Eyler, J., Giles, D. E. Jr., & Schmiede, A. (1996). *A practitioner's guide to reflection in service-learning: Student voices and reflections*. Washington, DC: Corporation for National and Community Service.

Gillespie, J., Braskamp, L. A., & Braskamp, D.C. (1999). Evaluation and study abroad: Developing assessment criteria and practices to promote excellence. *Frontiers: The Interdisciplinary Journal of Study Abroad*, *5*(2), 101-127.

Gorsuch, R. L. (1983). *Factor analysis* (2nd ed.). Hillsdale, NJ: Lawrence Erlbaum.

Hill, J., & Woodland, W. (2002). An evaluation of foreign fieldwork in promoting deep learning: A preliminary investigation. *Assessment and Evaluation in Higher Education*, *27*(6), 539-555.

Hook, W. F., & Fern, P. S. (1983). Internships in social science: An historical perspective and suggestions for the future. *Innovative Higher Education*, *8*(1), 38-44.

Kinkead, J. (2003). Learning through inquiry: An overview of undergraduate research. *New Directions in Teaching and Learning*, *93*, 5-17.

Kolb, D. A. (1981). Learning styles and disciplinary differences. In A. W. Chickering et al. (Eds.), *Modern American college: Responding to new realities of diverse students and a changing society* (pp. 232-255). San Francisco, CA: Jossey-Bass.

Landerholm, E., Gehrie, C., & Hao, Y. (2004). Educating early childhood teachers for the global world. *Early Child Development and Care*, *174*(7-8), 593-606.

Mabrouk, P.A. (2003). Research learning contracts: A useful tool for facilitating successful undergraduate research experiences. *Council of Undergraduate Research Quarterly*, *24*(1), 26-30.

Michael, S. O. (1998). Restructuring U.S. higher education: Analyzing models for academic program review and discontinuation. *Review of Higher Education, 21*(4), 377-404.

Schwartzman, R. (2001). Service-learning responds to technological enchantment and intellectual isolation. *College Student Journal, 35*(3), 423-432.

Schwartzman, R. (2010). The "net worth" of applied learning: How Holocaust survivors counter educational consumerism. *Journal of Applied Learning in Higher Education, 2*, 3-21.

Schwartzman, R., & Phelps, G. A. (2002). Beyond consumerism and utopianism: How service-learning contributes to liberal arts ideals. *Journal on Excellence in College Teaching, 31*(1), 57-81.

Sherman, H. D. (1999). Pursuing global competence in undergraduate business education: Use of an international consulting experience. In E. Kaynak & J.R. Schermerhorn, Jr. (Eds.), *Teaching and program variations in international business* (pp.29-41). Binghamton, NY: International Business Press.

Slavkin, M. L. (2004). *Authentic learning: How learning about the brain can shape the development of students*. Lanham, MD: Rowman and Littlefield.

Wergin, J. F. (2002). Academic program review. In R. M. Diamond & B. Adam (Eds.), *Field guide to academic leadership* (pp. 241-256). San Francisco: Jossey-Bass.

# The Integrative Business Experience: A Practical Approach for Learning by Doing

**LARRY K. MICHAELSEN**
**MARY MCCORD**
University of Central Missouri

*This paper describes an interdisciplinary undergraduate curriculum innovation that links classroom learning to hands-on business and community service work. The program, called the Integrative Business Experience (IBE), requires students to enroll concurrently in three required core business courses and a practicum course in which they develop and operate a start-up business (based on an actual bank loan of up to $5,000) and use company profits to carry out a hands-on community service project. The IBE program is by nature a set of applied learning courses that clearly fulfill Kolb's four steps in the Cycle of Learning and produces a wide variety of positive outcomes. This paper will explain the need for applied learning in business and how the IBE program is structured. Then, after an overview of Kolb's Cycle of Learning (1984), the paper will apply IBE to Kolb's four stages: 1) Concrete Experience, 2) Reflective Observation, 3) Abstract Conceptualization, and 4) Active Experimentation.*

Over two decades ago, in a comprehensive national study, Porter and McKibbin (1988) concluded that undergraduate business school programs were doing a good job of developing students' technical skills, but were not adequately preparing them for their future jobs. Unfortunately, based on more recent assessments (e.g. Bennis & O'Toole, 2005; Mitroff, 2004; Pfeffer & Fong, 2002, 2004), business graduates are still unprepared in four important areas. With few exceptions, they: (a) have a difficult time viewing business organizations from an interdisciplinary perspective, (b) are limited in their ability to work and communicate effectively with others, (c) are unable to solve

*Journal of Applied Learning in Higher Education* Vol. 3, Fall 2011 25-43

unstructured problems and (d) have a narrow, outdated view of ethics and the role of management in human affairs.

In large measure, these deficiencies probably result from a combination of two factors. One is that most students have only worked in low level, part-time jobs that contribute little to their understanding of the workings of business organizations. Further, although typical student jobs involve working with others, they seldom provide any significant responsibility for organizing work activities, dealing with ethics and/or human-resource issues or solving unstructured problems. The other is that prevailing business education practice emphasizes theoretical knowledge in discipline-based courses while largely ignoring both practical applications that cut across business disciplines and the development of students' professional and ethical assessments (e.g., Bennis & O'Toole, 2005; Giacalone & Thompson, 2006; Mitroff, 2004; Pfeffer & Fong, 2002, 2004). Further, traditional lecture/discussion courses seldom provide opportunities to develop social responsibility and student values or gain community involvement.

The purpose of this paper is to describe a program in which students learn to do hands-on business and community service work. The program, called the Integrative Business Experience (IBE—see Michaelsen & McCord, 2006), requires students to enroll concurrently in three required core business courses and a practicum course in which they develop and operate a start-up business (based on an actual bank loan of up to $5,000) and use company profits to carry out a hands-on community service project. By creating and running both a business and service venture, the students engage in activities and outcomes that touch on all four of Kolb's Stages of Learning. The program receives high accolades and interest because the learning outcomes are clearly strong and directly measurable using real business metrics and because student engagement is very strong. These outcomes are a direct result of applied learning in an innovative and integrated curriculum.

## STRUCTURE OF IBE

In most undergraduate business programs, students have four types of required course work. During their freshman and sophomore years, they must complete the first two types: a university core curriculum (a broad-based set of general education requirements) and a pre-business core (i.e., courses in economics, statistics, computers, business communications, and mathematics). During their junior year, they must complete a set of core courses that focus on key business functions (e.g., finance, information systems, legal studies, management, marketing, etc.) During the remainder of their junior year and in their senior year, students complete the coursework in their major and minor fields of study and conclude by taking a required capstone course.

The curricular innovation reported in this paper involves a change in the way students complete their junior-level core business requirements. Traditionally, they enrolled in four or five (depending on the university) stand-alone, lecture-oriented courses. Starting in the spring of 2004 at the University of Central Missouri, they have the opportunity to choose a program, called the Integrative Business Experience (IBE—see Figure 1). This program, which was inspired by Management 101 at Bucknell University (see Miller, 1991), links students' work in three core courses to two intensive hands-on experiences (see Figure 2). Typically, these core courses are taught in a lecture/discussion format in which students listen, take notes, and demonstrate familiarity with course concepts by taking summative, and, in most cases, multiple-choice exams. By contrast, IBE students have the opportunity to: (a) practice using basic business concepts and analytical tools to solve a wide range of unstructured problems, (b) receive an integrated exposure to concepts from three core business disciplines, (c) develop interpersonal and group-interaction skills in a work-like setting, and (d) develop student values and social responsibility by responding to a real societal need. IBE students gain experience by creating and managing two significant enterprises–an actual start-up company (funded by a real-money bank loan of up to $5,000) and a hands-on community service project. They receive an integrated exposure to core business concepts as faculty deliver content instruction that is specifically sequenced to provide real-time conceptual support for managing students' business and service ventures. Students also have the opportunity to develop interpersonal and group problem-solving skills both in learning teams in the content courses (see Michaelsen, Knight, & Fink, 2004; Michaelsen, Parmalee, Levine & McMahon, 2007) and through their IBE company activities.

## TEAM-BASED LEARNING

Team-Based Learning (TBL—see Michaelsen et al., 2004, Sweet & Michaelsen, 2011, Trank & Rynes, 2003) is rooted in what actually motivates adult learners. Rather than coercing students to "do what

AUTHOR NOTE: *Larry K. Michaelsen and Mary McCord, Harmon College of Business Administration, University of Central Missouri. Correspondence concerning this article should be addressed to Larry Michaelsen, University of Central Missouri DOC 405G, Warrensburg, MO 64093. Contact: lmichaelsen@ucmo.edu or (660) 429-9873*

**Figure 1. Business Degree Program Structure**

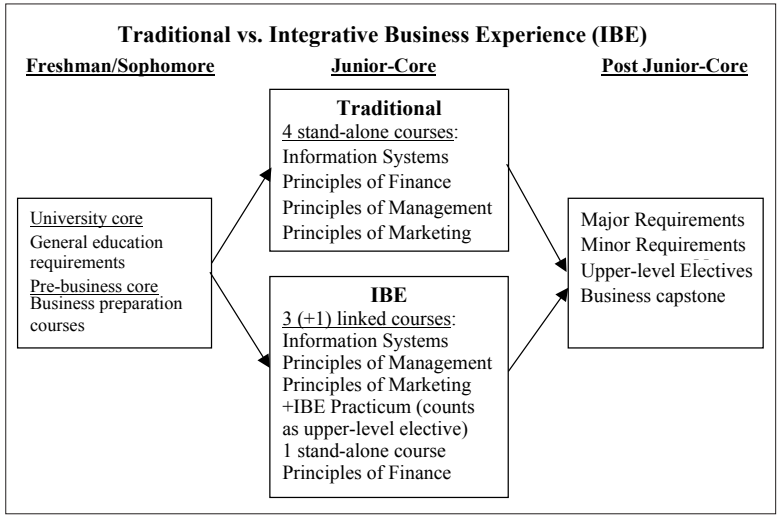



**Figure 2. Key Elements of IBE**

**Integrative Business Experience (IBE) Key Program Elements**

- Team-Based Learning (TBL) to ensure:
  1. Efficient content coverage–foundation from students' pre-class individual study.
  2. In-class time primarily focused on concept applications.
  3. Development of effective student teams.
  4. Development of interpersonal/group problem solving skills.
- Learning linked to experience. In one 16-week semester, students:
  1. Simultaneously concurrently enroll in four courses–three required core business courses and an Entrepreneurship/Community Service Practicum.
  2. Are responsible for mastering the content in the three required core business courses.
  3. Are assigned to a permanent 5-7-member learning team that is expected to complete projects and exams in all three core courses.
  4. Are an "employee" of 20-35 member company (4 or 5 of the core course teams) that develops a business plan for:
     - A start-up business venture.
     - A hands-on community service project.
  5. Obtain a *real* money bank loan (up to $5,000) to finance their start-up business.
  6. Generate enough income to pay back their loan *and* finance their service project.
  7. Prepare and present a company annual report
  8. Create a personal IBE program portfolio containing:
     - Self-reflections on how their experience contributed to their learning.
     - Artifacts that document their achievements and their learning outcomes.



good students do" (come to class, pay attention, take notes, etc.), TBL structures student work around specific, visible, concrete, public decisions. The quality of those decisions depends on how well students have processed course content. Particularly in the context of IBE, reading and studying are no longer empty behaviors or abstract exercises; they are a means to an immediate end—figuring out how to create and manage a start-up business and how to make a real difference through doing community service work. A permanent team structure gives students time to learn to make decisions together, an essential condition for requiring them to perform at higher cognitive levels. The key to an effective TBL course is that student tasks must be focused on using course concepts as a basis for making decisions and, in IBE, the decisions have consequences for the students, their customers, and for the recipients of their community service work. The main driver of the method is frequent, immediate feedback on everything students decide—whether as individuals or in teams. In IBE, the highest-impact feedback is often the reactions of their customers and clients.

A TBL course will have 5-7 instructional units. For each unit, the sequence over 2-6 class meetings is:

1. A substantial reading assignment (outside of class)
2. Readiness Assurance Process to assess basic student grasp of main ideas (in class)
3. Clarification of lingering confusion (in class)
4. Team applications using the material to delve more deeply into complex ideas (in class)
5. Assessment of learning (individual and/or team assignments) (in or outside of class)
6. Debrief/summary (in class)

The Readiness Assurance Process (RAP) (see Michaelsen et al., 2004; Sweet & Michaelsen, 2011) provides a foundation for both content understanding and team development. Early in each unit, students take an individual, multiple-choice, Readiness Assessment Test (RAT) to measure their understanding of the assigned content. Immediately afterward the team takes the exactly same test for a team score. Both components factor into students' grades. The RATs ensure that students get immediate feedback on their initial understanding, to correct any errors. This process has a double psychological function. First, the Individual RAT ensures that students do not use their teams to cover over individual failure to prepare. Second, the Team RAT requires the team to practice its decision-making from the very beginning of the course.

## EXPERIENTIAL LEARNING THEORY: KOLB'S CYCLE OF LEARNING

Applied learning is a pedagogy that integrates the content matter(s) being studied with authentic, real, learning experiences, and in doing so, completes Kolb's (1984) Cycle of Learning. Part of applied learning is experiential education, which is a process through which a learner constructs knowledge, skill, and value from direct experience (Luckman, 1996, p.7). Based on the idea that direct involvement enhances students' learning, experiential education addresses student problems with learning and motivation (Rogers, 1969). Applied learning uses experiential education in a real setting, which is the backbone of the IBE curriculum.

Many empirical studies have found that experiential learning increases students' ability to transfer knowledge and skills from the classroom to the real world (Cantor, 1995; Cranton, 1989; Knowles, 1970). Knowles et al. (1984) also supports the motivational advantages of experiential learning. His work on self-directed learning theory suggest that adults have a preference for experiential and task-centered learning. Other studies of experiential learning found increased student satisfaction and motivation (Acosta, 1991; Baslow & Byrne, 1993; Cantor, 1995.)

Kolb's Cycle of Learning (1984) supports the importance and impact of experience and application in learning. The cycle begins with a concrete experience—a particular action is carried out. The learner then reflects on the experience (reflective observation), draws conclusions (abstract conceptualization) and finally enters a phase of active experimentation where ideas and conclusions are tested. An example of how this process works in IBE is that students learn concepts related to product pricing in the classroom, which is abstract conceptualization. The concepts are put into active experimentation by setting a specific price and a sales strategy for the product they have decided to sell as part of the IBE practicum course. As soon as their product arrives from their supplier, students have the concrete experience of interacting with and experiencing the reaction of potential customers. Students inevitably reflect on their experience (reflective observation), and the cycle begins again as they adjust their prices and/or sales strategies. Because the experience is in a real business setting, the class content matter has already been transferred and applied to the real problems, decisions, and outcomes students will face in future jobs. The Cycle of Learning model was modified by Svinicki and Dixon (1987) to include primary descriptors of student learning for each phase, such as *feeling, watching, thinking,* and *doing*.

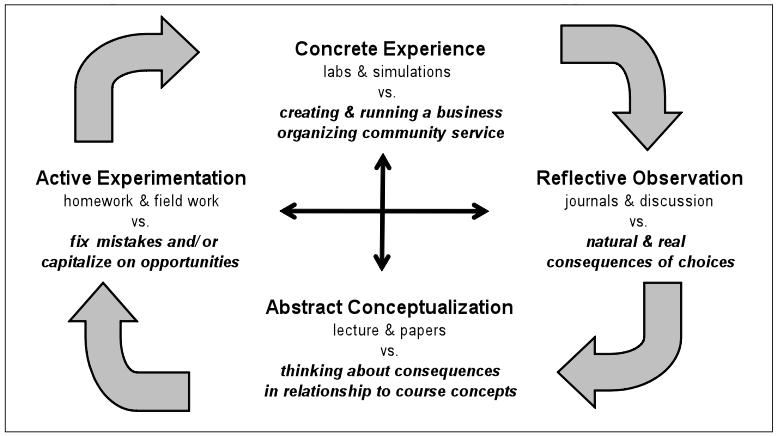


In this paper, the focus is on the outcomes that students are expected to perform and the impact that applied learning has on those outcomes. Using Kolb's cycle of learning, Svinicki and Dixon (1987, 1994) reframed the phases with horizontal and vertical axes. The vertical axis represents the range of input of information from concrete experience to abstract conceptualization, or "student as receiver". The horizontal axis represents the processing of information, as a range from active experimentation to reflective observation, or "student as actor." These axes for student tasks are included as crossed arrows at the center of Figure 3, which shows individual versus IBE instructional activities that support Kolb's model.

Svinicki and Dixon (1994) suggested individual tasks/activities that support Kolb's Cycle of Learning. Their practical ideas and activities for concrete experiences include fieldwork, poetry reading, laboratory experiments, and games. Journal writing or class discussion leads to reflective observation on those experiences. Abstract conceptualization occurs when students generalize concrete concepts, adapting them to new physical models. Svinicki and Dixon labeled this dimension "thinking." Examples of student thinking include situations that apply and test ideas in papers, projects, and model building. Finally, more case study, field, laboratory, or simulation work facilitates active experimentation, where the content is applied. Figure 3 shows Svinicki and Dixon's addition of classroom activities to Kolb's model. Svinicki and Dixon's examples of classroom activities are in regular font, and are compared to examples of IBE activities, given in italics.

This paper uses Kolb's cycle of learning to describe IBE's applied learning outcomes for experiential learning and development. This

**Figure 3. Examples of Individual vs. IBE Instructional Activities that Support Kolb's Model**



paper categorizes the outcomes of IBE using both the phases of the cycle and the axes. The IBE program naturally takes students through all four stages of Kolb's learning cycle, and consistently meets and exceeds learning outcomes.

## INTEGRATIVE BUSINESS EXPERIENCE

We use Kolb's (1984) Cycle of Learning with Svinicki and Dixon's modifications for individual learning to provide a theoretical rationale for why the IBE approach enriches the student learning experience. The foundation of the IBE program was specifically designed to give students real-life experience in using business course related concepts. The real-life experience is the primary vehicle used to advance the development of academic learning and students' professionalism, personal values, and interpersonal skills. The IBE program has three applied learning outcomes: (a) to provide students with the opportunity to create and manage a small business enterprise, (b) to cultivate and reinforce the students' sense of corporate and ethical responsibility by requiring profits generated by the company to be used to assist a non-profit service project, and (c) to cultivate a sense of individual responsibility to the community by requiring the personal involvement of the student with the selected non-profit service project. We assess these outcomes using Kolb's model below.

### KOLB'S AXIS OF ABSTRACT CONCEPTUALIZATION AND CONCRETE EXPERIENCE

Traditionally, much of a business curriculum is spent training students to use tools and theories to prepare them make better decisions, track data, and in general, prepare them for the kinds of jobs they will do after graduation—all of which are mainly categorized as *abstract conceptualization*. For example, students in an Information Systems course learn how to create spreadsheets, databases, project planning software, presentation software, and so forth. Similarly, Marketing students are taught about concepts such as using focus group or survey tools to identify a target market and Management students learn about tools and approaches for human resource assessment and performance tracking. Whatever the discipline, all too often the approach has been to lecture on the theoretical concepts from different business disciplines, with perhaps having students use the concepts in some sort of hypothetical setting such as analyzing a business case. In these scenarios, however, students rarely move beyond Kolb's stage of abstract conceptualization of content, because their experience is *purely* cognitive and the feedback they receive is limited to hypothetical consequences of



hypothetical choices. Increasingly, business courses attempt to increase the reality of students' experience by having them do field projects. However, in most cases the impact of most field projects is limited by the fact that the end product is a decision about a recommended course of action for their "client."

Although we strongly support the idea of having students do field projects, by providing students the opportunity to create and manage their own small business enterprise, IBE extends students' *concrete experience* (from Kolb's cycle) beyond well beyond what is possible from the vast majority of even the best-conceived field projects. That is because in IBE students' decisions are not the end product—they are the beginning of a series of learning cycles. In IBE, students acquire the business concepts just in time to use them to make real choices and experience feedback in the form of natural consequences. As a result, they have a far different motivation to both apply what they have learned and reflect on their experience. Further, because the consequences are real and immediate, they have the opportunity to learn to be innovative as they work their way through the challenges they inevitably face in the process of running their business and completing their community service projects.

For example, at the beginning of the program in the Management of Organizations course, they use decision-making concepts and goal theories to set company goals and determine how they will decide on a product for their business and a strategy for identifying and completing their community service projects. As the IBE program progresses, they are taught in their Management of Information Systems course to create and use a Gantt chart to plan and track their goals. Other courses teach financial and accounting concepts which are used by students to create budgets and Expected Income Statements, as well as liquidity ratios. These statements and ratios are presented to bankers in efforts to get a loan to finance their start-up business, another concrete experience. At the end of the program, when they close the books on the business, they report their revenues, expenses, and profit—real business metrics of success. In addition, the students have completed a hands-on service for a charity, and feel the pride and empowerment that their business and service success imparts. All of these concepts are first presented in the core classes as abstract conceptualization/thinking, but are moved through Kolb's continuum to actual concrete experience/feeling. The pedagogical innovation of IBE is not simply that the instruction tries to link the concrete experience to abstract concepts, but that the concepts now matter because students are employing them in a high-stakes situation. If they do not apply the concepts well, for example, they fail to secure the loan and thereby cannot complete the requirements for the coursework.

In addition to starting and running their own company, IBE cultivates and reinforces the students' sense of corporate and ethical responsibility by requiring profits generated by the company to be used to assist a non-profit service project. Many organizations are urging business schools to train students in ethics, hoping to increase their sensitivity to ethical issues. Most professions have a strong ideological and ethical component (Trank & Rynes, 2003) and business is no different. Beyond the call for ethical business training, there is a call to make social responsibility a meaningful part of business education (Kashyap, Mir, & Iyer, 2006). Students are introduced to discipline-related ethical issues and concepts (abstract conceptualization) in all three of the core courses. The concrete experience gained through IBE is that students use their business organization to make a profit that is then given to a charity.

Due to a combination of oversight from the bankers, high student motivation, and the fact that the companies have what amounts to free labor, there has never been an IBE Company loss. Students gain real-world business experience, with a service-learning goal (profit to be given away and services to be given to the charity) as a measure of that business experience. Working with and for a not-for-profit seems to naturally increase students' sensitivity to ethical issues and help them to develop an individual social responsibility. A recent study (Cai-Hillon & McCord, 2011) found that the IBE class encouraged student social responsibility development and the IBE service-learning curriculum significantly increased students' volunteerism. This occurs because they are experiencing ethical situations as opposed to simply talking and/or reading about them. In addition, IBE students both make choices and experience the consequences of their decisions, greatly increasing their applied learning.

Furthermore, as the students work throughout the semester with a not-for-profit, they start with a concept of what the charity is about and what the charity needs—abstract conceptualization. Later, as a result of concrete experience, IBE companies may change their service project plans midstream as they learn the true needs of the charity. For example, an IBE company initially planned to visit residents in the Veterans Home, but chose to add a more sustainable service by building benches and facilitating a new recreation room. Usually, IBE students volunteer the most near the end of semester as they develop and mature in their values and social responsibility, and as they come to better understand the needs of their service recipients. One indication of their increased social responsibility is that many of the IBE students continue to work with and for their non-profit groups after the semester is over (Cai-Hillon & McCord, 2011).

Another important learning outcome of IBE is to cultivate a sense of individual responsibility to the community by requiring the personal involvement of the student with the selected non-profit service project. As IBE students fulfill the requirement of "making a lasting difference" through organizing and carrying out hands-on community service work, many develop a deep sense of empathy for and commitment to those they serve. In addition, IBE students develop a greater level of personal competence, social justice responsibility, ability with interpersonal relationships and volunteer more than non-IBE students (Cai-Hillon & McCord, 2011). Although measures of empathy are hard to quantify, the depth of students' feelings about their service experience are evident in comments from their end-of-semester reflections. Quotes from end-of-semester reflections, included below, illustrate their personal growth, and how they take the concrete experience and real-world feedback at one end of Kolb's axis, reflect upon it, and turn it into an abstract conceptualization of planned action in future scenarios.



## KOLB'S AXIS OF ACTIVE EXPERIMENTATION AND REFLECTIVE OBSERVATION

After the students learn the concepts and begin applying them in the concrete setting of their student company, they modify them to meet the unique needs of their service or business company, engaging in active experimentation. For example, although all IBE companies have a static website to showcase their product, we have had IBE companies expand the use of their website to advertise their service goals to the community, remind students of events, and provide a web-form for students to input their service hours (and sales for the charity) into a database, which is then used to track the number of hours donated. The databases are downloaded into spreadsheets to make charts and are placed in PowerPoint presentations so individual students can see how they compare in service to their peers. Marketing students have experimented with adding social media and viral marketing to more traditional face-to-face sales techniques. One IBE company president experimented with servant leadership by fasting and sleeping in a cardboard box in front of the Student Union for two days to bring awareness to their service organization's needs. All these examples of active experimentation were not anticipated by the instructors and led to higher motivation and learning outcomes of the students involved.

As students themselves examine the results of these experiments, they discover that not all resulted in greater efficiency, efficacy, or higher business metrics such as profit. Their reflections on these experiments are not only discussed at company meetings throughout the semester, but also shared in an individual website journal at the semester end. For example, business metrics such as "quantity of sales" did not support using social media advertising but did support viral marketing. Examining the reasons behind these failed and successful attempts provides strong learning that is retained much more than

instructor lectures. So, by sharing what they have done and how they think they are performing, plus evaluating their peers' performance as company employees, they close Kolb's (1984) cycle through reflective observation and move across Svinicki and Dixon's (1994) axis of doing to watching.

The second learning outcome of IBE is to cultivate and reinforce an increased sense of corporate and ethical responsibility. As they implement their community service project, IBE students must do virtually everything managers actually do. Their first task is setting objectives, such as how to make a lasting impact through community service. In doing so, they reflect and discuss what is important to them, and in what community areas they most want to make a difference. Then they meet in groups to research, discuss, and decide how to spend their time and their money (company profit). In some cases, they raise money for one charity, but meet the needs of a different charity through hands-on work. They must organize events and find people to do the work, answer to charity and university stakeholders, assess the impact of their activities and track the resources used (money, hours, materials, etc.). In these activities, they are constantly experimenting with ways to be effective and efficient when assisting their charity (active experimentation).

At the end of the semester, part of the students' company final report is describing the impact they made on their charity. They have tracked throughout the semester metrics that they deem important, such as profit, hours served, hours served per person, impact on client charity, number of charity clients served or impacted, and so on. Deciding on their performance metrics for service, and then tracking and reporting those metrics at semester end requires reflection and closes the loop of Kolb's cycle. Individual and company reports have included quantitative metrics such as donations gained, hours served, grants written, and structures built or renovated. By applying ethical concepts to serving a real charity, their reflective observations of lessons learned are much more salient than using ethical cases or scenarios (see student quotes below). These reflections reinforce the student's increased sense of corporate and ethical responsibility.

The third learning outcome of IBE is to cultivate a sense of individual responsibility to the community by requiring the personal involvement of the student with a selected non-profit service project. The IBE students create and operate their business venture, choose their charity, and carry out their service project themselves. For many, interaction with a charity is new and forces them into active experimentation. They take considerable pride in how they use business and academic knowledge to succeed. At the end of the semester, each student creates a "Personal Portfolio," in which they reflect on what they learned and how they learned (reflective observation). In their reflections, students



often express the deep meaning of their service activities. Many make a personal bond with service clients, and continue their volunteer work and relationships beyond the semester. Others focus on the lessons they learned about working with others, and/or operating a business. Some of their reflections are as follows:

> "When I asked and assigned company members to tasks, my job became easier and other members felt more included. I learned that this should have been one of the first things I did. No one got mad; if they didn't want me to tell them what to do, they wouldn't have elected me for president. I just needed to realize this sooner." Kendra
>
> "I hope to use what I have learned within the courses to establish myself in a company and also learn hands on experience as a manager. Some things can't be taught in a classroom and you have to learn them from experience. … I hope to be better at giving feedback because as a manager it is something I need to become comfortable doing. My approach is still very weak and I come off as not productive..." Ernestine
>
> "I always thought that people would only help me if they could get some sort of benefit from it. After participating in my company, I have realized that is simply not true. Most people are willing to help with anything you could need. Being part of a non-profit organization really opened my eyes to this." Dwayne
>
> "This experience has not only taught me the course material, or how to start and run a business, but also it has taught me a lot about myself. I am a very hard worker and always strive for success. I have also learned that I care about other people and their own opinions." Paula
>
> "For our service project, we planned a Bowling for Cancer night at the (University) bowling lanes. All the profits from this event were also donated to the American Cancer Society. I helped advertise the event as well as stay and supervise. The company also participated in the Relay for Life in (City). I volunteered my time by walking and selling shirts at this event. The service project was a great experience raising money for such a good organization. It has taught me important areas such as ethics, communication, and working with others as a member of a team." Ariadne

## ASSESSMENT OF IBE PROGRAM BUSINESS AND SERVICE OUTCOMES

We face many of the same obstacles in assessing our program outcomes that we do when assessing the impact of a single course. For most of our outcomes, we rely on qualitative data from the students'

Personal Portfolios where they reflect on what they did and what they learned from their experiences. We have an advantage, however, in that we can assess students' learning by examining tangible deliverables produced by the companies and observing the processes through which they were created. These deliverables include such things as systems for handling money and company inventory, systems for tracking progress toward achieving company objectives, company web sites, advertisements, company documents and presentations. In fact, many of the deliverables provide compelling evidence of the positive academic impact of the IBE program. For example, in spite of the fact that students are enrolled in the introductory Management of Information Systems course, IBE companies have produced databases with web user interfaces that are more complex and work better than many senior-level IT capstone projects. In addition, we cannot help but conclude that students have increased understanding because they have actually used the databases to manage their inventory and to motivate company members to participate in company activities and projects.

In addition to the feedback from the members of the service organizations that is typical of most service learning courses, students get immediate and relevant feedback from other groups with whom company members interact. These include the bankers who must approve their loan requests, suppliers, various regulatory agencies both within the university and within the larger community, and customers. For example, in the past two years, two companies were not given a loan and had to modify their plans and reapply. This feedback from the bankers is a natural consequence of applying for a real loan. Every company must have any use of university logos evaluated and approved, and about half the time this process takes 2-3 iterations. One company was not able to get their product approved until the course was over three-quarters through! Many business people use the saying that actually trying to implement a business and make a profit is where the "rubber hits the road." Although profit is not a component of a student's grade, it is clearly a real indication of success using a real business metric–and every IBE company has made a profit. Although this seems impossible, it is made possible because the students give their business and community service labor for free, the faculty delivers content instruction that is specifically sequenced to provide real-time conceptual support for managing students' business and service ventures, and students are in competition with other peer companies and are strongly motivated not to fail.

Critics may wonder if some of the success of the IBE is due to a high proportion of highly motivated students choosing the IBE option for fulfilling their core course requirements. Even though the majority of IBE students are still from majors that require them to participate



in the program, this may be a valid point for two reasons. One is that, over time, there has been a steady increase in the number of students who enroll in IBE even though it is not a part of their major's requirements. The other is that students are increasingly choosing to come to our institution *because of IBE*. These students opt-into IBE at the point of deciding where to attend college, not at the point of deciding what courses to take. Thus, in a very real sense, the IBE has become a recruitment tool at the institutional level.

The most concrete data we use to assess the impact of the program are the number of service hours contributed at IBE company sponsored events and the amount of money contributed to community service organizations. Based on these measures, IBE has been a resounding success. The financial and community service performance of IBE companies has surpassed our wildest expectations. We have (one or both of the authors) worked with a total of 781 students in IBE between the spring semester of 2004 and the spring semester of 2011 at the University of Central Missouri. (The IBE program has been implemented at a number of other schools as far away as Indonesia.) These students have formed and managed 38 remarkably successful companies (see Appendix A for a company-by-company summary). In total, our IBE student businesses:

- Have received $96,991 in loans and have generated total revenue of $354,152 and total net profit of $193,332.
- Have provided to over 40 community service and/or voluntary non-profit organizations:
  - $193,332 in direct financial support from the efforts of IBE student businesses.
  - 11,962 hours of community service from IBE-organized activities (includes others whom IBE students have recruited to support their efforts).

One of the most valuable aspects of the IBE program is that we can make the content "real" by sequencing the topics so that students have intellectual and practical "tools" to use in creating and implementing their business and service ventures. As a result, the key document for organizing the classroom instruction and creating course syllabi for the three core content courses in IBE is a master calendar that shows the schedule of activities that the IBE companies engage in as part of the practicum course. Examples of these activities are in Figure 4.

## FUTURE DIRECTIONS

The authors are engaged in two different types of efforts regarding IBE. One is that we are engaged in research that supplements

**Figure 4. IBE Company Activities – Raising the Stakes**

| Examples of IBE Activities | | | | |
|---|---|---|---|---|
| **Kolb's Stage in Learning Cycle** | **Concrete Experience** | **Reflective Observation** | **Abstract Conceptualization** | **Active Experimentation** |
| Cash Flow and Breakeven Analysis | Must procure loan for start-up from bank | Loan presentation and feedback | Feasibility of cash flow | Create cash flow, breakeven and ratios |
| Decide on Goals | Companies decide on essential conditions for company success, which leads to goals | Final company presentation and individual reflections | Group decision making concepts and goal setting theory | External business environment and internal company environment impacts achievement of goals |
| Financial and Accounting Controls | Students must create databases and spreadsheets to track inventory, money & service metrics | Bank account reconciliation, weekly use and final report | Accounting checks and balances, business metrics, income in and out | Students use their process in course of the business |

anecdotal evidence with empirical data aimed at understanding and documenting both how and why this program has such a positive influence on students, as well as the extent to which participation in the IBE program impacts their performance in subsequent course work and their job performance and participation in community service activities in the early years of their careers after they graduate. At present, we are in the first year of analyzing data based on a maturity instrument developed by the authors and the Higher Education Service Learning Surveys (Diaz-Gallegos, Furco, & Yamada, 1990), which involves a pre-test (given in week 2) and post-test (given in week 15). In addition, we are in the process of collecting and analyzing data to see how the IBE experience affects student performance in a subsequent Production and Operations Management class.

The second goal of IBE's future is not research, but implementation. Given the overwhelming positive impact at each of the schools where IBE has been adopted, we strongly believe that we should do all we can to ensure that similar opportunities are given to as many students as possible. As a result, we are actively engaged in a number of efforts aimed at exposing faculty to the benefits of IBE and to the requirements for implementing similar programs at their institution. These efforts include: (a) presenting conference sessions on IBE, (b) developing an IBE textbook, (c) making campus visits to other schools to inform them about the IBE program, (d) extending invitations for faculty from other schools to visit our university to talk with IBE students and see them in action, and, (e) actively looking for opportunities to expose other educators to the IBE program and its benefits (e.g., IBE has been featured in a recent *BizEd* article (Bisoux, 2011)).



Appendix A – Integrative Business Experience (IBE) Business and Service Summary

| Company Information | | | Business Activities | | | | Service Activities | |
|---|---|---|---|---|---|---|---|---|
| *Term* | *Company Name* | *Company Members* | *Product or Service* | *Loan Amount* | *Gross Revenue* | *Net Profit** | *Community Service Recipients* | *Service Hours* |
| Sp. 2011 | MO on the Go | 23 | UCM Travel Mug | $2,800 | $8,188 | $4,227 | Survival Adult Abuse Center | 436 |
| Sp. 2011 | Cups of Hope | 20 | UCM Tumbler w/straw | $2,020 | $6,157 | $3,125 | Early Childhood Hunger Operation | 463 |
| Sp. 2011 | The Green Machine | 7 | Assorted Tumblers | $500 | $6,363 | $3,099 | Bridging the Gap | 175 |
| Fall 2010 | Survival Sweats | 26 | UCM Sweat Pants | $2,500 | $9,489 | $3,819 | Survival Adult Abuse Center | 402 |
| Fall 2010 | MO Active | 26 | UCM Water Bottles | $1,635 | $6,761 | $5,103 | Warrensburg Parks and Recreation | 433 |
| Fall 2010 | MO'ympians | 25 | UCM Sweat Bands | $2,730 | $4,670 | $2,197 | Special Olympics & W.I.L.S. | 267 |
| Sp. 2010 | I Be Mo' Dry | 34 | UCM Beach Towel | $4,200 | $10,456 | $5,565 | Big Brothers Big Sisters | 470 |
| Sp. 2010 | Mules With Hearts | 34 | UCM Playing Cards | $2,210 | $7,632 | $4,069 | Knob Noster Park/Connected Hearts | 790 |
| Sp. 2010 | Central MO Promotions | 12 | Golf discount card | $1,500 | $9,988 | $6,010 | Kansas City Autism Alliance | 196 |
| Fall 2009 | MULEstrong | 29 | LS Mule T-shirt | $1,400 | $7,456 | $4,783 | Show-Me Youth Home | 704 |
| Fall 2009 | Habitat Hoodies | 29 | UCM Hoodie | $3,210 | $12,632 | $7,169 | Habitat for Humanity/WBG Veterans Home | 385 |
| Fall 2009 | FrostPint | 27 | UCM frosted glasses | $2,500 | $7,988 | $5,223 | Big Brothers Big Sisters | 340 |
| Sp. 2009 | Thirsty Mules | 25 | UCM Water bottle | $0 | $9,142 | $5,714 | Show-Me Youth Home | 414 |
| Sp. 2009 | Mo' Gear | 29 | Mule T-shirt | $2,875 | $13,925 | $5,182 | Big Brothers Big Sisters | 433 |
| Sp. 2009 | I Be Savin | 13 | Super Saver card | $800 | $4,191 | $3,158 | Boy Scouts of America | 100 |
| Fal l2008 | Happy Hooves | 24 | UCM slippers | $5,000 | $12,295 | $5,267 | West-Central Independent Living Solutions | 652 |
| Fall 2008 | Mo' Time | 26 | Calendar '09 | $3,200 | $10,380 | $6,693 | Survival Adult Abuse Center | 668 |
| Fall 2008 | Warming Way | 24 | UCM Mule Blanket | $0 | $14,846 | $7,608 | Red Cross | 357 |
| Sp. 2008 | Good Directions Signs | 24 | UCM & Pine St. signs | $3,000 | $11,890 | $8,507 | Big Brothers Big Sisters | 453 |
| Sp. 2008 | Dry Up Hunger | 23 | UCM Beach Towel | $4,300 | $14,628 | $7,780 | County Food Pantry/Veterans Home | 300 |
| Sp. 2008 | Penticast | 5 | USB Drives | $4,200 | $9,110 | $4,318 | Kansas City Downs Syndrome Guild | 32 |
| Fall 2007 | Central Time | 27 | UCM Historical Poster | $500 | $10,516 | $7,672 | Habitat for Humanity | 368 |
| Fall 2007 | MO' UnderCover | 28 | UCM Umbrellas | $5,000 | $10,222 | $5,442 | Animal Shelter & Middle Schools | 222 |
| Fall 2007 | Chairs That Care | 28 | UCM Folding Chair | $5,000 | $35,004 | $25,929 | Adult Abuse Center/Warrensburg Schools | 438 |
| Sp. 2007 | Glass with Class | 8 | UCM Glasses | $1,200 | $6,868 | $3,776 | March of Dimes | 40 |
| Sp. 2007 | Keepin' It Kool | 20 | UCM Coolers | $1,988 | $11,941 | $6,871 | Show-Me Youth Home/Knob Noster Park | 170 |
| Sp. 2007 | Raise Mo' Money | 21 | Mo Bobbleheads | $3,343 | $12,050 | $4,096 | WBG Veterans Home/Knob Noster Park | 228 |
| Fall 2006 | Get Your Lid on | 24 | UCM Baseball hats | $2,851 | $8,082 | $4,416 | Salvation Army | 310 |
| Fall 2006 | Central Warmth | 24 | UCM metal travel mug | $2,800 | $12,330 | $6,117 | Project Warmth | 337 |
| Sp. 2006 | I Be Photography | 4 | Photography Sittings | $2,950 | $1,743 | $1,314 | Nathan Crabtree, Wayside Waifs, PTA | 400 |
| Sp. 2006 | I Be Baggin' | 18 | CMSU drawstring bag | $2,605 | $7,828 | $3,460 | Muscular Dystrophy Assoc | 183 |
| Sp. 2006 | Central Tendency | 17 | "the Burg 55" t-shirt | $2,504 | $5,215 | $1,866 | WBG Veterans Home/Adult Abuse Ctr. | 163 |
| Fall 2005 | IBE KickBack | 16 | "KickBack" t-shirt | $2,289 | $4,785 | $2,225 | Camp Quality | 121 |
| Fall 2005 | Not Another Shirt Co. | 16 | Mule Poster | $1,992 | $4,949 | $3,100 | American Red Cross Hurricane Relief | 106 |
| Sp. 2005 | IBE Wild Card | 20 | "Burg" t-shirt | $2,350 | $9,190 | $3,682 | American Cancer Society | 105 |
| Fall 2004 | IBE Solutions | 18 | "Pine St" T-shirt | $2,469 | $5,733 | $2,197 | Habitat for Humanity | 101 |
| Fall 2004 | Slap Happy | 18 | "Burg" glasses/Koozies | $2,596 | $3,554 | $1,672 | YES/ Warrensburg Recreation | 100 |
| Sp. 2004 | Just Scrub It | 21 | CMSU Medical Scrubs | $3,975 | $5,957 | $882 | Red Cross/Big Brothers Big Sisters | 100 |
| | Total Students: | 813 | Financial Totals: | $96,991 | $354,152 | $193,332 | Service Hour Totals: | 11,962 |

*Includes cash and matched donations.

## REFERENCES


Acosta, V. (1991). Integrating experiential learning and critical inquiry in health education. *Proceedings from the American Educational Research Association.* Chicago, IL.

Baslow, R., & Byrne, M. (1993). Internship expectations and learning goals. *Journalism Educator, 47*(4), 48-54.

Bennis, W. G., & O'Toole, J. (2005). How business schools lost their way. *Harvard Business Review*, *83*(5), 96-104.

Bisoux, T. (2011). Teaching differently. *BizEd*, *10*(1), 50-52.

Cai-Hillon, Y., & McCord, M. (2011). Can corporate social responsibility be taught? *Academy of Business Discipline Journal, 3*(2), 1-13.

Cantor, J. (1995). *Experiential learning in higher education: Linking classroom and community* (Report No. 7). Washington, DC: George Washington University, Graduate School of Education and Human Development.

Cranton, P. (1989). *Planning instruction for adult learners*. Toronto, Canada: Wall & Thompson.

Diaz-Gallegos, D., Furco, A., & Yamada, H. (1990). *Higher education service learning surveys.* Retrieved from http://www.servicelearning.org/filemanager/download/HEdSurveyRel.pdf

Giacalone, R., & Thompson, K. (2006). Business ethics and social responsibility education: Shifting the worldview. *Academy of Management Learning & Education*, *5*(3), 266-277.

Kashyap, R., Mir, R., & Iyer, E. (2006). Toward a responsive pedagogy: Linking social responsibility to firm performance issues in the classroom. *Academy of Management Learning & Education*, *5*(3), 366-376.

Knowles, M. (1970). *The modern practice of adult education: Andragogy versus pedagogy.* New York: Association Press.

Knowles, M., et al. (1984). *Andragogy in action: Applying modern principles of adult education.* San Francisco: Jossey-Bass.

Kolb, D.A. (1984). *Experiential learning: Experience as a source of learning and development. Englewood Cliffs, NJ: Prentice Hall.*

Luckman, C. (1996). Defining experiential education. *The Journal of Experiential Education, 19*(1), 6-8.

Michaelsen, L. K., Knight, A. B., & Fink, L. D. (2004). *Team-based learning: A transformative use of small groups in college teaching*. Sterling, VA: Stylus Publishing.

Michaelsen, L. K., & McCord, M. (2006). Teaching business by doing business: A faculty-friendly approach. In D. Robertson & L. Nilson (Eds.), *To improve the academy: Resources for faculty, instructional and organizational development* (pp. 238-253). Stillwater, OK: New Forums Press.

Michaelsen, L. K., Parmalee, D., Levine, R., & McMahon, K. (2007). *Team-based learning for health professions education.* Sterling, VA : Stylus Publishing.





Miller, J. A. (1991). Experiencing management: A comprehensive, hands-on model for the introductory management course. *Journal of Management Education, 15*(2), 151-173.

Mitroff, I. (2004). An open letter to the deans and the faculties of American business schools. *Journal of Business Ethics*, *54*(2), 185-190.

Pfeffer, J., & Fong, C. T. (2002). The end of business schools? Less success than meets the eye. *Academy of Management Learning and Education*, *1*(1), 78-95.

Pfeffer, J., & Fong, C. T. (2004). The business school 'business': Some lessons from the U.S. experience. *Journal of Management Studies*, *41*(8), 1501-1520.

Porter, L. W., & McKibbin, L. E. (1988). *Management education and development: Drift or thrust into the 21st century?* New York: McGraw-Hill.

Rogers, C.R. (1969). *Freedom to learn.* Columbus, OH: Merrill.

Svinicki, M., & Dixon, N. (1994). The Kolb model modified for classroom activities. In K. Feldman & M. Paulsen (Eds.), *Teaching and learning in the college classroom* (pp. 307-315). Needham Heights, MA: Simon & Schuster Custom Publishing.

Svinicki, M. D., & Dixon, N. M. (1987). The Kolb model modified for classroom activities. *College Teaching*, *35*(4), 141-46.

Sweet, M., & Michaelsen, L.K. (Eds.). (2011) *Team-based learning in the social sciences and humanities.* Sterling, VA: Stylus Publishing.

Trank, C. Q., & Rynes, S.L. (2003). Who moved our cheese? Reclaiming professionalism in business education. *Academy of Management Learning and Education, 2*(2), 189-205.