ENHANCE LEARNING EXPERIENCES
IN AN ACCOUNTING CURRICULUM
WITH COMMUNITY-LEARNING PROJECTS

Yi-Miin Yen, Computer Information Systems Department, University of Alaska Anchorage,
  ylyen@uaa.alaska.edu
Soren Orley, Accounting Department, University of Alaska Anchorage,
  seorley@uaa.alaska.edu
Dennis Drinka, Computer Information Systems, Department, University of Alaska Anchorage, dedrinka@uaa.alaska.edu

Abstract

Accounting programs across the country have been challenged to better prepare students for the accounting profession. In contrast to the traditional approach to accounting education which stressed calculating one right answer, the new focus emphasizes dealing with unstructured problems and preparing students with real world experiences through experiential learning, community service learning and project-based collaborating learning. The Accounting Education Change Commission (AECC) notes that students should be active participants in the learning process and not passive recipients of information. This research-in-progress paper described the courses design in an accounting curriculum with community engagement projects and their theoretical background.

Keywords: community-based learning, project-based learning, accounting curriculum.
1 INTRODUCTION

Accounting programs across the country have been challenged to better prepare students for the accounting profession. In contrast to the traditional approach to accounting education which stressed calculating one right answer, the new focus emphasizes dealing with unstructured problems and dealing with preparing students with practical experiences through experiential learning, community service learning and project based collaborating learning. The Accounting Education Change Commission (AECC) notes that students should be active participants in the learning process and not passive recipients of information.

A pedagogic model of Relate-Create-Donate proposes that students need to work collaboratively to produce ambitious projects that are meaningful for someone outside the classroom has been explored in accounting curriculum to enhance learning experiences. These three components, Relate-Create-Donate, imply that learning activities:

1. occur in a group context (i.e., collaborative teams);  
2. are project-based;  
3. have an outside (authentic) focus.

The first principle (the "Relate" component) emphasizes collaborative efforts that involve communication, planning, management and social skills. The second principle (the "Create" component) makes learning a creative, purposeful activity. Students have to define the project (problem domain) and focus their efforts on application of ideas to a specific context. Project orientation is the essence of Problem-Based Learning approaches that are often used in medical and others types of professional education (Barrows & Tamblyn, 1980). The third principle (the "Donate" component) stresses the value of making a useful contribution while learning. Ideally each project has an outside "customer" that the project is being conducted for. In many cases, the projects can be work-related, i.e., an activity that fits into a team's occupational or career interests. The authentic learning context of the project increases students’ motivation and satisfaction. This principle is consistent with the emphasis on school-to-work programs in many school systems and colleges, as well as the "service" philosophy of contemporary corporate training efforts (Jacoby & Associates, 1996).

We consider the use of experiential community learning to promote this Relate-Create-Donate model will be better accomplished through a course based, credit-bearing educational experience. Therefore, there are two courses which are designed and developed in our Accounting undergraduate program requires students to (1) participate in an organized service activity in such a way that meets identified community needs and (2) reflect on the service activity in such a way to gain further understanding of course content, a broader appreciation of the discipline, and an enhanced sense of civic responsibility.

The first course is a senior level course, the Justice for Fraud Victims Project (JFVP), which utilizes a partnership formed to assist victims of fraud in the local community. Project collaborators include state, local, and federal law enforcement officials; local Certified Fraud Examiners (CFEs); and students and faculty of the College of Business and Public Policy from a local University. The Pilot Program first developed in consultation with Dr. Sara Melendy, who launched the original program at Gonzaga University in 2009, the JFVP pilot program began at our program in the fall of 2011 with a select group of students in a forensic accounting course. Supervised by the faculty and mentors from the local Chapter of the Association of Certified Fraud Examiners, students investigated allegations from cases referred by law enforcement.

The second course is a junior level course, Accounting Information Systems II (AIS II), which studies the Accounting Information System (AIS) as an integral component of an enterprise. The emphasis of this course is focus on the topics of accounting processes, data modeling and database design of accounting systems using the Resources-Events-Agents (REA) framework and computer-based system analysis and modeling tools as the springboard toward the design of an enterprise accounting
information systems. Students are required to apply the concepts and tools they learned from the textbook to work on the real-world student led accounting information systems analysis projects.

These two courses have been proven to be popular among students in developing career enhancing skills and abilities, and increasing student self-confidence and employability, all while providing useful products for the community in the past. Since its inception, the quality and difficulty of the projects and the satisfaction of the sponsoring organizations has been consistently increasing. We envisioned that the popularity of these courses can probably be attributed to its design is based on a long history of widely accepted community-engaged project based learning theories.

However, although the potential benefits of this course design based on these principles are, in theory, significant, so are the risk. Projects in this course can be considered successful from the students’ perspective only if they truly integrate and enhance their traditional academic experiences; and as a minimum from the community’s perspective, they can be considered successful only if they add value to that organization. Assessed learning objectives that are not met up to the expectations of either the students or the organizations cannot, in actuality, be considered successful. That is, while the learning theories supporting this course design are significant, their learning results need to be carefully measured and assessed. This research-in-progress paper described the courses design with community engagement projects and their theoretical background. The data collection and learning results assessment will be accomplished in the next stage of the full paper. In the background section we will review the theories that describe the benefits that can be realized though this challenging form of course design and that were used to guide its development. The course description section will present the learning objectives of the course and the tasks that must be accomplished by the students for successful project completion.

2 THEORETICAL BACKGROUND OF THE COURSE DESIGN

The design of these courses was consistent with the engagement theory for technology-based teaching and learning (Kearsley and Shneiderman, 1999). This theory has emerged from Kearsley and Shneiderman’s experiences teaching in electronic and distance education environments and has much in common with many of the well-known community and project based learning theories. The fundamental idea underlying this theory is that students must be meaningfully engaged in learning activities through interaction with others and with worthwhile tasks. Through engaged learning, all student activities involve active cognitive processes such as creating, problem-solving, reasoning, decision-making, and evaluation. In addition, students are intrinsically motivated to learn due to the meaningful nature of the learning environment and activities.

- **Community-based learning** is a pedagogy that embeds academic study into community service projects. Local community groups are in need of assistance while students are in need of real-world experiences that relate to their course material so that they might gain a better understanding of real issues and practices by working on actual problems and with nonacademic groups (Lazar and Preece, 1999). While benefiting the community through work performed, this type of learning also increases students’ understanding of their academic subjects by putting them directly in touch with what is being studied, as differentiated from learning in the abstract (Keeton and Tate, 1978). The student in an experiential learning situation learns from actually, directly, and actively working with the objects of learning, usually under controlled conditions and under the instructor’s supervision (Venkatesh and Small, 2002). John Dewey (1938), Piaget (1970) and Lewin (1951) have viewed learning as a continuous, adaptive process driven by experiences where the student is active and engaged with the subject matter at hand. Community-based learning is a productive way to introduce students into the social context of their studies. Learning becomes the product of participation in the actual practice, interactions and relationships that constitute the community-based project (Lave and Wenger, 1991).

- **Project-based collaborative learning** refocuses learning from short, isolated, teacher-directed activities, to activities that are student-directed, long-term, and interdisciplinary—all within a
team-based, collaborative framework. Collaborative learning refers to those methods of instruction where students work together to reach a common goal. Within the context of a community-based course, this collaboration is extended to include the owners and users of the project deliverables. The instructor is included in the collaboration in a supportive role. With collaborative learning, students increase their understanding and knowledge by sharing ideas with their team members and are dependent upon each other for project success. Project team members must work together in learning and knowledge building communities, exploring each other’s skills while providing social support and modeling and observing the contribution of each member (Jonassen, 1995). Project collaboration also contributes to students’ social learning through their observation of behaviors, attitudes, and emotional reactions of teammates, owners and users (Bandura, 1977), (LeJeune and Richardson, 1998). From the perspective of social constructivism theory, members of the community serve as active agents in the construction of outcomes and activities that produce a development cycle in the social setting (Shaw and Shaw, 1999).

Therefore, combining project-based learning with community-based learning integrates the benefits of both. In the next section we will describe the courses and their project requirements.

3 COURSE DESCRIPTION AND PROJECT REQUIREMENTS

3.1 The Justice for Fraud Victims Project (JFVP) Projects

This course will use forensic accounting techniques to investigate real cases that are brought to the class by various enforcement agencies (federal, state, city, etc.). Teams of students (usually three students per team) will work on each case to determine if a fraud has occurred and, if so, if it is prosecutable. In addition to the professor, the teams will be assisted by volunteers from various law enforcement agencies and by mentors from the local chapter of the Association of Certified Fraud Examiners (CFEs).

JFVP’s goal is to assist victims of suspected financial fraud in cases where forensic investigative services are limited or too costly. With the assistance and oversight of CFEs and state and federal law enforcement, students will assist victims in establishing the method by which a fraud was perpetrated and in quantifying the damages so the case can be prosecuted. Ultimately the goal is to assist the victims in obtaining justice if a fraud has occurred. At the same time, accounting students will obtain real world experience in the field of forensic accounting.

The JFVP incorporates problem-based service-learning by providing students an opportunity to meet an identifiable, unmet need in the Anchorage community. Through this practical application of forensic accounting, students will develop an awareness of the challenges faced by local fraud investigators and its broader social implications. Students will reflect on how this experience has influenced their own ways of thinking about social and ethical issues in business.

The course content will start with an introduction of investigative process, chain of custody, the forensic accounting report, etc. Then the teams will be formed and meet weekly with their CFE mentor to work on their assigned case. At the end of the semester, teams will prepare a written forensic accounting report for each case they investigate. In addition, a binder of supporting documents will be prepared for each case that includes all the schedules and details of the work that is referenced in the final report. It is important that each week the team should formally document your work in team’s binder. This is necessary so that when the case is turned over to the prosecutor, there is a record of the procedures that were performed and they can be verified by your CFE mentor if necessary.
3.2 The Accounting Information Systems II Projects

This course will use information system analysis techniques with REA ontology framework and approach, which looks at the relationship between an organization’s critical resources, events, and agents to help students study, analyze and document the real world Accounting Information Systems. REA, developed by Bill McCarthy of Michigan State University, is a framework for creating an enterprisewide database that can be used to retrieve information for multiple business purposes. The students will be asked to drilled down the high-level value system view to the more detailed value chain level and illustrated how the transaction cycles fit together to form the value chain which enables students to see the “big picture”. Then the course will prepare students (1) understand the underlying concepts, terminology, tools, and techniques of systems analysis, (2) be able to design and conduct interviews with system owners and users to determine business requirements, (3) document how the systems worked and develop feasibility assessments and study reports.

Through this real world community engagement project assignment, the course will enable its goal to help students develop intellectual skills, professional practical skills, and transferable key skills. Through these community engagement projects, the learning objectives which included but not limited to develop the ability of critical thinking, analysis and synthesis, the ability to identify assumptions, evaluate statements in terms of evidence, to detect false logic or reasoning, to identify implicit values, and to define terms adequately and to generalize appropriately with effective problem solving and decision making skills. At the same time, students will develop an appetite for reflective, adaptive and collaborative learning with the interpersonal skills for effective listening, negotiating, persuasion and presentation.

4 RESEARCH-IN-PROGRESS

As we describe earlier, this is a research-in-progress paper and the future work will be followed with learning objectives discussion, data collection and learning results assessment.

References