Nurturing social responsibility through community service-learning: Lessons learned from a pilot project

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Abstract

Background: Community service-learning (CSL) has been proposed as one way to enrich medical and dental students’ sense of social responsibility toward people who are marginalized in society.

Aim: We developed and implemented a new CSL option in the integrated medical/dental curriculum and assessed its educational impact.

Methods: Focus groups, individual open-ended interviews, and a survey were used to assess dental students’, faculty tutors’ and community partners’ experiences with CSL.

Results: CSL enabled a deeper appreciation for the vulnerabilities that people who are marginalized experience; students gained a greater insight into the social determinants of health and the related importance of community engagement; and they developed useful skills in health promotion project planning, implementation and evaluation. Community partners and faculty tutors indicated that equal partnership, greater collaboration, and a participatory approach to course development are essential to sustainability in CSL.

Conclusions: CSL can play an important role in nurturing a purposeful sense of social responsibility among future practitioners. Our study enabled the implementation of an innovative longitudinal course (professionalism and community service) in all 4 years of the dental curriculum.

Introduction

Service-learning has generally been proposed as a way of sensitizing future health professionals to health disparities and the needs of vulnerable populations (Seifer 1998; Kahne & Westheimer 2001; Brill et al. 2002; Haq et al. 2002; Mayne & Glascoff 2002). As a result, the Committee on the Accreditation of Canadian Medical Schools (CACMS) and the Liaison Committee on Medical Education (LCME) in the United States officially adopted a new accreditation standard that requires medical schools in North America to offer service-learning activities to medical students. The new standard took effect on July 1, 2008. Dental schools in North America, however, are not obligated to offer service-learning as part of program accreditation requirements. Nevertheless, there is a growing interest in dentistry to use community service-learning (CSL) as a pedagogical tool for preparing students to be community and socially responsive (Rubin 2004; Dharamsi 2006; Graham 2006; Harrison et al. 2006; Yoder 2006; Hryhorczuk et al. 2008).

This article reports on a study of dental students’, faculty tutors’ and community partners’ experiences and perspectives on the educational impact of a pilot CSL initiative introduced to foster a better understanding of the social determinants of health and ways of addressing related health disparities.

Practice points

- CSL is becoming an increasingly common pedagogical tool for preparing students in the health professions to be community and socially responsive.
- CSL can enable a deeper appreciation among future health practitioners of the vulnerabilities that marginalized segments of the population experience.
- Critical, structured reflection in CSL can enable students to challenge their taken-for-granted assumptions about vulnerable communities.
- Participatory approaches to curricular development can create an inclusive, enabling and empowering learning environment.

Background

The first 2 years of the Doctor of Medicine (MD) and Doctor of Dental Medicine (DMD) programs at the University of British Columbia (UBC) are integrated. Medical and dental students are taught together using a hybrid problem-based learning curriculum (Broudo & Walsh 2002). The hybrid model enables a range of teaching and learning strategies including lectures, cases, seminars and student led projects. Just over a decade...
ago, a new course entitled, ‘Doctor/Dentist, Patient and Society’ (DPAS) was introduced to enhance the communication skills of future physicians and dentists (Kent 1998). The course has evolved and now also introduces students to the social determinants of health by linking core concepts from the humanities and social sciences with the clinical and basic sciences. It is an interdisciplinary course taught across the first 2 years of the curriculum by faculty from different departments within medicine and dentistry, including guest lecturers from various community organizations. A combination of lectures and small group tutorials address topics such as the patient–doctor relationship, ethics, community and public health, culture, addiction medicine, and health disparities.

Over the years, many students complained that although rich in theory, the course failed to provide them with practical knowledge and skills to address the social determinants of health and to respond to the needs of socially disadvantaged and medically underserved segments of the population. As a result, several students have criticized the course as *fluff*, suggesting that it is of little practical significance. Moreover, dental students complained that DPAS lacked a dental context. One dental student expressed on behalf of others that the course needs to have a greater focus on addressing oral health disparities and related professional obligations:

> We feel that there is a perception among our peers that dentists are greedy and socially inconsiderate people; and that we are the cause behind health care problems by not providing care to those in need. We are disturbed by this perception and want to change it. How can our education help us? (Personal email communication from a student to SD)

In response to student concerns and in light of the anticipated new accreditation standards in medical education, a CSL option was introduced on a pilot basis.

### The CSL option

Although many medical students were receptive to the new option, most of the dental students were reluctant to participate. Several dental students saw it as a ‘make-work project’ with little potential to help them learn anything of perceived dental value, while some felt that the medical students in the group would be less likely to embrace projects around oral health.

In collaboration with faculty and a small group of representative dental students, an educational proposal was developed and subsequently funded by the UBC teaching and learning enhancement fund (TLEF) to design and implement a separate CSL course for dental students, and to assess its impact on student attitudes towards disparities in health care and the needs of vulnerable people.

The course was developed using a participatory approach – working closely with students and consulting with various community-based organizations during the development of key learning objectives and outcomes. The intent was to nurture a sense of social responsibility within the next generation of dentists so they could respond to the disparities in health care and the needs of those people in society who are rendered vulnerable because of various social, economic, political, environmental, and biological influences that prevent them from protecting their own needs and interests (Dharamsi & MacEntee 2002).

#### Project planning, development and implementation

Eight self-selected dental student groups were formed based on their interests in working with a community partner representing a particular segment of vulnerable people: inner-city school children, frail elders in long-term care facilities, a women’s community centre, and a clinical preventive health care society. Student projects were focused primarily on health promotion initiatives. Each group was assigned a faculty tutor who met with the students on a weekly basis to provide guidance and to monitor progress.

The students began by conducting a needs assessment and situational analysis. This required the students to meet with their community partner, and to find any information available to provide a greater insight into the community they would serve. For example, students who selected an inner-city school conducted a site visit, met with teachers, and gathered government census data for information on the demographic and other characteristics of the neighborhood where the school was located. All projects were developed in consultation with the community partners. Project implementation and evaluation occurred in the second term. A poster fair was held at the end of the term where students shared the outcomes of their CSL projects with fellow students, faculty and community partners.

The Course Director (SD) conducted a series of capacity-building workshops throughout the academic year for faculty tutors and students, including discussions around lessons learned from various CSL initiatives across academic disciplines, potential applications to the dental CSL curriculum, reflective journaling and critical incident reporting, and how the dental curriculum can best foster the students’ sense of social awareness and responsibility. A key aspect of the workshops was to engage students and faculty tutors in dialogue on the differences between charity conceptions of service-learning to one based on social justice. Many outreach service-learning efforts in dentistry tend to take an almost exclusively charity-based approach – providing dental services or relief to people who cannot access care and who are in desperate need. Charity-based outreach activities tend to focus on providing resources, time, knowledge, and clinical service to vulnerable people. This is not only difficult to sustain, but also creates a dependency relationship (Smith et al. 2006). Charity approaches are seen simply as band-aid solutions that do not address the root problem of health disparities (Mouradian 2006). A social justice approach, on the other hand, requires students to focus their efforts on understanding and working to change the structural or institutional factors that contribute to inequitable conditions. Service-learning activities within a social justice framework enable an equal and collaborative partnership with communities (Kendall 1990); develop mutual capacity to address the root causes of systemic social inequity and disparity (Monard-Weissman...
Reflective journaling and critical incident reporting

Students were asked to keep a reflective journal to record their service-learning experiences, thoughts about the social determinants of health, and concerns about disparities in health care as they planned and implemented their projects (Strauss et al. 2003). Using the critical incident technique (Mofidi et al. 2003), students were requested to reflect and write about how various events and experiences during their CSL activities influenced their thinking on charity versus social justice approaches, and their sense of social responsibility. The aim of reflection and critical incident reporting was to enable students to challenge their assumptions of the relationship between poverty and poor health, the impact of illness on already vulnerable individuals, the challenges that vulnerable segments of the population face, and the role the dental profession can play to respond to disparities in health care. The journals were read by the tutor who provided written comments that would stimulate further thinking.

To enable students to enact their health advocacy role, the journaling activity culminated in a Letter to the Editor assignment whereby students were asked to select a dental journal or a newspaper and write a letter to the editor on a topic related to promoting oral health in vulnerable communities. Students wrote about a broad range of issues such as the oral health of the working poor and dentistry’s social contract.

Poster fair

A poster fair was organized at the end of the term where the students presented the outcome of their health promotion projects in poster format to faculty, senior students and community partners. Students learned how to develop a poster presentation and to communicate what they learned, the impact of their work, and related challenges, successes and recommendations. Presentations were graded by a team comprising faculty and community partners. The best poster received recognition.

Methods

Approval to study educational impact was obtained from the Behavioural Research Ethics Board of University of British Columbia, Canada. Focus groups, individual open-ended interviews, and a survey were used to explore the students’, community partners’, and tutors’ experiences and opinions of the CSL initiative.

Focus group interviews

In-depth focus groups and individual interviews were conducted with consenting students, faculty tutors, and community partners to probe their opinions on the CSL experience (DiCicco-Bloom & Crabtree 2006). Twenty-one students (grouped according to their service learning projects), and four of the eight faculty tutors participated in the focus groups. Five of the seven participating community organizations consented to be interviewed. All of the interviews and focus groups were audio recorded and transcribed verbatim for analysis. Interviews and focus groups were analyzed in sequence, so that information from one interview could guide the course of the discussions during the next in keeping with the usual conduct of interviews during an inductive exploration (Kvale 1996). Each interview was subjected to a process of coding using NVivo 7 software (QSR International Ltd.) to identify and group related narratives and quotations. The codes provided the basis for identifying patterns that were grouped into main themes.

Guided by Braun and Clarke’s (2006) work on Thematic Analysis, we identified patterns from the narratives and we explored how the participants created meaning from their experience in relation to the questions in our interview guide. We also considered how the context (relationship between students, with their community partners, and with their tutors) and structural conditions (experiential learning versus learning in a classroom) may have influenced individual and group accounts of the educational impact of CSL.

Survey

Immediately upon the completion of the service-learning projects, participating students were requested to complete a descriptive survey adapted from a questionnaire developed and validated by Kuthy and colleagues (Kuthy et al. 2007). Twenty-one students out of the total of 36 completed the survey. Information elicited included students’ past experiences and future willingness to provide care to vulnerable people, their perceptions of comfort and anticipated feelings toward providing health care to underserved populations.

Results

The significance of community engagement facilitated through service-learning surfaced as an overarching theme. Five subthemes were identified following the analysis of the focus groups, individual interviews and surveys: (1) witnessing, (2) the value of experiential learning, (3) building relationships, (4) wanting more structure, and (5) a desire to see the projects continue.

The importance of community engagement emerged as an important aspect of the service-learning experience.

I wanted to tell you how excited I am to see dental school is not all about long hours of studying and feeling disconnected from society…thank-you for firing this interest in us.

Hence, students, tutors, and community partners all stressed that health professions education should include a community-based service component focused on addressing health disparities based on community identified needs. Their views are echoed in a statement from one of the community partners:

Effective community engagement requires much more than the desire to help; it should address the needs of the group.
There was a growing realization among the students and faculty of the importance of building relationships by getting to know the community better, becoming involved, and developing a project by working with communities to promote and educate vulnerable people about the importance of oral health care. Hence, the most emphasized student recommendation for future students and faculty centered on ensuring that community partners were adequately consulted:

[Tell students and faculty] that we are not going to do anything until we go and see the community.

Meeting with the community partner at the outset allowed students to collaboratively address community identified needs, which resulted in a better project proposal. Student groups that met early and more frequently with their community partner expressed more meaningful and rewarding experiences and outcomes. The following situation, as reported by one of the faculty tutors, could be avoided if students know the community better before developing their proposals:

The project changed half way through it; we could not find common ground with what [the community partner] wanted. And we could not do the partner’s proposal in the 7 months we had. So we ended up moving the project and I and the students found that very frustrating, and then we were concerned that [we] were left far behind.

It became obvious that a good community connection at the beginning of the project is a key step: ‘even a small difference at the start, can [result in] a big satisfaction at the end of the project.’

Witnessing

The students emphasized that being in the community helped them to develop a deeper appreciation and understanding of the challenges people face. For example, one student indicated that: ‘Witnessing was a lot more powerful than being told...just being there, seeing and talking to the people.’ In essence, CSL gave students the opportunity to learn by observing and acquiring first-hand knowledge about how social determinants affect people’s lives.

Just to have a sense of what the situation is in the communities...when you are lectured on things like...socio-economic status, it doesn’t quite sink in, you really need that personal experience to kind of realize [and] to see those communities and be out there, and to see kids with rampant cavities. I have never seen it in my school when I was going there. It is just different than being told in a classroom.

Community partners expressed that CSL created opportunities for the students to observe some of the harsh realities that some people live with – an experience that few if any of the students have ever faced. One of the community partners summarized that CSL helps, [students] put things in perspective: here’s the dentist, in the office, where the patients come in... so there’s another part of the world that doesn’t get there; going to a women’s shelter, going to the prisons, [and] going to long-term care facilities gives students a more real perspective.’ It became obvious to many students that working with people who are vulnerable reveals that, ‘there is a lot going on at really unspoken levels.’ There was a general feeling among the participants that CSL can create a level of awareness that a vulnerable community ‘desperately needs good physicians and good dentists.’

Value of learning experientially

Although problem-based learning is seen generally as having positive pedagogical impact compared to a strictly lecture-based approach, having the opportunity to plan a project for ‘real life’ implementation through CSL also created for many students an enhanced and more meaningful learning experience. Hands-on opportunities that required students to activate knowledge into action helped them to appreciate the value of learning experientially. As one student expressed:

It’s also great putting out ideas and just thinking of what you would do in that scenario. But when you’re actually in the scenario, when you have to do it, you end up thinking a lot more.

One of the community partners summed it up well that students expressed a strong sense of achievement because they ‘actually did something...they contributed to solving the community needs’, and saw ‘so much planning coming together.’ Many of the students also felt the same way: ‘This project gave us the opportunity to walk-the-talk and not just talk-the-talk.’

The importance of building relationships

The students consistently pointed out the importance of building positive relationships with the community and the value of having honest and open discussions:

The bonding and camaraderie that we built...was great. They were laughing, made lots of dentist jokes, and very seriously and openly discussed a lot of the problems that they had been having with receiving proper dental care. They actually mentioned that they never had the opportunity before to get proper answers to all of their dental concerns, and they really appreciated our willingness to discuss everything even the flaws in our chosen profession.

The appreciation and positive feedback students received from their community partners was perhaps one of the most rewarding aspects of the CSL experience:

the kids would be running up to you in the school yard or would see you in the halls and they were very excited that you were there, and they would know your name, they knew all of our names! [Teachers] actually told us: ‘you did a great job, we really appreciate you being here...we are so happy that this came about.” That was reward enough.
CSL also enabled the students to also realize the value of communication and respect in patient care. They learned how to communicate better, how to be more sensitive and responsible, and how to interact in ways that create positive and enjoyable working relationships:

This experience has opened our eyes to the motivations behind being involved in the community. In the process of putting this project together we learned a lot about teamwork and how to integrate and relay our professional knowledge in a relatable way to the public. It was an extremely rewarding experience [that] taught us the most important lesson of all, about the value of communication and respect in patient care.

The community partners indicated that it was a ‘learning process that raises students’ awareness and assists them in learning how to make relationships and connections.’ They also found that the CSL experience helped to ‘dispel some of the stereotypes [students] have about people’.

Wanting more structure

Some students complained initially that CSL was not as structured as they would have liked, particularly within the context of a heavy professional school curriculum. The students realized that community engagement is not a straightforward process – it takes effort, negotiation, and patience. Some students wanted a syllabus laid out for them, with conventional expectations:

We had different expectations; we are really used to getting marks through assignments and tests. We want to pass the program, we want to do what we need to do to fulfill those requirements . . . we didn’t have a nice layout in a document that said: you need to give those deliverables in order to pass the course.

For this reason, a few students suggested developing a CSL ‘guide book’ that outlined in advance ‘communities’ problems and needs’. A few suggested that, ‘having community organizations send requests of problems they are facing’, and ‘knowing resources and budget from the beginning if possible’ would make it easier for them to develop a relevant project.

Desire to see project continue

Students, faculty and community partners all expressed a strong desire to see the projects continued by future CSL students:

I hope somebody carries our project on. I really want someone to go there and continue. We designed the project . . . with the idea that the project could be carried on. It was something that the school really wanted, something that was long-term and sustainable.

Several students made comments such as: ‘I definitively recommend going back;’ ‘it was really gratifying;’ and ‘very stimulating.’ From the community partners’ perspectives, CSL was seen as an opportunity for ‘reciprocal learning and gain-gain situations’ between students and community members. Hence, collaborative and participatory approaches to developing learning objectives and related outcomes with the community were seen as crucial for sustainability.

Survey results

Twenty-one students participated in the exit survey (11 female and 10 male students). Not all of the students who participated in the exit survey responded to all of the questions.

Results indicate that students mostly expected they would provide care in the future to underserved population groups, but there were some exceptions; for example, for the home-bound, homeless and jail inmates (Table 1, available at informahealthcare.com/doi/abs/10.3109/01421590903434169). Comfort levels and feelings toward providing care were positive in generally similar proportions except for more negative feelings toward providing care for drug users and extracting savable teeth (Tables 2 and 3, available at informahealthcare.com/doi/abs/10.3109/01421590903434169).

Stigma seemed to play a role, over and above the lack of past experience in treating these groups; for instance, 18 of 19 students indicated that they would provide care to inner-city school children, even though only 4 of 18 indicated they had previous experience (Table 1, available at informahealthcare.com/doi/abs/10.3109/01421590903434169).

Other survey results included the following: 62% of the students responded that CSL provided them with a valuable learning experience in the areas of communication, health promotion planning, patient education, patient management, addressing health disparities and staff management. Fifty percent indicated that community-based volunteer work was either very important or important to their professional and personal life. Eighty-one percent of the students acknowledged that they learned new skills and techniques while participating in the CSL experience. Students reported that the primary barriers that would likely prevent them from contributing to community-based volunteer activities in the future were time limitations (71%), debt incurred from education (67%), financial obligations (57%), and the lack of awareness of opportunities (10%). Only 5% reported no barriers.

Discussion

UBC’s educational mission calls for teaching and learning approaches that foster graduates to be ‘responsible members of society, [who] will value diversity, work with and for their communities, and be agents for positive change’ (Trek 2010). Our research revealed that a CSL option developed and implemented in consultation with students and community partners can help toward achieving this goal. Our findings provide a useful insight into the benefits of learning experientially, developing projects that are implemented and evaluated in collaboration with communities, responding to community-identified concerns, balancing service provision with critical, reflective learning and applying learning to real-world situations. Students and faculty tutors indicated a deeper appreciation of the vulnerabilities that marginalized segments

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of the population experience; the development of communication skills and respect; ability to create enjoyable and reciprocal working relationships with community groups; a better sense of the social determinants of health; and the development of skills around project planning, implementation and evaluation. Community partners indicated that a sustainable CSL initiative requires partnership and collaboration with community organizations and a participatory approach to course development.

Our students also realized teaching and learning within a CSL context is not a neatly structured and pre-packaged activity, with a clearly specified time schedule that students are used to. Students and faculty needed to be flexible and patient. Service learning is messy: it requires students to get to know their communities, to build relationships, to be reflective, to think critically, to negotiate, and to deal with real people with real challenges. Given the demands of a professional school curriculum, some students would have easily settled for a neat and tidy teaching and learning activity.

One fundamental aim of this initiative was to create a sustainable curricular model that allows students to engage communities they will serve as future health care practitioners (i.e., work with the community to know its needs, develop care models in collaboration with communities, and deliver care to underserved populations). Our aim was achieved by providing students the opportunity to inform curricular development, share their experiences, articulate advantages and challenges of various parts of their service-learning experiences, and to suggest ways that community service initiatives in future years can and should be improved. Our experience supports the findings in the literature that CSL increases student awareness of unmet health needs and their responsibility to address health disparities among vulnerable populations (Smith et al. 2006).

Other studies too have reported that prior experience with underserved groups has a positive impact on the comfort level of students and a positive influence on their perceived future willingness to treat vulnerable segments of the population (Kuthy et al. 2005). Nevertheless, our study also reveals that stigma plays an influential role; for example, students are less comfortable and less willing to treat drug addicts and jail inmates. Perceived time limitations, debt incurred from education, and financial obligations are also seen as primary barriers that would likely prevent future practitioners from contributing to community-based volunteer activities following graduation.

Limitations

Hawthorne effect and volunteer bias may be present. The data collected for this study were self-reported. The participants have varying ability to reflect, express, and precisely articulate their experiences. Furthermore, several participants reported on experiences that occurred over the course of many months. The time delay between their early experiences and interviews for this study might have affected or biased certain perceptions and recollections. In addition, the interviews asked for participants’ perceptions of the effects of their service-learning experiences on social justice, multicultural competence and civic engagement. This does not imply a causal relationship, but rather the participants’ self-reports of change.

Future directions for research

This study has illustrated some of the predisposing and enabling educational factors that make it possible for students to feel comfortable engaging with people who are marginalized in our society. It has also demonstrated that CSL is one educational model that may help students to understand and embrace their role as health care providers in underserved areas. Health professions education can play an important role towards this goal by considering CSL as an essential part of the curriculum and developing strategic partnerships with communities (Bradford et al. 2007).

While it appears that prior exposure enables students to feel a little more at ease with people who are marginalized, such as people who are homeless or drug users, future research is necessary to explore ways of increasing the comfort level of students without this prior experience. Although CSL may provide an appropriate context for learning social responsibility (Dharamsi et al. 2007) by enabling students to feel increasingly comfortable with people who are marginalized (Dharamsi 2006; Yoder 2006; Davis et al. 2007), future research is needed to measure indicators aligned with social accountability after the students enter clinical practice. While the immediate impact appears to be positive, longer term sustained change will be important to measure.

CSL is also a relevant context in which to engage students in interprofessional learning. The needs of people who are vulnerable are many and complex, requiring the expertise of an interprofessional team of care providers. Placing interprofessional teams of students into CSL experiences could enable collaborative approaches to service delivery that can enhance health outcomes significantly. Testing interprofessional learning in CSL within the context of vulnerable people is one more area for future research.

Conclusions

How medical and dental students are educated can play an important role in how they will respond to health disparities. CSL offers students an experiential and transformative pedagogy to develop knowledge and skills to learn about social determinants of health and related disparities, and to respond to community-identified concerns. It seems to facilitate a deeper appreciation among future health practitioners of the vulnerabilities that marginalized segments of the population experience, nurture a purposeful sense of social responsibility, and help develop better communication and health promotion project planning, implementation and evaluation skills.

Findings from this research enabled the development and implementation of a new longitudinal community-based service-learning course entitled, ‘Professionalism and Community Service’ (PACS). Unlike DPAS, which is offered in the first 2 years of the medical curriculum, PACS is integrated within all 4 years of the dental curriculum.
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References


Supplementary material available online

Table 1. Student past experience and future willingness to provide care

Table 2. Comfort in providing care for the following groups

Table 3. Students anticipated feelings towards providing care