



Different Roles, Same Goal: Students Learn about Interprofessional Practice in a Clinical Setting

Susan Takahashi, RN, MSc(A)

Clinical Nurse Specialist, Shriners Hospitals for Children – Canada
Montreal, QC

Sharon Brissette, RN, MScN, DIA

Director of Nursing and Patient Care Services, Shriners Hospitals for Children – Canada
Montreal, QC

Kelly Thorstad, RN, MSc(A)

Clinical Nurse Specialist, Shriners Hospitals for Children – Canada
Montreal, QC

Abstract

The Shriners Hospitals for Children – Canada has developed an innovative Interprofessional Education Program to help tomorrow's healthcare professionals gain the skills and knowledge they need to work effectively in teams to provide efficient, collaborative and family-centred care. Undergraduate students in nursing, physiotherapy and occupational therapy participated in group discussions, seminars by staff members and group presentations. Students reported increased understanding of their own and others' roles and a more holistic view of patients and families, and demonstrated their ability to work in teams to create collaborative care plans. Facilitating factors were a strong existing interprofessional team, administrative buy-in and support, consistent clinical nurse specialist involvement and strong, enthusiastic students. Challenges included logistics, time taken away from students' regular clinical time, time required of staff for program planning and implementation, and the difficulty of evaluating effects on patient care. The program shows promise as a way of introducing students to interprofessional practice and giving them a chance to practise their newly acquired skills in a clinical setting. It also has the potential to enhance staff awareness of interprofessional issues and facilitate staff development.

Introduction

There is increasing recognition that the current healthcare environment requires professionals to work collaboratively to provide the best possible care to patients and families. It is clear that effective teamwork results in improved communication and continuity of care, and decreased conflict, competition and redundancy, ultimately leading to improved quality of care and better patient outcomes (Allison 2007; Gilbert 2005; Herbert 2005; Keith and Askin 2008).

The importance of interprofessional education (IPE)

Key requirements for effective interdisciplinary practice are respect for, and familiarity with, the roles of colleagues in different professions, as well as communication and teamworking skills (Cook 2005; Oandasan and Reeves 2005a; Suter et al. 2009). However, these components have not consistently been an area of focus in the education of all healthcare professionals. Interprofessional education was designed to address this gap. Defined by the UK Centre for the Advancement of Interprofessional Education (2002) as occurring “when two or more professions learn with, from and about each other to improve collaboration and the quality of care,” this type of learning can take place in either the classroom or the clinical setting and may include students or practising professionals.

IPE initiatives are being undertaken internationally to improve healthcare delivery (Cook 2005; Wilcock and Headrick 2000). Academic settings have begun to incorporate IPE in their curricula via such strategies as classroom sessions, problem-based learning exercises and journal clubs (Cook 2005). Students are also organizing their own educational activities focused on interprofessional education and practice (for example, the National Health Sciences Students’ Association at www.nahssa.ca). Introducing IPE into the clinical setting provides a unique opportunity for students to see how interprofessional collaboration works in the “real world” and how it can improve the quality of patient care (Cook 2005; Gilbert 2005). This approach also affords clinical staff members involved in the program the opportunity to reflect on their own interprofessional skills, knowledge and practice.

An ideal setting for clinically based interprofessional education

The Shriners Hospitals for Children (SHC) – Canada is a 40-bed university-affiliated hospital specializing in the treatment of orthopedic and neuromuscular conditions and injuries in children. The hospital has a busy outpatient department, with specialty clinics focused on the special healthcare needs of a variety of patient populations. The spina bifida population has particularly complex care needs that make a collaborative team approach absolutely essential. The clinic team includes physicians, nurses, physiotherapists, occupational therapists, dieticians and social workers. A nurse care coordinator ensures continuity of care for patients and families by coordinating patients’ multiple appointments and holding team meetings to

facilitate collaborative interprofessional care planning and problem-solving. Over the years, our spina bifida team members have learned to communicate effectively and to understand and respect one another's roles in order to provide coordinated, comprehensive care. Cook (2005) describes the value of a role-modelling approach, which exposes students to units with highly functional interprofessional teams. With this in mind, the SHC – Canada set out to formally integrate IPE into the clinical setting in our spina bifida clinic.

The Interprofessional Education Program (IEP)

Program objectives

Understanding of the roles of healthcare team members and effective communication have been identified as core competencies for collaborative practice and have been linked with positive outcomes for both patients and providers (Suter et al. 2009). Therefore, the primary objective of this program was to provide an opportunity for students to (a) develop an understanding of the expertise that each profession brings to the management of health issues, (b) learn and develop clinical expertise together and (c) develop an understanding of team dynamics, communication skills and conflict resolution within the context of a well-functioning team. A secondary objective was to enhance the spina bifida team's own understanding of interprofessional practice and teamwork, thereby further improving team functioning. Both objectives were undertaken with the ultimate goal of improving the quality of patient care.

Program organization

The program, piloted in May 2006 and repeated in May 2007 and May 2008, was planned with guidance from the McGill Educational Collaborative on Interprofessional Collaboration and was designed to fit within students' usual clinical placements at the hospital, as an additional "bonus" component particular to this clinical setting. The spring clinical placement was chosen as the best time to pilot the program because nursing, physiotherapy (PT) and occupational therapy (OT) students were all present in the clinic on a full-time basis for a five-week period. Each session involved two nursing students, two physiotherapy students and one occupational therapy student.

Program components

The program was developed in accordance with IPE principles outlined in the literature (D'Eon 2005; Oandasan and Reeves 2005a). Students began with an introductory session consisting of a program overview, review of the theoretical basis of interprofessionalism, discussion of previous interprofessional experiences and brainstorming on the roles of different health professionals. Additional presentations provided background information about spina bifida and the contributions of various team members to the care of these patients. During the

program, students participated in several spina bifida clinic days, meeting prior to each clinic day to review patients' charts and discuss potential issues and plans of care. Students then followed patients in interprofessional groups throughout the day to each of their appointments with the different professionals, enabling them to appreciate the various members of the healthcare team in action, demonstrating their particular skill sets. Students also participated in interprofessional team meetings and were debriefed the following day by the clinical preceptors and the IEP coordinator. For their final assignment, students worked in interprofessional teams to develop collaborative care plans for hypothetical patient cases. These were presented at the end of the placement to the IEP team and other interested staff.

Program evaluation

Several authors have described the current lack of evidence of the benefits of IPE on actual practice and on quality of patient care and have called for further research (Cook 2005; Gilbert 2005; Illingworth and Chelvanayagam 2007). However, evaluation of outcomes is complicated for a number of reasons. First, there is no standard way to offer IPE. Programs vary widely in content, methods and structure. In addition, there is little agreement about what the expected outcomes of IPE are and how they should be measured. What do we expect in terms of outcomes for students? For patients and families? For preceptors? For the healthcare institution? Do immediate effects on student or staff knowledge and attitudes translate into long-term changes in practice? If so, with multiple factors affecting the practice environment, would this translation necessarily result in improved patient care? Initial attempts to evaluate IPE programs focused on such outcomes as students' attitude changes. However, as Steven and colleagues (2007) note, IPE is a complex intervention that may be better evaluated by examining the learning processes that occur during such an intervention. Oandasan and Reeves (2005b) also describe alternative outcomes to consider when evaluating the impact of IPE initiatives, such as learners' views of the experience and their acquisition of knowledge and skills. According to Gilbert (2005: 35), the benefits of IPE may not be tangible but may simply "accrue through shared respect, esteem, and trust of interprofessional partners who have been educated together in teams." It seems evident that professionals who communicate well and understand one another's roles would provide more effective and efficient care by decreasing duplication and conflict. D'Eon (2005: 54) gives a compelling argument for the necessity of IPE: "Learning must prepare students for the real world in which they will work. If that involves teams of health professionals working together, then the learning needs to model and teach skills that contribute to that goal ..."

The SHC – Canada is working with the McGill Educational Initiative on Interprofessional Collaboration to formally evaluate this and similar programs. For this purpose, students completed a number of questionnaires before and after

the program, and kept reflective journals about their interprofessional experiences. These data have been presented by the McGill Educational Initiative (Asseraf-Pasin et al. 2007b; Asseraf-Pasin et al. 2007a). In addition, to illuminate the learning process and for program improvement purposes, feedback from students and staff team members was gathered more informally throughout the program and in a final wrap-up session. This case study report describes this feedback and other observations in order to give a broad view of possible outcomes of IPE.

Responses from the students were overwhelmingly positive. They reported an increased understanding of, and respect for, their own and others' roles. According to Lidskog and colleagues (2008), this is an important outcome of IPE. Students expressed satisfaction with the experience, reported gaining knowledge and skills that they believed would be helpful in their future careers, and recommended expansion of the program to other healthcare settings. In their final presentations of the collaborative care plans they had developed, the students demonstrated their understanding of the needs of patients with spina bifida as well as familiarity with one another's roles and an ability to work together in a collaborative manner. Their new knowledge was also demonstrated by their comments during wrap-up sessions and final questionnaires. One student group showed its new understanding of collaborative, patient-centred care by conceptualizing it as "different roles, same goal." In addition, by following a particular patient and family through a clinic day, students reported that they were able to gain insight as to what the family's clinic experience is like and how overwhelming it can be to see so many different professionals in one day.

Clinic team members enjoyed participating in the program and were pleased to note increased interaction and socializing among the students from different disciplines. They were impressed with the quality and thoroughness of the care plans presented by the students. Some staff members reported that after participating in the IEP, they were more aware of interprofessional issues in their own practice. The IEP gave them opportunities to learn about interprofessionalism and to practise their own interprofessional teamwork during program planning and execution. In addition, students raised some questions and issues related to interprofessional interactions that stimulated team members to re-examine clinic processes.

Facilitating factors, challenges and recommendations

Several factors contributed to the success of this pilot project. Others have described the importance of organizational and logistical challenges in offering IPE (Nisbet et al. 2008; Oandasan 2005b). Fortunately, in our case administrative buy-in and support ensured the dedication of an IEP coordinator to facilitate program planning, implementation and evaluation. Furthermore, preceptors from the spina bifida team were given dedicated time for program planning and execu-

tion. Arranging for everyone to be in the same place at the same time can be a significant barrier to the coordination of clinically based interprofessional education programs, as the various schools and faculties operate on different course schedules and clinical rotations. Thus, a key factor in the success of the IEP was cooperation and mutual support between leaders in the academic setting and the hospital, helping us to take advantage of factors particular to our setting: the fact that the students from the different professional programs have overlapping clinical placements each spring and the long-standing existence of an effective interprofessional team in the spina bifida clinic. The latter was an essential component to ensure that the students had real-life role models. Every clinical setting is different, and each one will likely face unique logistical challenges. This reality underscores the need for administrative support and creative thinking to work around limitations such as staff and student scheduling.

The important question of timing of the IEP in the students' training has been debated in the literature (D'Eon 2005; Oandasan 2005a). In our experience, student and staff participants agreed that offering such a program in the second or third year of education is ideal, so that students will have developed a sense of their own roles in the healthcare team but are still able to step outside the culture and biases of their respective professions.

Some hospital staff and students voiced concerns about the extra time required by the IEP and questioned whether the students were missing out on other clinical opportunities because of their devotion to IEP activities. In order to address these concerns the second time the program was offered, some of the sessions were consolidated and shortened to retain the essential core of the program while decreasing the time commitment for students and staff. In the future, as IPE is recognized as a vital component of clinical healthcare education, it should be integrated into course curricula so that it will no longer be an extra demand on students' time and energy. It should also be noted that IPE and clinical learning are not mutually exclusive; indeed, it seems likely that students' clinical learning would be deepened when acquired in such a context. One reason that the integration of IPE into clinical placements is ideal is that it accomplishes multiple objectives simultaneously; in the case of our IEP, students learned about spina bifida and about the needs of patients and families with spina bifida at the same time as learning about interprofessional practice.

Conclusion

Overall, offering the IEP has been a positive experience with a number of opportunities and benefits, and the promise of further development. The

SHC – Canada provided an ideal setting for students to observe the work of other professionals and learn how team members can work together to help patients and families attain their goals. Instruction and discussion about roles and teamworking skills helped students to frame their experiences and explore the complexities of interprofessionalism. Students were able to practise describing their own professional roles and to engage in peer teaching about different aspects of patient care, an experience that helped them develop confidence in communicating with other health professionals. Participation in the IEP facilitated staff members' learning about interprofessionalism and stimulated them to reflect on their own practices and experiences. Interprofessional discussion among colleagues was enhanced.

Future directions

We are hoping to broaden the IEP to include other specialty clinics and patient populations and to involve students from more professions. The IEP is evolving to keep up with changing realities in healthcare and education, and continues to develop based on ongoing program evaluation. In addition, a further exploration of the impact of the IEP on staff preceptors is warranted, to evaluate changes in their attitudes or clinical practices.

The IEP developed at the SHC – Canada is a model program that could be adapted to fit different clinical settings. If similar programs were offered at different clinical sites, they could have a significant cumulative impact on healthcare education by complementing what students learn in the classroom about interprofessionalism. Leaders in healthcare agencies can evaluate the strengths and opportunities unique to their settings and use this information to plan their own IEPs, incorporating principles and “lessons learned” from the literature. While it may not be possible in all settings, we encourage others to consider IPE as a way of offering enriched student learning and professional development opportunities for staff. As more settings initiate and evaluate such programs, the body of evidence will grow and the required elements, facilitating factors and potential outcomes of IPE should become clearer.

Acknowledgements

The authors would like to thank Lynne Sinclair of the Toronto Rehabilitation Institute; the McGill Educational Initiative on Interprofessional Collaboration; Kathleen Montpetit and Noémi Dahan-Oliel for their assistance with manuscript preparation; and all staff, students, patients and families who participated in the IEP.

Correspondence may be directed to: Susan Takahashi, Shriners Hospitals for Children – Canada, 1529 avenue Cedar, Montreal, QC, H3G 1A6; telephone: 514-282-8246; email: stakahashi@shrinenet.org.

References

- Allison, S. 2007. "Up a River! Interprofessional Education and the Canadian Healthcare Professional of the Future." *Journal of Interprofessional Care* 21(5): 565–68.
- Asseraf-Pasin, L., C. Birlean, K. Redden, S. Takahashi and B. Shore. 2007a (June). "Documenting the Process and Initial Outcomes from Interprofessional Clinical Placement Experiences." Paper presented at World Physical Therapy 2007 Congress, Vancouver, BC.
- Asseraf-Pasin, L., K. Redden, C. Birlean, S. Takahashi, E. Laflamme and B. Shore. 2007b (June). "Interprofessional Clinics Ready to Share Their Wisdom: A Pilot Project for Interprofessional Placement." Paper presented at World Physical Therapy 2007 Congress, Vancouver, BC.
- Centre for the Advancement of Interprofessional Education (CAIPE). 2002. Defining IPE. Retrieved February 16, 2010. <<http://caipe.org.uk/about-us/defining-ipe/>>.
- Cook, D.A. 2005. "Models of Interprofessional Learning in Canada." *Journal of Interprofessional Care* 19(S1): 107–15.
- D'Eon, M. 2005. "A Blueprint for Interprofessional Learning." *Journal of Interprofessional Care* 19(S1): 49–59.
- Gilbert, J.H.V. 2005. "Interprofessional Education for Collaborative, Patient-Centred Practice." *Canadian Journal of Nursing Leadership* 18(2): 32–38.
- Herbert, C.P. 2005. "Changing the Culture: Interprofessional Education for Collaborative Patient-Centred Practice in Canada." *Journal of Interprofessional Care* 19(S1): 1–4.
- Illingworth, P. and S. Chelvanayagam. 2007. "Benefits in Interprofessional Education in Health Care." *British Journal of Nursing* 16(2): 121–24.
- Keith, K.M. and D.F. Askin. 2008. "Effective Collaboration: The Key to Better Healthcare." *Canadian Journal of Nursing Leadership* 21(2): 51–61.
- Lidskog, M., A. Löfmark and G. Ahlström. 2008. "Learning about Each Other: Students' Conceptions Before and After Interprofessional Education on a Training Ward." *Journal of Interprofessional Care* 22(5): 521–33.
- Nisbet, G., G.D. Hendry, G. Rolls and M.J. Field. 2008. "Interprofessional Learning for Pre-qualification Health Care Students: An Outcomes-Based Evaluation." *Journal of Interprofessional Care* 22(1): 57–68.
- Oandasan, I. and S. Reeves. 2005a. "Key Elements for Interprofessional Education. Part 1: The Learner, the Educator and the Learning Context." *Journal of Interprofessional Care* 19(S1): 21–38.
- Oandasan, I. and S. Reeves. 2005b. "Key Elements for Interprofessional Education. Part 2: Factors, Processes and Outcomes." *Journal of Interprofessional Care* 19(S1): 39–48.
- Steven, A., C. Dickinson and P. Pearson. 2007. "Practice-Based Interprofessional Education: Looking into the Black Box." *Journal of Interprofessional Care* 21(3): 251–64.
- Suter, E., J. Arndt, N. Arthur, J. Parboosingh, E. Taylor and S. Deutschlander. 2009. "Role Understanding and Effective Communication as Core Competencies for Collaborative Practice." *Journal of Interprofessional Care* 23(1): 41–51.
- Wilcock, P.M. and L.A. Headrick. 2000. "Interprofessional Learning for the Improvement of Health Care: Why Bother?" *Journal of Interprofessional Care* 14(2): 111–17.