When Service is Good for Economics: Linking the Classroom and Community through Service-Learning

Andrea L. Ziegert and KimMarie McGoldrick

Abstract

Service-learning is an experiential learning pedagogy that enables students to integrate their study of economics in the classroom with service activities in their communities. It enhances student learning because it encourages deep learning. Furthermore, it is a method by which economics can be made more accessible to an increasingly diverse student body and improve the relationship between colleges and universities and their communities. This paper offers an overview of the learning theory that underlies service-learning experiences, describes examples in the economics curriculum which demonstrate the associated components of deep learning, and provides a discussion of important considerations for economics faculty who wish to integrate service-learning into their classrooms.

Introduction

One of the most cited goals of undergraduate economics education is to provide our majors with economic skills and content to make effective economic decisions throughout their lives. In short, to 'think like an economist'. This suggests that students use 'chains of deductive reasoning in conjunction with simplified models… to help understand economic phenomena' in the world around them (Siegfried *et al*., 1991: 199). Thinking like an economist has become the buzz phrase for describing lifelong learning in undergraduate economic education. Active learning exercises, course projects and entire courses are described against this benchmark. Yet simply completing requirements of the major with good grades does not necessarily mean that students can think as economists and apply their

economic understanding beyond classroom walls (Hansen, 2001: 231). Students are more likely to apply their knowledge of economics in their everyday lives when their course work promotes 'deep' rather than 'surface' approaches to learning.

A deep approach to learning, or learning for understanding, necessitates critical thinking skills, integration of knowledge over time and subjects, theoretical application to practical situations and higher order skills of analysis and synthesis (Biggs, 1999; Entwistle, 1981; Prosser and Trigwell, 1999; Ramsden, 1992). In contrast, a surface approach to learning is encouraged when learning objectives are not well linked to materials, students are not actively engaged, and traditional (summative) assessment techniques are used. A surface approach to learning is consistent with activities defined on the lower cognitive levels of Bloom's Taxonomy of Educational Objectives (Bloom *et al.*, 1956), including comprehension and reproducing knowledge. Faculty motivated to help their students 'think like economists' must provide students opportunities to adopt a deep approach to learning that leads to a deep understanding of the subject. Understanding is deepened when it is actively applied beyond classroom walls. Such activities are more likely to enable undergraduate economics majors to apply their coursework after they graduate.

Service-learning is an experiential learning pedagogy that promotes deep learning because of what occurs when students integrate their classroom studies with service activities in their communities. For example, when undergraduate economics students volunteer at a homeless shelter, distributing services or tutoring homeless children, they are providing a needed and valuable SERVICE to their communities. But when those same students use their experiences at the shelter to better understand the economics of poverty and the shortage of low-income housing, they are LEARNING about the economics of their communities. Service-learning combines SERVICE with LEARNING in intentional ways that benefits both the community and the student-learner. Service activities are not just add-ons, but are closely linked to the academic content and learning objectives of a class. Students use the theories of economics within the context of the world in which they will ultimately participate. Service-learning

'is a strategy that builds character, spurs civic engagement, and applies content to abstract theories, allowing teachers to engage students as active participants in the learning process. Instead of simply asking students to open their textbooks, teachers using service-learning engage students in a critical thinking exercise to examine their world. Students are guided to connect their interests and moral leadership to solve a problem, serve a need, or be of service to others. Once a focus for service is identified, students may apply skills such as data collection, documentation,

problem-solving, charting and graphing, and persuasive writing to test theories, develop surveys, analyze data, inform community decision-makers, and practice communication skills' (Pearson, 2002: 6).

Besides promoting a deep approach to learning, incorporation of service-learning into the curriculum addresses a recurring criticism of higher education in general: graduating students are not prepared for active citizenship. 'Based on a reading of scholarly and popular commentary about higher education, the message is clear: the public has lost faith in higher education, and higher education is part of the problem instead of the solution (Astin, 1994; Boyer 1996; Harkavy and Puckett, 1994; Hirsch and Weber, 1999; Spanier, 2001)' (Ward, 2002: 5). Increased civic engagement motivated by the use of service-learning has the potential to rectify the current displeasure with higher education through meaningful reconnections with the community.

Service-learning can improve the public image of economics curricula. In an era of CEO excesses and business scandals, it is easy to see why objections are raised regarding the obsessive focus on the self-interested behavior of individuals, an often implicit (if not explicit) assumption throughout microeconomic theory. Critics contend that typical undergraduate study in economics places too much emphasis on utility or profit maximisation by individual economic agents and firms and excludes discussions of community and the common good. By placing economics students in service activities in their communities, students gain a broader understanding of the benefits of their economics education: their knowledge and skill can be used to promote the common good by addressing community problems and by increasing the efficiency and effectiveness of community agencies.

The purpose of this paper is to provide economics instructors with a rationale for developing service-learning projects for their own economics courses. Service-learning is not a new pedagogy. The *Michigan Journal of Community Service-Learning* has documented research on the use of service-learning in other disciplines for more than 20 years. However, economic educators have been slower to adopt service-learning in their classrooms. One notable exception, *Putting the Invisible Hand to Work: Concepts and Models of Service-Learning in Economics*, edited by McGoldrick and Ziegert (2002) provides a detailed introduction to the theory and practice of service-learning in economics. The goal of this paper is to further enhance this work by focusing on the potential learning gains service-learning can provide economic students and offer guidance to those interested in developing such experiences. We begin with a brief review of learning theory and show how the characteristics of well-defined service-learning experiences contribute to deep learning. This is followed by examples that demonstrate the flexibility of service-learning pedagogy, including its applicability to a wide range of course

content and continuum of the experience. Finally, we outline key steps for developing service-learning experiences in economics classrooms and address particular challenges of this unique pedagogy.

Service-learning and learning theory

Recent research provides insights into 'How People Learn' (Bransford *et al*., 2000). A deep approach to learning promotes recognition of when knowledge can be transferred and encourages transfer of knowledge from one context to another. As a result, learners '(a) have a deep foundation of factual knowledge, (b) understand facts and ideas in the context of a conceptual framework, and (c) organize knowledge in the ways that facilitate retrieval and application' (Bransford *et al*., 2000: 16). This is facilitated when faculty encourage reflection on learning, use formative as well as summative assessment, and develop learning environments that are learner- and community-centered.

When learners reflect on their own learning processes they keep their learning on track and are able systematically to check their understanding. A variety of strategies may be employed in this process: planning ahead, apportioning time, explaining course content to themselves to improve understanding, predicting outcomes, accessing background information, and identifying when they lack understanding (Bransford, *et al*., 2000: 18). Reflection is key to this learning process for it enables the learner to make sense of past experiences in order to affect and understand future experiences (Daudelin, 1996). Reflection is also a key component in service-learning – it is the process by which the service experience is linked with academic learning. Boud *et al*. (1985) describe reflection in the three stages of service-learning experience: when preparing for service, students reflect upon what is required of them academically and the demands of their service site; during the experience, they process activities they are engaged in at their service site; and upon completion of the experience students evaluate what they have learned from the experience. Through reflection, economics students are pushed to link their concrete service experience to abstract economic concepts and theories learned in the classroom.

Eyler and Giles (1999) note that reflection is most effective at promoting learning when it is continual throughout the experience, is structured to connect classroom learning with the service experience, and challenges students to think in new ways. Thus well-structured service-learning experiences encourage students to develop habits of reflection that facilitate deep learning. These ongoing structured reflections provide faculty with opportunities to integrate formative assessment of student learning, test students understanding of foundational knowledge, and require students to demonstrate their ability to transfer that knowledge to a new context. While it is possible to add these components to traditional classroom settings, they are natural and integral components of service-learning experiences.

Learner-centered environments promote a deep approach to learning by encouraging students to make connections between their current knowledge, previous experiences and the academic task at hand (Bradford *et al*., 2000: 133–4). Students learn best when actively involved with the material they are learning (see for example Baxter-Magolda, 1992; Belenky *et al*., 1986; Kolb, 1981; and Perry, 1970). One of the strengths of service-learning is that the embedded learning process promotes student engagement with the material and student ownership over learning is strengthened. As students struggle with course content in the context of their service experience, they move beyond rote memorisation to the higher-level cognitive skills of critical thinking, analysis and synthesis.

Learner-centered environments can also facilitate deep learning for diverse students. Because a student's experience operates as an additional 'text' in the course and is the grounding component of the learning process, service-learning as a pedagogy can make classroom content more accessible to an increasingly diverse student body. Research indicates that learning styles differ across populations. For example, Ziegert (2000) finds that students with different personality temperaments approach and learn about the world in different ways. Using a Myers-Briggs type instrument (Myers, 1975; Provost and Anchors, 1988), her work confirms that a large majority of students (66 per cent) prefer sensing (S) to intuition (N) when taking in information. Students with S dominant preferences 'trust the data and information that comes from the five senses. These students focus on details and specifics, often work sequentially, prefer experience-based learning, and have a practical and present orientation' (Ziegert, 2000: 309). Additional research indicates that women and students of colour learn more with experiential based pedagogies than traditional lecturing (Bartlett, 1996). As a learner-centered pedagogy, service-learning better targets sensing (S) student population's learning style and addresses the traditional under-representation of women and people of colour in economics classrooms by providing an alternative method by which to engage with the material.

Finally, a deep approach to learning is promoted when learning is community-based. Students are more motivated to learn when they see the usefulness of what they are learning and believe their knowledge can contribute something to their local communities (Schwartz *et al*., 1998). Through service-learning, students have opportunities to make a difference in their communities while at the same time developing the habits and skills of an engaged citizen. Service-learning has been shown to impact a wide range of outcomes including enhanced commitment to social responsibility, interaction with peers, and greater satisfaction with learning. In a review of nearly 150 service-learning research projects, Eyler *et al*. (2001) summarise evidence that service-learning has a positive impact on student social responsibility

and citizenship skills, appreciation of diversity, and personal identity, self-efficacy and growth. But above all, faculty interest in service-learning as an effective pedagogical tool lies in the realm of cognitive gains and although the evidence is less developed, service-learning has also been shown to lead to 'improved learning (Astin and Sax, 1998; Eyler and Giles, 1999; Markus *et al*. 1993), improved ability to think critically about complex problems (Batchelder and Root, 1994; Eyler and Giles 1999)' (Bringle and Hatcher, 2005: 31). Furthermore, Battistoni (2002) adds political knowledge, critical thinking skills, communication skills, public problem-solving skills, civic judgement, creativity and imagination, community/coalition building, and organisation analysis as the skills of civic engagement. Thus, service-learning motivates a deep approach to learning as students use their education to benefit their communities, developing a wide range of skills in the process.[1]

As suggested at the start of this section, a deep approach to learning is demonstrated when students can 'transform factual information into useable knowledge' (Bransford, *et al*., 2000: 16). Such knowledge transfer is facilitated through the use of reflection and the incorporation of formative assessment in an environment that is both learner- and community-centered, qualities which are consistently present in service-learning experiences. Knowledge learned from rote memorization rarely transfers from one situation to another, but when students have opportunities to actively *use* principles learned in the classroom, they develop an understanding of *how* and *when* knowledge can be applied in different contexts. Howard (1993: 49) notes that participants in service-learning activities:

- apply knowledge by applying and testing academic learning;
- synthesise knowledge by bringing together past and present learning to add coherence to students' studies;
- critically think and analyse by learning to distinguish what is and is not important in the unfiltered context of the real world;
- learn about cultural diversity by learning with, from and about people different from themselves;
- develop values through experience with community issues and problems; and
- learn inductive reasoning by using specific experience as a starting point for hypothesising and theorising.

Applied in the context of economic education, service-learning requires students to actually perform activities that economists would perform: identify economic issues, formulate hypotheses, gather evidence, develop economic explanations, link evidence relating experiences with these economic theories, and make policy recommendations.

Examples of service-learning

Service-learning is a well-established pedagogy used by college and university faculty for over two decades (Stanton *et al*., 1999). Economists have used service-learning to promote deep learning in economics classrooms for over a decade (McGoldrick, 1998). Due to the flexibility of this pedagogical technique service-learning can be used in a multiple of ways in a variety of classroom settings.

Service-learning activities can be situated anywhere along a continuum from a limited single service experience making up a small portion of a course to an experience that serves as the basis for the entire context of the course. Thus, faculty can choose the level at which they wish to incorporate service-learning and faculty new to this technique can develop more comprehensive activities by starting small and building on these experiences over time. For example, faculty can incorporate service-learning into their courses through a series of iterative steps over several academic terms. Faculty initiate their development of a comprehensive service-learning project in the first semester by requiring students to identify and describe organisations in their community that address issues covered in the class. Students produce position papers documenting the needs of the community as reflected in the missions and activities of the organisations and also describe how course content relates to those needs. In a subsequent semester, students can be given the previously generated list of agencies and associated activities and be required to document their impact (in economic terms) on the community (see for example, McGoldrick, 1998). Finally, in a third semester, a more comprehensive project could be developed in conjunction with a subset of the documented agencies in which economic analysis is used to help address needs of the community. Regardless of the level of sophistication, each of these service-learning projects has the potential for deep learning because they integrate the critical elements as described above.

Service-learning experiences are also flexible in that students can be organised to participate in service activities individually, in groups, or as an entire class. Additionally, the service activity can take place at a single community site, at multiple sites or in the classroom. For example, a class on the economics of poverty might have students placed in a variety of agencies that serve the needs of the poor (soup kitchens, homeless shelters, etc.) or the class as a group might volunteer its time at a local Habitat for Humanity build. Alternatively, at the beginning of the term the class could choose an economic issue of local importance, and develop (in conjunction with community agencies) a project which addresses community needs. Over the course of the term, class members would individually investigate components of the problem using classroom content as grounding for the development of a set of viable action steps or solutions. At the end of the term, students would develop a

comprehensive report applying their economic knowledge and communicating their analysis through presentations to relevant community organisations.

Service-learning can also be incorporated into classes of different sizes. While service-learning experiences are most often described for classes of 30 or fewer students, the flexibility of this pedagogy enables it to be used in larger classes as well. For example, in large classes, students can be divided into groups to provide service at a number of community sites for a 'make a difference day'. Students then provide both individual and collective reports that reflect upon their service activities using a defined set of theories or concepts learned in class. Following the service experience, spokespersons for each group report on how those theories relate to their service experience. The class as a whole then reflects upon differences discovered across service sites. Alternatively, Caplan (2002) describes how 100 economics principles students helped community members survey the healthcare needs of an underserved population in Ogden, Utah.

The flexibility of service-learning pedagogy also suggests that it can be developed within a variety of educational formats. An instructor teaching a class that meets for lecture three times a week might add a weekly service component to the class and integrate content through class discussion or reflective writing exercises, while an instructor leading a course in the tutorial format might instead choose a single community problem or issue as the focus of a class project. As long as the service experience provides students with an opportunity to apply classroom learning in concrete and reflective ways, it can enhance deep learning in economics.

The descriptions above may lead readers to expect that service-learning projects are relegated to application-oriented elective courses. In order to dispel this myth, we briefly describe two examples of service-learning experiences developed for theoretical and mathematically-oriented courses. These two examples demonstrate that with a little planning and forethought, service-learning projects can be developed for any course.

Teaching theory

Economics is often described as a science that relies on deductive reasoning, moving from theory to example, and the way economic content is developed in most textbooks and classrooms follows suit. Even when examples motivate discussion they are typically grounded in accepted theory with no opportunity for students to practise developing their own explanations for what they observe. While more motivated students may be driven to understand why some realities do not fit neatly into theoretical models, others are satisfied with labelling these as anomalies. Follow up activities such as policy discussions are limited to more

superficial debates for and against existing policies as opposed to richer discussions that strive to understand the development of policies and the underlying assumptions about human conditions and behaviours. Learning under these conditions is likely to be surface as opposed to deep as students are not engaged with the material.

Service-learning, on the other hand, provides the opportunity to practise inductive reasoning and engage students. Beginning with a question such as 'Why do income differences exist across populations?' allows students in a principles or intermediate micro theory course to explore causes and effects. A service-learning project is initiated with students documenting income differences at the national as well as local levels. Community agencies that target lower income populations are then identified and components of their programmes described. Interviews with agency staff and surveys of those served provide both quantitative and qualitative data that help document sources of such inequalities and the effectiveness of existing policies. A report to the local government and community agencies identifying areas for potential improvement conclude the experience. Key to this approach is that it is learner-centered. Because students interact with the target population of economic policy and develop a report to an outside constituent, students are challenged to reflect upon their learning process. They must transfer their understanding of classroom material to address a community problem by explicitly stating assumptions rather than relying on the (often) implicit assumptions of textbook outlined theoretical models. Because students know their work addresses a concrete need in their community, they are better motivated to gather information necessary to propose policy solutions (however simplistic in nature) and generate a rich discussion of the problems that the policy is trying to address as well as the inherent difficulty of policy formation. Thus, service-learning promotes deep understanding of economic theory through reflection on the learning process and transference of classroom learning to community problem solving in a setting that is both learner- and community-centered.

Teaching statistics and research methods

Most instructors would agree that teaching courses in statistics and research methods are most effective when done through the use of applications. Unfortunately, the use of prepackaged data limits the learning opportunities for students who might some day be faced with collecting their own data. Experiential based learning provides a venue for the full process of analysis from data collection through results presentation. Furthermore, a statistics and research methods course can provide sorely needed help to community agencies that typically need evidence of impacts to justify future funding.

Gail Hoyt, a professor of economics at the University of Kentucky, outlines her use of service-learning in a research methods course that serves as the second course in a statistics sequence taken by business and economics students. (Hoyt, 2002) Although the course project is patterned after a more traditional research paper (developing a proposal, gathering data, summarising data, developing and estimating a regression model specification, and writing a comprehensive report), service-learning projects introduce new topics important to community partners for investigation . For example, students applied statistical analysis to projects associated with not-for-profit organisations (such as Big Brothers/Big Sisters, the American Lung Association, and the Helping Hand Center for Alzheimer's Patients), campus organisations (such as the student-athlete tutoring centre and residence life) and private businesses (such as a book store, the local airport and American Eagle Beer Distributors). Because the community partner depended on students completing the research project this provided a better source of motivation to learn class content. In reflecting on the decision to incorporate service-learning into an otherwise traditional research methods course, Hoyt suggests that '[t]his change was an enormous improvement as it required students to apply topics as they were presented, with the end result being a cohesive statistical analysis that truly developed the basic research skills of students' (2002: 138–9). Throughout the project, students were engaged with the community and received formative feedback from both the instructor and agency staff. While the learning objectives of this class are identical to those of a more traditional statistics course, the probability of deep learning is increased. The experience promotes transference of classroom learning beyond classroom walls; students found that statistics was no longer a tedious exercise but a tool to investigate real problems of importance to members of their community.

Getting started: adding service-learning to your class

Like any pedagogical technique, the successful incorporation of service-learning in a course relies on an implementation process. Critical, but often neglected, are the components of preparation and follow-up. Four steps outline the process:

1. Clearly identifying the course and student learning goals.
2. Identifying appropriate community members and community issues and problems consistent with course content.
3. Understanding the role of reflection and choosing a reflection method which will best help students to integrate classroom content and service experiences.
4. Identifying and resolving practical considerations of service-learning.

The first step in developing a successful service-learning project is to have a well-developed set of course goals and learning objectives. Objectives are important

in implementing active pedagogical practices for variety of reasons. Developing learner-centered objectives provides the opportunity for faculty to evaluate appropriate pedagogical strategies to facilitate what we really want students to learn. The process of developing objectives encourages instructors to keep the focus of a course on learning processes which contributes to the ultimate goal of having students achieve deep learning. Significant learning experiences have both process and outcome dimensions: the process of learning is energetic as students are engaged in their own learning processes and the outcomes of learning result in significant and potentially lasting changes in how students interact with their world (Fink, 2003: 6-7). Thus, it is important to document not only the content students should master in class, but also the learning outcomes students should achieve.

Saunders (1998) notes that complete learning objectives include not only well-defined learning outcomes and behaviors but also a 'statement of the conditions in which the student should be able to do it, and a statement of the criteria that will be used to judge how well it is done' (1998: 102). For example, an environmental economics professor might expect her students to be able to apply basic economic concepts and theories related to pollution. In order to demonstrate their knowledge, she might expect students to analyse the economic impact of a business practice such as a local manufacturing plant testing the use of inexpensive fuel made from recycled tyres. Students would be required to identify the affected constituents including those that may be positively impacted as cost savings are passed on in terms of lower prices and negatively impacted by the potentially harmful emissions. A course project requiring student groups to act as representatives of the impacted parties and developing position papers based on economic theories would further develop the theoretical applications.

Carefully defined content and learning outcomes facilitate the next step in integrating service-learning in the classroom, identifying community partners. Community partners play a key role in the learning process; they help students intellectually navigate between abstract classroom knowledge and concrete community experience. Community partners help students identify and understand community problems, they provide important context specific information throughout the service experience, and they provide important feedback as students strive to integrate their experience with classroom learning. Traditionally, partners are not-for-profit community or local government agencies that provide services to underserved populations. These agencies benefit substantially from the knowledge and expertise economics faculty and students have to offer. Tight budgets and limited resources restrict not-for-profit agency activities and well structured advice on improving the use of resources or enhancing project outcomes is welcome. Partnering with a not-for-profit can provide students with additional

learning experiences as they have the opportunity to study the differences between the profit and not-for-profit sectors of the economy. Engaging in service-learning experiences in the for-profit sector also provides significant learning opportunities. Like their not-for-profit counterparts, small businesses also have limited resources which may hamper efforts to undertake research projects that a carefully designed service-learning course could manage. Although identifying agencies may appear to be a time consuming activity, recall that students can be required to do this as one component of the service-learning experience. Alternatively, campus centres for teaching and learning and offices which coordinate co-curricular student volunteer activities typically have a wealth of information useful for identifying appropriate community partners.

While the possibilities for community partners are quite varied, the most critical component of service-learning is that the experience offers students opportunities for learning consistent with the objectives set by the instructor. Because connections do not necessarily occur spontaneously, careful thought and consideration should be given to providing opportunities for students to integrate their service experiences with classroom content. Deep understanding is enhanced with the requirement of well-thought-out reflection assignments. Classroom discussions or class specific electronic chat rooms, targeted writing assignments or student journaling are some of the many methods used to help students link service experiences with course content. Eyler *et al*.'s 1996 volume, *A Practitioner's Guide to Reflection in Service-Learning*, is a good resource to explore reflection options.

Faculty new to developing service-learning experiences have access to a wealth of resources that model effective projects, including details regarding the above described steps of setting objectives, choosing agencies and developing reflection exercises. A good starting point is the U.S. Campus Compact website (http://www.compact.org) which contains sample syllabi by discipline, guides and models of reflection, service-learning assessment tools and tool kits, potential conference and workshop activities, and links to research on service-learning outcomes. Of particular value is the Campus Compact publication *Introduction to Service-Learning Toolkit: Readings and Resources for Faculty*. Another important print resource is the American Association for Higher Education's 20-volume series on *Service-Learning in the Disciplines*, edited by Edward Zlotkowski. These volumes contain discipline specific descriptions of the theoretical underpinnings of this pedagogical practice and detailed course examples. Some journals have even dedicated entire issues to the use of service learning in their disciplines (*Academy of Management Learning and Education*, 2005). Another valuable source of information is provided by other faculty who have already incorporated service-learning in their classrooms. Campus centrers which focus on teaching and learning or specific US

state campus compact organisations (see www.ccompact.org/state for a list) can link faculty new to service-learning with seasoned practitioners. Finally, even if a particular campus lacks a teaching and learning centre, faculty can tap into resources through the internet: universities known for their service-learning activities offer good general advice on their websites (in the US these include the University of Utah, Brown University, Portland State University, Elon College). In short, the internet has shrunk our world with the result being a wealth of information on service-learning activities at our fingertips.

Addressing the challenges of service-learning

The final step in developing a service-learning project necessitates faculty reflection on some of factors that are typically posed as inhibitors of all active learning pedagogies. Common areas of concern include course content coverage, control over learning, preparation time and assessment. As with other pedagogical practices, many of these concerns can be addressed through planning and preparation.

Integration with course content

Perhaps one of the most voiced concerns associated with any active learning technique is the assumption that less academic content will be covered. In the case of service-learning projects, an additional text in the form of student experiences is introduced into the classroom. Achieving deep understanding necessitates that students integrate this experiential text with the traditional text. Opportunities for this integration start with reflection activities described above and continue throughout other components of the course including in-class discussion. Despite this added component, service-learning does not necessarily diminish content coverage; rather, it situates learning outside the classroom as students learn through their experiences. When students take ownership over their own learning experiences and become engaged in the issues, they become motivated to take responsibility for this learning and can be expected to practise more independent learning, providing the opportunity for richer analysis of content covered *in* class. Properly designed service-learning activities can facilitate the same content coverage as traditionally taught courses. However, even if the same degree of content coverage is not achieved, there is greater educational payoff to developing lasting, deep learning. Rather than the push to cover more content, which may only result in superficial learning of material, Ramsden notes that 'learning should be seen as a qualitative change in a person's way of seeing, experiencing, understanding, conceptualizing something in the real world – rather than as a quantitative change in the amount of knowledge someone possesses' (1988: 271).

The role of the instructor

Standing behind a podium at the front of the classroom may provide faculty with a sense of control. The instructor is in charge of the order and extent of material covered, orchestrates the story of the day, and controls the degree of student intervention in that narrative. This is a decidedly different process than what is generated using the community as a learning environment. There day-to-day operations of community agencies and student experiences are less predictable and amenable to faculty control. With service-learning projects, faculty provide the scaffolding to promote deep learning: rather than control the learning environment, the faculty's role is to design the necessary learning and follow-up activities that promote structured, reflective learning. The use of contracts between the community agency, the student and the instructor can align expectations of learning.[2] Additionally, unexpected experiences and project outcomes can be used as teachable moments through classroom discussion reinforcing the practice of learning for understanding (deep learning) and not simply rote (surface) learning as the key to preparing for life beyond college.

Preparation time

Incorporating a new pedagogical technique involves time and preparation. Like any pedagogical technique that moves beyond lecture, much of time investment occurs at the front end and is incurred by the faculty, while learning occurs throughout and is a benefit absorbed by the student. With constantly increasing demands on faculty time it is reasonable for many to claim that they are simply ill-prepared to incorporate such techniques. Matching students with organisations and ensuring that issues addressed by agencies can be linked to course content may appear to be a very time intensive activity, especially if one assumes the responsibility of making initial contacts with each organisation. Obviously, campus organisations such as engagement offices and teaching centres can minimise this pull on an instructor's time. Alternatively, as suggested above, faculty can implement the project over time and in stages. The important aspect to keep in mind is that the end goal is student understanding that is deeper, broader and more durable, and that this is promoted by well-constructed service-learning experiences.

Assessment

Some may argue that it is impossible to grade student service time. We agree. Yet it is not time that should be evaluated, rather it is the learning that this time facilitates. In fact, the same argument can be made for all assigned work in which the output (rather than inputs) are graded. Consider the case for both formative and summative assessment. The goal of formative assessment is to nurture

students towards achieving the defined learning objectives, providing feedback at times at which adjustments can be made. Formative assessment is naturally built into service-learning experiences through reflective assignments in ways similar to outlines and drafts that are used for traditional term papers. Typically these exercises are given less weight in the overall course grade because the primary focus is to provide feedback to students. Summative assessment involves the faculty providing a judgement as to the degree to which a student has ultimately demonstrated mastery of the learning objectives. Final papers and presentations differ in the service-learning projects only to the extent to which the theoretical underpinnings of the discipline are demonstrated through the community issue.

Other methods used to gauge the impact of service-learning are still evolving, in part because many of assessment practices used in conjunction with experiential learning are a compilation of evaluative methods developed within specific disciplines. Even leaders in the field admit that 'one of the greatest challenges to researchers is to identify and measure appropriate learning outcomes that service-learning might be uniquely designed to affect' (Giles and Eyler, 1998: 67). Yet such measures do exist, generating the evidence cited above that well constructed service-learning experiences do enhance student learning.

Conclusion

This paper provides economic faculty with the motivation and knowledge necessary to consider the use of service-learning for their courses. The theory of deep approaches to learning leading to deep understanding provides the organising structure through which it is shown that service-learning experiences support the development of critical thinking skills, integration of knowledge over time and subjects, theoretical application to practical situations and higher order skills of analysis and synthesis. Service-learning experiences are community and student-centered, challenging students to actively engaged with course material and integrate their experiences with course content. In other words, service-learning promotes deep learning and enables economics students to 'think like an economist' through the application of their knowledge beyond classroom walls.

Notes

[1] To date there are no empirical studies in economics that evaluate the effectiveness of this pedagogical practice. The final section of this paper addresses the question of assessment and provides a starting point for those motivated to measure economic specific cognitive gains.

[2] For an example of a learning contract, see Ball et al. 2002.

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Contact details

Andrea L. Ziegert
Department of Economics
Denison University
Granville, OH 43023
USA

Tel: (740) 587-6575
Email: ziegert@denison.edu

KimMarie McGoldrick
Department of Economics
University of Richmond
Richmond, VA 23173
USA

Tel: (804) 289-8575
Email: kmcgoldr@richmond.edu