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Academic Service-Learning's Impact on Students' Social Capital

by

Megan Jean Anderson

Thesis

Submitted to the Department of Sociology, Anthropology, and Criminology

Eastern Michigan University

in partial fulfillment of the requirements

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in Sociology

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Ypsilanti, Michigan

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ABSTRACT

ACADEMIC SERVICE-LEARNING'S IMPACT

ON STUDENTS' SOCIAL CAPITAL

This study examines whether there is a relationship between social capital and participation in academic service-learning courses within higher education. Through designing, implementing, and analyzing a survey which was given to students enrolled in courses with an academic service-learning component at Eastern Michigan University (n=127), the role between these two variables was tested. Social capital was measured through the total number of relationships formed at participants' academic service-learning site, whether these relationships were strong or weak ties; the frequency of interaction with said ties; and individuals who could be used as a reference. Results suggest the number of individuals with whom participants worked and whether participants were partaking in academic service-learning for the first time positively impacted social capital. Furthermore, the type of service, as well as frequency of interaction between participants and individuals at their site, had an impact on the strength of participants' ties. Similarly, frequency of interaction with one's supervisor positively impacted the total number of individuals participants felt comfortable asking for a reference. It was also found that whether participants partook in academic service-learning as part of an education course or a non-education course played a role in participants' social capital.

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CHAPTER 1: INTRODUCTION AND BACKGROUND

Introduction

Given the recent economic downturn, students graduating from college are finding it increasingly difficult to find a job. It seems that one's social capital – who you know, not what you know – is becoming more important when landing a job. For example, according to Fernandez and Weinberg (1997), organizations make use of social capital when recruiting and maintaining employees. Furthermore, when it comes to career success, social capital also proves to be an important factor (Seibert, Kraimer, and Liden 2001).

Social capital can be built through relationships and/or networks (Bourdieu 1986; Kao 2004) and it allows individuals to “secure benefits by virtue of membership in social networks or other social structures” (Portes 1998:6). These relationships often are purposefully fashioned for future use, benefits, and trade (Bourdieu 1986), such as securing a job after college.

How to quantify social capital can be challenging. One way in which it can be measured is through the strength of relations, meaning weak or strong ties (Granovetter 1973), among individuals (Adler and Kwon 2002; Berscheid, Snyder, and Omoto 1998; de Janasz and Forret 2008; Granovetter 1973; Lin 1999; Seibert, Kraimer, and Liden 2001). Both weak and strong ties are important aspects of social capital. Weak ties can allow access to a different set of information than one already has (Granovetter 1973). However, as a tie is strengthened, close ties may be more “motivated” than weak ties to share information (Granovetter 1983).

While still in college, there are measures that can be taken to help students increase their social capital. This paper will focus on one possible measure, academic service-learning, and whether or not it has a positive impact on the increase of students' social capital. With a membership of more than 1,200 colleges and universities, Campus Compact demonstrates that partnering with organizations within the community on academic service-learning endeavors is a trending theme within higher education (Campus Compact 2012).

Academic service-learning can assist with creating the connection between what students are learning in class to real life (Kearney 2004; Bryant, Schonemann, & Karpa 2011). Previous evaluations and studies pertaining to academic service-learning have mainly focused on students' comprehension of course materials, analytical thinking, and sense of civic engagement (Bryant et al. 2011). However, academic service-learning it is also a way for students to build social capital with the community at large. Furthermore, participation in an academic service-learning course can allow students to gain real-life experience, which can be included in a résumé (Butin 2003). Social capital can also increase one's occupational status (Lin 1999). Possible social capital built through academic service-learning experiences have not been studied to the extent of the aforementioned components.

This relationship between academic service-learning and social capital is expectantly positive and academic service-learning can potentially have a significant impact on students' social capital. If this is true, there is great potential for the higher education community to expand upon their networks. In particular, if universities began

to implement service-learning into more courses, students would hopefully build relationships and a network with individuals at their service-learning site, as well as with the community at large. These relationships could possibly lead to an increased social capital among all parties involved.

Eastern Michigan University's Academic Service-Learning Program

The foundation of Eastern Michigan University's academic service-learning program begins with their Office of Academic Service-Learning (OAS-L). Eastern Michigan University (EMU), in Ypsilanti, Michigan, has a commendable academic service-learning program. EMU defines academic service-learning as "an educational approach that integrates service in the community with intentional learning activities" (Office of Academic Service-Learning 2011:1).

"The mission of EMU's Office of Academic Service-Learning is to build infrastructure which will support students, faculty, administrators and community members (Office of Academic Service-Learning, n.d.:¶ 5). Moreover, the office "[1] provides an opportunity for students through service-learning courses to greater engage and collaborate with the community. [2] Provides faculty training, support & opportunities to integrate community within their scholarship and teaching. [3] Provides community members and organizations an entry point to university collaboration and communication" (Office of Academic Service-Learning, n.d.:¶ 2-4). Academic Service-Learning is most effective when implemented into academic course work coupled with working with a specific need within the community. The OAS-L plays a key role in this process.

Due to the fact that the OAS-L trains faculty from all departments, there is an assortment of social issues addressed. Each faculty member, with the assistance of OAS-L, locates local organizations that are focused on social issues pertinent to their course content. For example, several education courses work with local public schools, while a theatre course works with *Young Peoples Theater*, and a course on geography works with a city planning department (ASL 2009).

The process of designing effective courses begins with the OAS-L during seminars for tenure-track faculty wherein faculty become “Faculty Fellows.” Faculty Fellows “learn the theories, trends, methods, and assessment of service-learning” (Office of Academic Service-Learning, n.d.:¶ 6). Faculty Fellows apply to participate in the Faculty Fellow Seminar and are granted a one semester course release while they partake in weekly seminars with OAS-L. Through these seminars they are exposed to ways in which they can implement service-learning into their course work. Upon completion of the seminars, faculty members have the necessary tools needed to lead a successful service-learning course (Office of Academic Service-Learning, n.d.:¶ 6).

With the support of OAS-L, faculty members work with local community partners on both addressing their needs, as well as enhancing the academic service-learning course. Throughout this process, OAS-L acts as a resource center for faculty, including assisting with networking, providing a resource library, acting as a support network, and making available possible grant funding (ASL 2008).

OAS-L has been a long standing program and has so been recognized in numerous journal articles. In *Academic Exchange Quarterly*, Kapucu and Petrescu

(2006) compared and contrasted Eastern Michigan University's Academic Service-Learning to that of University of Central Florida. Within this article accolades were given to EMU's program, "at EMU academic service learning has been 'practiced' for over a decade and the service learning model developed has been disseminated state- and nationwide" (p. 4). Moreover, when comparing Eastern Michigan University's Academic Service-Learning program to a life cycle model, Kapucu and Petrescu (2006) suggest OAS-L is at its peak and has obtained the adulthood stage. Given their status of adulthood and their reputation, newer programs, such as Northern Michigan University, have based their academic service-learning programs on EMU's OAS-L's faculty development manual (Northern Michigan University 2009)

OAS-L has not only been recognized through other programs following in their footsteps, they have also received awards for their work. Each year Michigan Campus Compact, an organization which supports programs that focus on civic engagement within higher education, awards colleges and universities for their exemplary work with community service. In 2009, Eastern Michigan University received one such award and became a member of the "Michigan's Honor Roll" (Michigan Campus Compact 2009).

CHAPTER 2: REVIEW OF RELATED LITERATURE

Social Capital

In order to understand how social capital could potentially be impacted by academic service-learning, it is first important to build a foundation of social capital. Social capital is a term that has been in existence for over a century and has numerous interpretations of the definition. Although there are similarities between definitions – most involve social relations (Adler and Kwon 2002; Coleman 1988; van Oorschot, Arts, and Gelissen 2006) – they vary between micro and macro-sociological theory (van Oorschot et al. 2006). Generally speaking, social capital “stands for the ability of actors to secure benefits by virtue of membership in social networks or other social structures” (Portes 1998:6).

Dating back to the early 1900s, Hanifan (1920) argues building relationships and contact with one’s neighbor can accumulate community social capital. Community social capital, Hanifan (1926) argues, can be built through picnics “which may immediately satisfy his social needs and which may bear a social potentiality sufficient to the substantial improvement of living conditions in the whole community” (79).

Taking a similar view to that of Hanifan, Putnam (2000) focuses on community organizational life, engagement in public affairs, and trust. Trust is an important factor within social capital. Trust accumulates over time (Putman 1993). Without it, the formation of social capital is weakened (Adler and Kwon 2002), which can result in individuals feeling isolated from each other (Cohen and Prusak 2000). “Without a high degree of trustworthiness among the members of the group, the institution could not

exist” (Coleman 1988:S103), and within a group setting where members trust one another, they will get much more done than a group where members do not trust each other (Coleman 1988). Although trust is a key component to social capital, given the need to narrow down my research, the issue of trust will not be addressed in this study.

In addition to trust, according to Putnam (2000), the benefits of social capital are not an increased network as much as producing a healthier and wealthier community. “Social capital allows citizens to resolve collective problems more easily” (Putnam 2000: 288). In this particular piece of Putnam’s work, due to a number of factors, including an increase in television watching, he argues there has been a decline in social capital as people are no longer becoming civically involved as they once were (Putnam 2000). In order to remedy this situation, Putnam (2000) argues that individuals need to connect with people different than themselves and become more civically involved.

Parallel to Hanifan and Putnam theories, Coleman argues a community and collective identity analysis of social capital. Coleman suggests there are three ways in which social capital can be explained: through "trustworthiness of the social environment, information-flow capability of the social structure, and norms accompanied by sanctions" (1988:119). Investing in one’s social capital can prove to be beneficial with regards to access to information and a strengthened “collective identity” and “collective action” (Adler and Kwon 2002:21). On the macro level, norms can have a positive impact on social capital; for instance, the norm of acting in the interest of the collective instead of in the interest of the individual. Norms often promote social support

of others and can in return have the ability to combat negative things that may occur without the presence of social capital, e.g. increased crime (Coleman 1988).

Coleman (1998) further contends that social capital is different from other forms of capital, as social capital can act for the common good of the public and may not always directly benefit the key persons generating the social capital (Coleman 1988:119). Social organizations can play a role in increasing a community's social capital - once in place they can aid other organizations and in return can produce social capital for both the individuals in the community as well as the community as a whole (Coleman 1988).

Taking the macro lens of social capital one step further, Fukuyama (2001) argues social capital can be fashioned through shared experiences and informal norms in which co-operation is generated. According to Fukuyama (2001) social capital can be applied to small groups of friends, NGOs, and religious groups. Furthermore, on an even more macro-level, “an abundant stock of social capital is presumably what produces a dense civil society... seen as a necessary condition for modern liberal democracy... [On the contrary] low levels of social capital lead to a number of political dysfunctions” (Fukuyama 2001:11).

Working down from macro-level social capital to micro-level social capital, Bourdieu (1986) defines social capital as “the aggregate of actual or potential resources which are linked to possession of a durable network of institutionalized relationships of mutual acquaintance and recognition – or in other words, to membership in a group” (p. 248). Through resources that are made available to us through relationships and/or networks, social capital can be formed (Bourdieu 1986; Kao 2004), and these

relationships often are purposefully fashioned for future use, benefits, and trade (Bourdieu 1986). Social capital is something that requires an investment. It is in the course of “an investment in social relations by individuals through which they gain access to embedded resources” (Lin 1999:39). "All social relations and social structures facilitate some forms of social capital" (Coleman 1988:105). With regards to academic service-learning and social capital, when it comes time to make decisions about hiring, these embedded resources can have an influence on agents at the service-learning sites, and therefore are important because they can be influential when finding a job (Lin 1999).

Social relations often translate into networks, which are a key component of social capital. “Networks may be understood as the ‘structural’ elements of social capital” (Stone 2001:6) and are “instrumental in goal attainment, e.g., in getting a job” (Flap and Boxman 2001:161). Networking is building working relationships with people (Muir 2009). One way to increase one’s network is to build relationships with individuals across the spectrum of the service-learning site – from the janitor to the president of the company (Muir 2009). However, relationships and networks are not necessarily easy to come by. It often takes time and energy before a network can be achieved which can impact one’s social capital (Coleman 1988). Even though they can be difficult to obtain, if and when these opportunities are made available, skills in networking are significant when pertaining to an increase in one’s social capital (de Janasz and Forret 2008). These skills can lead to an increased social capital, which is a key component in getting ahead (Laird 2006; Muir 2009).

In addition to time and energy influencing one's social capital, the places and facilities (Flap 2002) in which interactions occur can also impact one's social capital. For example, participating in community service, volunteer, and service-learning activities (Campbell 2000; Flap 2002) can potentially positively influence social capital. More specifically, taking full advantage of interactions among students and adults within service-learning activities can bring about connectedness and an increased network (Campbell 2000).

Due to the fact social capital can be accessed through service-learning activities and experiences (Lin 1999), it is important to also measure whether or not experiences were made available that could potentially build one's social capital. Whether or not there was access to resources, access to information (Seibert et al. 2001), and access to interactions that could theoretically result in an increased social capital should be measured.

Now that social capital has been defined, how can it be measured? It can be measured by the strength of the relations among involved parties (Adler and Kwon 2002; Berscheid, Snyder, and Omoto 1998; de Janasz and Forret 2007; Granovetter 1973; Lin 1999; Seibert, Kraimer, and Liden 2001) and whether ties are formal or informal (Stone 2001) or strong or weak ties (Granovetter 1973). There is a "power" that comes from both these formal and informal relationships as well as memberships in groups (Hipsky 2000:192) and out of these social relations comes "potential for information" (Coleman 1988:S104).

Strong ties refer to close friends, which require more time spent together in order to obtain this status (Granovetter 1973). Strong ties, or according to Stone (2001), “informal ties” can also refer to family ties, friends, and neighbors. Weak ties are relationships made at work and through formal organizations, and acquaintances (Granovetter 1973). Furthermore, weak ties, or “formal ties” (Stone 2001), are colleagues and relationships related to associations and groups. “Strong ties characterize the intimate social circle of individuals with similar characteristics and weak ties characterize the infrequent interactions and peripheral relationships among dissimilar individuals” (Lin 1982:134). Weak ties, therefore usually have less frequent interactions than those of close friends.

Both types of ties are key components of social capital. Weak ties are important because they can give access to a different set of information than one already has. They can also help one find a job faster and help with mobility because “more people can be reached through weak ties” (Granovetter 1973:1369). Strong ties are also important, for as a tie is strengthened, close ties can be more “motivated” than weak ties to share information (Granovetter 1983) making the prospect of gaining more information and additional support higher, which can lead to an increase in the likelihood of mobilization (Seibert et al. 2001). Furthermore, the closer the relationship between two people, the more likely they will have a long term relationship and increased network (Bringle, Clayton & Price 2009). Although quite different, both strong ties and weak ties are key components of social capital and should be addressed when researching social capital.

Academic Service-Learning

Participation in academic service-learning is one way in which individuals can gain social capital. Within literature, there is not one universal definition of service-learning or academic service-learning. However, a couple components can be found in most definitions; service-learning is connected to scholarship and responds to “explicit community needs” (Cohen & Kinsey 1993:4). According to Bringle and Hatcher (1995), academic service-learning is a credit-bearing educational experience in which students partake in organized service that addresses a need within the community. It is mutually beneficial for students as well as community partners (Keselyak et al. 2007) and the service component should be integrated with what is being taught in class (Kearney 2004; Bryant et al. 2011). Through reflection, students are able to connect their service back to course content and therefore further understand what is being learned (Bringle and Hatcher 1995). Furthermore, participation in service-learning provides opportunities in which students are able to apply what they learn in class to “real-life situations” (Keselyak et al. 2007:379; Cohen and Kinsey 1993) and gain real world experience (Butin 2003).

Generally speaking, there are five main components of service-learning: (1) Service is linked to course content – service should be relevant to what is being learned in class and should be a central component of the course, not an afterthought (Butin 2003). (2) Service addresses actual needs within the community – ideally both students and the individuals at the service-learning site participate in deciphering which community need should be met (Keselyak et al. 2007). (3) The relationship between community partners

and the class is reciprocal – all participating stakeholders should be a part of the collaboration process, from addressing the possible issues at hand, to the type of service, to possible outcomes of the collaboration (Bringle et al. 2009). (4) Reflection is at the center of every aspect of service-learning. Reflection helps “provide context and meaning” (Butin 2003:1677) and can assist in gaining a “further understanding of course content, a broader appreciation of the discipline, and an enhanced sense of civic responsibility” (Bringle and Hatcher, 1995:112). (5) Evaluation is essential in assessing the overall impact of academic-service learning on all participating stakeholders.

In Figure 1, Geleta and Gillian (N.d.:11) provide us with an excellent visual of the components of service-learning and the relationships among them. Reflection is at the core of academic service-learning. It is what differentiates service-learning from volunteering and internships (Kearney 2004); it is the hyphen in “service-learning” (Eylar & Giles 1999). Reflection begins with preparation: thinking both about appropriate topics of which the course is addressing as well as needs within the community that could be applied to course content. Ideally, this reflection should be a conversation occurring between educators and community partners. From here, the action portion of service-learning can begin. Generally speaking, “sustained community partnerships, shared service-learning objectives, and broad preparation are identified as important components for ensuring successful service-learning partnerships” (Keselyak et al. 2007:379). Finally, during and after service-learning has been completed, reflection should be part of the evaluation. All parties involved should be part of this process.

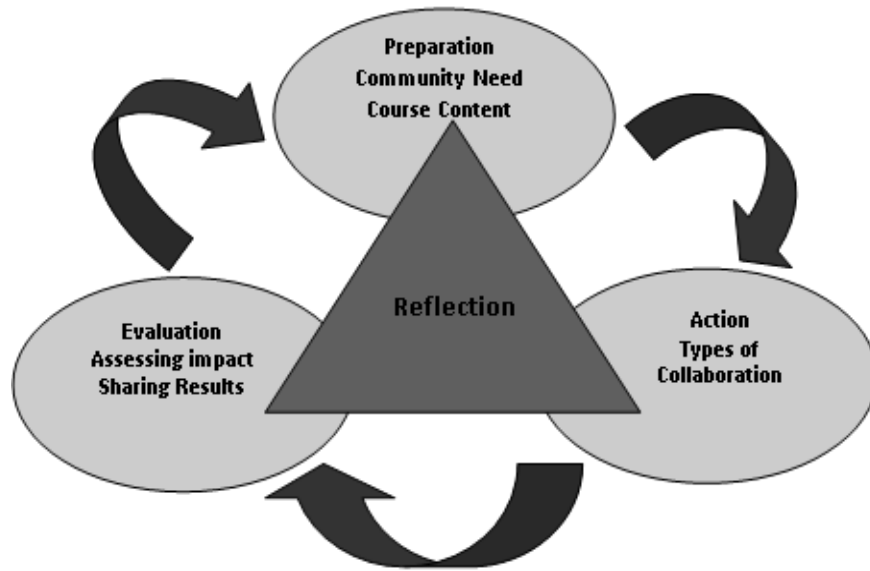


Figure 1. Service-Learning Components

Now that the general definitions of service-learning have been addressed, specific ways in which service-learning can occur needs to be addressed. Sigmon (1994) proposes four different ways in which academic service-learning can transpire: (1) service LEARNING, where the main focus in on the learning, (2) SERVICE learning, where the main focus is on the service, (3) service learning, where each service and learning are separate but equal entities, and (4) SERVICE LEARNING, where both service and learning are equally important and enhance one another.

Programs which focus on service (volunteering and community service) are categorized as SERVICE learning, while on the other end of the spectrum, internships and field-based education are categorized as service LEARNING (Butin 2003:1676). Although there are different variations of service-learning, the ideal representation of academic service-learning is SERVICE LEARNING, where both components are equally

represented. “Learning improves the quality of service... [and] service transforms learning, changing inert knowledge to knowledge and skills that students can use in their communities” (Eyler, Giles, and Braxton 1997:5). Academic service-learning is different from other forms of service and other types of experiential learning because it seeks to not only benefit one party involved, but it is meant to benefit both students and community partners (Deeley 2010) all the while connecting back to the academic mission (Gray et al. 1999).

In addition to the abovementioned variations, academic service-learning can vary depending upon the area of discipline in which the course is being taught, as well as the individual service-learning partner (Bryant et al. 2011). Gray et al. (1999), in their evaluation of the Learn and Serve Program, which focuses on service-learning within higher education, found course goals vary greatly. While the majority of programs found developing civic skills, increasing disciplinary knowledge, and commitment to community involvement to be the most important goals – increasing involvement in studies and enhancing ethical and moral development were also found to be important (Gray et al. 1999). Some courses may focus more on the educational aspect and have fewer hours at the service-learning site, while other courses may focus more on the experiential learning that occurs at the service-learning site. Furthermore, needs within the community can vary greatly, as can the type of service in which students participate. For example, Gray et al. (1999) found community needs being met within various areas of service – education, health and human needs, neighborhood and natural environment, and public safety.

There are five main stakeholders involved with academic service-learning: “Students, Organizations in the community, Faculty, Administration on campus, Residents in the community” (Bringle et al. 2009:5) and in an ideal situation all parties are equally involved in the process:

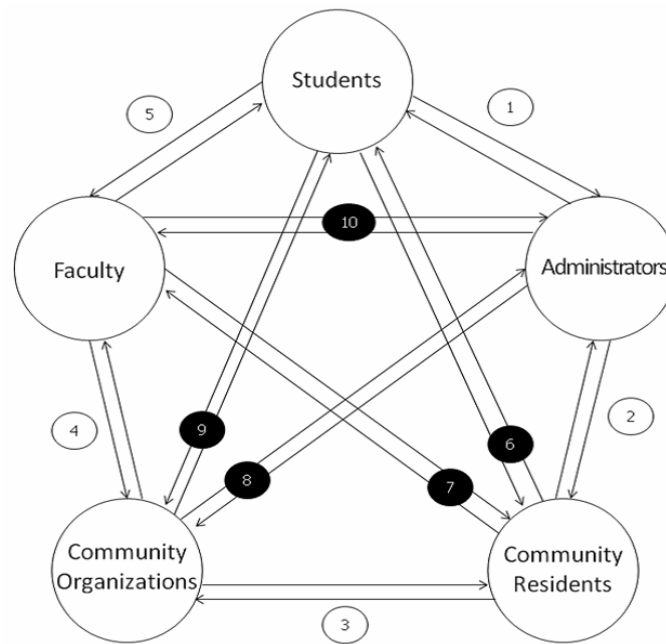


Figure 2. Stakeholders Involved in Service-Learning

At the basic level of analysis, service-learning entails relationships and interactions between these stakeholders; any or all of these relationships can be evaluated (Bringle et al. 2009). Preferably all parties interact with each other on a regular basis, meaning a network could potentially be gained from participation in academic service-learning. For example, there is potential for students to have increased involvement through talking with faculty (Gray et al. 1999). Moreover, students can encounter

individuals and networks they might not have otherwise (Butin 2003). Although all of these relationships are equally important when studying and evaluating academic service-learning, the main focus of this study is on the relationships and networks built between students and individuals they come into contact with at their academic service-learning site.

The question remains however, are students taking full advantage of interactions at their academic service-learning site and if so, is this having a positive impact on their social capital?

Academic Service-Learning and Social Capital

The impact of academic service-learning on students has mostly focused on “the following dimensions: 1) awareness of community, involvement in community, commitment to service, and sensitivity to diversity, 2) career development, understanding of course content, and communications, and 3) self-awareness, sense of ownership, and valuing of multiple teachers” (Gelmon et al. 2001:76). There is currently a lack of research addressing the exact relationship between social capital and academic service-learning.

There have been at least three major studies which examine this relationship between academic service-learning and social capital. Koliba (2003), Howard (2006), and D’Agostino (2010) suggest there is a positive relationship between the two variables. As previously mentioned there are several definitions and aspects of social capital that can be measured. Koliba (2003) studied whether there was a relationship between service-learning and social capital, in particular the presence of a network, with child

participants. Howard (2006) explored participation in civic engagement, in particular participation in academic service-learning and television watching. D'Agostino, on the other hand, researched networks and trust and their relationship with service-learning.

Through participation in service-learning activities, Koliba (2003) found that students that interacted with individuals with whom they might not have otherwise encountered, resulted in an increase in social capital. Furthermore, Koliba (2003) found social capital created during service-learning activities lead to further development of social capital. Howard (2006) studied the extent to which social capital could be changed within a group of middle-school students through participating in service-learning while D'Agostino (2010) explored social capital as an outcome of service-learning through surveying students post-graduation from college. Individually, Howard (2006) and D'Agostino (2010) both found that through the implementation of service-learning activities students that participated in these activities had higher social capital than those that did not participate. Each of these three researchers examined the relationship between academic service-learning and social capital, however they did not go into great detail about individual indicators of academic service-learning which may have an impact on one's social capital. This study aims to delve into these possible relationships further.

CHAPTER 3: CONSTRUCTING RESEARCH SURVEY

Research Question

Given the lack of research on the relationship between social capital and academic service-learning, this study researches whether one's social capital can be increased through participation in an academic service-learning course. Building upon the aforementioned specifics about social capital and academic service-learning we arrive upon the overall research question: Does academic service-learning contribute to students making gains in social capital? In order to test this hypothesis, numerous components were analyzed for the dependent variable, social capital, and the independent variable, academic service-learning. The dependent variable was broken down to strong and weak ties. Academic service-learning, the independent variable, was measured through questions focusing on how much time and effort were put into the service component by both the individuals at the site, as well as by the students. Furthermore, whether students felt comfortable with their role at their site (Rockquemore & Schaffer 2000) and accessibility to interactions with staff and volunteers were measured. The type of service, previous experience, attitude towards ASL, and demographics of participants were also used as ways to measure the independent variable. In the following section these components of the survey will be addressed in more detail, followed by more specific hypotheses.

In order to determine how to measure the dependent and independent variables so they could be utilized in a survey, the concepts had to be translated into something that could be measured (De Vaus 2004). Three steps had to be taken in order to do this:

“1. Clarify the concepts, 2. Develop indicators, and 3. Evaluate indicators” (De Vaus 2004:43). Through researching previous literature, working definitions of social capital and academic service-learning were established. This resulted in a clarification of the concepts of these terms. In order to move from the abstract definitions to where questions could be used in the survey, definitions had to “descend the ladder of abstraction” (de Vaus 2004:28), meaning the abstract concepts of social capital and academic service-learning were broken down to dimensions which could be measured. The following section will break down each section of the survey, which will also describe how the abstract overall concepts were broken down into indicators which could be used to analyze the overall hypothesis.

In the subsequent section the variables used in the survey, as well as and the reasoning behind why each question was asked, will be discussed. Listed after each description of the questions asked in the survey the exact survey question number will be listed, which can be found in Appendix II.

Social Capital

Social capital, the dependent variable, was a latent variable which exists among relations among people; therefore it is not as tangible as say, physical capital (Coleman 1988:100) and could not be directly tested. For this reason, other factors were used to define and test the impact of academic service-learning on social capital.

Concepts of social capital were broken into sub-dimensions until indicators which could be used in the survey were obtained. Latent, dependent, variables of social capital were determined as weak and strong ties. Weak ties were measured as relationships with

individuals that could be used as a reference, individuals participants felt comfortable asking a general question, individuals that participants classified as acquaintances, and individuals with whom participants had infrequent interactions. Strong ties were measured as individuals that participants felt comfortable talking to about a work-related problem, individuals participants classified as close friends, and individuals with whom participants had frequent interactions.

This battery of questions began by addressing possible relationships with individuals at the service-learning sites. Respondents were asked two similar questions about individuals at their service-learning site and whether or not they felt comfortable asking a work related problem (questions 23-26) and/or a general procedural question (questions 31-34). The more specific question was classified as a strong tie, whereas the general question was classified as a weak tie.

Behavioral intentions and actual behavior are two different factors (Bradburn et al. 2004), therefore these questions were followed up by asking how many individuals they *actually* asked a question (questions 27-30 and 35-38). According to Bradburn et al. (2004), participants' answers to general questions can be affected by where they are asked in a survey, whereas specific questions are not as easily influenced. Therefore, participants were first asked about work-related problems (specific question), followed by general/procedural questions (general question). The rationale behind asking the specific question first was so that participants would eliminate any work-related problems from the following question. If the general question was asked first, participants may have been confused when reading the specific, work-related problem, question second

resulting in participants having to interrupt the flow of their survey taking in order to ascertain the difference between the two questions.

Flap and Boxman (2001), in their study on social capital and starting careers, found employers often use referrals when selecting new employees. Moreover, social capital can help provide resources in the job search (Lin 1999). Therefore, whether or not individuals form relationships with individuals they feel can be used as a reference is another means of measuring one's social capital. This was directly addressed in the survey by asking participants if there were any individuals at their ASL site they would feel comfortable asking for a reference or letter of recommendation (question 39). If participants responded yes, they were then asked an open ended question in which they were asked to write the first initial of each person they would feel comfortable asking for a reference (question 39a). This was done to measure the existence of weak ties and the size of this particular set of weak ties.

Finally, participants were asked whether or not they formed any personal relationships with individuals at their service-learning site (question 40). This form of measurement was adopted from Lin's (1999) measurement for perceived strength and role category, in which relationships were measured on a scale from close friend to acquaintance. For the purpose of this study, strong ties referred to close friends and weak ties referred to acquaintances and references.

If participants answered yes, they had formed personal relationships, participants were then asked how many personal relationships they formed (question 41). This

battery of questions was asked with the goal of obtaining the size of one's network, an indicator of social capital (Bourdieu 1986; Flap 2001; Seibert et al. 2001; Stone 2001).

Following this battery of questions, participants were asked to classify up to five of these relationships by ranking them on a scale ranging from 1 (just an acquaintance) to 11 (close friend) (questions 42a-42e). Participants were also asked how often they interacted with each individual on a personal level – ranking from never to always (questions 42a1-42e1); for examining the frequency of interactions among participating actors is a way to measure relationships and social capital (Adler and Kwon 2002; Berscheid, Snyder and Omoto 1998; Flap and Boxman 2001; Granovetter 1973, Lin 1999). Thus, this battery of questions was asked in order to obtain a more specific description of the type of network formed – acquaintance and infrequent interactions were measured as weak ties, while close friends and frequent interactions were measured as strong ties. Both of these answer categories had an odd number of options so participants could not pick a mid-point option (Bradburn et al. 2004).

Time and effort at service-learning site. Time and effort put into the academic service-learning experience by both the students as well as the participants can impact one's social capital. Therefore, the survey started with general, nonthreatening questions concerning how much time participants spent at their service-learning site (Gray et al. 1999) followed by questions about interactions with staff and volunteers at their site.

Questions 1 and 2 in the survey addressed frequency and duration of participants' visits at their service-learning site, which tested whether these independent variables had an impact on one's social capital. The next set of questions addressed whether or not

participants put in more time at their service-learning site than was required by their course. This question (question 3), along with the following question addressing how participants felt about the amount of time at their service-learning site (question 4), were asked in order to determine whether or not students felt stressed about their participation in the ASL component of their course. If so, they may not have taken advantage of possible networking opportunities made available at their site and hence not benefit from a possible increase in their social capital. Furthermore, if participants put in more time than required, this could either be due to their own interest with their ASL service or because they felt a need to put in more hours in order to complete required work. Each of these answers could impact one's social capital in a positive or a negative way.

Subsequent to questions about whether or not participants put in more time than required, an open-ended question asked participants the reasoning behind why they put in extra hours (question 3a). Open-ended questions encourage respondents to respond in a way in which they feel comfortable and can prove to be important when beginning to study a new area (Bradburn et al. 2004).

Feeling welcome. In order to determine whether service-learning sites were welcoming, the survey presented a battery of questions asking whether participants were invited to attend staff meetings (question 7), and if so whether or not they attended the meetings (question 7a). These questions were asked with the idea that if participants were asked to participate in staff meetings, the service-learning site would have been embracing participants as part of their community. Furthermore, if participants attended

staff meetings, this could have posed as an opportunity to network and build social capital.

Next, participants were asked about whether they felt welcome at their site (question 8) and whether they felt comfortable with their particular role at their service-learning site (question 9). These questions were asked with the goal of determining whether or not participants felt welcome at their site, which could have had an impact on whether or not they would feel comfortable building a network with individuals at their service-learning site.

Moreover, whether or not students were able to choose their service-learning site, whether they were satisfied with their responsibilities at their site, and how committed they were to their site may have played a role in how involved students were and how much they cared about their service (Gray et al 1999; Rockquemore & Schaffer 2000), which could impact social capital. Therefore these issues were addressed in the survey - satisfaction with tasks at the service-learning site (question 22), whether students were aware of the academic service-learning component when signing up for the course (question 43), how participants felt about ASL being a requirement (question 44), and how participants selected their service-learning site (question 45).

Accessibility to interactions. The next battery of questions allowed for insight into whether or not students had access to resources needed to increase their network (Lin 1999). In order to distinguish whether having a direct supervisor could lead to an increased network, a question about whether participants had a supervisor was asked (question 5). This was followed by another question which asked how often participants

met with their supervisor (question 6). This set of questions was asked with the opinion that a supervisor could potentially assist in increasing one's social capital and the more often participants would come in contact with their supervisor; the more likely there would be an increase in their weak ties.

In addition to asking questions about whether participants had access to interactions with a supervisor, another set of questions addressed whether participants were given time to interact with individuals at their site. Both interactions on the professional level (question 10), as well as interactions on the social level (question 11), were addressed. These questions, similar to the supervisor questions, were asked with the goal of trying to determine whether service-learning sites presented opportunities in which participants could potentially build social capital.

Service type. The next battery of questions addressed the type of service in which participants participated, for this may have impacted whether or not participants had access to building relationships and networking with individuals. For example, Astin and Sax (1998) found students who worked at a political organization and/or the university had an increase in interactions with faculty members. Therefore, participants were asked whether they participated in direct service, indirect service, community/citizen education, and/or community building (questions 12-15).

In addition to the type of service, the "outputs," meaning how many individuals the participants came in contact with was also addressed (Gray et al. 1999). Participants were asked how often they carried out tasks by themselves (question 16); this was asked on a 5-point scale ranging from "never" to "always." Subsequently, participants were

asked to write the number of individuals they worked with over the course of the semester for each of the following categories: staff members, volunteers, interns, other college students, and clients/beneficiaries over the age of 18 (questions 17-21). These questions were asked in order to ascertain whether participants worked alone or with individuals - which could potentially lead to opportunities in which they could have an increase in social capital.

Previous experience. Astin and Sax (1998) and Gray et al. (1999) address several predisposing factors that may influence whether or not students participate in service. These predisposing factors can lead to students entering into the semester with higher initial social capital compared to other students. For example, individuals who volunteered in high school are more inclined to participate in service in college (Astin and Sax 1998). “While 31% of Americans who reported that they did not perform volunteer work while young engage in voluntary activity as adults, 64% of respondents who did volunteer in their youth also volunteered as adults” (Campbell 2000:643).

Given the abovementioned findings, subsequent to asking questions pertaining to participants’ current experience with their service-learning site, whether or not participants had previous experiences with an academic service-learning course and/or previous experience volunteering was addressed (questions 46, 47, 49, 50, and 52). If this were the case, it could be that academic service-learning was not influencing their social capital. In addition to asking about previous experience, participants were asked if they were still in contact with individuals from their previous volunteer sites (questions

48, 51, and 53). If so, this could suggest this set of participants had more of a tendency towards embracing opportunities in which social capital could potentially be gained.

Attitude towards ASL. Self-selection into an academic service-learning course may have an impact on students' openness to participating in the service aspect of their course (Gray et al. 1999; Rockquemore & Schaffer 2000), therefore a question regarding whether participants were aware, before they arrived to class on the first day, that service was a component of their course (question 43) was asked. Furthermore, participants' attitude toward the requirement of service-learning might have an impact on one's experience. In particular, required hours outside of class (Keselyak et al. 2007; Johnson 2004) might hinder some participants from having a positive attitude towards ASL and therefore possibly from building social capital at their sites.

Demographics. Gray et al. (1999) suggest one's background and demographics may have an impact on one's social capital, therefore the survey concluded with a battery of questions focusing on participants' demographics. As Astin and Sax (1998) found being a woman can be a predisposing factor to whether someone participates in service, therefore the demographic survey questions began with a question about gender (question 54). Participants were then asked about their age (question 55), and race/ethnicity (question 56).

Next, participants were asked about their education – both their highest level of education completed (question 57) and which year they were at Eastern Michigan University (question 58). Due to the fact there might be older participants returning to school, or participants going back to school, it was important to address the highest

degree participants received (Bradburn et al. 2004). Rounding out the education questions, participants were asked their college major. Due to the assortment of courses participating in the study, college major was asked as an open-ended question (question 59).

Finally, in order to ascertain whether participants' parents' education (question 60 and 62) and occupation (questions 61 and 63) had an impact on whether students had an increase in social capital, the survey ended with questions addressing both these topics.

Specific Variables and Hypotheses

Breaking down the abovementioned groups, social capital was broken into two different categories – weak ties and strong ties. Indicators of weak ties were relationships in which participants classified as acquaintances, the number of individuals participants felt comfortable asking a general question, and/or persons which participants felt could be used as a reference. Indicators of strong ties were relationships which participants classified as close friends and the number of individuals that participants felt comfortable talking to about a work-related problem. This study focused on staff members, volunteers, college students, and clients at the service-learning site as possible individuals with whom participants could have formed relationships and built social capital.

The following aspects of academic service-learning were measured – duration of time participants spend at their site, type of service in which they participated, whether or not participants had regular interactions with a supervisor, accessibility to professional and social interactions, whether or not participants felt welcome, previous experience

with academic service-learning courses, previous experience volunteering, and the demographics of participants.

My hypothesis was that this study would suggest participation in academic service-learning activities would have a positive impact on participants' social capital. In particular I hypothesized that the more time participants spent at their site and the more welcoming the community at a site was, the more positively impacted social capital outcomes would be. Furthermore, the more frequently students met with their supervisor at their ASL site, the more positive the impact on their social capital. Additionally, I hypothesized the type of service in which participants partook would have an impact on their social capital, more specifically participants that partook in direct service, in which interactions with individuals were readily available, would have an increase in social capital with strong ties; while those that participated in indirect service and did not interact with individuals regularly at their ASL site would have an increase in weak ties. Regarding previous experience with academic service-learning and volunteering, I hypothesized participants with previous experience would be more likely to have an increase in their social capital. With regards to demographics, I hypothesized that women would be more likely to have an increase in social capital, as well as participants with parents that had networking as part of their job would be more likely to have an increase in social capital.

CHAPTER 4: RESEARCH DESIGN AND METHODOLOGY

Research Design

In order to test the hypotheses, methodology of the study was very important. Included in this section will be a background of how the study transpired and how it was implemented. In ideal circumstances, an experimental design would have been utilized. This was considered by the researcher; however due to time constraints, this was not a feasible option. Therefore, a survey was developed as a way to study participants' experiences with academic service-learning courses and whether social capital was impacted by their participation in academic service-learning courses.

In order to confirm there were minimal risks to human participants in the study (Babbie 2007), approval from the Institutional Review Board (IRB) was obtained. Upon approval from the IRB, professors at Eastern Michigan University teaching courses with an academic service-learning component were e-mailed and invited to have their students participate in a study on academic service-learning and social capital. Instructors were informed the principal investigator was a graduate student working on her thesis, an exploratory study on whether participation in an academic service-learning course helps contribute to an increase in students' social capital (strong and weak ties). It was then explained that the principal investigator was in search of participants currently enrolled in courses with an academic service-learning component and involvement would require students filling out a survey which would take approximately 10-15 minutes. Upon giving a brief description of topics addressed in the survey (type of service, frequency and duration of service, access to staff and faculty at the site, types of relationships built

throughout the experience, and previous experience with academic-service learning), professors were asked if they would be willing to permit their students partake in the study.

Using SPSS, nonparametric correlations were run to determine the strength and direction of correlations between dependent and independent variables. Pearson's Correlations were also utilized. In addition, regression analysis was used in order to determine the specific impact of the independent variables on the dependent variables.

For the data analysis portion of this study I worked with Daric Thorne. Thorne was a classmate in my survey research class who also conducted a study on social capital and used a survey to conduct his research. In addition, he and I had the same advisor and Thorne has had extensive training in statistical analysis. All of these components made for an ideal situation for collaboration on the data analysis portion of this study.

Sampling

Non-random subjects were recruited based upon enrollment in courses during the Winter 2013 semester with an academic service-learning component at Eastern Michigan University. For the winter semester of 2013 there were 18 courses at EMU with an academic service-learning component. A total of 321 students were enrolled in these courses. Of the 18 courses, 8 participated in the study, for a total of 127 student participants. During the final two weeks of class, surveys were distributed to participating classes during their regular scheduled class time. The survey was voluntary and given on one day only. Due to the fact participation was voluntary and students could have been absent on the day of the study, not all students enrolled in every class

participated in the study. The breakdown of participating courses was as follows: one social work course (n=19, out of 26 possible students), one nonprofit management course (n=10, out of 13 possible students), one preservation administration course (n=13, out of 14 possible students), two management courses (n=21, out of 29 possible students), and three education courses (n=64, out of 73 possible students).

Although all participating courses had an academic service-learning component, the academic service-learning component varied greatly. Some courses only required students to complete a required project (preservation administration with 10-15 hours being an estimated hour range), while others visited their site weekly (education courses required 20 hours with a suggested meeting one to two times weekly), and still others were given a required amount of hours to fulfill throughout the semester (social work with 35 hours, education with 20 hours with four to five suggested visits, nonprofit management 20 hours, and management with 5-10 hours). Furthermore, depending on the course, it was up to the instructor's discretion the extent that academic service-learning was integrated into their courses. Some courses focused more on the academic aspect while others fully embraced students work with their academic service-learning sites.

As previously noted, the sample was both small and non-random. Consequently, empirical generalizations about the impact academic service-learning has on one's social capital could not be made. The results of this study are only to be used to describe Eastern Michigan University students who partook in an academic service-learning course during the winter semester of 2013. Through this research, it is suggested that

certain relationships between the independent and dependent variables exist. These relationships propose possible theoretical implications, not empirical implications. The results in this study can be used by future scholars who can build further theory upon the findings.

Data Collection

Surveys were distributed to participants in seven participating instructors' courses during the last two weeks of class, for a total of eight participating courses. The principle investigator distributed surveys to seven of the courses. Upon approval from the participating professor, Thorne served as a proxy to the eighth course and distributed surveys. Prior to having participants complete a self-administered, close-ended survey, participants read and signed an informed consent form. Confidentiality was extremely important; therefore signed informed consent forms are kept in a locked drawer, separate from the self-administered surveys. The surveys were anonymous; each survey was assigned a serial number.

Pre-testing the Survey

The survey began with general instructions (2012), which were created during a Survey Methods course:

This survey seeks to gather information about academic service-learning at Eastern Michigan University. It also seeks to gather information about possible networks and relationships that potentially arise through academic service-learning.

The results of this survey are completely confidential. Only the researcher will know your personal information. Please answer the questions based on how you think and feel.

Please also note that completion of this survey is voluntary. If you come to a question you do not feel comfortable answering, please feel free to skip it and move on to the next question. If you chose to participate and later decide you would like to change your mind, you may withdraw at any time without any consequences.

INSTRUCTIONS FOR COMPLETING THE SURVEY:

1. Read all questions and answers before making your choice
2. Circle the one answer that best describes your situation or write in the one answer that best describes your situation

Following the instructions, the layout of the survey was “spread out and uncluttered” (Babbie 2007:252). The ordering of the questions within the survey was crucial – the survey began with easy, nonthreatening questions, and questions were grouped into sections with other like questions (Bradburn et al. 2004). Language used in the survey was simple, with short, to the point, questions and answers. For each question the goal of the question, meaning exactly what was intending to be measured, was established. This was important in order to ascertain whether or not what was intended to be measured was actually being measured (Bradburn et al. 2004).

In order to test whether or not the survey was user friendly, as well as the validity of the questions – whether or not the questions were measuring what they were intending to be measuring – the survey was pre-tested by willing volunteers (Bradburn et al. 2004). The survey was initially constructed during a course on designing surveys and half the pre-testing was done during this course. As the study developed, the survey adapted – questions were added, questions were deleted, and several questions remained the same. The new survey was pre-tested again before the final survey was distributed.

Twenty willing respondents that had experience with academic service-learning and/or an internship partook in the pre-test of the survey. This provided an estimate of how long the survey would take, which proved to be helpful information when recruiting participants for the actual study. Subsequent to completing the survey respondents partook in a cognitive interview. “Cognitive interviewing entail(s) administering survey questions to a participant while collecting additional verbal information relevant to survey responses” (Beatty and Willis 2007:289). Through think-aloud procedure and follow-up probes (Beatty and Willis 2007) cognitive interviewing helps to improve survey questions (Sudman, Bradburn, and Schwarz 1996). Think-aloud procedure involved asking respondents to discuss how they arrived upon their answer(s) (Beatty and Willis 2007; Sudman et al. 1996). More specifically, respondents were asked whether each question was difficult to answer, what they took into account when answering each question and if it was hard for them to find a choice that expressed the way they felt (Sudman et al. 1996). Follow-up probes involved respondents’ paraphrasing and repeating survey questions in their own words (Beatty and Willis 2007). Paraphrasing of

questions by respondents allowed for a better understanding of whether the intent of the question and what was understood by respondents were one in the same.

Feedback from the pre-test proved to be quite helpful and several questions were changed accordingly. For instance, many grammatical errors were corrected. This was useful, for these types of errors might impede on the flow of the survey and might confuse participants. With regards to actual questions on the survey, respondents had suggestions for several questions. A few respondents suggested shortening question 1, regarding the average times a week participants visited their service-learning site. They thought the question was “too wordy.” While this information was taken into account, the question was left alone in attempts to eliminate any possible misinterpretations. Bradburn et al. (2004) specify that “the ‘when’ questions should specify the time period by using actual dates instead of terms such as ‘last week’ or ‘last month’” (p. 63). Furthermore, Bradburn et al (2004) suggest that when it comes to behavior questions, longer questions can improve recall.

Question 2, about average duration of time spent at one’s service-learning site, received several comments from respondents. Many respondents stated they wished there were more options with longer hours. Upon further review of respondents’ responses, it was believed these comments were due to the downfall of having pre-tested the survey with respondents from a similar demographic group, however not the exact group being used in the study. The distribution of frequency for this question was geared toward academic service-learning opportunities, not internships, and it is important to

have an idea of what the distribution of frequency is most likely going to be (Bradburn et al., 2004).

Other respondents stated the response options in question 2, which address the duration of time respondents spent at their service-learning sites, were too wordy. This was taken into consideration and the “visit” part of each response option was omitted. It was initially thought including “visit” would be helpful, however after the pre-test it was decided leaving it in was more distracting. In attempt to lessen the “wordiness” of the question, the duration of time options were changed from their number written out in words to the actual number. In addition, it was decided to condense the response options to seven instead of nine. Bradburn et al. (2004) suggest there be no more than six to seven response options.

When asked about whether participants developed personal relationships with any individuals at their site (questions 40-42), through the pre-test it was suggested that after “personal relationships” a description of “either as acquaintances or close friends” be added. This change would allow for direction and clarity of what kind of “personal relationships” were in question. Clarity is important in survey questions, making this a valid suggestion, and the change was made accordingly.

During pre-testing, it was observed that the “go to” instructions were incorrect in the battery of questions addressing previous experience with academic service-learning and volunteering (questions 46, 49, and 52). This was noted and changed accordingly, as according to Bradburn et al. (2004) it is important to have “go to” instructions that are

correct. This set of questions did not receive any further comments and/or problems during the pre-test.

Overall there were no major problems with the demographic questions (questions 54-63). One respondent suggested putting demographic questions at the beginning of the survey; however as Bradburn et al. (2004) suggest demographic questions should go at the end of a survey. When demographic questions are asked at the end of a survey, essential questions can be addressed in the beginning (Bradburn et al. 2004).

Furthermore, with demographic questions at the end of the survey participants can move quickly through the end of the survey. It was also observed that respondents enjoyed the end of the survey moving quickly with questions that were easy to answer.

When asking about age, Bradburn et al. (2004) recommends asking about the date of birth of participants, in addition to their age. However when pre-testing this question (question 55) participants found this to be redundant and confusing, therefore the final question was left at “How old are you.”

Limitations

A few limitations have previously been mentioned, such as sample size, nonrandom sample, and validity. Another limitation that should be mentioned again is the possibility that students enrolled in academic service-learning courses may already display characteristics of increased social capital. Therefore, similar to D’Agostino’s (2010:318) study on social capital and academic service-learning, there is a possibility the results of this study display differences in characteristics of students instead of impact of academic service-learning on social capital.

Another minor limitation to the study is that a survey was utilized. Although self-administered surveys are most commonly used for this type of research, are useful for collecting original data, and are reliable for exploratory studies, surveys can be weak on validity (Babbie 2007). The survey was pre-tested in attempts to create more validity.

Measurement problems were experienced with question 1 on the survey, which addressed the frequency of academic service-learning site visits. Since some participants only visited their site one time during the semester, and others visited their sites sporadically, responses from participants were varied and confusing. This resulted in the frequency variable not being useful in analysis and it is not known whether this is due to the variable itself not being a useful measure, or if the variable was measured poorly.

Through re-evaluating indicators of participants' attitude toward ASL, it is possible the question may have been confusing. The question asked how participants "felt about service being a requirement" of their course (question 44). Ideally this question would have had response options on a scale. Furthermore, the wording of the question may not have measured what it was intending to measure. It is possible some participants focused on how they felt about service while others may have focused on how they felt about an added requirement to their course.

Regarding the variable of race/ethnicity, this variable was not properly asked. The question should have been borrowed from the U.S. Census, which breaks the question of race and origin into two consecutive questions - first asking respondents if they are Spanish/Hispanic or Latino, second asking about race (Bradburn et al. 2004).

Had the question been asked in this way, it would have avoided possible confusion about race/ethnicity.

CHAPTER 5: VARIABLE CONSTRUCTION AND DATA CLEANING

After inputting the variables into SPSS each variable was individually assessed, as well as their frequencies. From here several variables were collapsed into categories, and new variables were constructed. The changes made to the data are listed below.

Supervisor. Question 6's categories were collapsed into a dummy variable with frequent interactions with a supervisor valued at 1 and infrequent interactions with a supervisor valued at 0.

Interactions with individuals at the service-learning site. The initial battery of questions (10 & 11) addressed whether or not participants were given time at their site for professional and/or social interactions, "no" and "n/a" were collapsed into one category of "no."

The second battery of questions (17-21, 23-26, 27-30, 31-34, and 35-38) were open ended and asked participants to give the number of individuals with which they had interactions. The total amount in each question section was totaled and this number was constructed into a new variable.

Type of service. The four types of services (questions 12-15) were collapsed into two categories – direct service (made up of direct service and community building) and indirect service (made up of indirect service and community/citizen education). Two different sets of dummy variables were then created - one variable had direct service valued at 1 and the other had indirect service valued at 1.

In addition to the abovementioned changes, another variable was constructed, Total Service Type. This variable was created by looking at each individual participant

and whether or not they partook in only one type of service or both indirect and direct service. If they participated in only one type of service this was valued at 1; if they participated in both types of service, this was valued at 2.

Social capital. Question 39 addressed whether or not participants would feel comfortable asking someone at their academic service-learning site for a letter of recommendation or to serve as a reference. If participants answered yes to this question, they were asked to write the first initial of each person. These initials were tallied and this number was then used as a numeric representation of the size of participants' reference network.

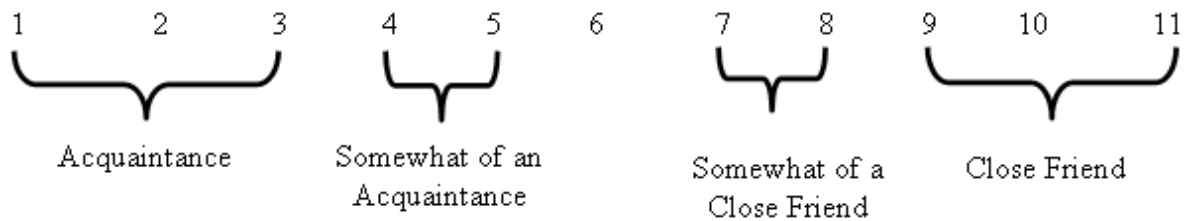
Question 41 asked participants how many personal relationships they formed; however this question was asked in a way which did not provide an exact number of personal relationships, instead it gave a range of answers from which participants could choose (1, 2-3, 4-5, 6-7, 8-9, or 10 or more). Therefore, a new variable was constructed in order to obtain a more accurate number of personal relationships formed by each participant while at their academic service-learning site. Using the information obtained from the set of questions in which participants were asked to classify their relationships for up to five individuals at their site (question 42a-e), the new variable was constructed. The new variable ranged from 0 relationships to 5 or more relationships for each participant.

Following total relationships formed, two additional variables were created – the total number of close friends each participant made and the total number of acquaintances

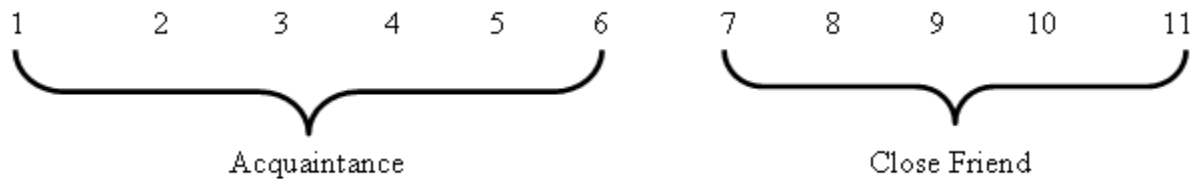
each participant made. Categories of “close friend” and “acquaintance” were created through a series of collapsing categories. The original scale ranged from 1 to 11:



For initial coding 1-3 were collapsed into one category - acquaintance, 4-5 were collapsed into one category - somewhat of an acquaintance, 7-8 were collapsed into one category - somewhat of a close friend, and 9-11 were collapsed into one category - close friend:



From here, the two “acquaintance” categories were collapsed into one category of “acquaintance”; sixes were also added in as acquaintances. The two “close friend” categories were collapsed into one category “close friend.” In the end, reverting back to the original scale – 1-6 are now categorized as “acquaintances”, while 7-11 are now categorized as “close friends”:



Next, an additional variable was created, Relationship Type Dominance Scale, which addressed whether each participant’s relationships were mostly classified as “close friends” or “acquaintances.” This scale was constructed by taking the total number of close friends each participant reported minus their total number of acquaintances. This resulted in each participant being given a number ranging from -5 to 5. Negative numbers meant a participant predominately formed acquaintances, 0 meant that participants either had no friends or an equal number of close friends and acquaintances, and a positive number meant that participants predominantly made close friends. From here, these variables were recoded into 1 = no relationships or equal number of close friends and acquaintances; 2 = acquaintance dominance; and 3 = close friend dominance.

Average interaction for each individual was a scale from 1-5 (questions 42a1-42e1), 1 indicated participants never interacted with the individual in question and 5 indicated they always interacted with the individual in question while at their service-learning site. From here a new variable was constructed “Average Interaction” among all personal relationships for each participant. This variable was constructed by taking the total of all interaction average scales and dividing this number by the number of total relationships each participant had.

Academic service-learning background. Question 44 addressed how participants felt about service-learning as a requirement of their course. Upon further review of the wording of the question, it was evident the categories given were not consistent – meaning “don’t care” could not be appropriately included as an option with “disapprove” and “approve.” This question should have been a scale with different levels of approval. Therefore, in attempts to correct this error, “disapprove” and “don’t care” were collapsed into one variable “don’t care.” The rationale behind collapsing these two variables was that if a participant doesn’t care about academic service-learning being a requirement, in the researcher’s mind, this was more aligned with disapproving than approving of the added component to their course. From here, this question was made into a dummy variable with “approve” valued at 1 and “disapprove” valued at 0.

Question 45 addressed how participants selected their service-learning site. This question was made into a dummy variable by collapsing “selected service site using course-provided information” and “selected site on own” into one category of “self-selected service site”, valued at 1, and “assigned site”, valued at 0.

Question 50 addressed the frequency of volunteering at a site in the past 12 months. Initially the question had seven categories, which were then collapsed into four: frequent (every day I give unpaid help & at least once a week I give unpaid help), somewhat frequent (at least every 2-3 weeks I give unpaid help & every month I give unpaid help), somewhat infrequent (at least every 2-3 months I give unpaid help & at least every 4-6 months I give unpaid help), and infrequent (Once or twice a year I give unpaid help).

Demographics. Question 54 addressed gender and was made into a female dummy variable. Question 56 addressed race/ethnicity, and all non-white participants were collapsed into one category. This variable was then made into a dummy variable with white participants valued at 1, all other participants valued at 0. Questions 61 and 63 addressed parents' occupations. Parents' occupations were collapsed from 12 categories to six – unskilled labor, professional trade work, professional services and public administration, service industry, and other. Question 60 and 62 addressed parents' education and initially had seven categories which were collapsed into three – high school or less, some college and college, master's degree or higher.

Education majors vs. non-education majors. In addition to the abovementioned changes, a completely new variable was constructed which separated participants into two different groups – those enrolled in an education course and those enrolled in a non-education course. During initial analysis, questions were raised as to whether or not variables were interacting and therefore affecting results. It was then noted participants' responses were differing based on which course they were enrolled. After analysis of cross tabs, it became apparent there were strong correlations between the recoded variables and the particular classes in which participants were enrolled. Certain courses were producing much different data than others. From here surveys were recoded based on class subject, similarities were examined and further attention was paid to patterns that may have predicted differences between groups. It was evident the three courses which were education-based were producing similar results while those that were not education-based were also producing similar results. This then lead to another recoding of the

course variable into a dummy variable in which participants taking an education course were coded as 1 and non-education courses coded as 0.

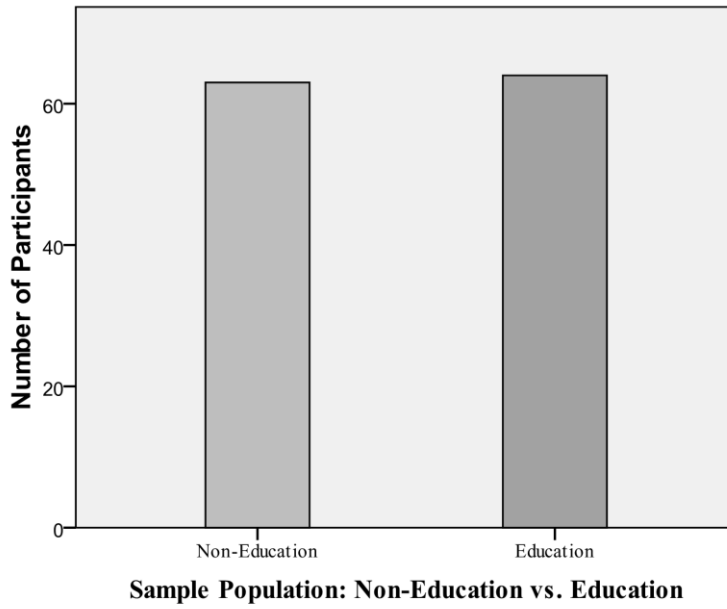


Figure 3. Non-Education vs. Education Participant Totals

CHAPTER 6: ANALYSIS OF GENERAL RESULTS

In order to test the hypotheses, nonparametric correlations and Pearson correlations were used to determine possible associations between the dependent and independent variables. Correlations can suggest the direction and strength of relationships between variables. In addition to nonparametric correlations, regression analysis was used to determine the relationship and the impact independent variables had on dependent variables. Three separate regression models were made.

Social capital is represented in the analysis by the following indicators: (1) total number of relationships participants formed; (2) number of close friends participants made; (3) number of acquaintances participants made; (4) average frequency of interaction participants had with individuals with whom they formed relationships; (5) whether participants predominantly formed more close friends or acquaintances; and (6) number of people participants would feel comfortable asking for a reference or a letter of recommendation. These indicators of social capital were chosen to be included in the final analysis because they emerged as the best overall indicators of strong and weak ties.

The independent variable, academic service-learning, is represented in the analysis through the following indicators: (1) frequency of visits with supervisor; (2) feeling welcome at the service-learning site; (3) previous experience with academic service-learning; (4) type of service in which participants partook; (5) whether participants were given time for social and professional interactions; (6) the total number of individuals with whom participants worked; (7) frequency of interaction with individuals classified as personal relationships; (8) participants attitude toward ASL

being a component of their course; and (9) demographics of participants. These nine indicators of academic service-learning were chosen to be included in the final analysis because they portrayed the best overall representation of the independent variable.

Due to the non-random and small sample population, tests of significance were not used in this study (Carver 1978). Furthermore, given the results of this study are not intended to be generalized beyond this study (Carver 1978) and results are proposing possible theoretical implications, not empirical implications, it was not necessary to include tests of significance. The results in this study, however, can be used by future scholars who can build theory upon the findings.

Overall Data Results

Supervisor. Did having regular interactions with a supervisor at the ASL site have an impact on one's social capital? With a .154 Spearman's rho correlation and a .147 Kendall's Tau-b correlation, a strong positive correlation was found between how often participants met with their supervisor and the total number of people participants felt comfortable asking for a reference. The more participants met with their supervisor, the more people they felt comfortable asking for a reference. On the other hand, the remaining correlations were mostly negative, suggesting that the more frequently participants interacted with their supervisor the less likely they were to form relationships (both with close friends and acquaintances). The contrast between these results may possibly be due to the fact that the more time participants spent with their supervisors, the less time they probably spent with individuals at their sites.

Table 1: Correlations between numbers of times met with supervisor and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=127)	-.047	-.042
How many total close friends (N=127)	-.060	-.058
Acquaintance total (N=127)	-.035	-.032
Interaction Average (N=79)	.061	.053
Relationship dominance (N=127)	-.004	-.003
Number of people felt comfortable asking for a reference (N=66)	.154	.147

Welcoming service-learning site. Did feeling welcome at the ASL site have an impact on one's social capital? A strong positive correlation was found between feeling welcome at one's academic service-learning site and the number of people participants felt comfortable asking for a reference (.244 Spearman's rho and .232 Kendall's Tau-b). Those that felt comfortable at their academic service-learning site were more likely to feel comfortable asking individuals for a reference.

Participants that felt comfortable at their site were more likely to have frequent interactions with individuals, as a strong positive correlation (.193 Spearman's rho and .166 Kendall's Tau-b) was found between participants that felt welcome at their site and how often participants interacted with individuals. There was also a negative correlation (-.134 Spearman's rho and -.119 Kendall's Tau-b) between those that felt welcome at their site and the type of relationships formed on the relationship type dominance scale. This suggests general participants built relationships with acquaintances. However, there was not great variability between those that felt welcome at their site and those did not which may have an impact on the validity of these results. 102 participants responded they felt welcome at their site, while 21 responded they did not feel welcome.

Table 2: Correlations between welcoming service-learning site and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=123)	.005	.004
How many total close friends (N=123)	-.037	-.035
Acquaintance total (N=123)	.075	.069
Interaction Average (N=78)	.193	.166
Relationship dominance (N=123)	-.134	-.119
Number of people felt comfortable asking for a reference (N=65)	.244	.232

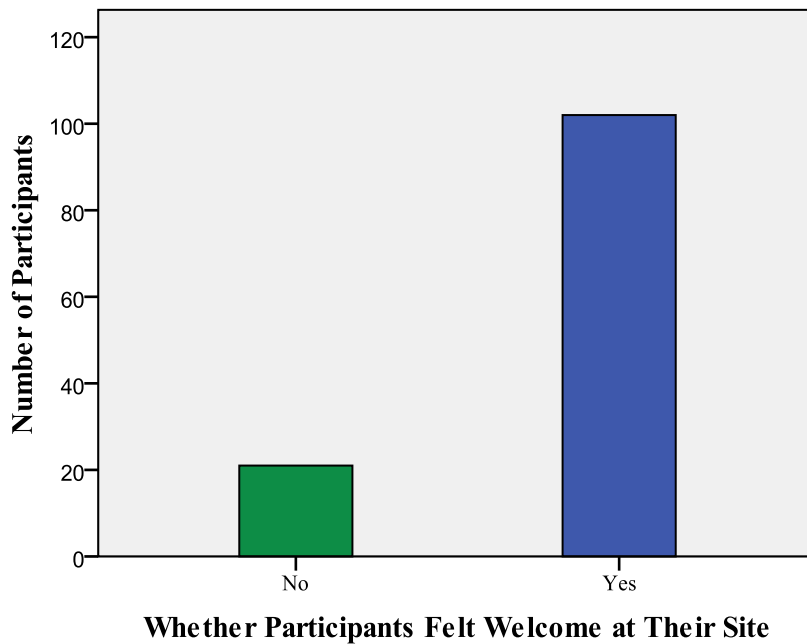


Figure 4. Graph of Whether Participants Felt Welcome at their Site

Previous experience. Did previous experience with ASL have an impact on one's social capital? Several strong positive correlations were found between previous experience and social capital, however not in the way initially hypothesized. There was a positive correlation (.304 Spearman's rho and .273 Kendall's Tau-b) between participants

partaking in academic service-learning for the first time and their total number of relationships. Furthermore, first experience had a positive correlation (.240 Spearman's rho and .221 Kendall's Tau-b) with the total number of acquaintances. A negative correlation (-.117 Spearman's rho and -.103 Kendall's Tau-b) was also found between first experience and relationship dominance. This negative correlation corresponds with the previous results, as according to the relationship dominance scale, negative correlations suggest participants dominantly made acquaintances. These results suggest that participants taking part in an ASL course for the first time were more likely to build relationships, specifically with weak ties, acquaintances. Additionally, a negative correlation (-.198 Spearman's rho and -.170 Kendall's Tau-b) was found between first experience participants and interaction average. These findings are consistent with the preceding results, in that the less frequent interactions participants had with individuals the more acquaintances they made.

Table 3: Correlations between first experience with ASL and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=126)	.304	.273
How many total close friends (N=126)	.112	.107
Acquaintance total (N=126)	.240	.221
Interaction Average (N=78)	-.198	-.170
Relationship dominance (N=126)	-.117	-.103
Number of people felt comfortable asking for a reference (N=66)	.192	.183

Service type. Was one's social capital affected by the type of service in which they partook? Beginning with direct service, there were two correlations of note - the number of people participants felt comfortable asking for a reference and how often participants interacted with individuals. A strong positive correlation (.236 Spearman's rho and .224 Kendall's Tau-b) was found between direct service and the number of people participants felt comfortable asking for a reference. A positive correlation (.123 Spearman's rho and .106 Kendall's Tau-b) was also found between direct service and interaction average. These findings suggest participants who participated in direct service had more frequent interactions with individuals and were more likely to build relationships with individuals that could be used as a future reference.

Table 4: Correlations between direct service and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=127)	.016	.014
How many total close friends (N=127)	.075	.071
Acquaintance total (N=127)	.048	.044
Interaction Average (N=79)	.123	.106
Relationship dominance (N=127)	-.007	-.007
Number of people felt comfortable asking for a reference (N=66)	.236	.224

For participants that took part in indirect service, a positive correlation (.100 Spearman's rho and .092 Kendall's Tau-b) was found between indirect service and total number of acquaintances. Additionally, a negative correlation (-.100 Spearman's rho and -.088 Kendall's Tau-b) was found between indirect service and relationship dominance. These results suggest that participants that participated in indirect service were more likely to form relationships with acquaintances.

Table 5: Correlations between indirect service and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=127)	.033	.029
How many total close friends (N=127)	-.058	-.055
Acquaintance total (N=127)	.100	.092
Interaction Average (N=79)	.037	.032
Relationship dominance (N=127)	-.100	-.088
Number of people felt comfortable asking for a reference (N=66)	-.026	-.025

Social and professional interactions. Were students given time to interact with other individuals at their ASL site, and if so did this have an impact on their social capital? A negative correlation (-.188 Spearman's rho and -.172 Kendall's Tau-b) was found between the total number of acquaintances individuals had and whether or not they were given time to interact socially. Furthermore, there was a negative correlation (-.239 Spearman's rho and -.215 Kendall's Tau-b) found between participants that were given time to interact socially and their total number of relationships. Figures 5 and 6, however, demonstrate that although these are negative correlations, overall, participants that were given time to interact socially tended to make more acquaintances and total number of relationships than those that were not given time to interact socially.

Table 6: Correlations between given time to interact socially and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=125)	-.239	-.215
How many total close friends (N=125)	-.142	-.135
Acquaintance total (N=125)	-.188	-.172
Interaction Average (N=78)	-.143	-.123
Relationship dominance (N=125)	.098	.086
Number of people felt comfortable asking for a reference (N=65)	-.155	-.147

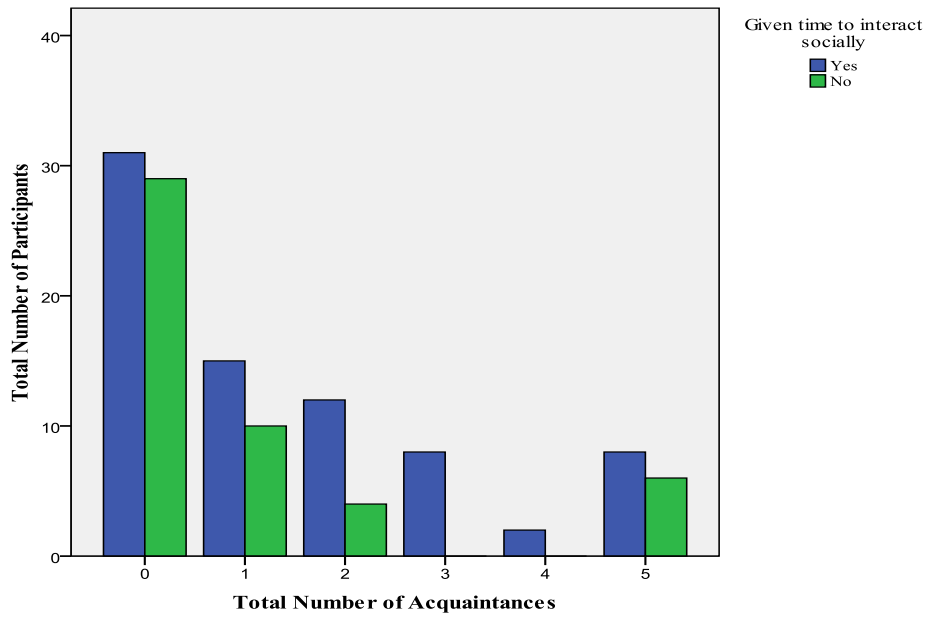


Figure 5. Given Time to Interact Socially and Total Number of Acquaintances

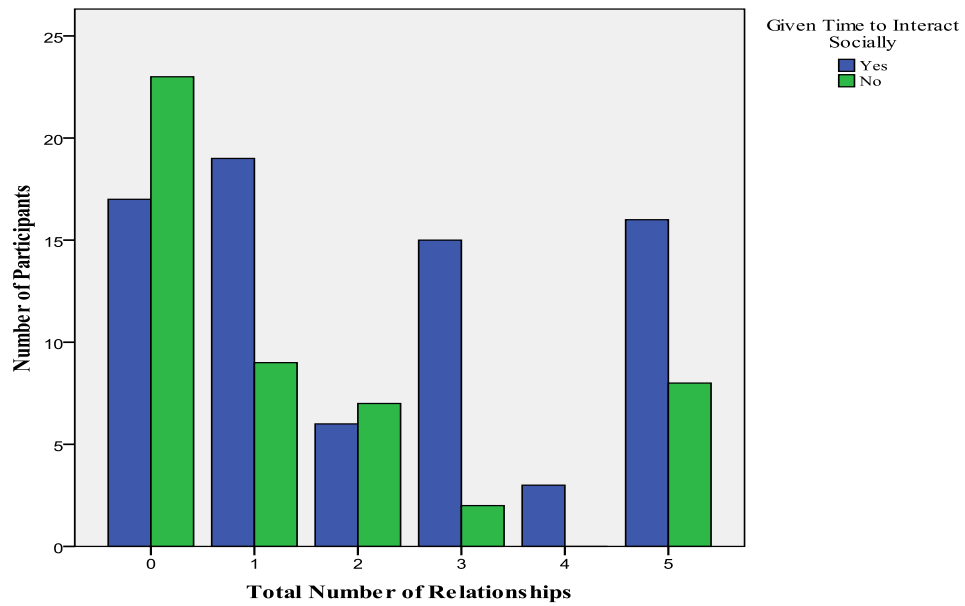


Figure 6. Given Time to Interact socially and Total Number of Relationships

Similar to participants that were given time to interact socially, there was a negative correlation (-.156 Spearman's rho and -.140 Kendall's Tau-b) between those that were given time to interact professionally and total number of relationships. A negative correlation (-.133 Spearman's rho and -.122 Kendall's Tau-b) was also found between participants that were given time to interact professionally and acquaintance total. Again, parallel with social interactions, Figures 7 and 8 demonstrate that although these are negative correlations, overall, participants that were given time to interact professionally tended to make more acquaintances and total number of relationships than those that were not given time to interact professionally.

Table 7: Correlations between given time to interact professionally and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=125)	-.156	-.140
How many total close friends (N=125)	-.070	-.067
Acquaintance total (N=125)	-.133	-.122
Interaction Average (N=78)	.035	.030
Relationship dominance (N=125)	.087	.077
Number of people felt comfortable asking for a reference (N=65)	-.061	-.058

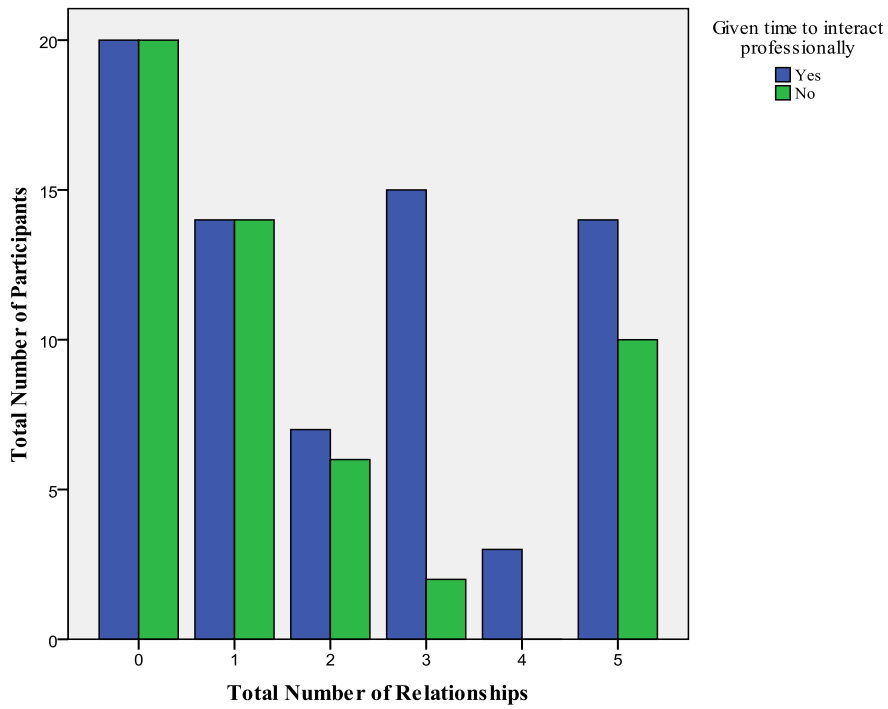


Figure 7. Given Time to Interact Professionally and Total Number of Relationships

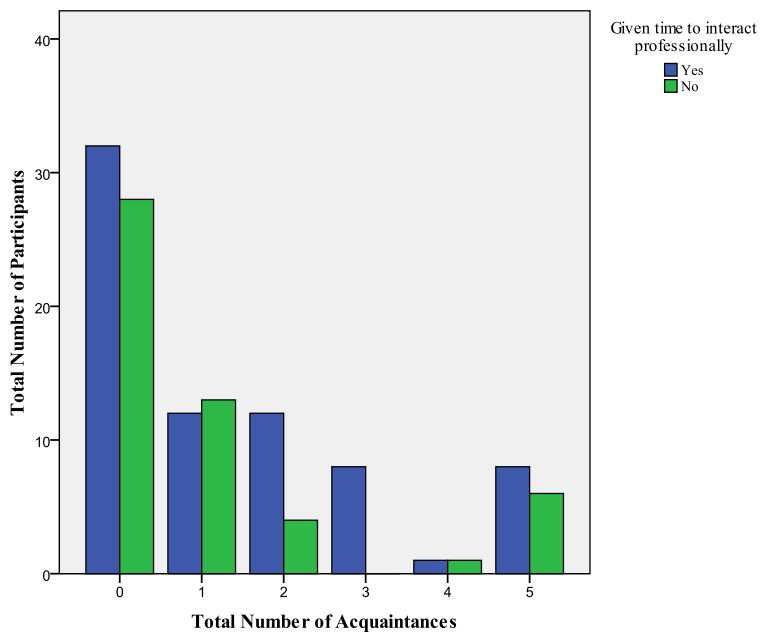


Figure 8. Given Time to Interact Professionally and Total Number of Acquaintances

Total number of individuals worked with. Did the total amount of individuals participants worked with impact their social capital? A positive Pearson Correlation (.263) was found between the total number of people participants worked with and how many total close friends they made. Furthermore, there were positive correlations between the total number of people worked with and the total number of relationships (.165), interaction average (.114), and the number of people participants felt comfortable asking for a reference (.174). Overall, these results suggest that the more people participants worked with, the higher their social capital indicators.

Table 8: Pearson correlations between total number of people worked with and social capital

	Pearson Correlation
Total number of relationships (N=114)	.165
How many total close friends (N=114)	.263
Acquaintance total (N=114)	.000
Interaction Average (N=70)	.114
Relationship dominance (N=114)	.142
Number of people felt comfortable asking for a reference (N=59)	.174

Frequency of interaction and strength of relationship. Did participants' frequency of interaction with individuals have an impact on the strength of relationships with said individuals? A negative correlation (-.416 Spearman's rho and -.334 Kendall's Tau-b) was found between the average frequency of interaction and the total number of relationships participants made, suggesting the more frequently individuals interacted, the

fewer total number of relationships individuals had. Moreover, a positive correlation (.216 Spearman's rho and .181 Kendall's Tau-b) was found between frequency of interaction and participants' number of close friends. Seeing that as frequency of interaction went up, so did total number of close friends, this suggests that participants interacted more frequently with close friends. Furthering this interpretation, there was also a strong positive correlation (.456 Spearman's rho and .351 Kendall's Tau-b) between interaction average and the type of relationships participants predominantly made. Meaning, as the average frequency of interaction went up, relationships moved toward close friend on the Relationship Dominance Scale.

As previously mentioned, as frequency of interaction went up, the total number of relationships went down, conceivably leading to an increased number of acquaintances. This hypothesis is reiterated when examining the correlation between average frequency of interaction and acquaintance total, as there is a negative correlation (-.519 Spearman's rho and -.415 Kendall's Tau-b) between the two variables. The more acquaintances participants had on average, the less frequently they interacted with each individual.

Table 9: Correlations between average interaction and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=79)	-.416	-.334
How many total close friends (N=64)	.216	.181
Acquaintance total (N=79)	-.519	-.415
Relationship dominance (N=79)	.456	.351
Number of people felt comfortable asking for a reference (N=41)	-.002	-.008

Attitude towards academic service-learning. Did attitude toward academic service-learning as a component of participants' courses impact their social capital? No strong correlations were found between these variables. The most notable correlation was negative (-.112 Spearman's rho and -.101 Kendall's Tau-b), and was found between the total number of relationships and attitude towards ASL. This suggests participants that had a positive attitude towards the ASL component of their course were less likely to build relationships. However, upon further investigation, Figure 9 illustrates that participants with a positive attitude towards ASL built more relationships than those that did not have a positive attitude towards ASL.

Table 10: Correlations between attitude towards ASL component and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=127)	-.112	-.101
How many total close friends (N=127)	-.053	-.051
Acquaintance total (N=127)	.052	-.047
Interaction Average (N=79)	-.022	-.019
Relationship dominance (N=127)	.019	.016
Number of people felt comfortable asking for a reference (N=66)	-.032	-.030

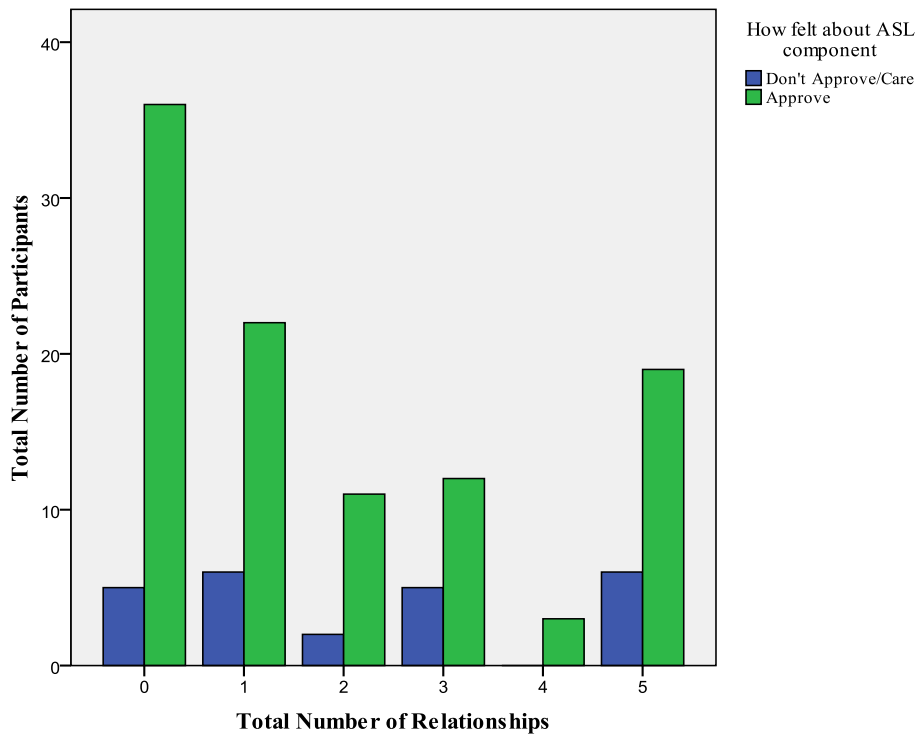


Figure 9. Attitude Towards ASL and Total Number of Relationships

Demographics. Did participants' demographics have an impact on their social capital? Although many of the demographics of participants did not demonstrate to be noteworthy, a few were, in particular sex/gender and race/ethnicity. However, there was not much variance between these two variables; the majority of participants were white and female. First, looking at the demographics, it is notable that white participants tended to make more relationships than non-white participants (.175 Spearman's rho and .157 Kendall's Tau-b). Furthermore, there was a positive correlation (.196 Spearman's rho and .180 Kendall's Tau-b) between white participants and the number of acquaintances made. There was also a notable negative correlation (-.313 Spearman's rho and -.268 Kendall's Tau-b) between interaction average and white participants.

These results suggest white participants interacted less frequently with individuals and made more relationships, in particular with acquaintances. Furthermore, there was a negative correlation (-.159 Spearman's rho and -.152 Kendall's Tau-b) between white participants and the number of people they felt comfortable asking for a reference.

Looking at Figure 11 it can be explained that there is a negative correlation between the two variables, however overall white participant had a large number of individuals they felt comfortable asking for a reference.

Table 11: Correlations between race/ethnicity and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=125)	.175	.157
How many total close friends (N=125)	.029	.028
Acquaintance total (N=125)	.196	.180
Interaction Average (N=78)	-.313	-.268
Relationship dominance (N=125)	-.154	-.136
Number of people felt comfortable asking for a reference (N=66)	-.159	-.152

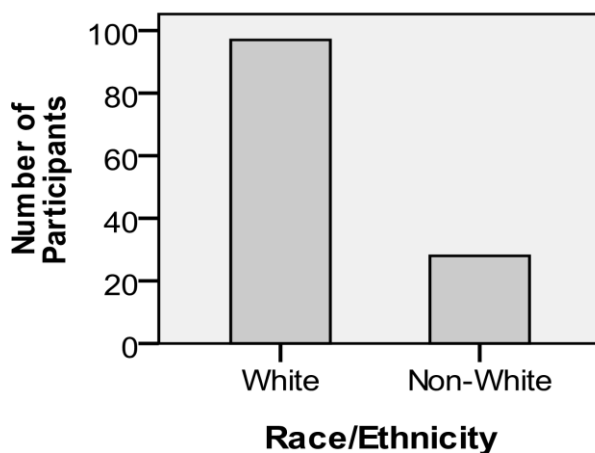


Figure 10. Graph of Participants' Race/Ethnicity

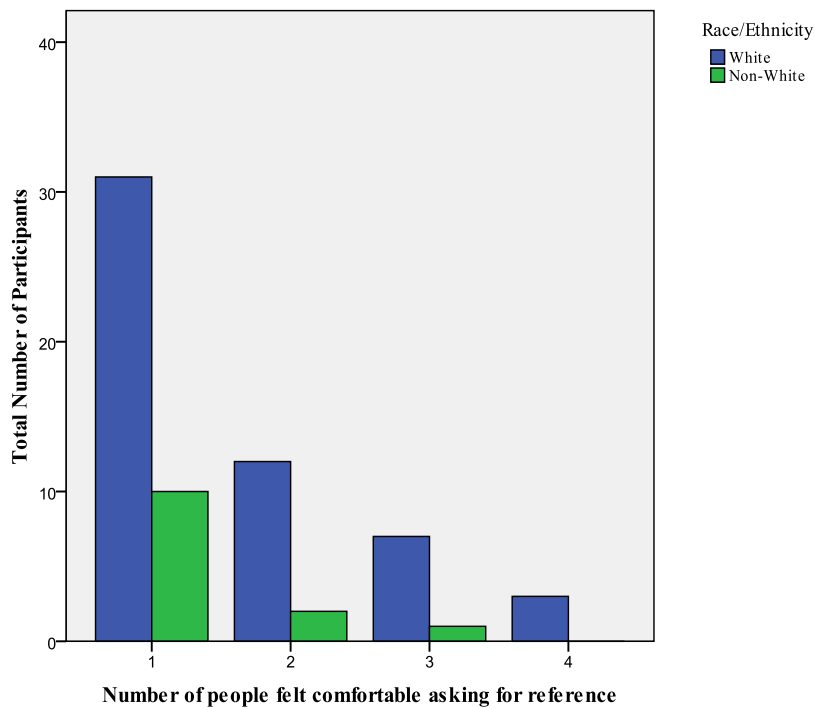


Figure 11. Race/Ethnicity and Number of People Felt Comfortable Asking for a Reference

Women demonstrated a strong positive correlation with average interaction with individuals, (.134 Spearman's rho and .115 Kendall's Tau-b), suggesting women were more likely than men to frequently interact with individuals. Additionally, women had a negative correlation (-.121 Spearman's rho and -.109 Kendall's Tau-b) with total number of relationships, meaning the more women interacted with individuals, the fewer relationships they made. These results correspond with the hypothesis that the more frequently participants interacted with individuals, the closer their relationships became, as women were more likely to build relationships with close friends than acquaintances.

Table 12: Correlations between women and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=124)	-.121	-.109
How many total close friends (N=124)	.023	.022
Acquaintance total (N=124)	-.114	-.104
Interaction Average (N=77)	.134	.115
Relationship dominance (N=124)	.118	.105
Number of people felt comfortable asking for a reference (N=65)	-.026	-.025

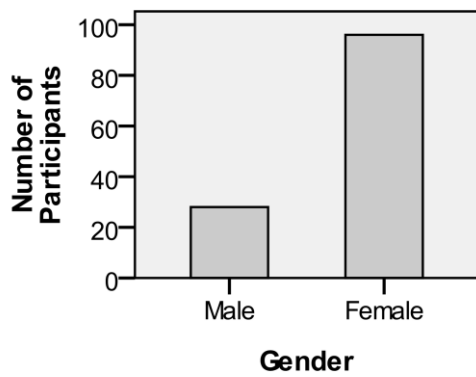


Figure 12. Graph of Participants' Gender

CHAPTER 7: ANALYSIS OF EDUCATION CONTROL RESULTS

During analysis of the data it was noted that education-based courses were producing similar results distinct from non-education-based courses. Given this, nonparametric and Pearson correlations were used to determine possible associations between the dependent and independent variables specifically related to education-based courses. Social capital (the dependent variable) and academic service-learning (the independent variable) are represented in the analysis using the same indicators as used in the general results (please refer to specific indicators on pages 49-50).

Supervisor. Did having regular interactions with a supervisor at the ASL site have an impact on education participants' social capital? There was a strong positive correlation between the number of times education students met with a supervisor and the number of people they felt comfortable asking for a reference (.138 Spearman's rho and .132 Kendall's Tau-b). A negative correlation (-.262 Spearman's rho and -.257 Kendall's Tau-b), was found between the number of times education participants met with their supervisor and how many close friends they made. Furthermore, there was a negative correlation between the number of times education students met with their supervisor and the remaining indicators of social capital. This suggests that the more education students met with their supervisor, the less likely they were to form relationships with individuals at their site.

Table 13: Correlations between education control numbers of times met with supervisor and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=124)	-.121	-.109
How many total close friends (N=124)	.023	.022
Acquaintance total (N=124)	-.114	-.104
Interaction Average (N=77)	.134	.115
Relationship dominance (N=124)	.118	.105
Number of people felt comfortable asking for a reference (N=65)	-.026	-.025

Welcoming service-learning site. Did feeling welcome at the ASL site have an impact on education participants' social capital? With a .238 Spearman's rho and a .206 Kendall's Tau-b correlation, education participants had the strongest correlations with feeling welcome at their site and their interaction average, as well as participants' total number of close friends. Education participants that felt welcome at their site were more likely to interact more frequently with individuals and make more close friends than those that did not feel welcome at their site. This goes along with the hypothesis that the more individuals interact with each other the stronger ties they will make.

A minimal correlation between whether education students felt welcome at their site and the number of people they felt comfortable asking for a reference was also found. However, upon further review, it was found there was no variation between these two variables, meaning those that felt welcome at their site all had individuals they felt comfortable asking for a reference. Conversely, those that did not feel welcome at their site did not have any individuals that they felt comfortable using as a reference.

Although this goes along with the hypothesis, that those that feel welcome at their site

were more likely to build social capital, it is important to note there was very little variance between those that felt welcome at their site and those that did not.

Table 14: Correlations between education control welcoming service-learning site and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=63)	.099	.090
How many total close friends (N=63)	.114	.111
Acquaintance total (N=63)	.046	.042
Interaction Average (N=36)	.238	.206
Relationship dominance (N=63)	.005	.005

Previous experience. Did previous experience with ASL have an impact on education participants' social capital? A positive correlation (.266 Spearman's rho and .242 Kendall's Tau-b) was found between education participants who were participating in academic service-learning for the first time and their total number of relationships. Furthermore, for participants experiencing ASL for the first time, they had a negative correlation with interaction average (-.179 Spearman's rho and -.155 Kendall's Tau-b), which corresponds with previous results suggesting that on average education students had less frequent interactions than non-education participants. Although they had less frequent interactions, education participants experiencing ASL for the first time appeared to form relationships with both acquaintances (.189 Spearman's rho and .185 Kendall's Tau-b) and close friends (.189 Spearman's rho and .185 Kendall's Tau-b). There was also a strong positive correlation (.224 Spearman's rho and .214 Kendall's Tau-b)

between those participating in ASL for the first time and the number of people participants felt comfortable asking for a reference.

Table 15: Correlations between education control first experience with ASL and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=63)	.099	.090
How many total close friends (N=63)	.114	.111
Acquaintance total (N=63)	.046	.042
Interaction Average (N=36)	.238	.206
Relationship dominance (N=63)	.005	.005

Service type. Was the social capital of education participants affected by the type of service in which they partook? A positive correlation, .319 Spearman's rho and .295 Kendall's Tau-b, was found between education participants that participated in direct service and their total number of acquaintances. Paralleling with these results, a negative correlation (-.289 Spearman's rho and -.261 Kendall's Tau-b) was found between participants that participated in direct service and their relationship dominance scale. Going along with previous results and hypotheses, there was a negative correlation between direct service and interaction average (-.142 Spearman's rho and -.123 Kendall's Tau-b), meaning between those that participated in direct service did not tend to have frequent interactions and therefore predominantly formed relationships with acquaintances.

Table 16: Correlations between education control direct service and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=64)	.205	.187
How many total close friends (N=64)	-.017	-.017
Acquaintance total (N=64)	.319	.295
Interaction Average (N=37)	-.142	-.123
Relationship dominance (N=64)	-.289	-.261
Number of people felt comfortable asking for a reference (N=41)	-.072	-.069

Similar to direct service, a positive correlation (.286 Spearman's rho and .264 Kendall's Tau-b) was found between those that participated in indirect service and their total number of acquaintances. Again, paralleling with these results, a negative correlation (-.326 Spearman's rho and -.295 Kendall's Tau-b) was found between those that participated in indirect service and the relationship dominance scale, indicating a strong relationship between those that participated in indirect service and predominantly forming relationships with acquaintances.

Table 17: Correlations between education control indirect service and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=59)	.205	.187
How many total close friends (N=59)	-.127	-.124
Acquaintance total (N=59)	.286	.264
Interaction Average (N=35)	-.067	-.058
Relationship dominance (N=59)	-.326	-.295
Number of people felt comfortable asking for a reference (N=41)	.077	.073

Social and professional interactions. Were education participants given time to interact with other individuals at their service-learning site, and if so did this have an impact on their social capital? A negative correlation (-.307 Spearman's rho and -.280 Kendall's Tau-b) was found between whether or not participants were given time to interact socially and their total number of relationships. A partial correlation between given time to interact socially and the total number of relationships also showed a negative correlation, -.274, between the two variables. Upon further investigation, it is thought that this negative correlation was due to the fact that, overall, education majors made fewer relationships than non-education majors.

There was also a negative correlation (-.271 Spearman's rho and -.251 Kendall's Tau-b) found between education participants that were given time to interact socially and their total number of acquaintances. Again, this is thought to be due to the fact that education participants formed fewer relationships than non-education majors.

Table 18: Correlations between education control social interactions and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=59)	.205	.187
How many total close friends (N=59)	-.127	-.124
Acquaintance total (N=59)	.286	.264
Interaction Average (N=35)	-.067	-.058
Relationship dominance (N=59)	-.326	-.295
Number of people felt comfortable asking for a reference (N=41)	.077	.073

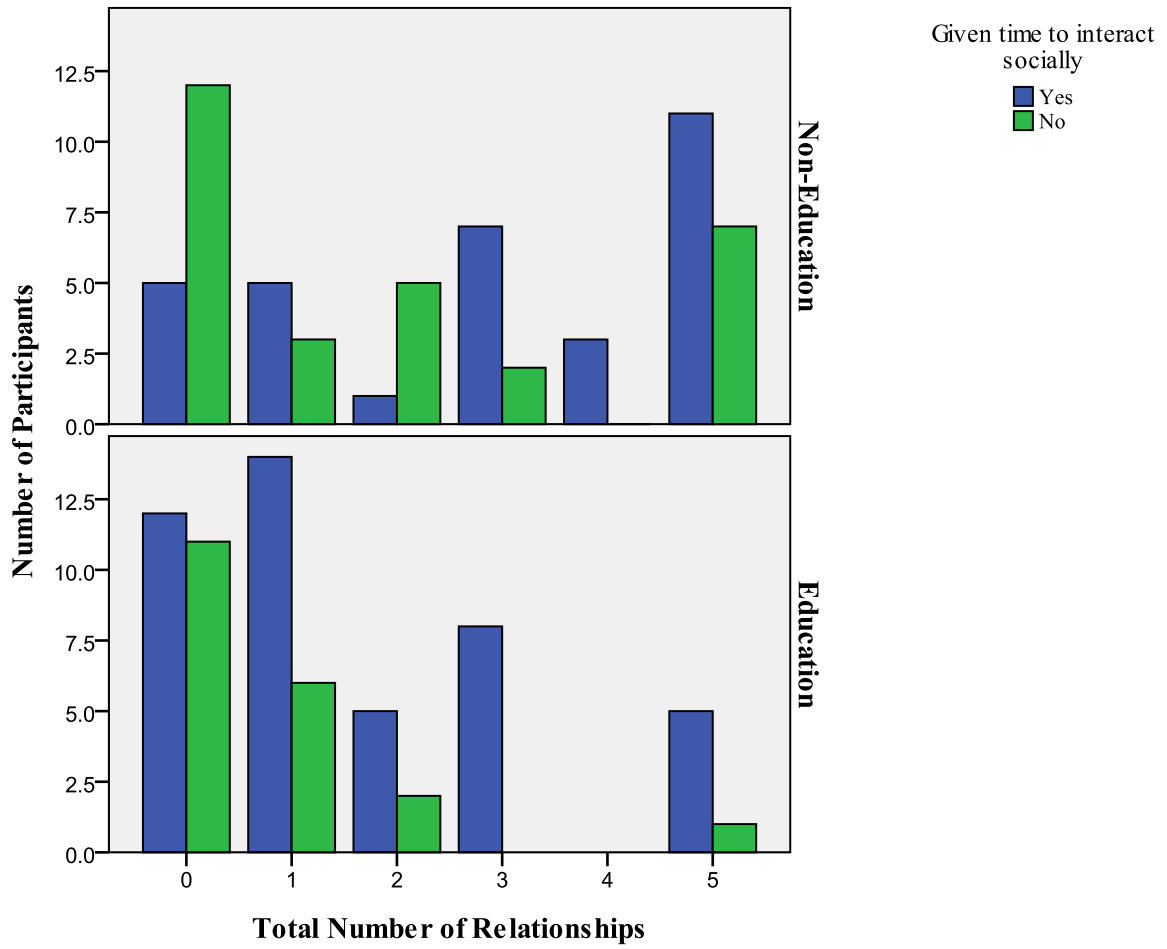


Figure 13. Given Time to Interact Socially and Total Number of Relationships: Non-Education vs. Education

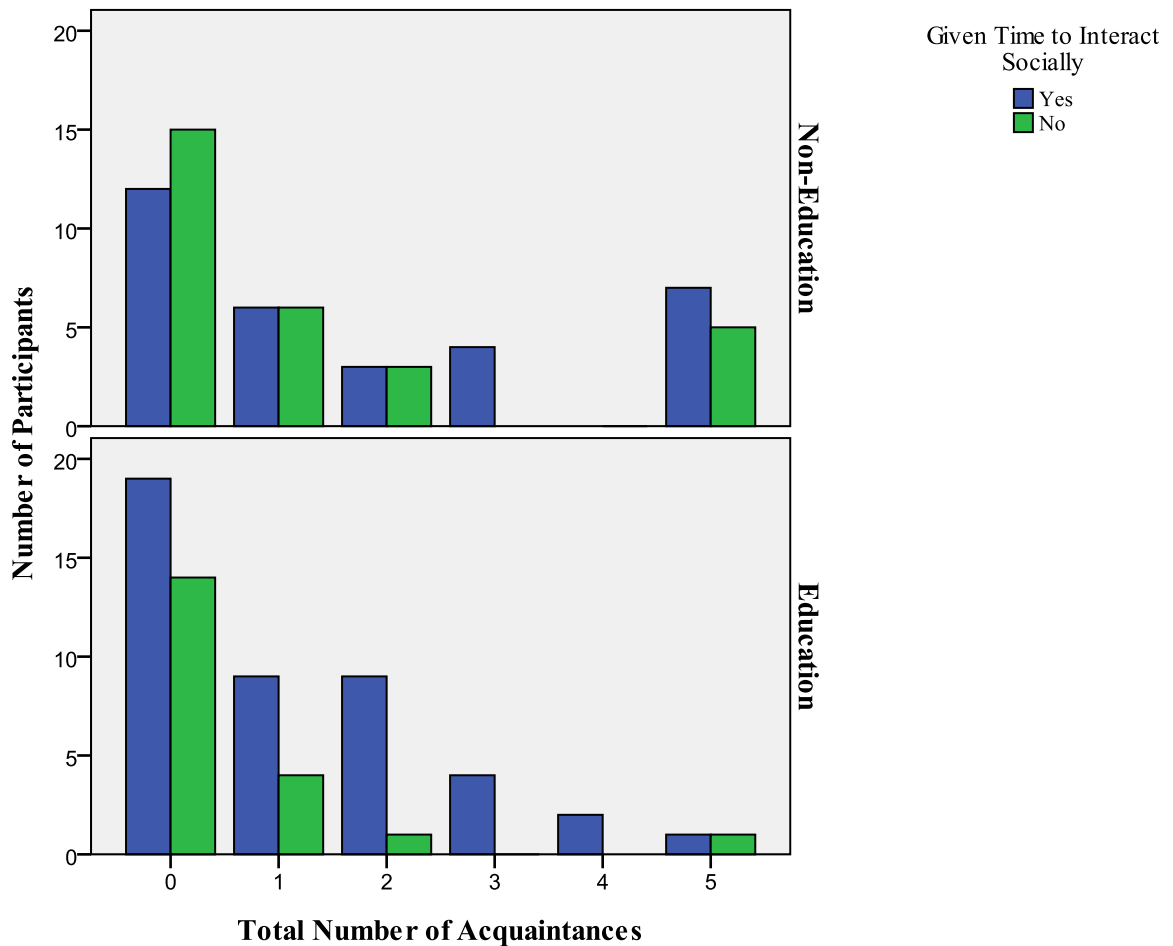


Figure 14. Given Time to Interact Socially and Total Number of Acquaintances: Non-Education vs. Education

Whether or not education participants were given time to interact professionally with individuals at their site appeared to have a considerable impact on how often they interacted with individuals. With a Spearman's rho correlation of .324 and a Kendall's Tau-b correlation of .375, the more education participants were given time to have professional interactions, the more frequently they interacted with individuals at their site. With a negative correlation (-.136 Spearman's rho and -.146 Kendall's Tau-b), the

more frequently participants interacted with individuals, the fewer acquaintances they tended to make.

Table 19: Correlations between education control professional interactions and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=64)	-.082	-.090
How many total close friends (N=64)	-.029	-.029
Acquaintance total (N=64)	-.136	-.147
Interaction Average (N=37)	.324	.375
Relationship dominance (N=64)	.106	.117
Number of people felt comfortable asking for a reference (N=41)	-.029	-.031

Total number of individuals worked with. Did the total number of individuals education participants worked with impact their social capital? Similar to previous results pertaining to the number of individuals worked with and social capital, correlations were overwhelming positive, suggesting that the more individuals participants worked with, the more likely they were to have an increased social capital. A strong positive Pearson Correlations was found between the total number of people worked with and the total number of relationships (.154), as well as average frequency of interactions (.130). Moreover, similar to previous results, a strong correlation with frequency of interactions suggest a high correlation with participants' total number of close friends – education majors produced a .159 Pearson's correlation. Finally, a strong correlation between the total number of people worked with and the number of people participants felt comfortable asking for a reference (.178) was also found.

Table 20: Pearson correlations between education control total number of people worked with and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=64)	-.082	-.090
How many total close friends (N=64)	-.029	-.029
Acquaintance total (N=64)	-.136	-.147
Interaction Average (N=37)	.324	.375
Relationship dominance (N=64)	.106	.117
Number of people felt comfortable asking for a reference (N=41)	-.029	-.031

Frequency of interaction and strength of relationship. Did education participants' frequency of interaction with individuals have an impact on the strength of relationships with said individuals? A negative correlation (-.379 Spearman's rho and -.313 Kendall's Tau-b) was found between frequency of interaction and the total number of acquaintances. There was also a negative correlation (-.347 Spearman's rho and -.289 Kendall's Tau-b) between frequency of interaction and the total number of relationships formed. On the contrary, there was a positive correlation between the frequency of interaction and the Relationship Type Dominance Scale (.299 Spearman's rho and .243 Kendall's Tau-b). The more participants interacted with individuals, the less likely they were to form a multitude of relationships, in particular with acquaintances. On the contrary, the relationships they did form were more likely to be with close friends.

Table 21: Correlations between education control average interaction and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=37)	-.347	-.289
How many total close friends (N=37)	.022	.017
Acquaintance total (N=37)	-.379	-.313
Relationship dominance (N=37)	.299	.243
Number of people felt comfortable asking for a reference (N=23)	-.034	-.028

Attitude towards service-learning. Did attitude toward academic service-learning as a component of participants' course impact education participants' social capital? Attitude towards academic service-learning and the number of people participants felt comfortable asking for a reference produced the strongest correlation, with a Spearman's rho correlation of .176 and a Kendall's Tau-b correlation of .168. This suggests that education participants who had a positive attitude about the ASL component were more likely to feel comfortable asking for a reference. There was also a negative correlation (-.122 Spearman's rho and -.106 Kendall's Tau-b) between education majors with a positive attitude toward ASL and interaction average, however as previously stated, education majors on average had less interactions than non-education majors.

Table 22: Correlations between education control attitude toward ASL and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=37)	-.347	-.289
How many total close friends (N=37)	.022	.017
Acquaintance total (N=37)	-.379	-.313
Relationship dominance (N=37)	.299	.243
Number of people felt comfortable asking for a reference (N=23)	-.034	-.028

Demographics. Did the demographics of education participants have an impact on their social capital? A negative correlation was found among education control white participants and their interaction average (-.150 Spearman's rho and -.130 Kendall's Tau-b), while there was also a positive correlation (.102 Spearman's rho and .094 Kendall's Tau-b) between education control white participants and acquaintance total. There was also a strong positive correlation (.166 Spearman's rho and .163 Kendall's Tau-b) found between education control white participants and their total number of close friends, suggesting that white participants were more likely than non-white participants to form close personal relationships. On the contrary, white education control participants were less likely than non-white education control participants feeling comfortable asking for a individuals at their site to be a reference (-.154 Spearman's rho and -.147 Kendall's Tau-b).

Table 23: Correlations between education control ethnicity and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=37)	-.347	-.289
How many total close friends (N=37)	.022	.017
Acquaintance total (N=37)	-.379	-.313
Relationship dominance (N=37)	.299	.243
Number of people felt comfortable asking for a reference (N=23)	-.034	-.028

Education control women had a strong positive correlation (.162 Spearman's rho and .146 Kendall's Tau-b) with relationship dominance. Going along with these results, there was also a positive correlation (.128 Spearman's rho and .111 Kendall's Tau-b) with interaction average. A negative correlation (-.151 Spearman's rho and -.140 Kendall's Tau-b) was also found between women and acquaintance total. These results coincide with the thought that women tended to have more frequent interactions with individuals at their site and therefore made more close friends.

Table 24: Correlations between education control women and social capital

	Spearman's rho	Kendall's Tau-b
Total number of relationships (N=37)	-.347	-.289
How many total close friends (N=37)	.022	.017
Acquaintance total (N=37)	-.379	-.313
Relationship dominance (N=37)	.299	.243
Number of people felt comfortable asking for a reference (N=23)	-.034	-.028

CHAPTER 8: ANALYSIS OF FURTHER RESULTS

In addition to the abovementioned results, while working with the data, three regression models were designed to help further explain relationships between academic service-learning and social capital.

General Regression Model

The General Regression Model is one in which the education control was not relevant. For every unit increase in participants' interaction average, they shift up 1.02 units in the relationship dominance scale. This suggests that as participants' average interaction goes up, their relationships move more towards close friends and further away from acquaintances. Also included in the General Regression Model is the impact the total number of individuals participants actually asked a work-related question has on the relationship dominance scale. For every unit increase in the total number of people participants actually asked a work-related question, they shift up .516 units in the relationship dominance scale. This indicates the more individuals participants asked a work-related question the more their relationships moved toward close friend and away from acquaintances.

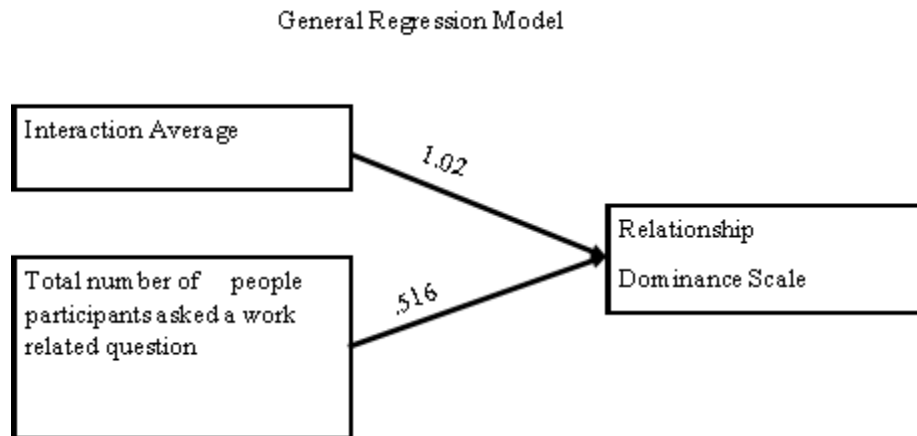


Figure 15. General Regression Model

Non-Education Majors Regression Model

Similar to the General Regression Model, there were strong relationships between the average interaction of non-education majors and whether they dominantly made close friends or acquaintances. For every unit increase in non-education majors' average interaction, they shift 1.225 units in the relationship dominance scale. This suggests that the more non-education majors interacted with individuals the more they tended to build stronger relationships. Also, comparable to the General Regression Model, there is a strong relationship between the number of individuals that participants actually asked a work related question and whether they dominantly made close friends or acquaintances. For every unit increase in the total number of people participants actually asked a work related question, participants shift .506 units in the relationship dominance scale. This signifies that the more individuals that participants asked work related questions, the stronger their relationships tended to be on a scale from acquaintance to close friend.

Non-Education Majors Regression Model

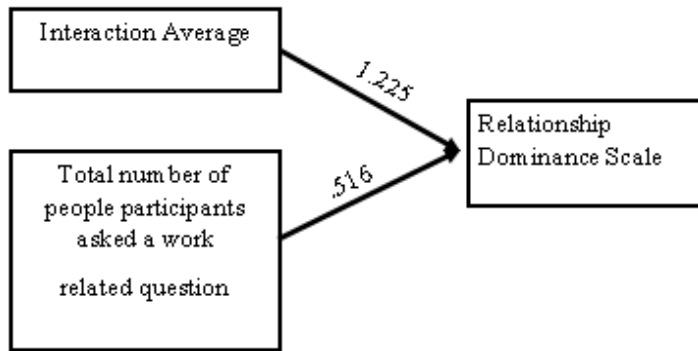


Figure 16. Non-Education Majors Regression Model

Education Control Regression Model

The third regression model involves four exogenous variables, one endogenous independent variable, and one dependent variable. Beginning with the individual impacts the exogenous variables had on the endogenous variables, for every unit increase in the total number of people participants felt comfortable asking a work related question, their total number of relationships increased by .315 people. For every unit increase in the total number of people participants felt comfortable asking a general question, their total number of relationships decreased by .313. Education majors mostly had one person they felt comfortable asking a general question, while non-education majors were more varied with how many people they felt comfortable asking general questions.

Controlling for education majors, for those that participated in an education course, their total number of relationships went down by 1.404. On average education majors made fewer relationships than non-education majors. For participants that were given time to interact socially, their total number of relationships decreased by 1.091.

Although it is known whether or not participants were given time to interact socially, it is not known the extent of time they were given to interact socially with individuals over the age of 18 at each individual academic service-learning site. It may be that education majors were given less time to interact than non-education majors, which could possibly account for a negative relationship between that and their total number of relationships. Nonetheless, through a partial correlation it is evident that education majors predominantly formed one relationship, with a limited number making two to three relationships, while non-education majors predominately formed three, four, or five relationships.

For the endogenous variable, the total number of relationships participants formed, for every unit increase in the total number of relationships formed, participants' number of people they felt comfortable asking for a reference went up by .119. This suggests the larger the size of education participants' network, the larger the size of their reference network.

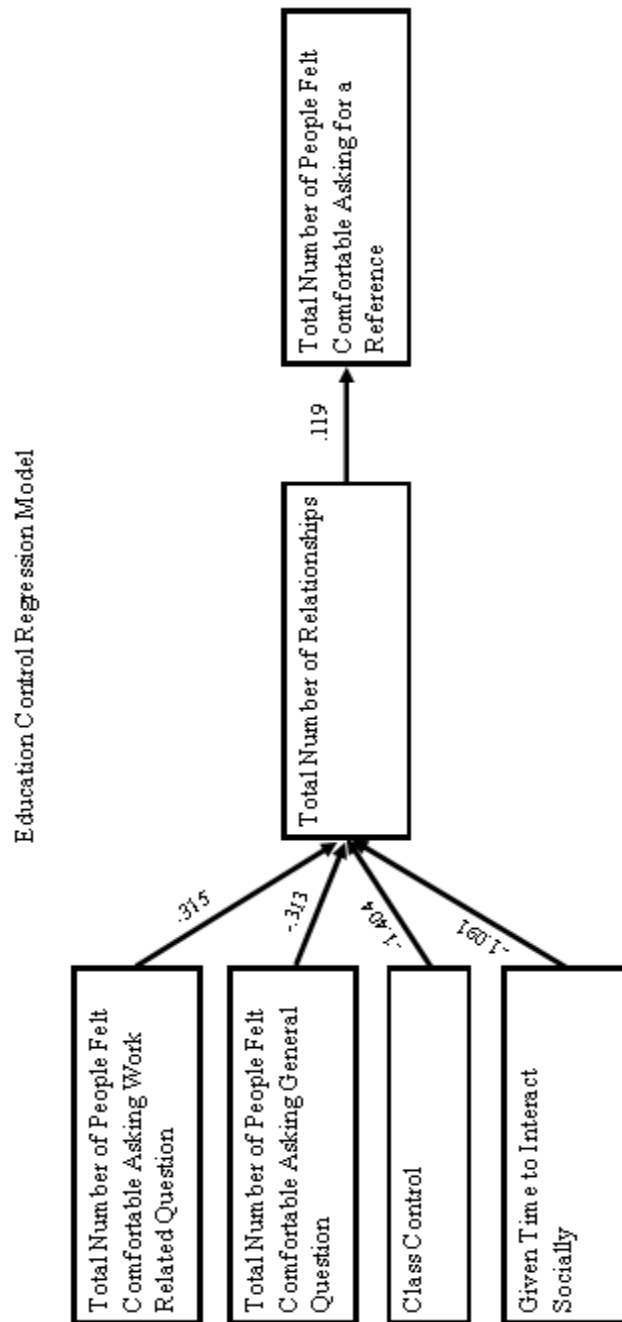


Figure 17. Education Control Regression Model

CHAPTER 9: CONCLUSION

Previous research on social capital and service-learning has focused on how social capital obtained at service-learning sites can impact further building of social capital. Furthermore, they concentrated on the importance of trust within social capital. These studies suggest a positive relationship between ASL and social capital. The current study explored specific variables at academic service-learning sites which may have an impact on social capital. Results support the theory that a positive relationship can occur between ASL and social capital.

Beginning with Granovetter's (1973) argument that strong ties entail a significant time commitment, this study suggests frequency of interaction can impact the strength of one's ties. When tested alone, frequency of interaction may not be an accurate indicator of one's strength of tie because individuals have a propensity to interact more frequently with co-workers and neighbors, however they may not consider these individuals to be "close ties" (Berscheid et al. 1989; Marsden and Campbell 1984). Therefore this study addressed strength of ties as well as frequency of interaction. The more participants interacted with individuals, their number of close ties increased. At the same time, their total number of relationships and weak ties, decreased, implying participants with weak ties interacted less frequently than participants with strong ties. The idea that frequency of interaction at service-learning sites can impact one's social capital could be beneficial for stakeholders of ASL. Given this information, students could potentially alter the nature of their service according to the variety of ties they may be interested in establishing.

Another way in which social capital can be affected by ASL is by the amount of people with which they work. The amount of people with which participants worked exhibited a positive impact on social capital, principally with strong ties. Furthermore, it positively impacted the number of individuals participants that felt comfortable asking for a reference. Whether or not participants were enrolled in an education course did not impact these results. This notion could be an important factor in future studies, as well as when pairing students with academic service-learning sites. It is possible that the more people with which one works, the better their odds might be of finding individuals with whom they may be able to build social capital.

Social capital can provide helpful resources when searching for a job (Lin 1999); in particular referrals have been shown as a way in which companies have found new employees (Fernandez and Weinberg 1997). One possible way in which references can be obtained is through having a supervisor at one's service-learning site. According to this study, those that had supervisors, the more often they met with them, the more likely they felt comfortable asking someone at their site for a reference. Results also suggest the more frequently participants met with their supervisor, the remaining social capital indicators experienced negative correlations. The contrast between these results may be due to the fact that the more time participants spent with their supervisors, the less time they were probably spending with other individuals at their site. The relationship between supervisor and social capital is an important one to address, as it produces different types of social capital. Stakeholders of ASL may be advised to pay attention to this relationship, as it could have potential implications on both supervisors and students.

Previous studies on academic service-learning found that individuals who volunteered in high school were more likely to participate in service in college/as adults (Astin and Sax 1998; Campbell 2000). This led the researcher to hypothesize that previous experience with service-learning would have a positive impact on participants' social capital. On the contrary, it appears first time participants of academic service-learning were more likely to have an increase in social capital. This was found for both general results, as well as education control results. Although there is no definite answer as to why this occurred, it could possibly be that first time ASL students were excited about a new opportunity to work outside the classroom and therefore may have been more willing to take advantage of situations in which social capital could be gained. Future researchers could look into possible reasons as to why individuals with previous ASL experience may not have been as inclined to build social capital as first time ASL participants.

Depending on the area of discipline, as well as the service-learning site, experiences with academic service-learning can vary (Bryant et al. 2011). Whether or not participants partook in an education based course with an academic service-learning component is one example of this variation, and it demonstrated to have an impact on participants' social capital. For example, the type of service offered at sites exhibited a different impact on education participants' social capital versus non-education participants. For overall results, those that participated in direct service had frequent interactions with individuals. However, education participants who partook in direct service had infrequent interactions but formed more relationships. On average, education

majors interacted less with individuals at their site than non-education participants. It is thought that this infrequent interaction may have been due to the fact several education participants worked at schools, primarily with individuals under the age of 18. Given these results, it appears that depending on the nature of direct service, as well as the age of individuals with which participants worked, there are additional factors that can impact one's social capital. Indirect service, on the other hand, demonstrates to have the same impact for both overall results and education results – those that participated in indirect service tended to make fewer relationships with close friends and more with acquaintances.

There were also differences between education students and non-education students concerning demographics. Overall, white participants interacted less frequently than non-white participants but made more relationships, in particular with acquaintances. Concerning white education participants, results suggest they did not make as many acquaintances, they tended to make more close friends. Although there were differences between the education and non-education students, both sets of white participants overall all had strong correlations with indicators of social capital. Depending on the demographic of people at the ASL sites, if the dominant group were white, they may have excluded non-white participants from networking opportunities and mentoring (Roscigno 2007). This should be further studied though, as it is not known the race of individuals at the ASL site and the race of individuals with which participants were building relationships.

Regarding the differences in social capital gained by white education and non-education participants, there could be numerous reasons as to why these occurred. One possible reason could be due to the fact that education students' service often tends to be more concentrated on their career field. This could possibly lead to more discussion and interactions based on their service, which could in turn lead to more close friends.

Previous research suggests gender, in particular being a woman, can be a predisposing factor of whether someone participates in service (Astin and Sax 1998); moreover girls are more likely to have a positive attitude toward doing required service than boys (Stukas et al. 1999). On the contrary, studies also suggest that even when women are knowledgeable and involved, they still tend to receive less investment from their network than men (McGuire 2002). The results of the current study suggest women interacted more frequently than men with individuals and consequently women made more close friends. It is thought that the predisposition of women being more likely to participate in service and being more open to doing it is what resulted in the positive impact on women's social capital. Due to the fact that the results of this study contradict the aforementioned theory of women being less likely to build social capital than men, further research could be done into factors that may have impacted these results, and whether this theme is found within other ASL courses as well.

Initially not all variables displayed positive correlations with social capital, however further investigation brought clarity to these cases. For instance, social interactions were displaying negative correlation. Although the correlations were negative, further examination displayed that those given time to interact socially made

more acquaintances than those that were not given time to interact socially. Another variable which appeared to have a negative impact on participants' social capital was participants' attitude toward ASL being a requirement of class. Besides a strong positive correlation between education students' positive attitude and the number of people they felt comfortable asking for a reference, the rest of the correlations were mostly negative. This suggested that one's positive attitude towards ASL could actually have a negative impact on one's social capital. Though, upon further review, it appears that similar to the social interactions, those that had a positive attitude toward ASL made more total relationships than those that did not have a positive attitude toward ASL.

College is an important time for students to learn, as well as gain experiences that will benefit them post-college. Academic service-learning is one way in which students can do both of these. In this study, it was demonstrated that participation in ASL can also positively impact one's capital. Strong and weak ties, as well as references, are all components of social capital which were shown to be positively impacted through participation in ASL. Each of these components could potentially benefit students in the future. In particular, as it is growing increasingly harder to find jobs, social capital is one measure that can be used to help obtain employment and share information. These concepts should be taken into account when educators work with students – not only on their education, but also their networking skills and building of social capital.

Future researchers could use the findings of this study as a beginning point to a larger study in which they could examine if what was found here leads to a broader theme across ASL participation in other universities. Researchers could also study whether

students are taking advantage of their social capital post-college. Since academic service-learning ideally benefits all involved stakeholders, whether academic service-learning has an impact on participating sites' social capital would be another beneficial area of research. In particular, whether ASL sites are taking advantage of the social capital gained through this experience could be examined in forthcoming studies.

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APPENDIX I

Project Title: Academic Service-Learning and Social Capital
Investigator: Megan Anderson, Eastern Michigan University
Faculty Advisor: Tricia McTague, Ph.D.

Purpose of the Study: You are invited to participate in a study conducted by Megan Anderson. The purpose of this study is to gain a better understanding of the relationship between academic service-learning and social capital. You are invited to participate because you are currently enrolled in a course that has an academic service-learning component.

Procedure and Voluntary Participation: You will be asked to fill out a questionnaire at the end of the semester. Participation in this study is voluntary and will take approximately 10 minutes. If you chose to participate and later decide you would like to change your mind, you may withdrawal at any time without any consequences. Furthermore, your participation in this study is separate from your coursework. Whether or not you decide to participate will not have an impact on your grade.

Confidentiality: A code number will be identified to each participant. The results will be stored in a locked drawer, separate from the consent form, which includes your name and any other identifying information. At no time will your name be associated with your responses to the questionnaires. All related materials will be kept in a locked cabinet in the researcher's office and electronic data will be stored on a password-protected computer.

Use of Research Results: Results will be presented in aggregate form only. No names or individually identifying information will be revealed. Results may be presented at research meetings and conferences, in scientific publications, and as part of a masters' thesis being conducted by the principal investigator.

Expected Risks: There are no foreseeable risks to you by completing this questionnaire, as all results will be kept completely confidential.

Expected Benefits: There will be no direct personal benefit to you, but your participation will contribute to our understanding of academic service-learning and its impact on social capital.

Future Questions: This research protocol and informed consent document has been reviewed and approved by the Eastern Michigan University Human Subjects Review Committee for use from 3/25/13 to 3/24/14. If you have any questions, please feel free to ask. If you have questions in the future, please contact Megan Anderson (mander54@emich.edu). For questions regarding your rights as a research subject, please contact the University Human Subjects Review Committee (human.subjects@emich.edu).

Consent to Participate: I have read or had read to me all of the above information about this research study, including the research procedures. The content and meaning of this information has been explained and I understand. All my questions, at this time, have been answered. I hereby consent and do voluntarily offer to follow the study requirements and take part in the study.

PRINT NAME _____
Signature _____
Date _____

APPENDIX II

This survey seeks to gather information about academic service-learning at Eastern Michigan University. It also seeks to gather information about possible networks and relationships that may develop through academic service-learning.

The results of this survey are completely confidential. Only the researcher will know your personal information. Please answer the questions based on how you think and feel.

Please also note that completion of this survey is voluntary. If you come to a question you do not feel comfortable answering, please feel free to skip it and move on to the next question. If you chose to participate and later decide you would like to change your mind, you may withdraw at any time without any consequences.

INSTRUCTIONS FOR COMPLETING THE SURVEY:

1. Read each question and its possible answers before making your choice
2. Circle the one answer that best describes your situation or write in the one answer that best describes your situation

First I am going to ask a few general questions about your service-learning site

1. During the winter semester, that is from January - April, 2013, on average, how many times a week did you visit your service-learning site? Please write the answer that best describes your situation.

_____ times/week

2. What was the average duration of time you spent at your service-learning site during each visit? Please circle the one answer that best describes your situation.

- a. Less than 30 minutes
- b. 30 minutes - 1 hour
- c. 1 hour
- d. 1 hour - 1.5 hours
- e. 1.5 hours - 2 hours
- f. 2 hours
- g. More than 2 hours

3. Did you happen to put in more hours at your service-learning site than your class required? Please circle the one answer that best describes your situation.

- a. Yes (continue to question 3a)
- b. No (skip to question 4)

3a. Please describe why you worked more hours than required

4. Considering family, class obligations, work, and transportation, how much time did you feel you had for your service-learning site? Please circle the one answer that best describes how you felt.

- a. I felt I had less time than was needed
- b. I felt I had enough time
- c. I felt I had more time than was needed

5. Did you have a supervisor at your service-learning site? Please circle the one answer that best describes your situation.

- a. Yes (if yes, continue to question 6)
- b. No (if no, skip to question 7)

6. While at your service-learning site, approximately, how often did you meet with your supervisor? Please circle the one answer that best describes your situation.

- a. I met with my supervisor every time I visited my site
- b. I met with my supervisor every other time I was at my site
- c. I only met with my supervisor at the beginning and end of the semester
- d. I met with my supervisor occasionally throughout the semester

7. Were you invited to attend staff meetings at your site? Please circle the one answer that best describes your situation.

- a. Yes (continue to question 7a)
- b. No (skip to question 8)

7a. Did you attend these meetings?

- a. Yes
- b. No

8. Did you feel welcomed at your service-learning site? In other words, did you feel like you were a member of the community at your site? Please circle the one answer that best describes your situation.

- a. Yes
- b. No

9. Did you feel comfortable with your role/position at your service-learning site? Please circle the one answer that best describes your situation.

- a. Yes
- b. No

10. At your service-learning site, were you given time to interact professionally (discussions involving such things as work questions and projects) with staff members, volunteers, interns, workmates, and/or clients at your site? Or was this type of interaction not available (N/A) at your site? Please circle the one answer that best describes your situation.

- a. Yes, I was given time for professional interactions
- b. No, I was not given time for professional interactions
- c. N/A

11. At your service-learning site, were you given time to interact socially (discussions involving things outside of work) with staff members, volunteers, interns, workmates, and/or clients at your site? Or was this type of interaction not available (N/A) at your site? Please circle the one answer that best describes your situation.

- a. Yes, I was given time for social interactions
- b. No, I was not given time for social interactions
- c. N/A

Next I am going to ask you a few questions about what kind of service you did this last semester and what kind of services your service-learning site had to offer

During the last semester, did you participate in any of the following types of service? Or was this type of service not available (N/A) at your site? Please circle all that apply.

12. Direct Service <i>Work directly with people/clients/consumers</i>	Yes	No	N/A
--	-----	----	-----

13. Indirect Service <i>Work on a project for your site (not working directly with clients)</i>	Yes	No	N/A
--	-----	----	-----

14. Community/Citizen Education <i>Plan or work on a community education project</i>	Yes	No	N/A
---	-----	----	-----

15. Community Building <i>Work on building community with local members of the community</i>	Yes	No	N/A
---	-----	----	-----

16. At your service-learning site, how often did you carry out tasks by yourself? Please circle the one answer that you feel best describes your situation.

Never Rarely Sometimes Often Always

During your time at your service-learning site, did you work with individuals from the following groups of people, and if so how many? Please write the number of individuals with whom you worked next to each category. *If you had no interactions with any particular group of people, please write zero.*

17. Over the course of the semester, I worked with _____ STAFF MEMBERS
(number)

18. Over the course of the semester, I worked with _____ VOLUNTEERS
(number)

19. Over the course of the semester, I worked with _____ INTERNS
(number)

20. Over the course of the semester, I worked with _____ OTHER COLLEGE
(number) STUDENTS

21. Over the course of the semester, I worked with _____ CLIENTS/BENEFICIARIES
(number) OVER THE AGE OF 18

22. How satisfied were you with your tasks at your service-learning site? As a guiding principle, 1 means you were very dissatisfied and 5 means you were very satisfied. Please circle the number that you feel best describes your situation.

Very Dissatisfied

Very Satisfied

1

2

3

4

5

Next I am going to ask you a set of questions about possible relationships that you may have built during your time at your service-learning site

At your service-learning site, how many individuals (meaning staff members, volunteers, interns, workmates, and/or clients) **would you have felt comfortable** talking to about a work-related problem? Please write the number of individuals next to each category. *If you would not have felt comfortable asking someone about a work-related problem in any particular category, please write zero.*

23. _____ Staff members

24. _____ Volunteers

25. _____ Workmates

26. _____ Clients

At your service-learning site, how many individuals (meaning staff members, volunteers, interns, workmates, and/or clients) **did you actually talk to** about a work-related problem? Please write the number of individuals next to each category. *If you did not in fact talk to someone about a work-related problem in any particular category, please write zero.*

27. _____ Staff members

28. _____ Volunteers

29. _____ Workmates

30. _____ Clients

At your service-learning site, how many individuals (meaning staff members, volunteers, interns, workmates, and/or clients) **would you have felt comfortable asking a general/procedural question related to your tasks at your site?** Please write the number of individuals next to each category. *If you would not have felt comfortable asking a question related to your tasks to someone in any particular category, please write zero.*

31. _____ Staff members

32. _____ Volunteers

33. _____ Workmates

34. _____ Clients

At your service-learning site, how many individuals (meaning staff members, volunteers, interns, workmates, and/or clients) **did you actually ask a general/procedural question related to your tasks at your site?** Please write the number of individuals next to each category. *If you did not in fact ask a question related to your tasks to someone in any particular category, please write zero.*

35. _____ Staff members

36. _____ Volunteers

37. _____ Workmates

38. _____ Clients

39. Is there any person or persons at your service-learning site that you would feel comfortable asking for a reference or a letter of recommendation for employment and/or graduate school?

a. Yes (continue to question 39a)

b. No (skip to question 40)

39a. Please write the first initial of each person below:

40. Did you develop any personal relationships, either as acquaintances or close friends, with any individuals (e.g. staff members, volunteers, interns, workmates, clients etc.) at your service-learning site? Please circle the one answer that best describes your situation.

- a. Yes (continue to question 41)
- b. No (skip to question 43)

41. With how many individuals did you form personal relationships? Please circle the one answer that best describes your situation.

- a. 1 individual
- b. 2-3 individuals
- c. 4-5 individuals
- d. 6-7 individuals
- e. 8-9 individuals
- f. 10 or more individuals

For up to 5 people with whom you have formed personal relationships, please tell me how you would classify each relationship and how often you interacted with each individual. As a guiding principle, 1 means you would consider the individual to be just an acquaintance and 11 means you would consider the individual to be a close friend. Please circle the answer(s) that you feel best describes your situation and how it describes the frequency of your interactions.

42a. Individual 1

Just an Acquaintance Close Friend
 1 2 3 4 5 6 7 8 9 10 11

42a1. About how often did you interact on a personal level with Individual 1 while at your academic-learning location?

Never Rarely Sometimes Often Always

42b. Individual 2

Just an Acquaintance Close Friend
 1 2 3 4 5 6 7 8 9 10 11

42b1. About how often did you interact on a personal level with Individual 2 while at your academic-learning location?

Never Rarely Sometimes Often Always

42c. Individual 3

Just an Acquaintance Close Friend
 1 2 3 4 5 6 7 8 9 10 11

42c1. About how often did you interact on a personal level with Individual 3 while at your academic-learning location?

Never Rarely Sometimes Often Always

42d. Individual 4

Just an Acquaintance
Friend

Close

1 2 3 4 5 6 7 8 9 10 11

42d1. About how often did you interact on a personal level with Individual 4 while at your academic-learning location?

Never

Rarely

Sometimes

Often

Always

42e. Individual 5

Just an Acquaintance

Close Friend

1 2 3 4 5 6 7 8 9 10 11

42e1. About how often did you interact on a personal level with Individual 5 while at your academic-learning location?

Never

Rarely

Sometimes

Often

Always

Next I would like to ask you a few questions about your thoughts on academic service-learning and whether or not you have had previous experience with academic service-learning

43. When you signed up for this course, were you aware that there was an academic service-learning component to the class? Please circle the one answer that best describes your situation.

- a. Yes
- b. No

44. How do you feel about service being a requirement of your course? Please circle the one answer that best describes your situation.

- a. Disapprove
- b. Don't care
- c. Approve

45. How did you select your service-learning site? Please circle the one answer that best describes your situation.

- a. I selected my service-learning site using course-provided information
- b. I was assigned my service-learning site
- c. I selected my service-learning site on my own
- d. Other _____

46. Was this your first experience taking a class with an academic service-learning component? Please circle the one answer that best describes your situation.

- a. Yes (skip to question 49)
- b. No (continue to question 47)

47. Not counting the academic service-learning course you are just now completing, how many classes have you taken that had an academic service-learning component? Please write the answer that best describes your situation.

_____ classes

48. Are you still in contact with any of the staff members, volunteers, interns, workmates, and/or clients at the site(s) you worked with during your previous academic service-learning experiences? Please circle the one answer that best describes your situation.

- a. Yes
- b. No

Now I would like to ask you a few questions about whether or not you have had previous experience volunteering

49. In the past 12 months, that is since April 2012, have you given any unpaid help to an organization, group, or individual? Please circle the one answer that best describes your situation.

- a. Yes (continue to question 50)
- b. No (skip to question 52)

50. In the past 12 months, that is since April 2012, on average, how often have you given unpaid help to an organization, group, or individual? Please circle the one answer that best describes your experience.

- a. Every day I give unpaid help
- b. At least once a week I give unpaid help
- c. At least every 2 - 3 weeks I give unpaid help
- d. Every month I give unpaid help
- e. At least every 2 - 3 months I give unpaid help
- f. At least every 4 - 6 months I give unpaid help
- g. Once or twice a year I give unpaid help

51. Imagine you need a reference for a job. How likely would you be to contact a staff member, volunteer, intern, workmate, and/or client at the site(s) where you have given unpaid help to ask for a reference? As a guiding principle, 1 means very unlikely and 5 means very likely. Please circle the number that you feel best describes your situation.

Very Unlikely					Very Likely
1	2	3	4	5	

52. Have you given any unpaid help to an organization, group, or individual that was *not in the past 12 months but was still significant in your life*? For example, some people volunteer in high school and this experience has had a lasting impact on their lives. Please circle the one answer that best describes your situation.

- a. Yes (continue to question 53)
- b. No (skip to question 54)

53. Are you still in contact with any of the staff members, volunteers, interns, workmates, and/or clients at the site(s) with whom you worked during these unpaid help experiences? Please circle the one answer that best describes your situation.

- a. Yes
- b. No

Finally I would like to ask you a few questions about your background

54. What is your gender? Please circle the one answer that best describes your situation.

- a. Male
- b. Female
- c. Other _____

55. How old are you? _____

56. What is your race/ethnicity? Please circle the one answer that best describes your situation.

- a. White
- b. Black/African American
- c. Hispanic/Latino
- d. Asian/Pacific Islander
- e. Native Hawaiian
- f. American Indian or Alaskan Native
- g. Other _____

57. What is your highest level of education completed? Please circle the one answer that best describes your situation.

- a. High school diploma/GED
- b. Some College/Associates degree
- c. Bachelor's degree (BA/BS)
- d. Master's degree or higher
- e. Other _____

58. What year at Eastern Michigan University are you? Please circle the one answer that best describes your situation.

- a. First Year
- b. Second Year
- c. Third Year
- d. Fourth Year
- e. Other _____

59. What is your college major?

60. What is the highest level of education your father/guardian has completed? Please circle the one answer that best describes his situation.

- a. Less than high school
- b. Some high school
- c. High school diploma/GED
- d. Some college/Associates degree
- e. Bachelor's degree (BA/BS)
- f. Master's degree or higher
- g. Other _____

61. Which of the following occupational categories best describes your father/guardian's occupation? Please circle the one answer that best describes his situation.

- a. Agricultural, Forestry, and Fishing
- b. Mining
- c. Construction
- d. Manufacturing
- e. Transportation, Communications, Electric, Gas, and Sanitary Services
- f. Wholesale Trade
- g. Retail Trade
- h. Finance, Insurance, and Real Estate
- i. Professional Services (e.g. healthcare, legal, education)
- j. Other Services (e.g. hospitality, maintenance, cleaning, repair)
- j. Public Administration
- k. Other _____

62. What is the highest level of education your mother/guardian has completed? Please circle the one answer that best describes her situation.

- a. Less than high school
- b. Some high school
- c. High school diploma/GED
- d. Some college/Associates degree
- e. Bachelor's degree (BA/BS)
- f. Master's degree or higher
- g. Other _____

63. Which of the following occupational categories best describes your mother/guardian's occupation? Please circle the one answer that best describes her situation.

- a. Agricultural, Forestry, and Fishing
- b. Mining
- c. Construction
- d. Manufacturing
- e. Transportation, Communications, Electric, Gas, and Sanitary Services
- f. Wholesale Trade
- g. Retail Trade
- h. Finance, Insurance, and Real Estate
- i. Professional Services (e.g. healthcare, legal, education)
- j. Other Services (e.g. hospitality, maintenance, cleaning, repair)
- j. Public Administration
- k. Other _____

64. If you feel comfortable providing the name of the organization with which you worked, please do so. **Please note this information will be kept completely confidential but would be helpful to give me a better understanding of your service-learning experience.

Thank you very much for your participation in this survey. If you have any further questions, please contact Megan Anderson, mander54@emich.edu.