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Assessing Global Citizenship After Participation in Service Learning in Physical Therapy Education

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ABSTRACT

Promoting a global perspective has become a recent topic in health care education (Frenk et al., 2010). The idea is to produce graduates who are capable of delivering culturally appropriate services to communities in need, both locally and globally. Various didactic components and pedagogies can be used but the outcome of producing a graduate who acts on that education is unclear. The purpose of this study is to evaluate the effects of service learning on promoting identified behaviors reflective of a global citizen in graduates from Wheeling Jesuit University's (WJU) Physical Therapy Program. This doctoral program includes service-learning courses that expose students to local, regional, and international experiences. Graduates of the program over the last 10 years were surveyed and the data were analyzed. Results indicate that graduates who participated in international experiences were more likely to respond positively to participation in global outreach programs in the future.

Keywords: service learning, global perspectives, global consciousness, citizenship

INTRODUCTION

In 2010, Lancet published the findings of the Commission on Education of Health Professionals for the 21st Century, which highlighted the disparity in health care services, education, and professionals worldwide (Frenk et al., 2010). The authors state that professional health care education has not kept up with the rapidly changing environment and demands of global health care and recommend a redesign of the current system of education. According to the report, "redesign of professional health education is necessary and timely, in view of the opportunities for mutual learning and joint solutions offered by global interdependence" (Frenk et al., 2010). As reported

by Frenk, "Reform is needed to improve the performance of health systems by adapting core professional competencies" (2010, p. 1,924). In addition to the basic science of health, the future practitioner must also be competent in effective identification and delivery of services that are meaningful to the recipient(s). This learning objective is embodied in a professional program's curriculum because the skills reflect basic behaviors and competencies consistent with a standard professional code of ethics. The American Physical Therapy Association's (APTA) Code of Ethics requires that physical therapists possess a number of behaviors including, but not limited to, compassion, altruism, and trustworthiness (APTA, 2009). These behaviors are important in

health care, as it is the nature of the profession to provide quality care to another individual or community in need. Despite the difficulty of teaching these behaviors in a classroom, research has shown it can be cultivated with service learning (Wise & Yuen, 2014; Hetward & Charrette, 2012).

Service learning is a teaching and learning strategy that integrates meaningful community service with instruction and reflection to enrich the learning experience, teach civic responsibility, and strengthen communities (Bandy, 2013). With the implementation of service learning, a doctor of physical therapy program has the ability to teach professional behaviors to students, while allowing the students to practice what they have learned in the classroom. Research on service learning has shown that the experience can build a student's altruism, compassion, caring, and integrity (Wise & Yuen, 2014; Hetward & Charrette, 2012). Conversely, students who did not participate in a service-learning experience did not show changes in these behaviors (Bandy, 2013). Boissonnault and Bobula (2014) reported that students who participated in an international experience reported that the experience was worthwhile, it should happen again, and they felt good about what they had accomplished. These authors concluded that an experience that provides a service to those in need will result in a feeling of fulfillment, an appreciation for service, and an awareness of the needs of developing communities.

Service learning in Wheeling Jesuit University's (WJU) Doctor of Physical Therapy (PT) program takes place locally in the Ohio Valley, regionally in Appalachia, and internationally in Mexico, Peru, and Haiti. Students are engaged with various local, regional, and international community partners that provide an opportunity for them to practice various aspects of health care delivery, including physical therapy

skills learned in the classroom, with people of various socioeconomic and cultural backgrounds. The experiences last several days and include the provision of an identified service, intentional reflections on the experience, basic cultural education, and the effect that the overall experience had on the individual. After being exposed to the differences in availability, access, and utilization of basic health care and public services, students are asked to reflect on their civic responsibility and role as a health care provider with regard to underserved populations.

Research is still required to assess objectively if those experiences influence behaviors long term, once a student has completed a service-learning experience, graduated, and acquired a position working as a physical therapist. Questions remain as to whether a practicing physical therapist continues to travel to developing countries to collaborate or provide services, or if graduates continue to view other perspectives of a culturally diverse patient population (patient-centered care) in clinical practice. These behaviors are reflected in several definitions of global competency (WHO, n.d.; Hunter, 2004; Schejbal, 2009) and described in several matrices, including the Global Competence Matrix (Council of Chief State Schools EdSteps, 2013), which further describes such behaviors as the ability to investigate other cultures, recognize different perspectives, communicate ideas, and take action on a global scale.

The terms "global competence" and "global citizenship" are not uniformly defined nor mutually exclusive in the literature (Schejbal, 2009). Some common elements that are often cited included knowledge, specific behaviors, effective communication, attitudes, and skills (Schejbal, 2009; Hunter, White, & Godbey, 2006; Widmann, 2008; Downey, 2006). A global citizen as defined by Ronald Israel

(2014) is a person who places his identity with a global community above his identity as a citizen of a particular place. Global competence is defined as “the capacity and disposition to understand and act on issues of global significance” (Israel, 2014). According to the Council of Chief State School Officers’ EdSteps Project (2011), a person acquires certain characteristics when gaining global competence. These characteristics include investigating the world, recognizing perspectives, communicating ideas, and taking action.

Wheeling Jesuit University defines a global citizen as a person who “understands the interconnectedness of human cultures and the dignity and worth of each individual. This realization causes the global citizen to live in solidarity with the human race despite the specific nation state in which he or she resides” (Wheeling Jesuit University, 2010). To further expand on this definition, the WJU Department of Physical Therapy believes that a student who lives in solidarity is competent (knowledge), actively engaged (behavior), and effective (communication) in the provision of entry-level physical therapy services that transcend national borders and reflect an awareness (attitude) of the recipient’s or community’s cultural dynamics and needs.

This framework and definitions are the bedrock of this study that attempted to discover if the curricular design and experiential learning opportunities had a long-term effect on graduates. The survey questions were written to capture the basic elements of global competency. This study surveyed graduates of WJU’s Doctor of Physical Therapy Program from 2003 to 2012, asking participants about their involvement in service learning during their professional education, and about their personal and professional behaviors since graduating from the program. Data were collected in summer of 2013.

The purpose of this research was to identify the effect of participation in service learning on post-graduation behaviors. The goals included establishing a connection between participation in service learning with continued behaviors reflective of a global citizen, as defined by the university and program, and the validation of service learning in physical therapy education in promoting global competency when providing services to others. In conclusion, the authors expected to identify a carry-over of behavior from academia to the professional setting.

METHODS

Survey design was used to collect data for this research. IRB approval was obtained for a questionnaire the researchers developed consisting of 11 questions including the following general demographics: sex, age, year of graduation from WJU’s Physical Therapy Program, years as a licensed physical therapist, primary area of practice, participation in service learning, and type of service experience, if applicable. “Effective survey questions have three important attributes: focus, brevity and clarity” (Alrech, 2004, p. 89). Every question should focus only on one issue and ask precisely what the researcher wants to know. The questions should be brief and easy to read, since long, cumbersome questions are difficult to interpret. Clarity means the questions should be completely clear and interpreted the same way, by all respondents. Dillman states, “The goal of writing a survey question for self-administration is to develop a query that every potential respondent will interpret in the same way, be able to respond accurately, and be willing to answer” (2000). To develop questions for this survey, the researcher followed eight criteria recommended by Dillman as follows: (1) Does the question require an answer?; (2) To

what extent do survey recipients already have an accurate, ready-made answer for the question they are being asked to report?; (3) Can people accurately recall and report past behaviors?; (4) Is the respondent willing to reveal the requested material?; (5) Will the respondent feel motivated to answer each question?; (6) Is the respondent's understanding of response categories likely to be influenced by more than words?; (7) Is survey information being collected by more than one mode?; (8) Is changing a question acceptable to the survey sponsor? (Dillman, 2000, 32-40).

The survey questions were formulated from the work of Veldhuis (1997), Council of Chief State School Officers' EdSteps (2013), Widmann (2008), Downey (2006), and the learning objectives of the program, to evaluate the program's effectiveness in fostering a global awareness and basic global competency in graduates. Downey (2006) identified learning criteria for global competency, which include the acquisition of knowledge, and the capability and demonstration of effectively applying that knowledge. In the development of the survey questions, the aspects of knowledge, behavior, attitude, and communication were used to reflect the question's ability to capture an aspect of these learning criterions. (The key criteria of global competency are identified in parentheses after each question.) The questions included

1. When in clinical practice, how often do you intentionally seek out information from sources outside the U.S. to gain a different perspective? (knowledge and behavior)
2. Reflecting on the past six months, when working with a person from a different ethnic, socioeconomic, or international background, how often have you modified an aspect of the plan of care due to the person's ethnic, socioeconomic, or international background? (behavior and communication)
3. Do you provide financial support to people, programs, or organizations that address the needs of people living in developing countries? (behavior and attitude)
4. Since graduating from WJU, do you participate in, or have made plans to participate in, any international trips to provide services (physical therapy or manpower) to others? (behavior)
5. Since graduating from WJU, do you participate on a personal level in activities that reflect a global awareness, such as conservation activities, recycling, purchasing fair trade items, or the efficient use of energy? (knowledge, behavior, attitude)

Piloting established the validity of the instrument. Fink recommends that before the questionnaire is made final, it is given to at least 10 people who are similar to the sample population (2003, p. 108). This questionnaire was piloted using a group of experts to determine content validity. The pilot group included six faculty members of a Doctorate of Physical Therapy Program and six doctorate of physical therapy students. The pilot group was instructed to answer the following questions as recommended by Fink: (1) Are the instructions for completing the survey clearly written?; (2) Are questions easy to understand?; (3) Do respondents know how to indicate responses?; (4) Are the response choices mutually exclusive?; (5) Are the response choices exhaustive?; (6) Can the respondents correctly use the commands of the web-based survey?; (7) In a computer-assisted survey, do respondents know how to change their answers?; (8) If there is incentive for the survey, do respondents know how to obtain it?; (9) Is the privacy of the respondents respected and protected?; (10)

Do respondents have any suggestion regarding the addition or deletion of questions, clarification of instructions, or improvements in questionnaire format? (Fink, 2003, p. 109-110). Modifications to the wording of questions were made based on feedback from the pilot group.

Once the survey was finalized, it was sent out through e-mail using Google Drive Survey in June of 2013. The participants consisted of graduates of the WJU's Physical Therapy Program from 2003 to 2012. The invitation to participate in the study, consent to participate, and the survey were distributed through e-mail. Participants were given three weeks to reply to the survey, at which point a follow-up reminder e-mail and invitation to participate in the study were re-sent. The researchers accepted all completed responses of the survey received within the six weeks following the initial invitation to participate. The responses were then analyzed using SPSS software version 20 using an Analysis of Variance (ANOVA) (for questions 1 and 2) to formulate comparisons and decipher trends of the impact of service learning. A chi-square analysis with cross tabulations (for ques-

tions 3, 4, and 5) was applied to determine the effect of participation.

RESULTS

Surveys were sent to 276 graduates with 110 responding (39.8%). The respondents included 58 women, 51 men, and one who did not specify. The majority of the respondents reported practicing in outpatient settings (52), skilled nursing facilities (27), and home health (11) (see Figure 1). At least one type of service learning (local, regional, or international) was completed by 95 (86%) of the respondents while in physical therapy school, whereas the remaining 15 (14%) did not participate in a service-learning experience while enrolled in the WJU PT program. Out of the 95 that participated in service learning, 50 (53%) participated in only local service, 12 (13%) participated in local and regional service, 12 (13%) participated in local, regional, and international service, 16 (17%) participated in local and international service, and five (5%) participated in only international service. A total of 33 (35%) respondents participated in international service learning (see Figure 2).

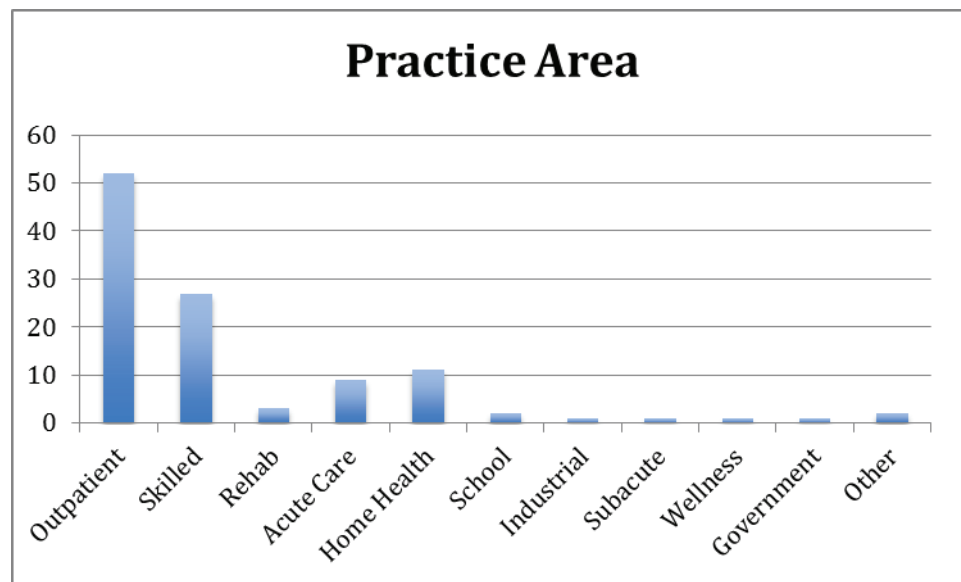


Figure 1. Practice Area Demographics

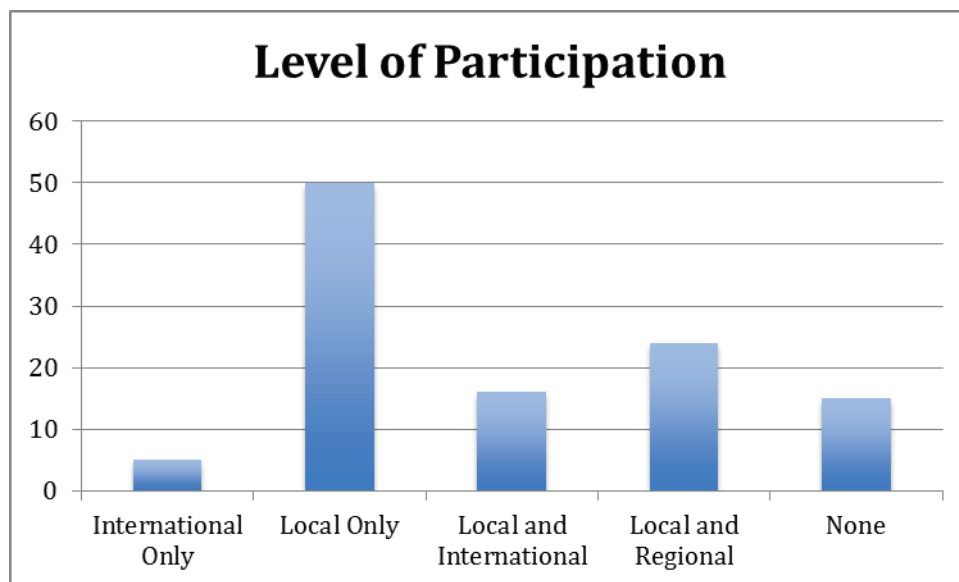


Figure 2. Level of Service-Learning Participation

Data were analyzed using SPSS software version 20 by completing chi-square analysis with cross tabulation (for questions 3, 4, and 5) or an ANOVA (for questions 1 and 2). The responses for questions 1 and 2 were ranked as always (1), often (2), sometimes (3), and never (4). Chi-square analysis with cross tabulation was performed on questions 3, 4, and 5 with yes or no responses.

ANOVA was calculated to compare demographic variables for questions 1 and 2. The first question was, “When in clinical practice, how often do you intentionally

seek out information from sources outside the U.S. to gain a different perspective?” The mean overall response for this question was 3.16, or “sometimes” (see Figure 3). The independent variables of sex, facility type, and service-learning experience were not significant factors for question 1.

The second question was, “Reflecting on the past six months, when working with a person from a different ethnic, socioeconomic, or international background, how often have you modified an aspect of the plan of care due to the person’s ethnic, socioeconomic, or internation-

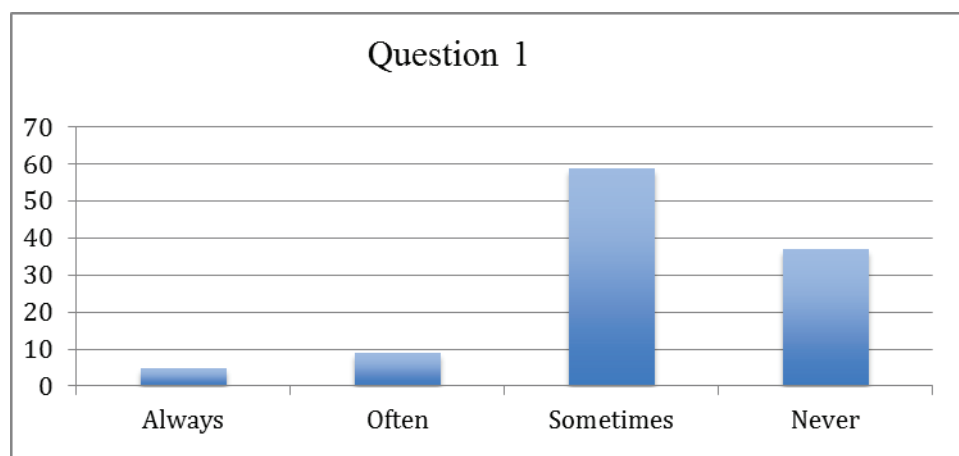


Figure 3. When in clinical practice, how often do you intentionally seek out information from sources outside the U.S. to gain a different perspective?

al background?" The mean overall response for question 2 was 2.4, which falls between "sometimes" and "often." The ANOVA revealed that the independent variables of

sex, facility type, and service-learning experience were not significant factors for question 2 (see Figure 4).

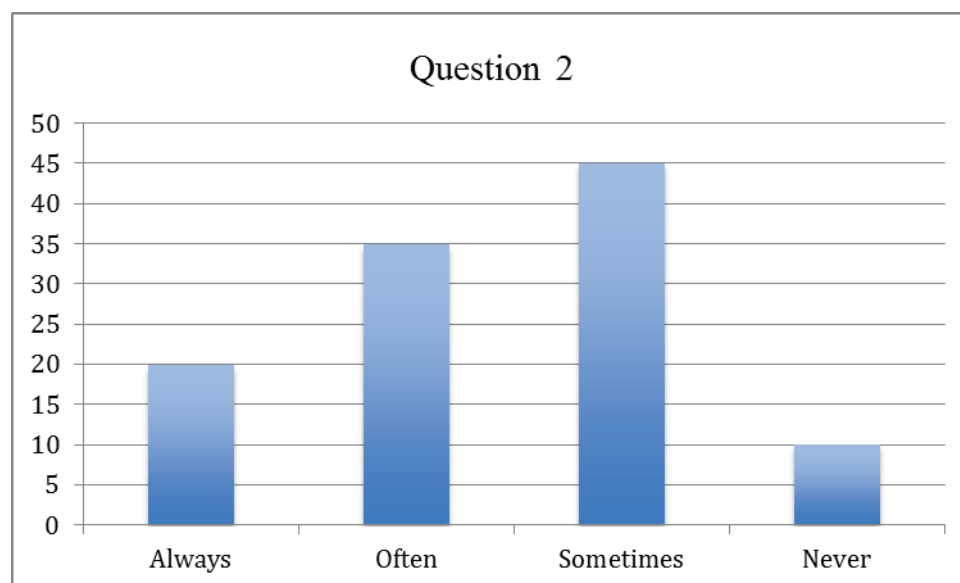


Figure 4. Reflecting on the past six months, when working with a person from a different ethnic, socioeconomic, or international background, how often have you modified an aspect of the plan of care due to the person's ethnic, socioeconomic, or international background?

Chi-square analysis was calculated for question three: "Do you provide financial support to people, programs, or organizations that address the needs of people living in developing countries?" 30% respond-

ed "yes" to this question while 68% answered "no." Significant differences were not found for demographic variables of sex, practice area, or service-learning experience (see Figure 5).

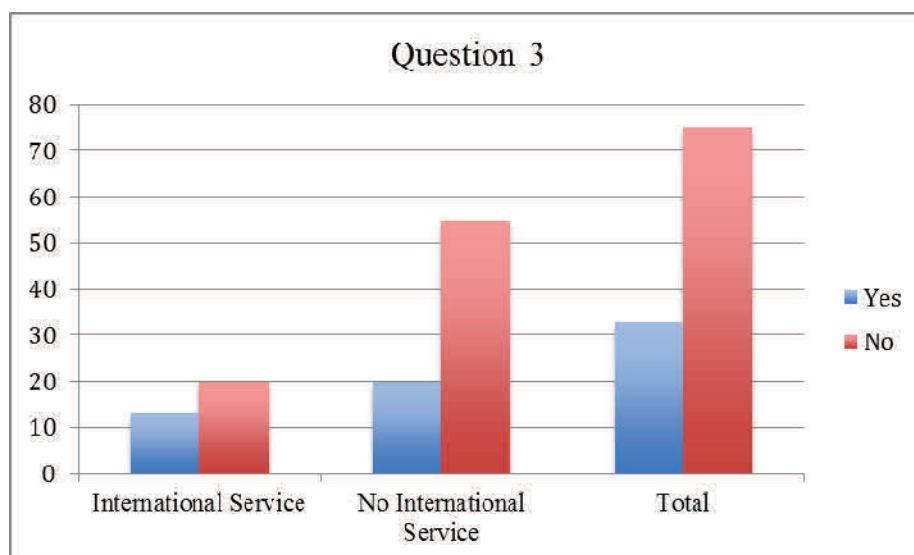


Figure 5. Do you provide financial support to people, programs, or organizations that address the needs of people living in developing countries?

Chi-square analysis with cross tabulation was used to compare level of participation in service learning with question 4: "Since graduating from WJU, have you participated in, or have you made plans to participate in any international trips to provide information, attend conferences, or provide services to others?" The data revealed that for those who participated in only local service learning, five responded "yes" (10%), while 45 responded "no" (90%). Of those who participated in local and regional service learning, 0 responded "yes" (0%), while 12 responded "no" (100%). Of those who participated in local, regional, and international service learning, four responded

"yes" (33.3%), while eight responded "no" (66.7%). Of those that participated in local and international service learning, seven responded "yes" (43.8%), while nine responded "no" (56.3%). Of those who participated only in international service learning, two responded "yes" (40%), while three responded "no" (60%). Level of service-learning participation as a student was found to be statistically significant for graduates' response to question 4 with a p-value of 0.004. Analysis reveals that those involved with international service learning were more likely to participate in or make plans to participate in international service learning, attend conferences, or provide ser-

Question 4 Cross Tabs P=.004		Yes	No	Total
No Service Learning	Count	1	14	15
	%	6.7%	93.3%	100%
Local SL only	Count	5	45	50
	%	10%	90%	100%
Local and Regional SL	Count	0	12	12
	%	0%	100%	100%
Local, Regional, and International	Count	4	8	12
	%	33.3%	66.6%	100%
Local and International	Count	7	9	16
	%	43.8%	56.3%	100%
International Only	Count	2	3	5
	%	40%	60%	100%
Any International	Count	13	20	33
	%	39.4%	60.6%	100%
No International	Count	6	71	77
	%	9.0%%	91%	100%
Total	Count	19	91	110
	%	17.3%	82.7%	100%

Figure 6. Since graduating from WJU, have you participated in, or have you made plans to participate in any international trips to provide information, attend conferences, or provide services to others?

vices to others (39.4% answered “yes”); in comparison to those who participated in only local or regional service learning, or those who did not participate in service learning (8.5% answered “yes”) (see Figure 6).

Respondents replied “yes” 85.5% and “no” 14.5% to question 5: “Since grad-

uating from WJU, do you participate on a personal level in activities that reflect a global awareness, such as conservation activities, recycling, purchasing fair trade items, or the efficient use of energy?” Chi-square analysis did not reveal significant differences for any of the demographic variables (see Figure 7).

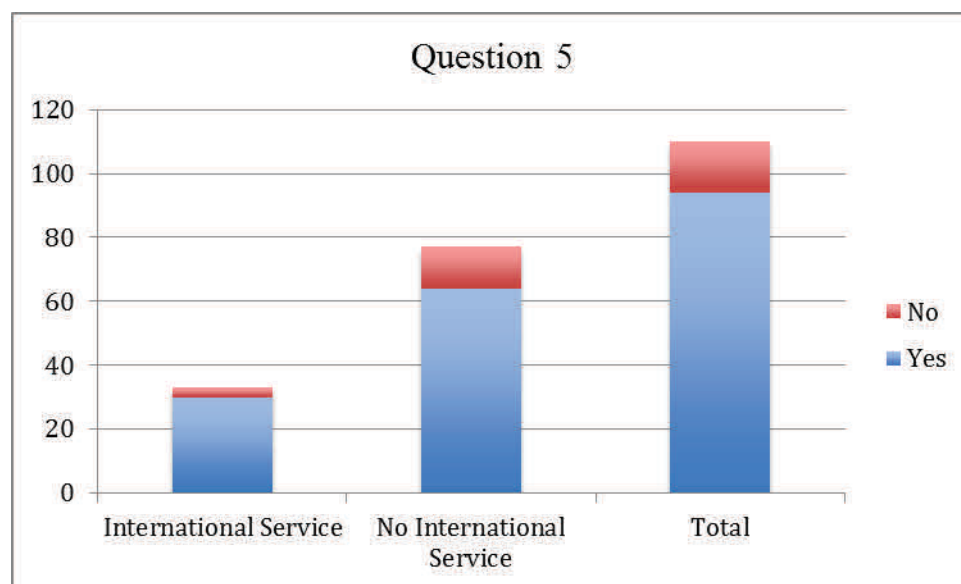


Figure 7. Since graduating from WJU, do you participate on a personal level in activities that reflect a global awareness, such as conservation activities, recycling, purchasing fair trade items, or the efficient use of energy?

DISCUSSION

The results of this research showed a significant correlation between having previously participated in international service learning, with planning to participate in global outreach programs in the future ($p=0.004$ for question 4: Since graduating from WJU, have you participated in, or have you made plans to participate in any international trips to provide information, attend conferences, or provide services to others?) Graduates who had participated in an international service-learning experience while in physical therapy school were far more likely to answer yes to question 4 at 39.4% than were graduates who had not participated in an international experience

at 8.5%. This result is consistent with the Council of Chief State School Officers' EdSteps Global Competence Matrix (2011), which describes that becoming globally competent requires investigation of the world beyond a person's direct environment. This aspect is also reflected in other models of global competency that include components of actively seeking to understand others (Hunter, White, & Godbey, 2006; WHO, n.d.; Schejbal, 2009; Hunter, 2004). Additional studies by Batchelder (1994) and Myers-Lipton (1998) have demonstrated a correlation with service learning or a positive response on a global scale. Batchelder (1994) found service learning correlated to a greater awareness of social problems and Myers-Lipton (1998)

reported an increased civic responsibility from students that participated in a service-learning program. Elam (2003) concluded that there was a positive impact of service learning on medical students' intent to volunteer in community-based clinics in the future. However, these studies analyzed immediate results, not long-term effects.

There was also an overall positive response to question 2: Reflecting on the past six months, when working with a person from a different ethnic, socioeconomic, or international background, how often have you modified an aspect of the plan of care due to the person's ethnic, socioeconomic, or international background? The majority of the responses indicate that graduates are considering their clients' cultural backgrounds when determining treatment plans. The majority of graduates responded positively to this question with 20 answering "always," 36 "often" and 44 "sometimes." Only 10 replied "never" to this question. While significant differences were not found between the groups that preformed service learning and groups that had not completed service, the overall positive response to this question is an indication that graduates in our program consider a client's cultural background when designing and implementing a treatment plan. This finding is consistent with the results from Casey (2008), which concluded that service learning in general supported development of cultural sensitivity to learn about caring for people in different cultures. Similarly, Green (2011) concluded that international service-learning experiences increased participants' ability to provide culturally congruent care. However, the results from this question are in conflict with the findings from Noles' (2005) conclusions that service learning had a negative impact on cultural competence scores.

A limitation of this study is the survey design. Psychologists typically study

and write about human behavior to attempt to explain why human beings behave as they do. The observer can explain the behaviors, or another way to assess humans' behavior is to ask them. This study focused on identified behaviors reflective of a global citizen in graduates of a physical therapist education program, and assessed those behaviors by questioning the participants via questionnaire. Limitations are that the questions were closed-ended and the responses are confined to the available choices. Therefore, the researcher may not capture issues that are relevant to the sample. Also, as with any survey, respondents may answer in a socially appropriate way, instead of what they actually believe. While the sample size was large enough to attain statistical significance with one of the chi-square analyses, the sample of 110 respondents is not large enough to establish external validity for the study. The results, while relevant to the Physical Therapy Program at Wheeling Jesuit University may not be generalizable to the population.

CONCLUSION

The conclusions of this study show that students who participated in an international service-learning experience did exhibit different behaviors as graduates than those who did not participate or only participated in other levels of service learning. This was demonstrated with a significance of 0.004 (N=110) calculated from a chi-square with cross tabulation from responses to question 4, which verified that students who have participated in international service learning were more likely to indicate willingness to do so again in the future. The majority of graduates (100/110; 91%) also indicated that they consider their clients' cultural backgrounds while designing and implementing a client's plan of care. These global characteristics are encouraged by the American Physical Therapy Association

(APTA) and are necessary traits of physical therapy students and graduates (APTA, 2011). Future research that explores specific components of a service-learning experience and its ability to transform a student's beliefs and behaviors would continue to develop our understanding of this pedagogy as it is used in health care education in the United States. It could allow for more standardization and efficiency, allowing for the delivery of the specific components through less costly venues. In addition, the impact of service learning on the community partner would broaden our understanding of this type of community engagement and illuminate the value or detriment of such experiential learning on a broader array of stakeholders.

With more than one billion people in the world living with some form of disability (WHO 2011), it is evident that higher education in physical therapy is in need of a clear definition, structure, and outcome measurement on global competency to determine if we truly are educating men and women who have an appreciation for global issues and behave, albeit in a limited fashion, as global citizens

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