determined before the course starts to prevent any miscommunication. Instructors need to determine policies and procedures and strategies for orientation and student retention.

Policies and Procedures

The course policies and procedures include assignment dues dates, office hours, and late work policy. The instructor has to determine if late work is accepted or not, then he or she can set the assignment open date, due date, and close date in the LMS. An instructor could set the due date and have the assignment close twenty four to forty eight hours later to accommodate late work. Office hours also need to be determined before the course begins. Options for office hours include virtual office hours where the instructor is online during a set time where students can chat synchronously with the instructor, in-person office hours, or the instructor may only be available via e-mail. Cheating is another policy to determine before the course begins. Cheating could lead to an automatic zero for the assignment, and depending on the district, reported to a counselor or administrator. Cheating can be reduced by placing less emphasis on testing and more emphasis on assignments and other course activities. Using authentic assessments where students apply their knowledge to real-world situations, can curb student cheating since every student's submission is different.

Orientation and Student Retention

The instructor should allow opportunities for students to become familiar with course structure, rules, and the learning management system to increase student retention in the course. The students should be informed of the measureable learning objectives for the course, expectations, policies, and milestones, by taking a test over the syllabus (Glenn, 2007). Students can obtain this information during an in-person pre-course briefing, an online tutorial, an introduction meeting using online meeting software, or in an orientation unit. The instructor should include a section of resources such as a course calendar, frequently asked questions, examples of exemplar work, Internet resources, and online libraries (Chen, 2007). Adding a human element to an online and otherwise impersonal environment enables students to relate to one another and to the instructor. Students can create a webpage with information and pictures of themselves, an avatar, cartoon character, or simple drawing along with a description. Putting a face with a name helps students feel connected and are then less likely to dropout of the course. Making the initial contact with the students and maintaining the contact with the student especially the first few weeks of the course, helps student succeed. Communicating with the student frequently at the beginning of the course can prevent students from falling into the "Wizard of Oz" trap where they feel intimidated by a mysterious unseen instructor.

One District's Course Development and Evaluation Process

Tempe Union High School District in Tempe, Arizona has 27 online courses offered in the district, and several other courses that are in the development or beta-testing phase. Classroom teachers in the school district develop these courses. Teachers are selected through an application process where teachers indicate the course they would like to develop, if they have taught the course and if so, how many years, and they also complete a skills section that identifies if they have taken or created an online course before, along with their skill level in several technology areas. Teachers are selected based on their application and their references, from the site principal, department chair, or curriculum area administrator. After the teacher is selected, he or she can develop the course.

Course Development

The course development process begins with a few classes where the course developer learns how to navigate the learning management system they are using. Then they have the flexibility to design the course the best way they see fit. The content is developed around district consensus maps where all sites agree upon the units, concepts, essential questions, vocabulary, and state and district standards. The consensus map accounts for approximately seventy percent of the course content, which leaves each teacher and course developer has around thirty percent which is flexible and teacher dependant. After the course is developed it is reviewed through a jury process.

Jury Process and Instructional Design Review

The course jury contains two to three members made up of one or two content experts which are usually teachers who teach the course in the district and a technical expert. The content experts look at the curriculum and activities to see if they align with the district curriculum. They also are making sure there are no gaps in information and the activities appear to be appropriate for an online version of the course. The technical expert checks the links to ensure they work properly and there are no technical glitches in the course. After the jury passes the course, the instructional designer reviews the course to ensure the course is easy to navigate for first time users and follows sound instructional design such as having the objective and standards taught listed for each unit. Once the course has been review by the jury and instructional designer the course is ready to be tested.

Beta Testing

The beta test phase occurs when the teacher (usually the course developer) teaches the course during a regular in-person course period. For example, if the instructor creates an online entrepreneurship course and teaches three sections, he or she would select one section and have the students in a computer lab take the course as if they were online. This process allows the teacher to determine students difficulties with assignments or directions and view any error messages that occur and make changes. After the beta testing phase, the course is ready to be delivered fully online.

Summary

Business educators at the secondary level have federal, state and local requirements to meet when they organize and teach courses either face-to-face or online. While teaching in an ever-changing world may mean creating curriculum in a variety of ways, including online courses, the additional requirements can make creating an online course challenging. However creating the course framework by planning and organizing the units, assessments, and unit length provides a foundation for the online course. Then using the course constructs the instructor can create and upload the lessons, formative assessments, and summative assessments into the course shell. Finally the instructor needs to determine the course policies, procedures and orientation for students and for the course. Provided with the tools and strategies for creating online business education courses, instructors can create online business courses at the high school level and provide more opportunities for students to take business courses.

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Strike a Pose: Using Office Yoga to Reduce Stress Levels and to Increase Vitality

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Abstract

Yoga poses that can be performed in an office without exercise clothing and equipment are introduced in this article. Practice of the introduced poses will contribute to stress reduction, thus increasing a person's vitality level. In addition, a simple breathing technique is described to promote relaxation. While the poses introduced work well in an office setting, they are also applicable for student teachers, training and development students, beginning keyboarding students, application software students, multimedia students, network students and students enrolled in courses such as business communications that require presentations.

Introduction

What is yoga? Yoga, a 5,000 year-old practice developed in India (Vilga, 2006), is comprised of postures, breathing techniques, and meditation among other things. While there are many types of yoga, the yoga postures or asanas presented in this article are based on hatha yoga (the physical movements) (Heriza, 2004). The practice of yoga has grown in popularity in the United States over the last decade and has become mainstream.

Activity Purpose

This article introduces readers to yoga poses that can be performed in an office without equipment such as a mat or bolster and that do not require work out apparel. Practice and mastery of these poses will contribute to stress reduction, thus increasing a person's vitality level.

Activity Objectives

By the end of the instruction, learners will

1. Be familiar with yoga poses that aid relaxation, such as poses for the eyes and the hands,

2. Be introduced to breathing techniques that promote relaxation before, during, and after potentially stressful situations, such as delivering a presentation, and

3. Learn how to adapt the session contents for use in the classroom.

Literature Review

A recent Time magazine article included "mandatory health" as one of ten ideas that are changing the world. For example, "Verizon Wireless, Microsoft, and Dow Chemical give cash bonuses for workers who lose weight or stop smoking. A growing number of employers assign "help coaches" to monitor workers' diets and lifestyles. Two thirds of companies offer so-called wellness programs" (Cullen, 2008, p. 58), which sometimes include yoga.

Heriza (2004) studied the use of yoga for reducing stress in cardiac patients and found that practicing yoga regularly helped to reduce cardiac symptoms. Experts recommend using yoga to alleviate stress and to increase energy levels (Brown, 2002; Gordon, 2006; Small, 2006). The role of yoga in relaxation has been promoted by Lasater (1995), a physical therapist and yoga teacher, who designed a program to increase a person's sense of renewal and relaxation through yoga practice.

The practice of yoga has been shown to reduce stress levels (Brown & Gerbarg, 2005; Smith, Hancock, Blake–Mortimer, & Eckert, 2007). In fact, the practice of yoga reduced stress levels for tsunami survivors (Telles, Naveen, & Dash, 2007). Further, the practice of yoga has been shown to minimize anger and stress in nursing students (Shirey, 2007). A yoga lifestyle has been shown to decrease levels of performance anxiety in professional musicians (Khalsa & Cope, 2006).

Jet Blue Airlines featured yoga poses on a seatback card for use during flights. The use of in-flight or travel yoga is recom-

mended by Zeer (2005), who designed a program that can be used during travel on trains, buses, and airplanes. More specifically, yoga is being practiced in the workplace with programs designed for the office (Fairechild, 2001; Thakur, 2007; Vilga, 2006). Furthermore, one of the authors keeps a yoga mat in the office for performing more advanced poses than those that will be introduced in this article. Yoga equipment is available in some hotels. How, then, can yoga poses be used by teachers, student teachers, and students to reduce stress and the increase vitality?

The Activity

Yoga Poses

Many yoga poses are helpful in reducing stress. The following descriptions are focused around major areas of the body: the eyes, the neck, the shoulders, the hands and wrists, and the ankles. In addition, simple breathing exercises are introduced. As with any exercise routine, a physician should be consulted before starting this regimen. Yoga is noncompetitive and gentle; be kind to your body by not trying to force any pose.

Eyes

The eyes can experience fatigue from working on a computer. The following two exercises help to combat eye strain.

Move your eyes upward and hold the gaze for 5 seconds. Then gaze downward and hold the gaze for 5 seconds. Repeat this sequence four times. Gaze as far left as possible, holding the gaze for 5 seconds; then follow the same procedure to the right. Repeat the left-right sequence four times.

Gaze at a clock (real or imaginary) on the wall opposite from you. Gaze at the 12 o'clock position for 5 seconds; then continuing clockwise, gaze at the 3 o'clock, 6 o'clock, and 9 o'clock positions, holding each gaze for 5 seconds. Repeat the sequence four times. Then reverse the sequence so that your eyes are moving counterclockwise, beginning with the 12 o'clock position and ending at the 3 o'clock position. Repeat this sequence four times.

Neck Rolls

Many people hold tension in their necks. The following exercise helps to release such tension. Begin with your chin touching your sternum; slowly turn your neck to the right and hold the position for 3 seconds. Then roll your neck to the left and hold the position for 3 seconds. Repeat the sequence four times. Looking at the opposite wall, slowly turn your head to the right; then slowly turn your head to the left. Repeat this sequence four times.

Shoulder Shrugs

Some people will have tension in their shoulders. Slowly roll your shoulders backwards five times. This pose is good for relieving tension in the body and may be repeated as needed during the day.

Hands and Wrists

Hands and wrists may become fatigued from using the mouse and keyboard (Blaine, 2008). This exercise is particularly good for alleviating wrist fatigue. Clasping your hands together, make a figure 8 in the air (moving only wrists and hands, not arms). Repeat this nine times. Then reverse the figure 8 in the opposite direction, repeating for a total of ten figure 8s.

Forward Bend

Standing up, lean forward over a desk, placing your chest on the desk and stretching your arms in front of you. Hold the position for 20 to 30 seconds. Repeat this sequence twice.

Ankles

Sitting in a chair, lift your right leg and rotate your ankle to the right for five counts. Then rotate your ankle to the left for five counts. Repeat this sequence with the left leg.

As you remain seated, extend your legs outward, point your toes, and hold for three seconds; then flex your toes for three seconds. Repeat this sequence four times.

Breathing

Breathing from the diaphragm, rather than breathing shallowly, is practiced in yoga. Breathing deeply from the diaphragm, inhale through the nose for four counts, hold the breath for two counts, and exhale through the nose for four counts. Repeat the sequence 20 times to activate the relaxation response. According to Heriza (2004), this breathing technique "produces a profound calming effect on the mind and body and decreases sympathetic nervous system stimulation . . . [and] also balances the availability of energy to your system" (p. 27).

Stress Reliever

To reduce tension, Dr. Vasant Lad (2008), a well-known ayurvedic physician, recommends repeating the following words several times: ha-ha-hee-hoo-hoo. Many people find that they begin laughing after a few repetitions of these words, which reduces stress.

The Lion Pose

Sitting or standing, raise both arms; clenching the hands, open your mouth, tilt your head back. stick out your tongue, and roar like a lion. Repeat this sequence twice. This pose relieves stress and exercises facial and neck muscles (Nadeau, 2007).

Practice Implications

The yoga poses introduced in this article may be used to reduce stress and to increase vitality. In addition, the strategies and content presented are useful beyond their applicability for those who work in an office setting. For example, student teachers, students majoring in training and development, and students enrolled in courses requiring them to deliver presentations can reduce anxiety levels by learning and practicing office yoga. Additionally, prior to and during a presentation in a course such as business communications, the use of diaphragmatic breathing can be helpful in regulating the pace of the presentation and the nervousness of the presenter. Beginning keyboarding students, application software students, multimedia students, and network students can learn the appropriate poses for the eyes, neck, shoulders, hands and wrists to alleviate stress and the stiffness that can ensue when developing a new skill.

Summary

By introducing yoga into their workday in their offices, business teachers can help to alleviate the stress that results from working with computers and from the normal workday challenges. In addition, business educators can teach these poses to their students in such content areas as keyboarding, computer software, multimedia, telecommunications, training and development, and business communications to alleviate student anxiety during presentations and from learning keyboarding and software. Lastly, introducing these poses to student teachers can help them to lessen the stress involved with facing the challenges of classroom and online teaching.

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The Use of Pre-Group Instruction to Improve Student Collaboration

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Abstract

Teamwork is essential in the business world, yet many students do not appreciate the importance of participating in collaborative assignments during their education. This paper provides a comprehensive review of literature to understand student perceptions of teamwork, best practices of teaching teamwork skills, and methods of assessing student performance. Before assigning collaborative work, instructors should prepare students by teaching team development, communication skills, and emotional intelligence factors. Students then apply these skills to challenging team assignments and learn from the experience by reflecting on their individual and group performance. Both formative and summative assessments should be used to evaluate student performance.

Introduction

The emphasis on the importance of collaborative skill is evident at nearly all levels of education. In higher education, teamwork and group skills are critical elements in a business student's training. To be successful in the business world, students must be able to work well in teams (Luca & Tarricone, 2001; Payne, Monk-Turner, Smith, & Sumter, 2006; Yazici, 2005). However, many students prefer to work individually. They may realize the importance of the experience, but do not enjoy the collaboration and often resent the grading procedures (e.g., one grade for all group members regardless of individual effort and/or performance) as noted in Payne et al. (2006). Nevertheless, group work can be a successful learning experience if students are given the tools they need to become effective team members. To that end, this paper suggests techniques for teaching effective teamwork skills. First, an analysis of current research on student perceptions of group work is provided. Then suggestions for teaching teamwork skills are outlined. Finally, procedures for assessing individual performance are described.

Understanding Student Perceptions

"Inappropriate use of teams can undermine the educational process so badly that learning does not take place, students learn how not to learn, and students build an attitude of contempt for the learning process" (Jones, 1996, p. 80). Poor instructional planning can lead to students' negative perceptions of group experiences; however, even in well-planned and methodologically developed collaborative experiences, student behaviors can adversely affect group cohesion, learning outcomes, and student perceptions.

Research has been conducted in an effort to understand why group projects are often not successful learning experiences (McGraw & Tidwell, 2001). Often cited problems include social loafing or free riders who usually enjoy the social aspects of group work, but do not provide substantial contributions to the team project. Communication problems also play a large role in the demise of effective collaboration. Other factors include lack of leadership, varying grade expectations, and differences in work ethic. Unfortunately, the instructor cannot control these variables nor completely compensate for their negative affects.

Students also often report negative perceptions of group work when time outside of class is required to complete collaborative work. In these cases, technology tools such as proprietary learning management systems (e.g., Blackboard and Desire2Learn) and open source methods (e.g., wiki's and Google Groups) may facilitate virtual collaboration methods. Interestingly, Ocker and Yaverbaum's (2004) research into virtual collaboration found that women perceived collaborative projects more negatively than men; however, men perceived asynchronous collaboration more negatively than women. Clearly gender issues can impact effective group collaboration in any environment; however, when technology is used to support collaboration, additional problems such as lack of access can exacerbate effective students' communication with each other.

Regardless of their origin, students' negative reactions to group work often affect instructors' perceptions of collaborative assignments (Stephens, 2001). This correlation may be especially significant when the barriers to effective collaboration cannot be overcome with the instructor's intervention. For example, when students report that their group members frequently procrastinate or rely on one person to do the work, instructors may tire of the constant complaints and requests to referee personality conflicts among student group members. These negative experiences may lead instructors to modify or refrain from assigning team activities to support student learning.

Even with these potential problems connected with group work, many researchers have found collaborative learning environments to enhance student performance (Ocker &

Yaverbaum, 2004). Student interaction is a critical factor in successful group experiences. As noted by Yuan and Benson (2000), "powerful and enduring learning seldom results from passively sitting in a traditional classroom. It is far more likely to occur when students are actively engaged in projects and is often enhanced when the projects involve diverse teams of students" (p. 52). However, to effectively participate in collaborative experiences, students must first have the requisite skills to perform well in team experiences. In effect, instructors must teach teamwork skills before they can assume students will use them.

Teaching Teamwork Skills

Students often experience negative collaborative situations because they are not adequately prepared to serve as effective team members. They do not understand the dynamics of the team experience and often try to apply individual work processes to collaborative experiences. Conflict arises, which occurs naturally in group situations, and is perceived as hostility. Students react by disengaging from the team experience or increasing the antagonism until someone complains to the instructor. However, if students learn about effective teamwork skills before they participate in collaborative projects, the group experience can be a successful social experience as well as an effective educational endeavor. The following sections suggest methods of preparing students for collaborative work, creating challenging team assignments, and reflecting on the team experience.

Preparing Students for Collaborative Work

"Even a small amount of training [on working in teams] can produce dramatic increases in team effectiveness and efficiency" (Jones, 1996, p. 87). Unfortunately, instructors often assign team projects without providing team training (Bolton, 1999; Vik, 2001). Before beginning a group project, students should be oriented not only on the objectives and goals of the group project, but on the group process itself (McGraw & Tidwell, 2001; Prichard, Bizo, & Stratford, 2006; Stephens, 2001). Prichard et al. found "empirical evidence that prior team-skills training produced superior collaborative group work compared with that of students merely placed in unaffiliated groups" (p. 129). Ettington and Camp (2002) also emphasized the importance of preparing students for effective team experiences. They stated "we should assess our students' skill development needs before we attempt to develop their skills using group projects" (p. 358). Their research focused on whether the skills learned in class-based group projects transferred to work team effectiveness. In many cases, students did not connect the significance of group projects assigned in school to the skills they will need to succeed in the workplace.

To prepare students for collaborative experiences and support the transfer of team skills to workplace readiness, three factors should be addressed: (1) team development, (2) communication skills, and (3) emotional intelligence (Holmer, 2001). Providing students with training in these areas prior to a group experience can build team cohesion (Anderson, 2005) and help students become active learners (Oitzinger & Kallgren, 2004).

Team development. Teamwork and collaboration are not innate abilities. They must be taught. Students need to understand the team development process before they participate in it (Holmer, 2001). Working on a group project without understanding the process is like playing a sport without knowing the rules of the game. You may know your team needs to get the ball to the other side of the field, but if you don't know the rules, you will make a lot of mistakes before you get there, and you won't understand or know how to overcome the obstacles you encounter. Although you may "pick up" on the process along the way, you will perform better both individually and with your teammates if you understand the rules of the game. Similarly, students should understand the process of team development before they play a team role.

At a minimum, students should become familiar with the Forming–Storming–Norming–Performing Model originally attributed to Bruce Tuckman in 1965. Many textbooks that address teamwork refer to this model, and several resources exist to provide additional instructional material (Egolf, 2001; Maples, 1988; Matthews, 1992). In brief, forming involves team members getting to know each other and often engaging in initial "icebreakers" or activities to develop a sense of unity. During the storming stage, team members begin to sense each other's abilities and productivity (or lack thereof). Conflict occurs, and if the team is successful at negotiating this phase, they progress to the norming stage. Norming occurs when the individual team members begin to work together to accomplish their goal; cohesion and synergy exist, and conflicts are managed. Finally, during the performing stage, the team is productive, the members share mutual trust and respect, and the final product demonstrates a balanced input and effort from all team members.

Understanding the phases of team development helps students navigate the collaborative experience as well as identify their own roles within the group dynamic. Studies have also addressed students' perceptions of their individual effectiveness in team environments. Using a self-efficacy framework, Stone and Bailey (2007) discovered that students can gain effective team management skills from observing other groups during their team development process. "Students' behavioral intentions to use their team skills are influenced by students observing or listening to other teams solve conflicts and by having a supportive, encouraging intra-team environment" (p. 262). Observation can be achieved in classroom settings using role playing activities or case studies that focus on group communication.

Communication skills. Students often realize the importance of communication to support an effective group experience. In their research of student perceptions of group work, Payne et al. (2006) surveyed students who had just completed a semester-long group project. Students consistently identified interpersonal

communication as a necessary ingredient for effective collaboration. Their comments included statements such as, "Make sure everyone understands the information and the process.... Communication is key…. When a group fails to communicate, the group as a whole suffers" (p. 443).

To support continual group communication throughout a lengthy team process, Stephens and Myers (2000) suggest incorporating weekly team meetings throughout the semester. Their research indicated that required weekly meetings that utilized agendas, actions lists, and team roles (leader, record keeper, etc.) significantly increased student communication, cohesion, and success, both in terms of the final product and the students' perceptions of the collaborative experience. Cohesion is also often enhanced by students' awareness of emotional intelligence issues.

Emotional intelligence. Although communication skills are required to effectively navigate conflict resolution, emotional intelligence is also an important aspect. Although definitions vary, emotional intelligence is often described as an individual's ability to recognize and effectively respond to emotions, such as conflict. Through their understanding of team development process, students will know that conflict is inevitable when working with others. Recognizing the important contributions of cognitive conflict (differing opinions) and avoiding the negative impact of affective conflict (differing personalities) helps to sustain group cohesion and collaborative success. Research suggests a strong correlation between students' ability to perceive their own and other's personality or feelings and successful teamwork experiences (Luca & Tarricone, 2001). However, students need theoretical training in these concepts to apply them to their team activities.

Some instructors may hesitate to take the time necessary to provide instruction about emotional intelligence issues before starting a team project. However, Oitzinger and Kallgren (2004) found that "training in fact enriched the content, taught critical thinking skills, and increased active learning" (p. 65). Prichard et al. (2006) also reported successful team experiences when pre-group instruction was provided. They conducted an experimental study that separated student groups into cohorts; half of the groups received instruction about interpersonal skills and effective team development, half did not. Although their findings varied, most groups reported more successful collaborative experiences when pre-group team development instruction was provided.

Creating Challenging Team Assignments

When assigning team activities, instructors should ensure that the activities are designed to promote team interaction and support the learning objectives of the course (Kreie, Headrick, & Steiner, 2007). If students are given challenging assignments that require critical thinking to solve complex problems, they are more likely to be motivated by the team experience. This supposition is supported by Anderson's (2005) research that focused on the outcomes of simulations and the relationship between student perceptions of team dynamics, which found that students' performance was linked to hypothesis-driven thinking. Project-based learning scenarios that encourage creative input and multiple perspectives facilitate team cohesion and team interdependence.

The element of interdependence is supported by Fairfield and London (2003) who emphasized the importance of interdependence over individualism in effective group environments. Ettington and Camp (2002) also stated that "to achieve the potential of a group effort versus an individual effort, group members must perceive themselves to be interdependent" (p. 362). Interdependence assumes the members of a group are mutually dependent on each other's work. Creating assignments that require interdependence can facilitate a cohesive group experience (assuming all group members complete their assigned tasks).

Reflecting on the Team Experience

As with any skill development process, practice is most effective when it includes reflection. When students participate in a group experience, they should reflect on their group and individual performance both throughout the group effort as well as after the product or outcome of the project is completed to determine their strengths and weaknesses. If students identify the collaborative skills in which they excel and determine aspects of the group process that they could improve, they can modify their interactions in subsequent team experiences.

McGraw and Tidwell (2001) emphasize the importance of reflection and offer group exercise and case study suggestions to promote students' collaborative skills by reflecting on the factors that contribute to a group's success and failure, such as group identity, team conflict, rights and responsibilities, interpersonal and behavioral skills, leadership issues, and time management. These variables may also be used to assess students' individual performance.

Assessing Individual Performance

Students often cite collaborative grading as a negative factor of participating in group work. Students may complain about their grade being negatively affected by the poor performance of their peers or argue about the inequitable workload that results when their group members do not complete their assigned duties. However, unlike many of the behavioral factors that instructors cannot control (personality problems, lack of leadership, poor communication, etc.), assessment techniques can be designed to provide evaluations that represent students' individual efforts as well as determine whether the group successfully met its objective.

Vik (2001) suggests using a three-stage peer evaluation system that tracks the team's progress throughout the project. The same form is used for each stage, but the focus of the evaluation differs.

The first evaluation is completed after a team activity requiring each student to "discuss expectations, level of responsibility, and emerging problems" (p. 114). The second evaluation serves as a progress report and is assigned at the midpoint of the group process; students evaluate each other's progress to date. The third and final stage of the peer evaluation process is conducted after the project is completed and the final product (paper, presentation, etc.) is submitted for the instructor's assessment.

The combination of formative and summative assessment techniques is supported by other research. Ettington and Camp suggest that "without feedback, the group participants may not know if they are practicing effective or ineffective behaviors. If they do not receive formal feedback from … peers until the end of the course, they lose the opportunity to adjust" (2002, p. 359). Kreie, Headrick, and Steiner (2007) also emphasized formative assessments to help students track their progress and modify behaviors that do not support the group's goals.

Although rubrics that assess students' collaborative skills are often subjective and therefore may require more time to complete than more easily quantifiable objective assessments, feedback should be provided promptly, both for individual team members as well as the team as a group. To facilitate this process, Oitzinger and Kallgren (2004) support integrating both self- and team-based assessments. Self-assessments not only enable students to reflect on their role within the team experience, but they provide the instructor with an "inside" perspective of the team dynamic. For example, if all team members assess a particular team member poorly, the instructor can assume that the team member is not supporting the team effort.

Further, formative assessments that provide graded feedback on the team's process during the collaborative experience not only provide students with the direction they need to successfully meet the objective of their team assignment (Holmer, 2001), but provide an opportunity to improve instruction (Johnston, Knight, & Miller, 2007). If the majority of the teams are struggling with the same aspects of a collaborative assignment, the instructor can modify the assignment or provide additional resources to assist the students' progress. Formative assessments also combat the problem of letting students "sink or swim" (Vik, 2001). Effective educational experiences should provide opportunities to support students as they build their teamwork skills.

Summary

Although many students do not appreciate the benefit of group projects and collaborative learning, they can become effective team members if given the appropriate tools. Their teamwork skills will improve if they understand group dynamics and realize the advantages of diverse perspectives. To this end, instructors are challenged to make the time to not only incorporate teamwork into their courses, but to teach effective teamwork skills. Several researchers support the need to address team development, communication skills, and emotional intelligence before assigning challenging team projects where students can apply their teamwork skills. By including reflection and both formative as well as summative assessments, instructors can enhance their students' teamwork skills.

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Using Clickers to Facilitate Active Learning

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Abstract

Survey research was conducted to examine whether business communication students (n = 42) perform better on exams after using clickers as a review method than students who use class discussion as a method review. Student perceptions regarding the use of clickers in the classroom were also examined. The study revealed that clickers only improved exam performance slightly (one percentage point). However, students responded positively to using clickers in the classroom reporting increased engagement, participation, and a greater sense of belonging. Students also felt that using clickers to review improved their exam grade and their understanding of the material.

Introduction

Most business educators today are faced with teaching Net Generation students on a day-to-day basis. Modern students are active learners and need to be engaged in the learning process to thrive (Guthrie & Carlin, 2004). It has become more difficult to reach these students because of their unique learning styles (Oblinger & Oblinger, 2005). Using technology, such as clickers, to enhance active learning provide another method to engage the learner.

Review of Literature

In this Information Age, engaging the learner has played a critical role in education. Children begin using technology as early as three years old. As a result, students of the 21st century are referred to as millennial learners. These millennials are accustomed to technology and expect it to be a part of the learning process. These millennials or Digital Natives, as they are sometimes called, are accustomed to using technology and are digitally literate. According to Oblinger & Oblinger (2005), millennials prefer to:

* Stay Connected
* Receive Immediate Feedback
* Participate in Experiential Learning
* Participate in Social Networking
* Participate in Teamwork

To connect with the millennials, educators are implementing active learning techniques that primarily require students to do something other than just listen to lectures. Traditional active learning techniques include games, student-led discussions, reflective journaling, team learning, student debates, and video analysis. Many teachers are incorporating Web 2.0 technology in their classrooms to enhance traditional active learning techniques. Some of the tools used include blogs, wikis, podcasts, social bookmarks, and social networks.

Another technology device that has emerged in education is the clicker. Student response systems or "clickers" have slowly been embraced by educators in secondary as well as higher education, particularly in large classrooms (Herreid, 2006). Clickers are wireless handheld devices that typically include a response pad that allows students to simultaneously respond to questions asked in real-time during class. The clickers use infrared or radio frequency technology to transmit and record student responses to questions (Educause, 2005). These responses are received and recorded on the instructor's computer (Guthrie & Carlin, 2004).

Educators in higher education have been exploring the use of clickers in the classroom since 1997 and have discovered many advantages to using them (Hatch, Jensen, & Moore, 2005). Some of the benefits are as follows:

* Instructors can instantly assess the level of student understanding (Woods & Chiu, 2003)
* Instructors can increase participation and class discussion (Beekes, 2006)
* Students know where they stand with respect to other students (Woods & Chiu, 2003)
* Students can practice solving test-style questions (Woods & Chiu, 2003)

So, using clickers to gauge learning outcomes can offer many advantages to students as well as educators.

Purpose of the Study

According to Chickerling and Gamson (1987), active learning is one of the seven principles of best practice in higher education. These early proponents of active learning contend that learning is more lasting when students are engaged in the learning process. This concept closely correlates with the learning styles of millennial students of today. One purpose of this study is to determine if using clickers as an active learning technique is effective. Comparing the perceptions of student learning after using clickers versus class discussion was also a purpose of the study.

Research Questions:

1. Do students perform better on an exam after using clickers as a review method than students who use class discussion as a method of review?

2. How do students perceive the use of clickers as a form of exam review?

Limitations

Due to the small sample size, the findings of this study are limited to the business communication students in the researcher's classes. No attempt was made to generalize to a larger population.

Methodology

This study involved business communication students from a comprehensive university in the southeast during the fall of 2007. Students enrolled in classes taught by the researcher were the selected samples. One class included 14 students while the other included 28 students, totaling 42 students. Business communication classes participated in two separate exam review sessions. For exam 1, Class 1 (n = 14) participated in a class discussion to review for their exam. Class 2 (n=28) used the clickers to review for their exam. Exam-type questions were used and placed in a PowerPoint presentation. Students using class discussion raised their hands to respond to the questions, whereas students using the clickers responded by using the devices. For exam 2, both classes used clickers as a method to review prior to the exam.

Research Design and Instrumentation

The first research question addressed whether students perform better on an exam after using clickers as a review method than students who used class discussion as a method of review? To answer this question, the researcher compared the average exam score of Class 1 (used class discussion) with the average exam score of Class 2 (used clickers).

The second research question sought students' perceptions of the use of clickers as a method of exam review. After taking exam 2, a survey instrument was administered to both classes to measure student opinions regarding the use of clickers to review. To answer the second research question, students responded to clicker perception questions using the ranking scale as follows: 1 = strongly disagree, 2 = disagree, 3 = agree, 4 = strongly agree, and unsure = not applicable.

Findings

The findings were categorized by two research questions: (1) Do students perform better on an exam after using clickers as a review method than students who use class discussion as a method of review? (2) How do students perceive the use of clickers as a form of exam review?

Concerning research question one, the average exam 1 score for Class 1 (used class discussion) was 75 out of 100. The average exam 1 score for Class 2 (used clickers) was 76 out of 100. For exam 2, both classes used clickers to review for their exams. The average exam score for Class 1 was 86 and 87 for Class 2. Additionally, more students (41.7%) from Class 2 self-reported GPA scores of 3.0-4.0 than students from Class 1 (38.5%).

Concerning research question two (see Table 1), the business communication students responded positively regarding the use of the clickers. Ninety-six percent of the students enjoyed participating with the clickers and 92 % would recommend using them again. The majority of the students agreed that the clickers increased their feeling of belonging in the course (43%), and 46% of the students strongly agreed that the clickers increased their interaction with other students. Ninety percent believed that the clickers improved their exam grade, and eighty-four percent felt that the clickers improved their understanding of the material. While most students preferred using the clickers, only 19% of them agreed with the idea of paying for their own clickers to use in class.

Table 1
Clicker Perception Responses, Reported by Means

Participation with clickers improved my grade on the exam.	3.11
Participation with clickers improved my understanding of the subject content.	2.97
Participation with clickers increased my feeling of belonging in this course.	2.73
Participation with clickers increased my interaction with other students.	2.65
I enjoyed participation with clickers.	3.47
I would recommend using clickers again in this course.	3.46
I would be willing to pay for my own personal clicker to be used in other classes.	1.24

Conclusions

The findings revealed that business communication students have positive perceptions regarding the use of clickers in the classroom. In this study, students felt more engaged when using clickers in the classroom which is consistent with prior research conducted by Hatch, Jensen, & Moore (2005). Also consistent with current literature, the students believed that reviewing for exams with clickers helped them understand the material (Judson & Sawada, 2002; Greer & Heaney, 2004; Duncan, D., 2005).

When comparing Exam 1 scores of students from Class 1 (used class discussion to review) with those from Class 2 (used clickers to review), there was only a slight difference in the exam scores (one percentage point higher for Class 2). Similarly, when both classes used clickers to review for Exam 2, students from Class 2 performed one percent point better than the students from Class 1. Self-reported demographic data revealed that students from Class 2 have higher GPAs than those in Class 1. Thus, higher exam scores may be contributed to factors other than the use of clickers. As clickers continue to grow in popularity, more research is warranted to determine whether positive perceptions and improved learning outcomes using clickers are simply due to novelty.

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PART III
WORK IN PROGRESS PAPERS

Distance Education Status in Illinois K-12 Schools

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Abstract

The purpose of this study is to determine the status of online classes in Illinois Public K-12 Schools. While distance learning is prevalent at the community college and university level, it is less common at the K-12 level. Findings from this work in progress could support the inclusion of an online teaching unit in a methods class for college business education students in addition to providing an insight into online K-12 classes.

Introduction

Online classes have exploded over the past few years (Rohland-Heinrich & Jensen, 2007; US Department of Education, 2005; Watson, 2005). However, the majority of online class are offered at the post-secondary level with K-12 schools just beginning to become involved with distance education. Currently, 28 states have established state-wide virtual high schools (Christie, 2008). A study conducted by the U.S. Department of Education found that 76% of public high schools, 7% of middle schools, 2% of elementary schools, and 15% of combined or ungraded schools offered distance education courses (US Department of Education, 2005).

Literature Review

The US Department of Education survey (US Department of Education, 2005) on distance education provided information on estimates of districts and schools with students enrolled in distance education classes. A greater proportion of large districts than medium or small districts had students enrolled in distance education courses. A greater proportion of districts located in rural areas than in suburban or urban areas had students enrolled in distance education courses. Also included in the report are reasons for offering online courses to students, students' grade level, and who delivers the courses among other data. During the 2000-2001 academic year, 56% of degree-granting institutions offered distance education courses for students from the elementary level to adults (US Department of Education, 2003). The total number of virtual schools in the US was estimated to be about 200 in 2005 (Revenaugh, 2006). States that offer K-8 virtual schooling include: Alaska, Arizona, Arkansas, California, Colorado, Florida, Idaho, Minnesota, Ohio, Oregon, Pennsylvania, and Wisconsin (Revenaugh, 2006).

Distance education has the potential to level the playing field and overcome socio-economic barriers through an excellent curriculum, optimal instruction, and a large quantity of resources. Approximately 600,000 K-12 students took part in distance education in 2005. In 2006 that number exceeded 1 million students (Rohland-Heinrich & Jensen, 2007). Students gave these reasons for enrolling in a distance education course: better manage time, learning from others, create a collaborative relationship with the teacher and other students, and immediate feedback on tests.

Virtual schools must serve all students who elect to enroll. These schools are guided by standards-aligned curricula, employ certified/licensed, highly-qualified teachers, and require students to demonstrate academic achievement through standardized tests. A responsible adult (learning coach) works with the teacher to oversee the student's program and progress (Revenaugh, 2006).

Study Purpose and Research Questions

The purpose of this study is to ascertain if distance education classes are offered to Illinois school students and determine how teachers are prepared to teach distance education classes. Specific research questions follow:

Are online classes offered to K-12 students in Illinois schools?
Who takes online classes? (grade level; student demographics)
What online classes are offered?
Does your school contract with an outside agency to deliver classes?
Who teaches the online classes?
How was the teacher prepared to teach the online class?
Who designed/created the online class?
What course management software is used?
What technology do you use to deliver online classes?

Methodology

Public school principals will be contacted to determine if their schools offer distance education classes to students. The list of principals will be obtained from the Illinois State Board of Education public school teacher list. The list contains approximately 5,600 names of principals and assistant principals at the elementary, middle, and high school levels. A stratified random sample will be used to select the people who will receive the survey. Principals will be contacted by email to determine if they are willing to participate in the study. If they are, they will be directed to a URL where the survey will be available. Non-respondents to the initial request will be contacted by postal mail asking them if they would be willing to participate in the study. If they are, the URL will be made available in addition to a hard copy of the survey. If responses are not received three weeks after the due date, principals will again be contacted to encourage them to complete the survey.

Data Collection and Analysis

Responses to the survey will be coded and entered into SPSS/PC+ for statistical analysis. Descriptive and inferential statistics will be used to analyze the data.

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Ethical Considerations in Business Journal Publishing

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Abstract

This research-in-progress continues where two previous unpublished studies were left without resolution. Surveys were conducted of business journal editors in the two previous attempts to gather data regarding the ethical practices followed in publishing journal articles. The objective of this study is to identify the ethical practices followed for publishing in business journals as perceived by the editors of the business journals. Very little research of this nature has been conducted or published. Rules that authors follow are primarily the publication guidelines of the journal, mostly stating format and style, as well as hearsay.

Introduction

The typical expectations for a university faculty member in business education evolve around teaching, research, and service. In many universities, research is weighted more heavily when tenure and promotion are considered. This places pressure on faculty members to not only conduct research, but to publish the research in appropriate journals. Opportunities for business education faculty have seemingly become more limited as some journals will only publish business content related articles while business teacher education articles are overlooked.

If the outlets for business teacher education faculty are becoming more limited, how do these faculty members get published in journals that are of the quality and reputation that is recognized by peer faculty who will review portfolios submitted for tenure and promotion? This dilemma increases pressure for business education faculty to become more creative in their endeavors, but hopefully not to the point of overlooking ethical considerations in publishing.

Research Objective

The objective of this research is to determine editors' perceptions of ethical practices that may be followed when considering and publishing articles in business journals. Some specific questions to be considered are:

1. Do business journal editors have a published set of ethical guidelines to follow when accepting, reviewing, and publishing articles?

2. What areas of concern are most prevalent in publishing journal articles?

3. What is the role and impact of online journal publishing regarding ethical considerations?

4. What changes have occurred in business journal editors' perceptions since the research was first conducted over 10 years ago?

Literature Review and Background

A review of the literature revealed very quickly that this research topic had not in the past been pursued specifically with business journals. Other disciplines, such as the sciences, have been more likely to address ethical standards for publishing than has business. One research study (Serebnick and Harter, 1990) looked at the subject in the library and information science periodicals. It was from this study that the researchers derived and modified, with permission, the survey instrument to collect data from editors of business journals.

Serebnick and Harter (1990) collected data from editors of 39 prominent journals in library and information science. General results of their research indicated that there are strong commonalities among the editors on what constitutes ethical practices relative to author behavior. An added bonus to the Serebnick and Harter research was that actions taken by editors, reviewers, and referees were also revealed. At least 60 percent or more of the editors had common responses to over two-thirds of the scenarios that were presented in the survey. Respondents were asked to rate each of the situations as either ethical, unethical, possibly unethical, or not an ethical issue. Respondents agreed that 20 of 22 situations were either unethical or possibly unethical. Situations such as multiple submissions of the same article, several articles on the same data, and others were included.

Vincent and De Moville (1993) completed research which explored with business professors and deans the ethics of a practice defined as "streaming." The authors define streaming publications as "the practice of presenting or publishing an article at one outlet and then taking the same article with perhaps minor revisions and presenting or publishing it at another publica-

tion outlet" (p. 37). This research concluded that faculty and deans were in agreement that "up streaming" or "down streaming" of publications was not an ethical consideration as long as the previous publications of the same or revised article is disclosed to the potential publisher.

One concern that was addressed by Woolf (1991) and was included in the research conducted by the current researchers was the authenticity of the research and the data reported in the research. Woolf cited several instances of research misconduct, many cases that were settled in the courts. Misconduct includes falsifying the data, padding the research results, plagiarism, probable overstatement, conflicts when reviewers are able to identify authors, and many more potential problems. Woolf didn't reach any conclusions but posed many questions about conduct of researchers. The implications are that researchers must be responsible for their own actions.

What are most readily available to researchers/authors are guidelines published by journals. While most guidelines specify format and style, some do include what is considered to be ethical rules. For example, the *Delta Pi Epsilon Journal,* in addition to formatting directions, specifically states that submissions be research based and contain actual research data to support findings and conclusions. Additionally, the guidelines state that the manuscript must be original material and not under consideration or published elsewhere and submitted exclusively to DPE (Selection Criteria for Delta Pi Epsilon Journal, 2008).

Heldref Publications, publisher of the *Journal of Education for Business,* emphasizes with italicized directions that manuscripts should not simultaneously be submitted elsewhere and should not have been previously published (2008, Regular Manuscripts section, ¶ 1). *The WebNet Journal – Internet Technologies, Applications & Issues* follows similar guidelines but adds that if work described in conference proceedings is substantially revised and extended, it will be considered (2008, Originality section, ¶ 1).

Previous Business Education Research and Procedures

This research began in 1996 when data were collected from editors of business journals. The original research came about because of a comment made by a professorial colleague in the management area who stated in a public presentation that his articles were sent to several journals at the same time in the hopes that one of them would publish the submission.

Because this type of research had never been conducted with business journals, the researchers found and adapted, with permission, a survey instrument that was developed for similar research in the library and information science discipline. Cabell's Directory of Publishing Opportunities was used to secure names of journals and editors. Many of the journal editors function like those for the Delta Pi Epsilon publications. They are volunteers and they change regularly. This presented problems because the editor who was listed in Cabell's may no longer have been in the position and the survey instrument may or may not have been forwarded. The first survey was sent to 170 journal editors and 85 responded. The data were analyzed and several journal editors expressed an interest in publishing the results. However, circumstances unfortunately changed with the researchers and an article was never completed.

In 2004, the research study was resurrected and a survey was sent to an equal number of journal editors. This time, the response rate was underwhelming with only 22 editors responding. The researchers decided at that time that the lack of response needed to be considered, and it would be necessary to do something differently to collect the data. The data that were collected has now stagnated and could only be used for comparative purposes if new data are collected.

Recent events that occurred in Illinois with a university official being accused of plagiarism and with faculty members being dismissed from universities for this same reason caused the researchers to feel the need to once again look at ethics in publishing research (Inside Higher Ed, October 12, 2007). Misconduct in the process of publishing is nothing new but has become much more detectable because of advances in technology, scanning software, and the more public availability of the completed research. There are several areas of misconduct that could occur that would render ethical concerns regarding publication of the research.

Ongoing Research Considerations

Because the research has never been published or presented at a conference, the researchers feel this work-in-progress can benefit from input from other researchers in order to improve the quality and gain greater response from journal editors. The following questions are open for consideration.

1. Is there a better way to collect the data from journal editors than using a written instrument? Should the researchers consider an online survey?

2. Many journals are now published by commercial companies with a full-time editor rather than editors from the organizations they represent. Should these be included in the survey since they typically may not respond and could skew the response rate?

3. The survey instrument presents short case situations to which the respondents react. Should the instrument be changed and be made easier and quicker to answer? How will this affect the usability for comparative purposes with the data previously collected?

4. Have ethical publishing considerations changed in recent years? Is the survey instrument that was used in the past relevant for today?

5. Some journals are now online. How does this impact the items in the survey instrument? Are there new items that should be added to the instrument to expand the data that is collected?

6. One researcher is a past editor of the Delta Pi Epsilon Journal and recognizes how difficult it is to get business educators to submit research articles for consideration. Is this research more suitable for mainline business faculty than for business educators? Do business educators still have the need to publish their research in journals?

7. Do business educators know which journals are the best outlets for their research, whether applied or scientific? Do enough journals exist that prefer to publish applied research, which may be more suitable for business educators?

The items on the survey instrument are included here for informational purposes. Because the data collected are old and minimal in the second iteration of the research, the survey results are not shown. In addition to the items that were rated using the scale stated in the literature review, comments regarding each of the scenarios were also collected. The survey instrument included the items shown in Table 1.

Table 1
Survey Instrument Items

Survey Instrument Items Included in Previous Research
1. An author simultaneously submits the identical manuscript to your journal and another journal.
2. An author simultaneously submits the identical manuscript to your journal and another journal, and informs you of this in a cover letter.
3. An author simultaneously submits a manuscript to your journal and a largely identical manuscript to another journal.
4. An author simultaneously submits a manuscript to your journal and a largely identical manuscript to another journal, and informs you of this in a cover letter.
5. An author simultaneously submits a manuscript to your journal and another manuscript, different in form but not in content, to another journal, and does not inform you of this dual submission.
6. An author simultaneously submits a manuscript to your journal and another manuscript, different in form but not in content, to another journal, and informs you of this in a cover letter.
7. An author submits a manuscript to your journal. You accidentally discover that the identical manuscript has been published previously in another journal.
8. An author submits a manuscript to your journal. You accidentally discover that the identical manuscript had been published previously in the proceedings of a conference or symposium.
9. An author submits a manuscript to your journal. You accidentally discover that a largely identical manuscript has been published previously in another journal.
10. An author submits a manuscript to your journal. You accidentally discover that a largely identical manuscript has been published previously in the proceedings of a conference or symposium.
11. An author submits a manuscript to your journal. You accidentally discover that another article, different in form but not in content, has been published previously in another journal.
12. An author submits a manuscript to your journal. You accidentally discover that another article, different in form but not in content, has been published previously in the proceedings of a conference or symposium.
13. An author submits a manuscript to your journal. You accidentally discover that the manuscript includes instances of plagiarism.
14. An author submits a manuscript to your journal. You discover that the manuscript includes instances of what appears to be deliberate falsification or fabrication of data or information.
15. An author submits a manuscript to your journal. You discover that the manuscript contains several errors in calculations, citations, or other mistakes resulting from sloth, negligence, or carelessness.
16. An author submits a manuscript to your journal. You recognize the paper as the latest of several papers the author has published on what is essentially the same research project. What is your view as an editor regarding the practice of watering down research
17. Undeserved coauthorship — e.g. Professors or senior laboratory administrators attaching their names to papers written by students or other associates
18. A "crony" — a personal friend, colleague, collaborator, or other close associate of an author — who also happens to be an expert in a relevant specialized field is asked by a journal editor to referee a manuscript or review a book written by a colleague. Rather than disqualifying oneself, to avoid even the appearance of cronyism, the expert writes the review.
19. You ask an expert in a relevant specialized field to referee (review) a manuscript. You provide time guidelines for responding, and state that if the expert cannot comment in the specified time, the manuscript should be returned as soon as possible. The expert keeps the manuscript, but does not respond with a critique during the stipulated time period.

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20. You ask an expert in a relevant specialized field to referee (review) a manuscript. Later you learn that the referee has apparently "borrowed ideas" from the manuscript and incorporated them into his or her own research program.
21. Lack of acknowledgment of financial assistance. An author submits a manuscript to your journal. The author has received financial assistance for the research, but does not acknowledge this support in the manuscript. Failure to acknowledge financial support might be at the request of the sponsor, or might be a decision made by the author.
22. Failure to share raw data. An author publishes a research paper in your journal. Later, the author refuses to share relevant raw data related to the research with an interested reader.

Summary

The number of business education researchers appears to have dwindled over the years. Many of the university business education programs have taken on a different dimension as a part of a department or unit that may be more generic but just as important. Business teacher education, where many of the business education researchers are housed, has become a part of curriculum departments, larger career and technical education programs, and even more traditional departments within business schools. Because there are still many faculty devoted to business education research, there seems to be a need for publication opportunities in business education. It is also important for non-researchers to have access to the work done by their colleagues who do complete research and publish the results. It is important for business education and other business researchers to have access to and understand the ethical ramifications of their research publication opportunities. This ongoing research project could provide ethical publishing insights for faculty who have an interest and a need to publish their research.

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An Investigation of Factors Affecting Part-Time Graduate Students' Transfer of Learning

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Abstract

The focus of this research-in-progress paper is on the impact that academic learning has had on the personal and work lives of students who were working full-time while working on their MA in Business Education part-time. Graduates of a master's degree program were interviewed to understand why or why not what was learned in the classroom was transferred to the workplace and to their personal lives. We use a framework of personal relevance, content relevance, and degree of job involvement to focus questions on this issue. At this point in time, interview data with seven graduates have been collected.

Introduction and Statement of the Problem

When discussing the differences between education and training, the focus tends to be on expected outcomes. Education, we say, prepares a learner for life. Training prepares a learner for a specific task or job role. These foci, however, seem to be meshing as in a quest to define what it means to be an adult learner in a learning organization, it is suggested that the role of educators and learning and performance professionals is to promote learning in the individual and the organization (O'Connor, Bronner, & Delaney, 2007). In other words, the goal is to help individual adults adapt to new circumstances and to be the catalyst for organizational learning. It is generally accepted that learning results in change, and that change can be in the behavioral, cognitive, and/or affective domains.

Oftentimes, the business education literature uses the term training the same way that the academic community uses the term learning. In both worlds, training/learning is a verb, defining an activity that is taking place. In both settings, learning is a term used to describe immediate outcomes—the skills or knowledge acquired. Organizational learning and development departments often go a step further and evaluate the behavior that occurs as a result of learning, calling that transfer of training. However, academic classroom outcomes beyond student reaction and subject mastery are rarely measured because cause and effect is difficult to establish. Moreover, sometimes dissonance occurs when what is being learned in the classroom is not connected with organizational work practices or individual values.

Thus, the definition of adult learning is evolving as we come to better understand what learning is and what learning means to individuals and their organizations. Mackeracker's (2004) definition was that learning is "a process of making sense of life's experiences…. making choices and decisions as a means of obtaining feedback to confirm or disconfirm meanings and choices." (p. 8) Jarvis (2006) suggested that "learning is an essential element of being" (p. 4). Illeris (2004) said learning is a result of the tension among cognitive, emotional, and societal processes. What these definitions have in common is the focus on the individual and the understanding that adults' choices and perceptions of the value of learning and their resultant transformation of experiences is the ultimate predictor of whether or not learning happens.

Working adult students who return to the university part-time for advanced degrees come with the expectations that what they learn will enhance their knowledge of their field, the work practices they see on the job, and their own self-understanding in relation to society and the work they have chosen to do. Sometimes, they return because they must have a credential or degree to retain their current job or obtain the job they want. However, even with this external motivation, they are intrinsically motivated as well. The question asked, then, is how do these working adults adapt and adopt what they are learning? What impact do they see their education having on their own personal growth as well as their organization's growth? What classroom experiences either aid or detract from their learning?

Therefore, the goal of this investigation is to use a conceptual model that includes the personal needs of the individual (helping the learner "become") and the job demand needs (helping the organization "become") as directly related to the academic learning environment, including, but not limited to its instructional design (and resultant feedback to curriculum, for "becoming" or change in this environment). Such an approach could be a useful lens for both organizational and academic educators in understanding the ultimate transfer of learning—individual and organizational change.

In describing the proposed model, a discussion of the key variables is offered, followed by the rationale for the development of

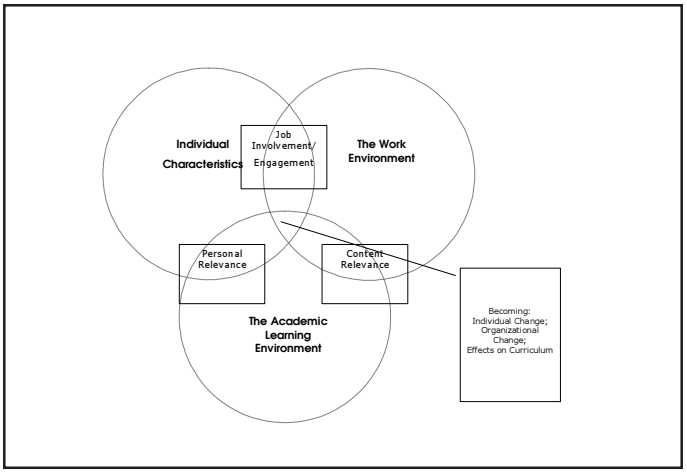
new categories of what might be considered a new way to understand the ultimate transfer of learning—or to use the words suggested here, of change or "becoming" in the individual, organizational, and academic spheres.

A Model for the Transfer of Learning

The model that attempts to respond to this question begins with inspiration from the Baldwin-Ford Transfer of Training Model (1988) but differs in that it is not a linear model but rather develops within a Venn diagram in which variables in three distinct categories (individual characteristics, the academic learning environment, and the work environment) overlap. This is not a model of how we learn; rather, this model shows the interrelationship among variables that impact the transfer of learning.

Each circle in Figure 1 closely follows the categories of what Baldwin & Ford called training input categories: individual characteristics, the work environment, and the learning environment. A premise here is that where there is synergy among these variables, learning is transferred, which results in "becoming." Learning is organic, it is not the result of any one input and whether or not it is demonstrated is a product of the intersection of multiple variables. Of special interest is the where the variables overlap—personal learning needs as a direct overlap between individual and learning environment characteristics; job involvement as the direct overlap with individual characteristics and the work environment; and content relevance as the overlap between the learning and organizational environments. In other words, when individual characteristics, the classroom learning environment, and the workplace are congruent, it is suggested that change is apt to occur.

Figure 1
The Relationship of Individual Characteristics, the Work Environment, and the Academic Learning Environment on the Transfer of Learning



Personal Relevance

Guidelines for the transfer of training have been developed in relation to learner characteristics. Cheng and Ho (1998) suggested that locus of control and self efficacy were vital to the transfer of learning from organizational training programs. They also found that individuals with high job involvement and strong career planning were more likely to use what the learned back on their jobs. In another study, it was a "need-to-know" that led to individuals' quest for applying what was learned to the workplace, as well as a need to learn to persuade others to change (Lim & Johnson, 2002).

Content Relevance

Content relevance means that what is being learned in the classroom has relevancy back at the workplace. The curriculum for the development of professionals must be relevant to those who are learning; and Lindell & Stenstrom (2005) have suggested there is a mutual dependency. Moreover, the effectiveness of a particular instructional technique is related to the content being taught (Alvarez, Salas, & Garofano, 2004; Mathieu, Martineau, & Tannenbaum, 1993). Information technology practitioners who rated their organization as a "learning organization" were motivated to transfer their learning (Egan, Yang, & Bartlett 2004). The most common reason for low transfer has been no direct relationship of learning to jobs, and a lack of understanding of the content (Lim & Johnson, 2002).

Job Involvement

Individuals with high job involvement and strong career planning were more likely to use what they learned back on their jobs (Cheng and Ho, 1998). In a study of managers, the social system at work played a central role in whether or not learning was transferred (Tracey, Tannenbaum, & Kavanagh, 1995). Etienne Wenger suggested that learning is a result of personal ability as well as being able to position yourself within a community. We learn with and from members of our community. Communities, he said, become stale when all they do is bump up against each other (Wenger, 2003). Accepting this premise, it seems that individuals grapple to implement new ideas. The very best learning outcomes may become stale when their implementation bump up against incompatible management practices.

Significance of the Study

In preparing our graduate-level Business Education students for careers as educators, we are attempting to instill the best of what is known about how adults learn within the context in which the learning is to be applied, whether the student intends a career as a professor of finance, a high school teacher, or as a corporate educator. Understanding how one learns from doing, from prac-

tice in business settings, calls for the blend of adult learning theory and management theory. In academic environments, we know the desirability for experiential learning, of problem-based learning, of cognitive apprenticeship, situated learning, and communities of practice. Findings from this study could inform business education classroom practices and, at the same time, provide a richer understanding of the personal and work environment factors that impact the transfer of learning of part-time adult students.

The Research Method

We are investigating the lived experiences of graduates who earned an MA in Business Education while working in full-time jobs. We developed an interview protocol based on an extensive literature review, correlating to each of the fields in Figure 1. We mailed an invitation to participate to individuals who meet these criteria and who graduated within the past three years. Those interested in participating returned a short questionnaire as the goal will be to have five participants, selected on the basis of obtaining a diverse group (note: the department has a diverse student body in terms of gender, age, race, and socio-economic status, marital status, and job levels). Each volunteer participant was interviewed for approximately two hours. The interviewer wrote a detailed reflective log after each interview. Interview data are in the process of being transcribed and will then be analyzed using a qualitative software analysis tool. Participants will be asked to review resultant write-ups for accuracy.

Concluding Comments

Part-time students in graduate-level Business Education MA programs are rarely the focus of research. It is anticipated that an understanding of the factors that relate to the transfer of learning—to their personal growth, job growth, and subsequent organizational growth—will be a major contribution to the literature and be of interest to graduate instructors.

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A Joint Service Learning Project within the Technology Support and Training Management Program

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Abstract

The Technology Support and Training Management (TSTM) Program at the University of South Carolina requires seniors to participate in capstone project management/service learning courses where they conduct information technology-related projects for community partners. In spring 2008, one capstone team initiated an innovative service learning project with students from the TSTM corporate training and development course to deliver senior citizen PC training. Based on the success of this coordinated cross-course collaboration, the community partner requested ongoing training rather than five-week courses. The goals of this action research study are to expand on the experience of the previous coordinated approach by expanding alternative approaches and evaluating the joint course strategy to meet our community partner's expressed need for ongoing support by TSTM students. This paper reports on the results-to-date of this study.

Introduction

The Technology Support and Training Management (TSTM) Program at the University of South Carolina has been involved with service learning projects since fall 2004 when we developed a capstone project management course that required senior student project teams to conduct projects for community partners. We considered this capstone course to also be a service learning program because it gave our students the "opportunity to enhance and enrich" their educational objectives by "extending the learning environment and engaging the students in experiential learning" (Gale, Crews, & North, 2007, p. 1). Since that time, we have introduced service learning projects in four additional courses, which provide "experiential learning where students and faculty collaborate with communities to address problems and issues simultaneously gaining knowledge and skills and advancing personal development" (Bounous, 1997, p. 5).

Over the last four years, our service learning projects were course specific, although some of our projects supported the same community partner. During spring 2008, one student capstone project team initiated an innovative and creative coordinated service learning project with students from the TSTM corporate training and development course for one community partner. This lead student capstone team organized a five-week introductory PC training program for senior citizen clients of the community partner that involved acquiring the computers, organizing and delivering the training, while also involving students from the corporate training and development course to provide training support.

Based on the success of the spring 2008 coordinated service learning project, the community partner changed its needs and requested an ongoing training program throughout the year rather than a five-week training. Our community partner's long term goal for training is to build its residents' knowledge and capacity so that they could eventually take online courses. Currently, our course structure does not allow us to satisfy our community partner's expanded, long-term needs. Therefore, starting in the summer/fall 2008 semesters, we began an action research project to explore alternative service learning approaches and expand on the experience of this coordinated approach, while our capstone and training students participate in a joint project.

This paper reports on the plan for the action research-in-progress project. It describes the structure of the service learning activities and instructional strategies for implementing the service learning project, the individual course and joint course learning outcomes, project objectives and deliverables, the short term impact on the students and community partner, and long-term impact and implications for the TSTM curriculum. We expect the findings from this action research project to contribute to the areas of business education, service learning, and capstone IT project management by linking service learning and capstone IT project management courses, assessing coordinated cross course collaborative model as another type of service learning project, and improving the course delivery and learning outcomes. The next section includes the project goals and student learning outcomes for the research study. The literature review includes research about service learning, assessment and

evaluation literature, and information about the development of the TSTM program. The final sections include background information about the TSTM program, a description of the action research process and plans used for this study, and the expected contributions of this study.

Project Goals and Student Learning Outcomes

The goals of this action research study are two: improve our current course strategies and evaluate the learning experience and performance of our students. The first goal is to improve the design and delivery of our current TSTM capstone project management course and our TSTM corporate training and development course to explore alternative service learning approaches that better work with our community partner to meet its changing need for ongoing student support. The second goal is to expand on the experience of the previous coordinated approach, evaluate the joint course strategy, and measure the learning outcomes and performance of our TSTM students during the fall 2008 semester.

Description of TSTM Information Technology Program

Students in the Technology Support and Training Management (TSTM) Program at the University of South Carolina receive an in-depth background in information technologies (IT) in four major areas. These areas include computer networking, database systems, corporate training and development, and end-user support. All TSTM students must complete a capstone course that incorporates all four core areas to maximize their learning experience. In this course, student teams work with a real business or non-profit organization as a service learning community partner, solve an actual business need or system issue, and design and implement the needed information technology system or technology. The program places emphasis on technology-based decision making and information management skills in dynamic business environments.

We also partner with the Project Management Institute (PMI) to insure that students are prepared for the business's need for qualified IT project managers. We use PMI's *A Guide to the Project Management Body of Knowledge (PMBOK®) Guide* as the course textbook and students also join the PMI-Midlands SC Chapter where they meet and work with professional IT project managers. Student research and leadership are incorporated into the capstone service learning projects when the students first learn and then apply PMI's PMBOK's standard practices for IT projects and when they fulfill one of three roles on the project team: project leader, technical lead, and quality lead. The team must solve the community partner's business problem by implementing either an existing or an emerging technology. They must research the available or potential technologies, select the best one that fits the problem, design and then implement it.

The training sequence of the TSTM curriculum includes a survey corporate training and development course in which students explore strategic training within organizations, review key adult learning and instructional design theories, and apply these theories to the needs assessment, design, delivery, and evaluation of technology-related training. The second course in the sequence, about training systems, continues developing the core training and learning concepts and explores ways that students can demonstrate their skills and competencies in designing, implementing, and evaluating training and training systems.

TSTM Course Learning Outcomes

Through course outcomes and feedback from student and community partners from previous TSTM courses with service learning components, we learned that early student experiences with service learning opportunities enabled students to be more innovative and creative and to develop leadership skills. This prepares the TSTM students to better meet the needs of the new global economy. The emergence of global networks in a rapidly changing global economy challenges the ability of university programs to prepare future technologists who have a broader perspective for developing innovative technical solutions besides just developing narrow sets of technical skills (Nambisan, 2005).

The TSTM course learning objectives are designed to provide students with hands-on, real world experience in four major areas: computer networking, database systems, corporate training and development, and end-user support. The project management course, as the capstone course, ties all these skill areas together for students. Overall, the program places emphasis on technology-based decision making and information management skills in dynamic business environments.

Upon completion of the service learning project, students in the project management course should be able to:

- Organize the information technology project, and work effectively as a project team;
- Collect the community partner's needs, conduct a needs analysis, and convert the needs into requirements;
- Develop project scope and detailed plan and schedule;
- Apply project scheduling methods and use project management software systems;
- Estimate costs for the project;
- Communicate professionally in oral and written means; and
- Assess project risk and success.

Upon completion of the service learning project, students in the training systems course should be able to:

- Design Activities –
    - o Understand how and why to create and conduct a needs assessment;

- Create a needs assessment survey tailored for the community partner;
- Apply adult learning and other learning theories to the design of technology training;
- Develop necessary materials appropriate for the learners;

- Training Activities –
  - Conduct training using appropriate technology systems and tools;
  - Reflect on individual training sessions; and
  - Adjust training activities as necessary.

Literature Review

Service learning is a pedagogical approach that has garnered much attention. Recent focused and organized efforts on campuses such as the University of South Carolina support the efficacy of service learning courses to promote students' academic learning, psychological development, and civic engagement (Smith et al., 2007). Literature and research related to this action research project are reviewed in this section. A review of service learning literature included definitions, how service learning works, and the importance of student reflection. A review of the assessment and evaluation literature describes the reasons for doing assessment, benefits to the students, community, and university program, and development of the course programs.

Service Learning

Service learning is learning by doing with a dual purpose. Students gain by experiencing and then reflecting on that experience. The community partners gain because meaningful and authentic work is completed providing solutions and service meeting their needs. Berman (2006) explained that "students learn course content, processes, and skills, strengthening their thinking skills as they develop empathy, personal ethics, and the habit of helping their communities" (p. xxi).

According to the National and Community Service Act of 1990, service learning is a method where:

- Students learn and develop through active participation in service experiences that meet real community needs, collaboratively coordinated with the community partner and the course professors;

- Students are provided structured time to think, talk, or write about what the student did and saw during the actual activity;

- Structured opportunities for community partnerships are integrated into students' academic curriculum;

- Students have opportunities to use newly acquired skills and knowledge in real-life situations in their own communities; and

- Classroom teachings enhance student learning beyond the classroom, while also developing a sense of caring for others (Waterman, 1997).

Successful service learning projects follow specific steps. Berman (2006) describes five elements necessary for structuring successful service learning projects:

1. Selecting the need for the service;

2. Identifying the community partner;

3. Aligning the service experience with the educational goals;

4. Managing the project; and

5. Fostering reflective student learning throughout the project.

Service learning is a practical way to combine academic content and theory to the reality of life outside the classroom (Speck, 2001). However, empirical evidence on the impact of service learning is mixed or non-existent. While faculty and administrators are interested in the relationship between service learning and academic learning outcomes, little evidence that service learning enhances or furthers academic learning outcomes exists (Giles & Eyler, 1998). There is evidence that service learning does enhance students' academic development, life skill development, and sense of civic responsibility and that it impacts students' attitudes, values, skills, and ways they think about social issues (Eyler, Giles, & Braxton, 1997). Other researchers report on the beneficial effects of service-learning (Henson & Sutliff, 1998; Rhoads, 1998; Rice & Brown, 1998). The mixed results of existing studies indicate that more research is needed to determine best practices for integrating service learning activities into the undergraduate curriculum.

Eyler & Giles (1999) reported that students describe a much richer learning experience when engaged in real world, service learning projects. Students say they learn more because they are more curious and more effectively engaged in the problems of the community. They remember more and can use the knowledge and skills more readily. Because the service learning experience is based on real, personal relationships where students are doing real work that can make a difference in people's lives, they feel that doing real work is a powerful experience.

Reflection is a critical component in the success of service learning (Mintz & Hesser, 1996). When students are reflecting on the connections among their service learning activities, course content, and theoretical perspectives, they gain a greater understanding of how to apply their new knowledge and skills in the real world (Eyler & Giles, 1999). Berman (2006) points out that opportunities for reflection allow students to revisit the service learning experiences, fit the various pieces of the project together, and identify areas for personal change and growth. Authentic situations, caring about others, and important work generate questions to think about (Eyler & Giles, 1999).

Reflective writing can help to generate these questions and bring them back into the classroom.

Assessment and Evaluation of the Program and Student Benefits

Berman (2006) explains the importance of developing a thorough evaluation plan in order to identify and demonstrate how the course helps the students and community partner obtain the expected benefits. Shumer (1998) explained a number of reasons why an evaluation process is important to insure that the program is structured correctly. An effective assessment involves the students, community partner, as well as the university professors. For example, students evaluate the community impacts of their service activities and their own learning. Community partners evaluate the performance of the students and the impact of service on the community need. Professors evaluate if the students are learning the appropriate skills, information, and concepts from the service activity and if the service learning method as an instructional strategy is effective.

Berman (2006) described categories of benefits that occur including student content learning, personal development, and cognitive skill development. Students will also gain valuable community connections and life skills. Waterman (1997) defined four broad categories of benefits from student involvement in service learning:

1. Enhancement in the learning of material that is part of the traditional in-school curriculum;

2. Promoting personal development;

3. Fostering the development of civic responsibility and other values of citizenship; and

4. Benefits accruing to the community.

One area missing in the literature is the use of capstone projects in service learning and especially IT projects. Wei, Siow, and Burley (2007) conducted a comprehensive literature review of service learning within IT projects. They identified only a few articles applying service learning concepts to IT education (Johnson & Johnson, 2005; Guthrie & Navarrete, 2004; Wilcox & Sigurs, 2003; and Lazar & Preece 1999).

Description of the Joint Course Service Learning Project

During the delivery of one TSTM capstone project in the spring 2008 semester, the project leader wondered how he and his project team were going to be able to meet the needs of their community partner who wanted a PC training program for their resident senior citizens. Because this project leader was in the capstone course in the TSTM program, he had experienced the development of different training programs when he took the TSTM corporate development and training course. He decided that current students in this TSTM course would benefit from providing hands-on training for a real group of people rather than simulating training. He recruited a team from the concurrent class who developed a beginning PC familiarization course under the direction of the senior project management team. Students then delivered the training over a five week period. His innovative and creative solution to the needs of the senior citizens resulted in a very successful service learning project.

In the case of this specific joint course service learning project, which we are using in this action research study during the fall 2008 semester, the same community partner requested that we continue the partnership by expanding on the success of the earlier project. The first two elements for structuring a successful project as described by Berman (2006) were met when we agreed to continue the partnership during the fall 2008 semester. The next two elements were built into the capstone project management class as delivered in previous courses. What we've added to the project this semester is the fifth element – fostering reflective learning throughout the project. In previous classes, the reflective element was not a critical part of the learning objectives. We had only asked the students to report on what they had learned. The other part that makes this particular project different from previous capstone projects is the use of students from two different courses. The project management class team will interact with the client, analyze the project need, plan the project, and oversee the actual training portion. This team will lead the project. The corporate training and development students will design and conduct the training for the senior citizens. Both teams will be evaluated by the client.

Action Research Method

Buchen (1998) described an action research framework that is useful for constructing and evaluating a project such as the cooperative joint course service learning project for PC training for senior citizens. We were pleased with the initiative taken by students during the spring 2008 semester and wanted to learn why the project was so successful and how that success could be replicated in other service learning capstone projects. We also wanted to learn how we could improve our current program to meet the changing needs of existing and potential community partners. Action research as a discovery process was selected as the best approach. The action research process includes the research topic, the research design, the data collection and analysis, the findings and conclusions, and communications and dissemination of the project findings (Buchen, 1998). The process for this research study follows.

- *Research topic* – The purpose of this research is to study the potential benefits of a cooperative joint service learning project to meet the expanded needs of one community partner, to improve the learning outcomes

of our students, and to improve the academic aspects of TSTM's capstone and training systems courses.

- *Research design* – We are using a baseline set of data from the capstone project management courses over the last four years and the one joint project during spring 2008. A pre-test, adapted from Eyler & Giles (1999), will be administered to students in both the project management and training systems courses to assess previous experiences and beliefs about service learning activities, current skills and abilities, and perceptions about self. The post-test, also adapted from Eyler & Giles (1999), will assess the current service learning experience, including perceptions about what was learned, how learning occurred, value of community-based service-learning, expanded skills and abilities, and self-perceptions. This will provide a measurement of the expected learning outcomes.
- *Data collection and analysis* – We plan to use a variety of data collection techniques including student status reports and logs, interviews, questionnaires, and observation. We also plan to interview the key individuals from our community partner including their senior citizen clients who will receive the specific training. Based on the data, we plan to systematically analyze the data using both statistical analysis and qualitative story-telling.
- *Findings and conclusions* – Because the action research method is an inquiry process, we plan to use the research findings and implications to develop future research. We also plan to use the study findings to continue to improve our TSTM capstone and training systems courses as well as our technology curriculum.
- *Communications and dissemination* – We plan to report our findings both locally and nationally through related conference presentations and journal publications.

In this project, student reflection will vary in both classes. Reflection activities will include written and verbal weekly status reports, monthly individual written reflections, verbal reflection during team meetings, and written feedback and reflection through the peer review process at the end of the project. Each student in the project management course will also prepare an individual reflective journal over the length of the project.

We will use a variety of assessment and evaluation tools to determine the student grades in the project management course including periodic reviews of interim project assignments, a final report, the primary community partner's project evaluation and report, and peer feedback about individual and group performance and effort. We plan to use the following checklist for evaluating the student delivery of services adapted from Berman (2006):

Table 1

Evaluation Checklist for Joint Service Learning Fall 2008 Project

Observable Indicators	**Very good - 5**	**So-so - 3**	**Poor - 0**
Comes to project site prepared			
Focuses on the day's task			
Is on site the majority of work time			
Listens to team members attentively and actively			
Keeps detailed log as necessary			
Helps with the task, does fair share			
Encourages team members to persist			
Invites team members to participate			
Celebrates success with team members			

Adapted from Berman, 2006, p. 189.

We plan to use the following table, adapted from Berman (2006), to assess the student benefits in the service learning project. Both project management and training systems students will be assessed. We plan to define the specific assessment tools and study findings during the analysis.

Table 2

Benefit Assessment for Joint Service Learning Fall 2008 Project

Type of Benefit	Specific Benefit	Assessment Tool Study Findings
Content learning	- In-context learning	
	- Enhance learning in breadth and depth	
	- More enduring learning	
	- Transfer of learning to new situations.	
Personal development	- Perception of self as service giver	
	- Enhanced willingness to take risks	
	- Openness to new people and experience	
	- Leadership, communications, and teamwork skills	
	- Exposure to and acceptance of different society groups	
	- More empathy – less judging.	
Cognitive skills	- Deepened understanding of concepts	
	- Enhanced transfer of learning	
	- Brainstorming	
	- Problem solving.	
Community connections	- Awareness of community problems	
	- Awareness of service organizations	
	- Enhanced civic responsibility.	
Life skills	- Knowing when to ask for help	
	- Knowing when to offer help	
	- Knowing how to find help	
	- Finishing a job that is started	
	- Following rules and directions	
	- Promoting personal safety	
	- Self-evaluating	
	- Deferring gratification	
	- Communicating clearly and precisely.	

Adapted from Berman, 2006, Figure 0.1, p. xxviii.

Potential Contributions to Field

We expect the findings from this action research project to contribute to the areas of business education, service learning, and capstone IT project management in the following ways:

- First, this project links service learning and an undergraduate IT curriculum, which has not been traditionally a service learning area;

- Second, assessment of the coordinated cross course collaborative model will add another possible curricular implementation for service learning projects in applied IT courses; and

- Third, findings will be shared on the effectiveness of the cross course collaboration model on addressing one community partner's ongoing needs. Results may have implications for faculty and administrators of capstone IT programs on changing the structure of courses when working long-term with community partners and their changing needs.

The results-to-date of this action research study will be presented at the 2008 National Delta Pi Epsilon Conference in November in Chicago IL.

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Owner Characteristics and Information Technology Use in Small Firms

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Abstract

Similar to large businesses, small firms have been using information technologies (IT) to support various aspects of business operations. However, small businesses have often been criticized for using IT mainly for routine, operational tasks, instead of using IT for more strategic purposes. Reasons for this include lack of top management/owner vision and lack of computer experience/expertise. This study investigates the relationships between levels of IT use in small firms and owner characteristics, including owner's IT knowledge, involvement and perception, by comparing small firms that exhibit varying levels of sophistication in their IT use.

Study Background

Small businesses have often been credited for driving economic development and employment growth in the U.S. According to the Small Business Administration (2003), small and medium enterprises (SME) contribute to about half of the private sector's output, and about half of the country's private sector employees work in small businesses. While an important economic force in the U.S., small businesses often fail due to a variety of reasons such as liquidity and financial issues, market development problems, and poor management (Toftoy & Chatterjee, 2004; Wu & Young, 2003). One of the most critical challenges and a major growth barrier for small firms is their limited financial resources (SBA, 2000). Therefore, SMEs must use their resources wisely to effectively leverage their investments, including those in information technology.

In the last twenty years, information technology has become an essential part of business operations, even for small businesses. While the positive impacts of IT on small businesses—from helping small firms enhance their operational efficiency (Beheshti, 2004; Penhune, 1998) to driving business growth (Eckhouse, 1998), to integrating marketing operations with marketing strategies (Roge & Chakrabarty, 2002)—are well documented, small firms are often described as lacking in sophistication in their IT use (Bridge & Peel, 1999; Hassan & Tibbits, 2000; Igbaria, Zinatelli, Cragg, & Cavaye, 1997; Lin & Wu, 2004). Specifically, small firms were found to use microcomputers mostly for operational tasks—such as accounting, payroll, budgeting, production and sales planning, and stock control activities—rather than for managerial activities such as strategic analysis, investment appraisal, market research, and cash flow and profit forecasting. In addition, small firms tend to focus on short-term operational efficiency instead of using IT for business planning, supporting business strategies, monitoring business performance, and improving competitive advantage (Temtime, Chinyoka, & Shunda, 2003).

What factors contribute to the less than optimal use of IT in small firms? Kyobe (2004) studied IT adoption in small firms and found lack of top management/owner vision, lack of computer experience/expertise, poor planning, and inability to identify strategic use of IT as inhibitors of strategic utilization of IT. Other IT adoption studies (Cragg & King, 1993; Igbaria et al., 1997; Lee & Runge, 2001) found that small business owners' innovativeness, knowledge and perception of the relative advantage of using IT played a critical role in IT adoption decisions

Research Questions and Study Method

Given the importance of owner characteristics on IT use, this study aims to examine the relationship between owner's IT knowledge and perception and the level of IT sophistication in SMEs. The following are the research questions of this study:

1. Do owners of small firms with different levels of IT sophistication differ in their IT knowledge and involvement?
    - o H1a: Owners of firms with higher IT sophistication are more knowledgeable in IT than those with lower IT sophistication.
    - o H1b: Owners of firms with higher IT sophistication are more involved in IT implementation and management than those with lower IT sophistication.

2. Do owners of small firms with different levels of IT sophistication differ in their IT perception?
    - o H 2: Owners of firms with higher IT sophistication perceive IT to be more important to their business than those with lower IT sophistication.

By comparing characteristics of small firm owners, this study seeks to determine the impact of owner characteristics on IT use in small firms.

Data for this study was based on input from small business owners (businesses with fewer than 500 employees). The survey method was used to collect input from small business owners in three Midwestern states. The sample was selected from the ReferenceUSA database. Two information-intensive industries, financial services and manufacturing, were selected given their use of information and communication technologies for processing relatively high volumes of information (Chan, Huff, Barclay, & Copeland, 1999; King & Pollalis, 2001). Two criteria, firm size and industry classification, were used in the sampling process. Small businesses in the following NAICS codes (first two digits) were randomly selected: financial services–52 (521 monetary authorities were omitted) and manufacturing–32 and 33. While this study adopted the standard categorization of small-medium enterprises (500 or fewer employees), the survey included a "number of employees" question to aid classification of firms in data analysis.

The data collection instrument was a two-page questionnaire on the types of IT currently adopted, the business owner's IT knowledge and involvement in IT implementation and management, and the owner's attitude toward IT. The questionnaire and a stamped return envelope were mailed to the owners or managers of the randomly selected businesses. A personalized cover letter explaining the study purpose and the voluntary and anonymous nature of the survey was attached to each questionnaire. Two months after the initial mailing of the questionnaires, a reminder postcard was sent to the selected businesses. A total of 217 usable responses were received. The response rate was 11%. The content validity of the survey instrument was established based on an extensive review of the literature and was refined based on feedback from colleagues. The internal consistency of the instrument was established using Cronbach's alpha which yielded an alpha of .894.

Data from the survey will be used to test the strength of relationship between the identified factors (owner IT knowledge, owner IT involvement, and owner IT perception) and IT use.

Expected Study Outcomes

Expected findings from this study should enhance current understanding of IT utilization in small firms and its relationship with owner influence. While the topic of IT use in small firms has been explored in various research studies, particularly in the area of e-commerce adoption in small firms (e.g., Grandon & Pearson, 2003; Martin & Matlay; 2003), this study focuses on the relationship between business owner characteristics and level of IT use. Such findings should add to existing literature on IT use in small firms

Audience

Since many business graduates find employment in small and medium enterprises and/or become entrepreneurs, it is important for business educators to include the study of small businesses in information technology classes to better prepare these students for the unique circumstances and challenges of small businesses.

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PART IV
TRAINING SESSION PAPERS

Evidence-Based Business Teacher Education Programs: Strategies to Synthesize Scientific Research Effectively

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Abstract

There is a recent movement at the federal level, named evidence-based reform, which calls for the use of evidence, obtained from rigorous scientifically-valid research, as the foundation for the development of effective educational programs and practices. The purpose of this study was to provide individuals involved in business teacher education programs with strategies to synthesize scientific research effectively that would serve as the basis for the creation of effective educational programs and practices with the ultimate goal of improving student outcomes. The following research design issues are discussed: minimizing bias, matching versus random assignment, sample size, outcome measures inherent to experimental treatments, duration, differences in pretesting, matched studies, and randomized quasi-experiments versus randomized experiments. Recommendations for improving the practice of business education research syntheses on instructional programs and practices are given.

Introduction

Teacher preparation programs in the United States face increased demands for accountability by state and federal organizations, parents, and the community at large. A primary concern is satisfying the requirements specified by the No Child Left Behind (NCLB) Act (Tacheny & Plattner, 2005). Consequently, educational institutions offering these programs are increasingly being held accountable for the graduates they produce (National Council for Accreditation of Teacher Education, 2006).

Business teacher education programs have always been expected to demonstrate that their candidates possess knowledge, skills, and professional attitudes (National Business Education Association, 2007). However, a more challenging trend, resulting from revisions made to accreditation standards, focuses on demonstrating candidate impact on K-12 pupil learning. This increased accountability has a direct impact on the way business teacher education programs are adopted, implemented, and evaluated (National Council for Accreditation of Teacher Education, 2006), as program evaluations must yield unbiased, reliable, and meaningful information (Slavin, 2008).

While certain fields (e.g., agriculture, medicine) use formal, scientific evidence to support the adoption of more effective educational practices, the field of education does not necessarily follow this trend. Quite often, the evidence used to support certain educational practices is based upon anecdotal trends and fashions, ignoring evidence from well-designed formal, scientific research (Slavin, 2002, 2008). However, there is a recent movement at the federal level, called *evidence-based reform*, that calls for the use of evidence, obtained from rigorous scientifically-valid research, as the foundation for the development of effective educational programs and practices (Slavin, 2002, 2008; Towne, Wise, & Winters, 2005).

The main requirement for evidence-based policy is "the existence of scientifically valid and readily interpretable synthesis of research on practical, replicable education programs" (Slavin, 2008, p. 5). Consequently, the first challenge before educational stakeholders is to agree on what constitutes "scientifically valid" educational research. In response to this challenge, the United States Department of Education has sponsored several projects to synthesize research on educational programs. Two examples of these projects include the No Child Left Behind Act (United States Department of Education, 2002a) and the Institute for Education Sciences (United States Department of Education, 2002b).

Adding complexity to the challenge of being able to synthesize research effectively is the fact that the research methods used to develop syntheses vary in dramatic ways, leading to inconsistent findings about the type of evidence that is necessary to consider instructional programs and practices effective. Needless to say, skepticism emerges as a result of this inconsistency (Slavin, 2008). While several researchers have agreed that synthesizing scientific research is nothing but conducting meta-analyses (Lipsey & Wilson, 2001), a unique set of characteristics and procedures must be followed to effectively synthesize scientific research (Slavin, 2008). Some of these characteristics include using rigorous research methodologies to arrive at valid conclusions; understanding that the number of studies of most programs is small, as it is extremely difficult to correlate study characteristics with effect sizes because of the small number of studies of each program; and avoid biases derived particularly from flawed research studies (Torgerson, 2006).

As a result, researchers must look for studies that use sound research methodologies that generate the best evidence that can be used to support the contention that instructional programs and practices have a positive impact on student outcomes. While consistent research procedures are critical, following formulas without paying attention to the circumstances surrounding each study can lead to a serious error (Briggs, 2005). Successful measures of accountability must be developed because they are critical for the creation of evidence-based business teacher education instructional programs and practices in an attempt to improve student outcomes (Gaytan, 2006).

Strategies for Synthesizing Scientific Research

The following strategies can be used by business teacher educators to synthesize scientific research effectively with the ultimate goal of improving student outcomes.

Minimizing Bias

While program evaluations that are large-scale, random, and multi-year, are relatively easy to conduct; evaluating business education instructional programs and practices represents a more significant challenge because of the small number of studies, lack of randomization in several studies, and the lack of multi-year evaluations. Individuals in charge of synthesizing business education research must be strict on factors with potential for bias. These factors may include failing to control for pretest differences, "including findings from measures made by the experimenter to assess outcomes taught only in the experimental group has substantial potential for biasing outcomes in favor of the experimental group" (Slavin, 2008, p. 7).

Matching Versus Random Assignment

Random assignment is critical to the validity of a given study because it eliminates initial selection bias. Some researchers (Agodini & Dynarski, 2004; Glazerman, Levy, & Myers, 2002) found that the use of covariates could reduce but not eliminate differences between randomized and matched studies. In addition, some other researchers (Slavin, Lake, & Groff, 2007) used effect size estimates, already adjusted for pretests and other covariates in each study, and found identical estimates of program effects for random and matched experiments. Torgerson (2007) synthesized the findings of five literacy intervention meta-analyses studies that separately reported effect sizes for matched and random studies. Four of the five studies reported very similar effect sizes for random and matched studies (Slavin, 2008). However, experimental studies using random assignment sometimes obtain results different from those found in similar matched studies.

In conducting syntheses of research, business education researchers must take into account that just because the author of a study claimed to have used random assignment, it does not mean that it actually took place. A countless number of experimental research studies are small, brief, and with major threats to internal and external validity. For instance, Kulik (2003) synthesized computer assisted instruction research and "included several studies in which the treatment duration was a few hours. Such brief treatments may be appropriate for laboratory experiments, but they do not inform educators about the likely impact of practical programs" (Slavin, 2008, p. 9).

In summary, while random assignment does not guarantee validity (Gay, Mills, & Airasian, 2006), randomization eliminates selection bias which is essential in the development of research syntheses, particularly in academic areas in which there is a small number of studies (Boruch, 2006).

Sample Size

Many research studies use sample sizes that are very small, leading to inadequate statistical analyses, confounding problems, and biases because sample sizes have the potential of making a major difference in effect sizes. For instance, studies with small sample sizes tend to be biased in favor of the experimental group because those with null or negative results are more difficult to find than studies that used larger sample sizes. Research studies with small sample sizes tend to have more extreme effect sizes because variables (e.g., a given teacher) can have a great impact on the results. On the other hand, studies with larger samples have a tendency of leveling out the effect sizes (Givens, Smith, & Tweedie, 1997).

In addition, studies with small sample sizes with zero or negative effect sizes are less likely to be published or reported than studies with larger samples and, therefore, represent "missing studies." (Sterne, Gavaghan, & Egger, 2000). In an attempt to respond to this challenge, educational researchers (Taylor & Tweedie, 1998) have used a "trim and fill" procedure to "estimate the number of presumed missing small studies with negative or null outcomes to balance against the excessive estimates from the small studies with positive effects that were therefore published" (Slavin, 2008, p. 10). While publication bias is a real challenge when dealing with studies with small sample sizes, it does not mean that studies with small sample sizes are naturally biased. The problem begins when researchers attempt to synthesize several of these studies that used small sample sizes (Rothstein, Sutton, & Borenstein, 2005).

In summary, business education researchers may obtain more reliable information from conducting large, prospective matched studies than from smaller randomized studies. It would reduce biases that can lead to invalid conclusions. Researchers should highlight large, randomized studies when conducting research syntheses on instructional programs and practices (Slavin, 2008).

Outcome Measures Inherent to Experimental Treatments

A difficult challenge experienced by researchers when conducting synthesis of research is to appropriately handle studies in which outcome measures assess skills being taught

only to the experimental group, increasing the possibility of generating results with potential bias towards positive effects (Slavin, 2008). Consequently, those studies should be excluded from research synthesis on instructional programs and practices. For instance, whenever researchers use non-standardized versus standardized tests (Ysseldyke et al., 2003), the results show that effect sizes are much more positive on the non-standardized tests. Researcher-made tests are designed to assess outcomes taught in the academic program but are unfair to students exposed to different content (Slavin, 2008).

Duration

A minimum time duration for research studies must be established by business education researchers and used in the decision to either include or exclude studies in a syntheses of research. Generally speaking, brief research studies have low external validity and should be excluded from syntheses of research. Business education researchers must concentrate on research syntheses on instructional programs and practices that include studies related to practical programs that can be used over extended periods of time, avoiding impractical procedures that are impossible to replicate for extended time periods (Slavin, 2008).

Differences in Pretesting

Pretesting is an important predictor of posttests, particularly in studies related to academic achievement. In the event that pretest differences are small, statistical analyses such as regressions, ANCOVAs, or hierarchical linear modeling can be used to control for those differences (Gay, Mills, & Airasian, 2006). Large pretest differences cannot be adequately controlled because the distributions may be very different. For instance, ANCOVAs tend to either over- or under-control pretest differences (Shadish, Cook, & Campbell, 2002). In summary, if pretest differences are greater than one half a standard deviation, studies should be excluded. In addition, non-randomized studies without pretests that indicate initial variable equivalence should also be excluded. Posttest effect sizes must always be adjusted for pretest differences. If adjusted posttests are not available, pretest effect sizes must be subtracted from their posttesting counterparts (Gay, Mills, & Airasian, 2006).

Matched Studies

If the control and experimental groups are designated in advance, the matched study design is called *prospective*. On the other hand, if the control and experimental groups are determined after the fact, it is classified as a *retrospective* design. These two types of matched studies are very different in nature and have different impact on program evaluations. For instance, retrospective matched studies may be biased in favor of experimental academic programs because they:

> usually report outcome data selected from many potential experimental and comparison schools and may therefore report on especially successful schools using the program or on matched control schools that happen to have made particularly small gains, making an experimental group look better by comparison. The fact that researchers in retrospective studies often have pre- and posttest data from state test scores readily available on hundreds of potential matches, and may deliberately or inadvertently select the schools that show the program to best effect, means that readers must take results from after-the-fact comparisons with a grain of salt. (Slavin, 2008, p. 10).

Comprehensive reviews of research on elementary and secondary math programs have been conducted (Slavin & Lake, 2007; Slavin et al., 2007) and the findings revealed that retrospective matched studies had effect sizes nearly doubled those of prospective design. The problem with retrospective designs is that, because they are after the fact, only the "survivors" are included in the study, marginalizing participants that might have dropped the program.

In summary, business education studies in which the control and experimental groups are matched effectively at the time of pre-testing may be included with much caution. If a sufficient number of randomized and prospective matched studies are available, this category should not be included in syntheses of research (Slavin, 2008).

Randomized Quasi-Experiments Versus Randomized Experiments

In a randomized experiment, subjects are randomly assigned to treatments in a process called cluster randomized trials (CRTs). For instance, schools, teachers, or classes are randomly assigned to treatments. Analyses of covariance using cluster (e.g., schools or classes) means or hierarchical linear modeling (Raudenbush, 1997) are the two most suitable methods to analyze the CRTs. However, researchers are confronted with a major challenge because CRTs may require a nearly impossible scenario of at least 40 clusters for adequate statistical procedures (Raudenbush, 1997). In responding to this challenge, researchers use a fixed hierarchical linear modeling (e.g., analyze at the student level) to produce similar results. While this course of action is not generally recommended by researchers (Donner & Klar, 2000) because it overstates statistical significance, it works rather well for program evaluation synthesis because effect sizes are unbiased (Raudenbush & Bryk, 2002).

Recommendations

This section provides recommendations for improving the practice of business education research syntheses on instructional programs and practices.

1. Consult educational research synthesis efforts that are reputable in an attempt to become familiar with effective ways of conducting syntheses of educational research. For

instance, the *Best Evidence Encyclopedia* has been produced by the Center for Data-Driven Reform in Education, which is funded by the United States Department of Education and headquartered at Johns Hopkins University. Summaries of research syntheses are available on its Web site found at www.bestevidence.org. Another reputable source is the *What Works Clearinghouse*, endorsed by the United States Department of Education, which provides synthesis procedures in great detail on its Web site found at http://ies.ed.gov/ncee/wwc/.

2. Exercise caution when interpreting reviews, particularly when the issues of quantity versus quality and statistical significance emerge. While it is true that a particular program that is supported by a large number of studies provides stronger evidence than a program with a few studies, business education researchers must be reminded that a synthesis that includes a large number of studies may include too many small studies that may be flawed or may have small effects. Regarding the use of statistical significance, while it can be used to classify outcomes, it tends to favor large studies which, once again, may have very small effect sizes.

3. Include well-designed matched studies because they tend to produce similar results as randomized studies (Torgerson, 2007). While it is ideal for business education researchers to concentrate on large randomized studies, only a few studies fall under this category and some of them may be very small. Consequently, well-matched studies should be included.

4. Pay much attention to effect sizes. A series of experiments should be synthesized in terms of a mean effect size because it provides a common metric for all programs to indicate differences between experimental and control groups in percentile ranks. Once again, a potential problem is that a program mean effect size can be misleading because the number of studies may be small, or the studies themselves are very small, or flawed. In other words, a mean effect size for a given program does not necessarily indicate the degree of confidence behind the number. "In principle, a single, small, flawed study could give an inflated effect size that would look much more positive than the evidence from dozens of large, high-quality studies" (Slavin, 2008, p. 12).

5. Ensure that syntheses of educational research must be able to provide policy makers, researchers, and practitioners with a clear road map to program effectiveness that can be tailored to specific educational contexts such as the time and place a given program would work, the conditions that must be present to maximize program characteristics, and the type of stakeholders that need to participate to make it work effectively (Briggs, 2008).

Conclusion

Teacher preparation programs in the United States face increased demands for accountability from multiple stakeholders. Business teacher candidates are expected to possess extensive content knowledge as well as an ability to deliver appropriate content to their pupils. Perhaps more than ever before, it is essential to effectively synthesize business education research in an attempt to provide researchers, policy makers, and practitioners with valid and trustworthy information with the ultimate goal of improving student outcomes.

Syntheses of educational research must be unbiased, valid, clear, trustworthy, and should conclude with a section in which gaps in researchers' understanding about the effectiveness of the program and the generalization of its effectiveness are addressed. Business education researchers must understand the most important factors involved in program syntheses that are used to interpret conclusions effectively to ensure that other researchers, policy makers, and practitioners thrust the validity of the information being provided by such program syntheses.

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How to Get Published

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Journal of Applied Research in Business Instruction
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The Delta Pi Epsilon Journal
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Abstract

Faculty working toward tenure and/or promotion often feel the pressure of the need to "publish or perish." Even after determining a topic, completing the research, and writing the paper, the publication process can be a daunting experience. The current editors of the DPE publications will outline the manuscript submission standards, editorial review board process, and evaluation criteria as well as offer suggestions to ensure your publication success. Prolific authors are invited to share their experiences and expertise.

Session Outline

I. Introduction
   a. Meet the Editors
   b. Session Overview

II. Manuscript Submission Standards
   a. Matching a Manuscript to a Journal
   b. Ensuring Appropriate Format: Style and Length

III. Editorial Review Board Process
   a. Blind Review by Content-Area Experts
   b. Timeline Based on Manuscripts in Progress
   c. Compilation of Reviewers' Feedback
   d. Second Review Does Not Guarantee Publication

IV. Evaluation Criteria
   a. Content
      i. Contribution to Journal's Scope
      ii. Clearly Stated Purpose Supported by Literature
      iii. Quality Research/Instructional Methods Outlined
      iv. Cited References Credible and Applicable

   b. Writing Style
      i. Content Well Organized and Presented Logically
      ii. Writing is Clear and Easy to Understand
      iii. Reader's Attention is Maintained
      iv. Acceptable Mechanics; APA Style

   c. Reviewers' Recommendations: What They Mean
      i. Accept
      ii. Conditionally Accept
      iii. Revise and Resubmit
      iv. Reject

V. Suggestions to Ensure Publication Success
   a. Demonstrate the Topic's Relevance to Business Education
   b. Add a "New Brick" to the Wall of Knowledge
   c. Use Headings and Subheadings to Organize the Content
   d. Provide Practical Applications or Suggestions for Further Research
   e. Ensure Every Citation is Referenced and Every Reference is Cited
   f. Check for Correct Use of APA Style Throughout Manuscript
   g. Ask a Colleague to Review Your Manuscript Before We Do

VI. Summary: Q&A

Social Entrepreneurship and Cross-Cultural Research Activities in Developing Economies: Strategies for Business Educators

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Abstract

Social entrepreneurship uses innovation to address basic needs such as water, food, health care, and education. These enterprises are most successful when ongoing partnerships among business, government, and non-governmental entities exist. Expanded telecommunication availability combined with increased economic interdependence provides a foundation for needed cross-cultural research. The ability to assess geographic, economic, cultural, and political influences on qualitative and quantitative research in developing economies has a growing demand. Adaptation of emerging research methods, such as ethnography, projective techniques, diary use, and "shopping with consumers," will develop a better understanding of attitudes and behaviors in varied cultural environments.

Background

In recent years, expanded concern for people in less fortunate economic settings has resulted in: (1) growth in social entrepreneurship, which attempts to use innovative and practical methods to address basic needs such as water, food, health care, and education; and (2) increased needs for cross-cultural research activities. Various causes and benefits of the social entrepreneurship, microenterprise, and microfinance movements as they relate to economic and business development are evident. In addition, an emphasis on research strategies for varied cross-cultural settings of developing economies continues to gain in importance.

The failure of government aid programs and other industrialized-nation economic plans point to need for localized enterprises adapted to geographic, cultural, and political environments. To achieve this end, research efforts must occur in the surroundings in which the proposed business activities will take place.

Social Entrepreneurship

Social entrepreneurs are as varied as the concerns they address. However, a common bond is the ability to combine very limited resources with innovative managerial strategies. In addition, these enterprises often combine the efforts of varied parties to form effective partnerships. Government is often involved, but in some settings years of instability and corruption result in no interaction with the public sector.

Many social entrepreneurs lack traditional business training. Instead, their visions surface from other disciplines, such as medicine, engineering, law, education, transportation, agronomy, and sociology. The result is quite often a new business model that addresses human and social needs in a particular cultural setting.

Adapting Research Methods for Cross-Cultural Settings

Geographic, cultural, economic, and political factors have a strong influence on research activities. These environmental factors are especially significant in developing economies, which often have a setting quite different from industrialized countries. Adaptations of various qualitative and quantitative research methods must often occur.

Geographic Factors

Data collection logistics and sampling is often affected by geographic location, climate, terrain, and waterways. The availability and location of natural resources and agriculture can also influence proximity and participation of respondents.

Cultural Situation

The foundation of cultures, including traditions, values, religion, education, foods, and music must be addressed when planning and implementing research. Social customs such as family connections and the role of women will likely affect interactions and responses.

Economic Environment

Level of economic development is often a foundation element in research design planning. Infrastructure, inflation, exchange rate, technology, and major industries will sway the selection and implementation of data collection activities.

Political Setting

In addition to political stability and corruption, the regulatory environment of a society can have a profound affect on the research process. Business rules, tariffs, and government restrictions must be considered.

Evolving Research Methods

While traditional methods of interviews, surveys, focus groups, and observational research are often adapted to research settings, other investigative techniques are surfacing.

Ethnography

Narrative documentation and descriptive reports of cultural settings for business research continue to gain use. These field research methods, adapted from cultural anthropology, with an emphasis on participant observation and systematic recording of behaviors can enhance insight into the daily activities and motivations of a society.

Projective Techniques

The use of third person, indirect questioning can provide information that go beyond surface-level responses. The most commonly used projective techniques are: word association, sentence completion, story telling, and photo or cartoon interpretation. Interpretation of results is often difficult especially with an added dimension of cross-cultural settings.

"Shopping with Consumers"

This naturalistic data collection process involves researchers escorting respondents during their shopping activities. "Shopping with Consumers" combines this process with in-depth interviews creating a multi-method research design, similar to ethnography. This approach may also be adapted to other types of behavioral incidents.

Instructional Strategies

Several categories of learning experiences may be considered for social entrepreneurship and cross-cultural research. These include resource assessment, field research activities, and team projects.

Resource Assessment

Student interaction with resources can provide several benefits including an ability to evaluate the objectivity and relevance of the content.

1. Journal Article Summary, Evaluation. Using a journal article involving data collection in a different cultural setting, students are asked to summarize research key procedures and findings. They also appraise strengths and weaknesses to suggest improvements in the methodology. This experience allows students to better plan and implement their own research activities.

2. Website Review. In a similar manner, students are assigned a website related to social entrepreneurship or cross-cultural research. Guidelines are developed to assess the value of this resource for class use and research activities.

3. Map Exercise. After locating online country and regional maps, students should research and identify these factors that can affect social entrepreneurial opportunities and research activities: (a) geographic features, (b) economic factors, (c) cultural situation, (d) political environment, (e) major imports and exports, and (f) regional trade relations.

Field Research Activities

Student interactions with respondents can provide a valuable experience for both the research process and for gathering cultural information.

1. Interview. One-on-one interviews (in person, on the phone, or by e-mail) provide an important experience for improving research abilities. Offer student guidelines when creating open-ended questions to achieve research goals. Encourage the use of probing and clarifying techniques. When conducting e-mail "interviews," stress the importance of contacting a specific person and to avoid questions with short answers or that can be answered by a web search.

2. Field Observations. Various settings are available to better understand cultural groups. Shopping in ethnic stores or attending festivals can provide insight into various attitudes and behaviors. Remind students to avoid being a distraction as that will taint the natural situation.

3. Ethnographic Simulation. This experience involves the use of texts, audio, and video to imitate a cultural setting. Students experience and react to daily events that might be encountered when conducting research. One source of this learning activity is *EthnoQuest: An Interactive Multimedia Simulation for Cultural Anthropology Fieldwork.*

Team Projects

Working in groups can be beneficial to both learning and preparation for organizational settings in the future.

1. Microenterprise Proposal. Based on country research, have students propose a business start-up in a developing economy. The components of the paper and in-class presentation may include: (a) obtaining preliminary country observations with regard to economic and social needs; (b) setting the project goals; (c) describing field research activities; (d) identification of local and global partners; (e) planning of funding sources and projecting revenue and

expenses; and (f) recommending action steps. (Note: A useful source of microenterprise examples is EMDAP – the Emerging Market Development Advisers Program: Business around the World website at www.emdap.org.)

2. Cultural Setting Video. As students better understand the influences of culture on social entrepreneurship and research activities, creation of a video may be considered. This presentation can be a combination of photos, video clips, and simulated interactions dramatized by students.

3. Simulated Community Event. To expand awareness on campus and beyond, have students plan an event that communicates a global concern. The various phases of this project may include: (a) identification of a situation, organization, or concern that requires media attention, public awareness, or actions; (b) research an organization related to this situation or concern that will serve as a resource and a basis for connections to take action; (c) develop an idea for a campus or community event to promote awareness/actions regarding this situation, organization, or concern; (d) describe target audience (demographics/ psychographics) for event; (e) summarize the steps to plan, promote, and implement this event; and (f) explain desired response/actions that should result from this event.

Needed Research in Developing Economies

The areas of social entrepreneurship and cross-cultural research provide the basis for some emerging research topics in varied settings, but especially developing economies. These include:

1. Social entrepreneurship: definitions, strategies, and effectiveness for improved economic development and business opportunities.

2. Strategic partnerships for social entrepreneurial efforts among business, government, and non-governmental organizations (NGOs).

3. Research method adaptation to varied cultures and economic environments.

4. Creation of new research methods using various technologies to capture the setting and responses.

Concluding Comment

A wide variety of frameworks, procedures, and resources are available to enhance business education teaching and research with regard to social entrepreneurship and cross-cultural research. Development of these concepts and skills will provide business students with an understanding of planning, researching, and implementing effective enterprises for improved economic development and increased quality of life for people living in dire settings.

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EMDAP (the Emerging Market Development Advisers Program): Business around the World (www.emdap.org)

Social entrepreneurship teacher resources handbook available at: www.ashokastore.org/Lessons/SocEnthandhook2008.pdf

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Threats to Research Validity

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Abstract

Threats to validity are frequently identified by reviewers and can affect the credibility of scholarly studies in business education. Common threats to research validity include selection bias, history, maturation, regression toward the mean, testing/response bias, nonrandom sample selection, sample size, and nonresponse bias. This paper discusses common threats to validity in research design and suggests strategies to overcome these threats and produce high-quality studies.

Introduction

Scholarly research is characterized by a myriad of methodological and technical details that require a researcher to be familiar with some of the most common threats to validity in research design. Effective researchers must be cognizant of the more common types of criticisms of research design, especially those applicable to the researcher's specific field of study, in order to overcome threats to validity and produce high-quality research. This paper discusses these threats to validity and suggests strategies for designing valid and appropriate studies in business education.

This paper answers the following questions:

1. What are the common threats to validity in research design?

2. What strategies can be used to address threats to validity and design high-quality studies in business education?

Threats to validity can weaken a researcher's evidence and can undermine the credibility of the study. Common threats to validity include selection bias, history, maturation, regression toward the mean, testing/response bias, non-random sample selection, sample size, and nonresponse bias.

Research Design and Validity

The adequacy of a research design is determined primarily by its validity. The two types of validity are internal and external validity. *Internal validity* is the most important type of validity; it exists when the researcher can establish a cause-and-effect relationship between the independent and dependent variables or a program and its outcomes. The *independent variable* is the group or type of treatment, and the *dependent variable* is the outcome that is being measured. *External validity*, or generalizability, affects all types of research but is a major concern in non-experimental studies such as surveys (Campbell & Stanley, 1963; Trochim, 2006). Randomized experiments have the strongest internal validity of the three most common categories of research (experiments, quasi-experiments, and surveys).

Experimental Designs

Experiments are characterized by the random assignment of individual participants (subjects) to treatment groups. Random assignment to treatment groups is an entirely different concept than random selection of a sample in survey research. Quasi-experimental and experimental designs are somewhat similar because in both types of designs a group of participants receives an experimental treatment and is compared to another group of participants that receive either no treatment or a different treatment. In a true experiment, however, the individual participants must be randomly assigned to treatments.

Quasi-Experimental Designs

In quasi-experiments the researcher assigns multiple intact groups (such as classes) to treatment groups. Quasi-experiments are common in educational research because researchers usually cannot control the assignment of individual students to classes or separate students within an existing class for random assignment to treatments.

Non-Experimental Designs

All other research designs may be classified as non-experiments, including various types of studies such as surveys, correlational studies, observational studies, and content analyses. Surveys involve selecting a sample from a larger population and asking the survey participants specific questions. Observational studies involve observing and measuring natural behavior or phenomena without any type of intervention or control group; for example,

ethnographic studies, global warming/climate studies, and econometric research. Correlational studies involve examining existing databases such as student records to determining the statistical relationships among various factors in the database.

Overcoming Threats to Validity

Overcoming threats to validity in research design is essential for all types of research, including business education. Eliminating threats to validity assists educators and researchers to provide useable research results that can be transferred from the research findings to the classroom and to other research projects. Careful research design allows researchers to make generalizations from the study to larger populations (Bartlett, Bartlett, & Reio, 2008). Common threats to validity include selection bias, history, maturation, regression toward the mean, testing/response bias, non-random sample selection, sample size, and nonresponse bias. Although non-experimental designs generally have less internal validity than experiments, a researcher can improve internal validity by carefully designing the study to control these threats (Campbell & Stanley, 1963).

Selection Bias

This threat to validity occurs in quasi-experiments because the experimental and control groups may not be equal. Because of selection bias, observed effects may be due to preexisting conditions such as IQ, age, or socioeconomic status rather than the treatment. Selection is also a major threat to validity in surveys and often occurs in convenience samples such as phone-in polls or voluntary participation in surveys at malls that may not represent the larger population.

History

This threat to validity occurs when nuisance variables such as teacher differences, interruptions, or absences affect participants in an experimental or quasi-experimental study. For example, several participants may drop out of a study, change schools, move, etc. History tends to affect longitudinal/multi-year studies more than studies of short duration.

Maturation

Maturation is an internal threat to validity that may occur when subjects change during the course of the experiment or between points of measurement. The researcher may not be able to determine if results are biased because of these factors. Maturation effects occur when the outcome is affected by non-treatment factors such as participants becoming older, tired, or bored. Pre- and post-tests can help identify maturation effects.

Regression Toward the Mean

This threat to validity refers to the phenomenon that extreme scores at one point in time tend to show less extreme scores on a similar instrument the next time they are tested, despite no additional preparation on the part of the participant. Many extreme scores happen to fall with or against the initial score, depending on whether the extreme score is extremely high or extremely low (Bland & Altman, 1994).

Galton (1886) discovered this phenomenon when studying parental heights in comparison to their offspring. Shorter than median height parents tended to have offspring who were taller and closer to the median than the parents and taller than median height parents tended to have offspring who were shorter and closer to the median. Successive generations tended to regress toward the mean. The same phenomenon has been observed in test scores such as IQ tests and other standardized tests. People who have higher or lower than average scores tend to score closer to the mean in successive assessments, particularly when the tests are administered in close succession. This effect can be mitigated in test-retest studies by using alternative forms of a test or by administering the tests at least several months apart.

Testing/Response Bias

Testing/response bias can affect the results of surveys when respondents answer questions according to the manner they believe the interviewer wants them to answer instead of answering according to the respondent's true views. Depending on how the surveyor is asking the questions (potentially angling for a desired answer) or if the respondent wants the surveyor to like them or think highly of them, the respondent may answer with a socially acceptable rather than honest answer. The potential for this type of response bias may occur because of question wording that reflects the researcher's bias. For example: "Because the legal age for voting and volunteering to die for your country by military enlistment is 18, don't you believe that people who are 18 should also be allowed to drink alcohol?" A better option would be to ask "Should people 18 years old be allowed to drink alcohol?" *The Authoritarian Spector* (Altemeyer, 1996) is an excellent source of information on developing unbiased questions.

Nonrandom Sample Selection

When a sample is selected in a nonrandom manner, the researcher should justify the logic of why the sample was chosen. For example, when studying the behavior of English language learners, the researcher should select schools that have large populations of those students. When studying phenomena applicable to all socioeconomic groups, the researcher should select a sample of students reflecting a wider diversity. Selecting classes taught by only one teacher or students in only one class rather than random selection of students from a wider pool is generally preferable to selecting all students from just one class.

Sample Size

Using Cochran's (1977) sample size formula for survey research involves two elements: first, a researcher must determine the acceptable margin of error for the study; second, the alpha level

for the study. In education studies alpha is usually 5%, or the 95% confidence level.

For example, a researcher employs a five-point Likert scale survey instrument. The researcher must determine the standard deviation associated with the scaled instrument and the number of standard deviations the researcher expects the majority of the population to fall within (68% within plus or minus one standard deviation, 95% within plus or minus two standard deviations, and 99% within plus or minus three standard deviations). Using Cochran's formula for the standard deviation yields:

$\underline{S}$ = (number of points on the scale) / (number of standard deviations)
$\underline{S}$ = 5 / 4 = 1.25

If the researcher determines that an acceptable margin of error is 5% given the estimate for the standard deviation above, the researcher can use Cochran's formula for estimating the appropriate sample size as follows:

$\underline{N}_o = [(t^2) * (S^2)] / d^2$

Where t is the t-value associated with the pre-determined level of alpha (0.05 or 0.025 over two tails: t = 1.96) and $\underline{S}$ is the estimated value of the standard deviation using the above estimation formula (1.25) and d is the margin of error the researcher will tolerate times the number of points on the Likert scale of the instrument (0.05 * 5) = 0.25

Utilizing the formula for sample size above:

$\underline{N}_o = [(1.96)^2 * (1.25)^2] / (0.25)^2$
= 96

Determination of the Mean as a Point Estimate. To determine the margin of error, the researcher should determine the acceptable level of alpha and assume an acceptable standard deviation. Use the following formula and solve for n:

Margin of Error = t-multiple * [(assumed standard deviation) / ("n)].

As an example, suppose an analyst at the state department of education wishes to estimate teacher salaries in a district. In the past, studies have found that the average salary is $45,000 with a standard deviation of $5,000. To find out how many people should be surveyed to yield a margin of error of $1,300 at the 95% level of confidence (t-value = 1.96), the analyst would use the above formula as follows:

1,300 = 1.96* [(5,000) /("n)]
n = 7.542
n = 57 rounded to the nearest whole person

To determine the average salary in the district of interest, 57 people should be studied. Determining the estimated standard deviation from a previous study and the assumed level of alpha are necessary assumptions an analyst needs to make in advance (Albright, Winston, & Zappe, 2004).

Adapted from a chart published by Bartlett, Kotrlik, and Higgins (2001), the following table indicates the appropriate sample size for various populations:

Table 1
Suggested Sample Sizes for Various Population Sizes

Sample Drawn from Population Size	0.05 level of alpha t = 1.96
100	55
500	96
1000	106
2000	112
4000	119
10000	119

Web-based calculators. The following web-based sample size calculators are suggested as resources:

http://www.surveysystem.com/sscalc.htm

http://www.raosoft.com/samplesize.html

http://www.macorr.com/ss_calculator.htm

http://www.custominsight.com/articles/random-sample-calculator.asp

Nonresponse Bias

Because survey respondents and nonrespondents may have different views, a high survey response rate is required to attain survey results that have adequate external validity and can be generalized to the population being sampled (Armstrong & Ashworth, 2000; Parashos, Morgan, & Messer, 2005). For example, a survey of 72 physicians involved in a pilot primary care prescribing group received an initial response of 74%. The nonresponders were contacted personally and convinced to complete the questionnaire; the nonresponders differed significantly from responders in their views.

An acceptable response rate is generally considered to be 66.66%. A lower response rate reflects some degree of bias that must be addressed by techniques such as comparing early and late responders.

Efforts to improve response rates in mailed surveys results include delivering the questionnaire multiple times, following

up with phone calls or personal visits, creating a short questionnaire (because response rates fall as the number or difficulty of questions increases), providing paid response vehicles such as a postage-paid envelope, including an addressed envelope, sending the questionnaire on official stationery (such as university letterhead), oversampling, or providing incentives for completion (this strategy may be criticized as an incentive to produce biased responses). E-mail surveys are also a viable delivery mechanism and responses can be validated using the time and date information on each e-mail response. E-mail surveys may yield a higher response rate than traditional mail surveys because e-mailing may be easier for the responder than U.S. mail.

To check for nonresponse bias, a researcher should compare the responses of early and late responders. For example, a survey of dentists found that late responders demonstrated different views than those who replied earlier. Slightly changing the format of one item at the beginning of the instrument used in a follow-up survey of nonrespondents can distinguish between early and late responders. Nonresponse bias is discussed in a recent article by Bartlett, Bartlett, and Reio (2008).

Oversampling. To correct for inevitable nonresponses, a researcher may send out more surveys than are minimally necessary to ensure that the responses yield the minimum number for the level of risk the researcher is willing to assume and the desired margin of error. *Oversampling* is a strategy that involves sending out more survey instruments than necessary for the minimum sample size. Strategies to aid in obtaining the expected response rate include conducting the sample in two steps and using the results of the first step to estimate how many additional instruments must be delivered in the second stage, using pilot study results, or using response rate estimates from previous or similar studies of the same or similar population.

Summary

Business educators can improve the quality of their research by addressing the common threats to validity in research design. Some of the common threats to research validity include selection bias, history, maturation, regression toward the mean, testing/response bias, non-random sample selection, sample size, and nonresponse bias. To produce high-quality research, business educators must incorporate appropriate strategies to avoid bias in research design.

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1946 MU: University of Tennessee, Knoxville, TN
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