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Student Success and Service-Learning: Exploring the Relationship at a Two-Year Public Institution

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Student Success and Service-Learning:
Exploring the Relationship at a Two-Year Public Institution
Leah Renee Kicinski

A Thesis Submitted to the Graduate Faculty of
GRAND VALLEY STATE UNIVERSITY
In
Partial Fulfillment of the Requirements
For the Degree of
Master of Education

College Student Affairs Leadership

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Abstract

This exploratory study examines the relationship between service-learning and student success at a two-year community college in the urban Midwest. Students who participated in service-learning during the 2010-2011 academic year were identified by institutional research and planning (n=788); additionally, students completed a survey regarding service experiences and learning outcomes (n=280). The data suggest that student success appears to be related to service-learning; 76% of subjects who participated in service-learning met a success indicator compared to 62% of students who were enrolled 2011-2012. Additionally, students reported learning communication, critical thinking, diversity, interpersonal, and personal skills as a result of their participation.

Acknowledgments

A paper such as this is really not a singular accomplishment. It is a result of the inspiration and opportunities I have been presented and a result of the support of my family, friends, faculty and colleagues. My success in many ways is their success. Their constant motivation, smiles, love and hugs made it possible; even their moments of doubt. To my loving parents, brothers and sister; my faculty and colleagues, both past and present; and my friends for their understanding and support—Thank You!

Leah R. Kicinski

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Chapter 1: Introduction

Problem Statement

Retention is a critical issue for American colleges and universities; funding and resources have been directed to evaluate how to support students towards degree completion. Tinto (1993) developed a model to explain how students who are engaged both socially and academically in their higher education institutions are more likely to complete their degree. Service-learning, as a teaching pedagogy in the classroom, engages the student more socially and academically in courses (Fiume, 2009). Using Tinto's model, students who are engaging in service-learning are often more engaged than other students and therefore should have higher retention rates. Exploring the relationship of how curricular service-learning impacts student success for two-year community college students is the focus of this study.

Research on service-learning has largely focused on the impact for students at four-year institutions of higher education; very little research exists on the impact that service-learning has at the two-year level (Taggart & Crisp, 2011). Additionally, research involving how service-learning might impact a student's persistence and retention is primarily based on student perceptions of how they might complete their degree by re-enrolling rather than actual retention rates beyond the next semester (Bringle, Hatcher, & Muthiah, 2010; Gallini & Moely, 2003). Bringle, Hatcher, and Muthiah (2010) suggest that students who participate in service-learning within their first year of college have higher intentions to re-enroll the following fall semester, though there is a weak relationship between student intentions and actual enrollment.

Importance of the Problem

A concrete, single definition of service-learning is complex because of institutional differences and various interpretations of service-learning. For the purpose of this study, service-learning is defined as a service activity tied to course learning outcomes that meet an identified community need and incorporates reflection (Bringle & Hatcher, 1995; Fiume, 2009; Howard, 2003). Howard (2003) identified three essential elements of service-learning to better help define the experience: 1) a community identified need which the participant responds to; 2) academic learning for the student must be strengthened by participating in the opportunity; and 3) commitment to the community and awareness of civic responsibility and citizenship is advanced for the student participant. Reflection on service opportunities supports academic learning, connections to course learning outcomes and academic discipline, and active citizenship (Fiume, 2009).

Retention. Many factors impact a student's persistence and retention; involvement with the college and student organizations, connections to students and faculty, and participation in high-impact experiences are three examples (Tinto, 1997; Kuh, 2008; Lau, 2003). Service-learning may be the starting point for future student classroom success and future student civic involvement. Student retention has been addressed at all levels of higher education from the two-year institution to the four-year institution although many two-year colleges face additional challenges related to retention of students. Additionally, more current research has focused on the specific issues of diverse groups of student's ability to earn their college degree. Walters and McKay (2005) stated that nearly 50% of two-year community college students would

eventually drop out; graduation rates in the two-year environment were predicted to be lower than four-year institutions. Many students seeking a bachelor's degree begin their higher education career at the community college (Cataldi et al., 2011). Identifying methods to support student success towards earning a community college credential is a key to future academic success.

Service-Learning. Many methodologies have been identified to support student success. Service-learning is a teaching pedagogy some faculty use that may impact student success, persistence, and retention. Both curricular and co-curricular service opportunities exist on college campuses, although institutional definitions and implementations vary widely (Berson & Younkin, 1998).

Sigmon (1996) identified a typology of service-learning to describe the shared goals and outcomes between the service and learning in education. Interactions of learning outcomes and reflection for students and how the community is influenced shows how the two terms are related to describe the experience. Terms are coupled using a hyphen; capitals express where emphasis is placed. In service-LEARNING typology, learning in regard to course outcomes takes precedence where community needs are secondary. Reversely, SERVICE-learning creates an environment where community needs and service take precedence while learning goals are secondary. When service and learning goals are separate, service learning, both terms are lowercase and without a hyphen, the terms are loosely connected. Carrying equal weight is SERVICE-LEARNING, the ideal within the academic environment.

For many institutions of higher education service-learning is curricular and incorporated by faculty to support course learning outcomes and goals. Curricular

service-learning can be incorporated into an academic course of any discipline; examples may include a child development course partnering with a preschool classroom. Child development students apply topics learned in class through the experience with preschoolers. Curricular service-learning at the two-year community college is the focus of this study.

Service-learning as a pedagogy is different from more traditional types of pedagogies because of its emphasis on the group rather than the individual. It redefines the role of the student, the faculty, the type of learning, and the role and interaction between the institution and the community (Bringle, Hatcher, & Muthiah, 2010; Fiume, 2009; Gallini & Moely, 2003; Howard, 2003). While the service experience will vary based on the academic discipline and needs of the local community, students will often participate in 20 hours of community based learning during the semester and engage in critical reflection opportunities (Association of American Colleges and Universities, 2012). Service-learning supports learning styles through its emphasis on active learning and reflection in courses from biology to construction trades. Research demonstrates that students who participate in service-learning experiences during their undergraduate careers have an increased understanding of learning outcomes and higher grades (Berson & Younkin, 1998; Gallini & Moely, 2003; Taggart & Crisp, 2011, Weglarz & Seybert, 2004).

Service-learning is also one method a college can use to increase a student's level of civic engagement; an overall learning outcome where there is an understanding of the responsibility one has as a community member and a citizen (Association of American Colleges and Universities, 2012). A Higher Education Research Institute Study (Astin,

Sax, & Avalos, 1999) surveyed student volunteers at various times during and after college. Students reported behaviors such as socializing with different ethnic groups, attending graduate school, and future involvement in social organizations as a result of student volunteerism. It is not just the act of service that impacts retention. Taggart and Crisp (2011) identified that students involved in service-learning are more engaged and active citizens in their community beyond their higher education experience. Service-learning can impact student success and retention based on the student's engagement and reflection in the service and the resulting in-depth learning of course material.

Background of the Problem

Service-Learning History and Future. Nationally, service-learning has become a prominent teaching pedagogy in the United States. The earliest use of the term dates back to the 1960s. Prior to the 1960s, Greek-letter organizations and faith groups organized service activities on college campuses. The Peace Corps began in 1961 and created opportunities which still exist for America's young people to not only serve their local community but the broader world as well. Volunteers in Service to America, or VISTA, began in 1965. Both opportunities planted a seed for the future of service-learning and volunteerism in the United States. In 1969, representatives from these organizations and the higher education community gathered to discuss how to best implement service-learning programs into the climate of American Higher Education (National-Service-learning Clearing House, 2008).

The 1980s proved to be a second wave for interest in service-learning as formal groups such as the National Youth Leadership Council and Campus Compact began to offer professional development to advance service-learning nationally. Campus Compact

has greatly expanded since that time with state organizations working to help students better engage in their communities. In 1990, the National and Community Service Act passed by congress created grant funded opportunities for schools to promote service-learning. The AmeriCorps and SeniorCorps programs were created in 1993; adding additional opportunities for individuals at several stages of life to serve their communities (National-Service-learning Clearing House, 2008).

Cress, Burack, Giles, Elkins, and Carnes Stevens (2010), partnering with the U.S. Department of Education and the Association of American Colleges and Universities (AAC&U), conducted a comprehensive study on civic engagement. The study found that service-learning creates a space for students to learn about their community, engage in civic learning, and promote future civic engagement. Civic learning promotes student persistence towards degree completion, helps students gain skills that employer's value, and develops a heightened sense of social responsibility and civic participation including voting and volunteerism (American Association of College and Universities, 2012). As more individuals increasingly enroll in higher education, institutions have a greater responsibility to develop students to be "informed, engaged and globally knowledgeable citizens" (American Association of College and Universities, 2012, p. vii).

The growth of service-learning has promoted the creation of various institutional recognition and goals on a national scale. The Association of American Colleges and Universities (2012) has advocated for high-impact educational practices to promote strong teaching styles to support student learning. Service-learning has also been identified as a high-impact practice; creating a set of teaching perspectives that can be utilized in the classroom (Kuh, 2008). High-impact practices can include learning

communities, writing-intensive courses, collaborative assignments and projects, undergraduate research, diversity/global learning, internships, and capstone courses and projects, in addition to service-learning or community-based learning (Kuh, 2008).

Institutions of higher education engage learners in civic education through service-learning, community based research, community experiences and co-curricular opportunities. No matter how the institution seeks to implement civic engagement, institutions support students in values exploration for themselves and in the community. Awareness of community needs encourages student involvement in social change both during and after their educational careers (Cress et al., 2010).

Community Colleges. The community college is a uniquely American institution. Joliet Junior College in Illinois opened in 1901 and remains the oldest continuously operated junior college. Forty years prior to the opening of Joliet Junior College, the Morrill Act of 1862, which established land grant institutions, provided the basis for creating an American higher education system to provide access to more than just the privileged elite. Land grant institutions focused on liberal arts education, along with agricultural programs and support for expanding technology (Phillippe & Sullivan, 2005). Junior colleges emerged as an opportunity to couple liberal arts education with vocational training for the growing needs of the work force. These special institutions served as an opportunity to educate students who sought higher education but were not accepted to the land grant or other private institutions. Junior colleges helped meet some of the needs of the changing production within the economy.

By 1921 California established a system of junior colleges, with 21 locations throughout the state and legislation created funding for the first two years of a college

education to be offered in the public high schools. Subsequently in the same year, the American Association of Junior Colleges was formed to create opportunities for the presidents of these institutions to share ideas (Phillippe & Sullivan, 2005). The 1960s emerged as a decade for community college growth, with an expanding number of institutions and expanding enrollment. More than 450 institutions opened within that decade (Cohen & Brawer, 2008). Since 1992, the association replaced the term junior with community and currently has membership from private, public and proprietary two-year institutions who offer both liberal arts and vocational degrees and programs. Like most institutions of higher education, both public and private, and at two-year and four-year institutions, enrollment was increasingly expanded following World War II with the creation of the GI Bill for returning service members. In the 100 years since Joliet Junior College opened, over 1,000 two-year institutions now exist in the United States (Phillippe & Sullivan, 2005).

As the number of institutions expanded so did the expectations of educational instruction offered at the college. Community colleges offer programs for students to transfer from the two-year to a four-year college or university in liberal arts like setting. Vocational and job training for identified community needs was included. Community colleges offer non-credit courses and community enrichment opportunities that address additional community needs. Both associate degrees and certificates are awarded to students after successful completion of a program.

Community College Students. Students at two-year institutions represent a different population of students than those at more selective four-year institutions. For example, 57% of students at two-year schools that participated in the Community College

Survey of Student Engagement (2013) were enrolled less than full-time and 49% were ethnic minorities. Community colleges function as open door institutions to local residents and often are an access point for minority students seeking to earn a college credential.

Community colleges are important for bachelor's degree attainment; 28% of all bachelor degree earners began at a community college; 47% of bachelor degree earners enrolled in at least one course at a community college (Cataldi et al., 2011).

Transferability of community college courses is an important attribute with evidence suggesting that 28% of students with a bachelor's degree began at the community college. For the 822 public two-year institutions who report a transfer -out rate, between 20.6% and 78.7% students transfer from the community college (Mullin, 2012).

Michigan is home to 28 public community colleges. African American students represent 17.83% of Michigan community college enrollment and Hispanics represent 3.37% of students. Total community college enrollment in the state is 473,307 students where 280,401 students are enrolled in a for credit program. Nearly 65% of Michigan community college students enrolled part-time while just under 53% are traditional age, 18 to 24 (Michigan Community College Association, 2013). Two-year institutions also enroll a larger number of first generation college students than students at four-year institutions and these students tend to have lower retention rates than students whose parents attended college (Thayer, 2000).

It is clear that community colleges represent a large number of college and university across the country and in the State of Michigan. Exploring how participation in

service-learning experiences impacts the retention of these students is critical as this population of students continues to grow.

Statement of Purpose

This descriptive study will examine student perceptions and student success data for students who participated in a course that implemented service-learning pedagogy at one two-year public community college in an urban setting during fall 2010 and winter 2011 academic semesters. By exploring student success measures such as whether or not they received a degree, transferred, or remain enrolled at the institution, students who participated in service-learning will be compared to the overall student success data for students. This study will examine the role service-learning might play and the degree to which it potentially influences whether or not a student stays enrolled at the institution or if they continue to pursue their academic goals at another institution. Additionally, student survey data will address additional student perceptions of the service-learning and course experience and how the course may have influenced their participation in the community.

In order to address the current gap in the literature regarding the connection between service-learning and student success and retention this research seeks to explore the ways service-learning might impact student retention in the two-year environment. 1) Is there is a relationship between student success and retention after participating in service-learning within the two-year community college?, and 2) Is there a relationship between service-learning and student learning outcomes?

Design, Data Collection and Analysis

Explored in this study is the relationship between service-learning and retention at an urban Midwest community college. During fall 2010 and winter 2011, 788 students participated in academic service-learning at this institution. Two data sources will be used. Institutional Research and Planning provided data on service-learning participant retention data including: age, gender, number of credits earned, if the student received a degree or certificate from the institution, where the student transferred, if applicable, or if they were still enrolled at the community college in winter 2014 (n=788). The Department of Service-Learning also used an electronic survey to assess student learning outcomes and attitudes towards service and civic engagement. The survey was sent to faculty who provided a link for student participants to complete the survey. Student participation was voluntary (n=280). Data obtained will be analyzed using descriptive statistics to determine whether or not any themes emerged as a result of participants experiences with service-learning. Research methods are included in Chapter 3 and the data will be presented in Chapter 4.

Definition of Terms

For the purpose of the study, *service-learning* will be defined as a *pedagogy* which involves “a credit-bearing educational experience in which students participate in an organized service activity that meets identified community needs and reflect on the service activity in such a way as to gain further understanding for the course content, a broader appreciation of the discipline, and an enhanced sense of civic responsibility” (Bringle & Hatchter, 1996, p. 222).

Civic engagement, an intended outcome of service-learning, is defined as “working to make a difference in the civic life of our communities and developing the

combination of knowledge, skills, values and motivation to make that difference. It means promoting the quality of life in a community, through both political and non-political processes” (Ehrlich, 2000, p.vi). *Retention* is broadly defined as the rate at which a student enters college and persists at the institution to earn a degree. Retention for a two-year institution is expanded to include students continuing their studies from semester to semester towards associate degree completion or transferring (Mohammadi, 1994). *Student success*, in the community college will include students who have earned a community college credential such as an associate degree or one-year certificate, transferred to a new institution or are currently enrolled.

Delimitations of the Study

The researcher chose to study curricular service-learning at one urban Midwest two-year community college as the site for this study. Service-learning experiences were different in each course, as faculty decides the specific types of experiences provided to their students; there is no way to completely understand each students experience with service-learning and involvement in the community. The researcher is only able to report if students re-enrolled or if they transferred and not the other factors that may have contributed to that decision. Student success was not measured by successful course completion or the grade students received in the course. Retention data from the institution and student survey data cannot be correlated because no personally identifiable information was collected in the survey.

Limitations of the Study

Student success and retention is influenced by several factors and creates limitations for this research. First, how an institution defines student success will be different at each institution and for individual students. The researcher will only identify student success based on how the institution involved in the study interprets it. A second limitation for this research is that retention is also defined differently by institutions. Nationally, students transferring to a new institution are not typically considered being retained, however at this two-year institution students meeting personal goals is viewed as an indicator of student success. Additionally, retention is also influenced by factors other than service-learning; including interaction with peers, faculty and staff and family obligations which may require students to transfer to another institution.

Organization of the Thesis

The introductory chapter outlines the background and intentions of this research study. Chapter Two will include a review of the current literature on the topic as well as the theoretical perspectives used to understand the problem identified. Chapter Three will outline the research and data analysis process. Chapter Four will present data and results. Chapter Five will discuss findings, recommendations and implications of the research. The survey instrument, Institutional Review Board Approval from both Grand Valley State University and the two-year community college, permission to use survey instrument, and approval of the thesis committee by the Office of Graduate Studies, and can be found within the Appendices.

Chapter 2: Literature Review

Introduction

Presented in this chapter are the theoretical frameworks regarding service-learning and retention. A review of existing literature provides summaries in the following areas: 1) theoretical background; 2) student success and retention; 3) service-learning; 4) service-learning and retention.

Theoretical Foundations

Exploring the relationship between service-learning and retention begins with understanding the theoretical foundations of both. Theoretical foundations of service-learning and experiential education are shaped around Robert Sigmon's (1996) service-learning typology, addressed in chapter one and David Kolb's (1984) theory of experiential education. Additionally, retention and persistence is examined using Vincent Tinto's (1993) work on student departure from college

Service-learning. Existing research on curricular service-learning is vast. Service-learning is a form of experiential education and has its roots in the works of John Dewey, Kurt Lewin and Jean Piaget (Mayhew & Engberg, 2011). Dewey (1938 as cited in Mayhew & Engberg, 2011) developed a six step process for experiential, logical inquiry. In this process problems are encountered and hypotheses formed and tested to enhance learning. Saltmarsh (1996) described Dewey's community service-learning pedagogy as "reflective inquiry linking student's involvement in community service to their intellectual and moral development" (p.14). Lewin (1951, as cited in Mayhew & Engberg, 2011) emphasized the interaction between the environment and the individual to create a learning environment. Jean Piaget (1952 as cited in Mayhew & Engberg,

2011) argued that intelligence is formed through adaptation and assimilation of experiences over time. Each of these theories informs the practice of service-learning.

Kolb's (1984) model of experiential education is a theory of transformative experiences that promote student learning and development. Learning is a stage cycle where an experience forms the basis of knowledge for the learner. It is a process that begins with experience and when the learning cycle is completed, the experience allows the learner to incorporate new ideas into future actions. Beginning with a concrete experience, the learner participates unbiased in the experience. Reflective observation on the experience allows the individual to experience the learning from various perspectives. Idea formulation and integration is a result of abstract conceptualization. Active experimentation is the incorporation of new ideas into action (Evans, Forney, Guido, Patton, & Renn, 2010). When the learning cycle is completed, more effective learning is the result. Kolb's model is especially important to this study as it relates directly to the philosophy behind the pedagogy of service-learning.

Retention. Student success and retention is important for institutions of higher education. Given the diversity of the community college student body, helping students to expand their knowledge of the institution and make connections with faculty and staff are important indicators of success and retention (Tinto, 2006). Connection to the college and awareness of institutional programs and services help to retain students. The work of Tinto is influenced by the rate of departure and graduation at the four-year institution (Tinto, 1993). Much of what impacts a student's retention at an institution is a reflection of the relationship between the individual and the environment. Vincent Tinto's (1993) internationalist theory is the basis of several studies on student retention, including those

which relate retention to participation in service-learning experiences (Bringle, Hatcher, & Muthiah, 2010; Gallini & Moely, 2003; Fike & Fike, 2008; Lau, 2003; Nakajima, Dembo, & Mossler, 2012; Mohammadi, 1994; Yeh, 2010). Central to the model is the social and academic integration for the student in the college community (Feldman, 1993; Tinto, 2006). Since the work on retention began in the 1970s, Tinto and others have expanded the research and volume of work on the issue addressing different socioeconomic groups and working to apply the theory at different institutional types, including two-year institutions (Tinto, 2006).

Retention theory takes into consideration individual student demographics to address student degree completion. Students arrive to college with varying backgrounds that often impact whether or not they complete their degree program. Pre-existing attributes including family background, individual skills and abilities, and previous educational experiences impact the goals and commitments which the student has entering into higher education. Classroom experiences with faculty can also impact a student's academic performance and therefore their higher education careers. In the non-residential college setting, like many community colleges, interactions with faculty have become important in student retention (Tinto, 2006). Classroom experiences influence academic and social integration. The student decision to remain in college or to leave is impacted by the interaction of academic and social integration, individual internal and external goals, and commitments (Tinto, 1993). Tinto (2006) makes an explicit connection between the student and the academic or social interactions during their time at the institution.

Retention research has allowed practitioners to better understand this phenomenon for different groups of students. Separate models exist for students of different socioeconomic backgrounds, races, ethnicities, and gender. Additionally, the work done on retention must also include two-year institutions, which enroll groups of students who greatly vary from their four-year counterparts (Fike & Fike, 2003; Nakajima et al., 2012). Increasingly important is two-year and four-year institutions working together to help encourage student transfer after meeting their personal goals, general education or associate degree requirements (Tinto, 2006). Involvement outside of class is important; equally important is the classroom and how faculty support student persistence through teaching and student learning (Tinto, 1997; 2006).

Entrance into college from high school or returning after entering the workforce is a series of transitions. Experiences of college do not exist in a bubble, and a student's family life and experiences play a role in retention (Tinto, 2007). Students in the community college exhibit unique characteristics that are unlike students in the four-year university setting where many of the retention theories were tested (Fike & Fike, 2003). Lau (2003) argues that in order to impact retention of students once they are in college, the university must help the student in making the transition specifically from high school. For many students college is a new learning environment where they are able to determine their daily schedule, what activities they are involved in and how they interact in their new environment. Issues in this transition can arise in particular for the non-traditional or minority student. Support can come in a variety of ways whether it is social or personal, structured or unstructured. Involvement in summer bridge programs or

mentor programs prior to moving to campus or involvement in clubs or organizations can have an impact (Tinto, 2003).

Synthesis of Research Literature

Student Success and Retention. Student success and retention is important for institutions of higher education. Given the diversity of the community college student body, helping students to expand their knowledge of the institution and make connections with faculty and staff are important indicators of success and retention (Tinto, 2006). Connection to the college and awareness of institutional programs and services helps to retain students. Much of what impacts a student's retention at an institution is a reflection of the relationship of the individual and the environment. The number of degrees earned at an institution is a reflection of the students enrolled at the university. To understand retention, the student's environment, both internal and external must also be considered (Fike & Fike, 2008).

Student Characteristics Impact Retention. Individual student characteristics impact retention and persistence in the community college. At a community college in California, Nakajima et al., (2012) studied the impact of student demographics on persistence including academic integration and psychosocial variables. Fike and Fike (2008) looked at fall to fall retention of 9,200 first year students over the course of four years in a community college. Relationships between student demographics and retention exist; gender and ethnicity were not statistically significant predictors of retention (Fike & Fike, 2008). Retention was positively related to number of credits enrolled in, financial aid, and grade point average (Nakajima et al., 2012).

Age. The number of years that have passed since a student attended high school is an indicator of retention. Fike and Fike's (2008) sample had a median age of 19; here, age was a weak predictor. Their sample evaluated first time in any college students, or FTIAC students, many of whom entered after high school. Nakajima et al.'s (2012) sample was older, a mean age of 24, finding that younger students were more likely to persist than adult learners. The Michigan Community College Association (2014) reported that 53% of community college students are 18-24; while 47% are older than 24. Adult students, older than 24; have different needs compared to the traditional age college student. Both Chaves (2006) and Nakajima et al. (2012) assert that adult learners should be examined separately from traditional students. Nakajima et al. (2012) assume that older students have additional demands beyond school which impact retention and suggest that interventions should be focused specifically on older students.

Financial Aid. Financial aid status also plays a role in student retention. Aid is based on income level; students who receive funding coming from low to moderate income levels have lower enrollment, retention, and persistence rates than students from higher income levels. Recognizing a paradigm shift from access towards college completion, the National Association of Student Financial Aid Administrators (NASFAA, 2012), sees a relationship between Federal Pell Grant recipients and retention. Students are required to demonstrate academic progress to remain eligible for the award. Grant programs create opportunities for students to access education; exploring how grant programs impact student persistence and retention is important. Fike and Fike (2008) saw a positive correlation between receiving financial aid and persistence for students in a community college over four years. Nakajima et al. (2012)

also found 85% of students who received financial aid persisted compared to 73% who did not.

Enrollment Status. The number of credits in which a student is enrolled is also a predictor of student success. Nakajima et al. (2012) found that of the students who did not persist, 70% were enrolled part-time, with the other 30% enrolled full-time. Part-time status was also related to other negative persistence indicators such as age, family, financial responsibility and off-campus work hours. External commitments can make enrolling full-time in college difficult, the interaction of these factors in course work compound to affect student success.

Faculty. For community college students, retention and persistence is also impacted by faculty and classroom experiences (Tinto, 1997). Higher education is just beginning to explore how faculty teaching impacts retention. Faculty can use a variety of teaching pedagogies to engage students in the curriculum, teach critical thinking and communication skills. While critical thinking skills can be taught in several ways, Lau (2003) argues that cooperative and collaborative learning, such as service-learning, is one method to allow students to work together and learn practical skills beneficial for future careers. Students who felt that their faculty genuinely cared about them were more likely to persist (Nakajima et al., 2012). Students appreciate dialogue between themselves and faculty; in team-taught courses students valued the differing perspectives of faculty that encouraged more student participation (Hodge et al., 2001). Appropriate professional development on student success and teaching for faculty can support these efforts.

First-year students and senior-level students at institutions where faculty used active learning pedagogies report higher gains in social development, knowledge of

general education topics and practical competencies for their students. Umbach and Wawrzynski (2005) explored the impact that active learning had on student engagement and course learning outcomes. Students felt most engagement from faculty when there were high levels of academic expectations and challenges in the classroom (Umbach & Wawrzynski, 2005). Active learning in these ways motivated the students to complete the task. Tinto (2003) argued that the classroom is perhaps the only place where students and faculty can meet together in an environment centered on learning.

Service-learning. Successful service-learning opportunities for students have demonstrated that students acquire academic knowledge and skills and also influence their development, sense of community between students and the area, and interpersonal engagement (Howard, 2003; Gallini & Moely, 2003). Service-learning impacts students differently from community service when analyzed longitudinally and within a specific course (Hollis, 2002; Voggelsang & Astin, 2000). Service-learning as a teaching pedagogy was studied in several types of courses, including sociology (Hollis, 2002), architecture (Burr, 1999) or English as a second language (Elwell & Bean, 2001). Service-learning is identified as a high-impact learning practice (Kuh, 2008); as such it can be integrated into other high-impact practices such as learning communities (Hodge, Lewis, Kremer, & Hughes, 2001) and first-year experience courses (Mayhew & Engberg, 2011). The results of empirical research on service-learning vary. Longitudinal data suggests positive relationships between service-learning and student academic success (Voggelsang & Astin, 2000), while case studies have shown the impact of service-learning within courses like those motioned above.

Longitudinal Service-Learning Research. A Higher Education Research Institute longitudinal study conducted in 1998 included 22,000 students at diverse colleges and universities throughout the United States beginning in 1985 when the group began college. Follow-up surveys of these students were conducted in 1989, four-years after beginning college enrollment and in 1994-1995, nine-years after college entry (Astin, Sax, & Avalos, 1999). The data set has been used to assess student learning when service is curricular, but also to evaluate the service impact on future volunteerism. Other variables for this longitudinal study included measures of racial understanding, academic skills, leadership and future plans (Astin, Sax, & Avalos, 1999; Vogelgsang & Astin, 2000). Based on this study, service-learning and community service both influence critical thinking skills, writing skills and college grade point average. Service-learning had a much stronger impact on academic performance and the development of cognitive skills than for students who did not participate in service-learning (Vogelgsang & Astin, 2000).

Vogelgsang and Astin (2000) used the Higher Education Research Institute data to compare curricular service-learning experience to generic community service opportunities; 29.9% of the sample participated in curricular service-learning and 46.5% reported volunteerism outside of college sponsored or curricular events. Students who were Service-learning participants were also more likely to participate in service more frequently (Vogelgsang & Astin, 2000).

Student Learning. Research has suggested the various ways that students are impacted by their participation in service-learning; these include personal skills, course learning, higher grades and course attendance (Berson & Younkin, 1998; Hollis, 2000),

and overall academic engagement (Hodge et al., 2001; Gallini & Moely, 2003).

Additionally, learning outcomes for service-learning may include communication skills, critical thinking skills, diversity skills, interpersonal skills, and personal skills. A selection of these learning outcomes will be explored in the present study.

Academic Achievement. Student participation in service-learning impacts a student's overall academic engagement in addition to how well a student does in a course based on their grades and overall grade point average (Gallini & Moely, 2003; Vogelgesang & Astin, 2000). Vogelgesang and Astin (2000) saw that while any type of service involvement is related to student success, participation in service-learning has a stronger impact on grades. Service-learning in the community college can present a host of challenges different from the four-year environment; students at community colleges are typically older, and also have differing levels of household income and college readiness (Prentice, 2011; Largent, 2013). Even though these differences existed, when two-year students participated in service-learning results were similar to students who participated at four-year institutions (Prentice, 2011).

In an introductory sociology course, Hollis (2002) compared two types of service experiences. An unstructured community service experience was integrated one semester and compared to a structured service-learning experience in a subsequent semester. The two courses were demographically similar, both taught by the researcher, used the same textbooks, and administered the same cumulative final exam. Introductory courses like this are important avenues for integrating service-learning. Often taken early in a student's higher education career they establish a space for students to engage in critical dialogue and create building blocks for future engagement throughout their higher

education career (Zlotkowski, 2002). In the sociology course, service-learning students received higher grades than the community service students. Higher grades suggest that the application of course concepts to the real world setting helped students achieve greater cognitive gains and academic understanding (Hollis, 2002). While student grades do demonstrate success, more research is needed to determine if students who participate in service-learning are more likely to receive higher grades because of other external factors (Hollis, 2002; Vogelgesang & Astin, 2000).

Collaborative Learning. Collin County Community College District (CCCCD) in Texas addressed civic disengagement using service-learning as a component of learning communities. Students participated in multiple classes together as a group, allowing them to work closely with one another and faculty (Hodge et al., 2001; Kuh, 2009). In this case, faculty who taught in the learning communities also included service-learning in the course. Participants in learning communities at CCCCCD included the 18-22 year old age demographic (71%), were white (82%) and female (58%). Students who participated in the learning communities and participated in service-learning completed a survey at the end of the semester. Student success rates in terms of grades were higher overall for the learning community students who participated in service-learning. Students reported that service-learning impacted future career plans, (36%), major selection (31%), and was equally or more academically challenging than classroom work (73%) (Hodge et al., 2001).

During an eight-week architecture project, students in a construction trades and architecture course at an Oklahoma community college worked with city government for architecture and historical preservation in a downtown business district to create an

architectural model of the area. Burr (1999) reviewed student journals and conducted a focus group with 8 student participants. Work with the city was transformational for many of the students, who reported learning collaboration and cooperation between each other and interactions with city officials. Students reported seeing the concepts they learned in other courses in this real world application (Burr, 1999).

Skill Building. In an exploratory study of low-income, first-generation students who participated in service-learning at a four-year institution, Yeh (2010) examined how service-learning might impact success in college and skill development. While this study was limited to a small group of students at a four-year institution, this group reflects the demographics of community college students (Thayer, 2000). Four dimensions of skill building were identified: academic, psychosocial, personal and spiritual, and sociocultural or sociopolitical. The personal and spiritual dimension allowed students to make connections between personal values and learning. Learning and curriculum engagement led to more motivation in the course and to persistence through college (Yeh, 2010).

When service-learning was a component in a first-year experience course at a large public four-year research university, Mayhew and Engberg (2011) used a pre and post-test method to evaluate student experiences (n=173). Service-learning courses (n=5) were used as an experimental group and compared to non-service-learning courses (n=5). Researchers focused on factors relating to service-learning including personal competence, charitable responsibility, social justice responsibility, and interpersonal relationships. While there was no significant difference between students in pre-test understanding of charitable or social responsibility, post-test understanding showed

positive gains. When service-learning is incorporated into first-year experience courses they can provide support for students to understand themselves, but also their role in the community and their future impact on society (Mayhew & Engberg, 2011).

Civic Engagement. The American Association of Community Colleges supported community college service-learning initiatives with a Learn and Serve grant from the Corporation for National and Community Service (Prentice, 2011). Between 2004 and 2006 coordinators of service-learning at these institutions administered pre- and post-service questionnaires to students who participated in service-learning (n=168) and those who had not (n=89). The survey included the same set of 27 questions; the post-test survey included additional questions regarding the service-learning experience for that group. Survey results had statistically significant differences between the two groups. While the two groups began the semester with a similar understanding of civic engagement, service-learning students had a greater understanding following their participation in service-learning. Many of the outcomes identified for community college service-learning students were comparable to the outcomes that are identified in the four-year university students (Prentice, 2011).

Learning Outcomes. Service-learning allows students to engage in course material and with each other differently than typical teaching practices. Eyler and Giles (1999) identified a variety of learning outcomes as a result of student participation in service-learning. Research presented on service-learning shows the breadth of how students can learn from the experience.. Using a national survey, Eyler and Giles (1999) used three different samples with nearly 4,000 students surveyed, learning outcomes such as: communication, critical thinking, understanding of diversity, personal, and

interpersonal skills were identified. Themes emerged in relation to skill development which was influenced by the quality of placement for students and the quality of reflection that students participated in.

Communication Skills. Communication skills are defined broadly as a learning outcome to include reading, writing, listening and speaking. In the Eyler and Giles (1999) study, communication skills were not directly related to participation in service-learning, however they were related to quality of placement. High quality placements allowed students the opportunity to express their ideas and explore leadership opportunities. An English as a Second Language course used service-learning pedagogy to holistically help students learn English reading, writing and speaking skills; student participants demonstrated learning of communication skills. Elwell and Bean (2001) used participant observation, interviews and questionnaires to address student learning outcomes for this course (n=28). Students read classic literature on the American farm worker experience and participated in service-learning with current migrant farmers. Students were able to connect many of the themes in the literature they read with a real world application through service-learning using communication skills with migrant workers, reviewing research literature, and course presentations. Course discussions identified ESL student's own struggles with being immigrants to the United States and helped to improve student speaking skills (Elwell & Bean, 2001).

While the communication skills are explicit in how the students in ESL courses learned communication skills as a result of service-learning; opportunities to engage in small group work or presentations and reflection also support learning of communication skills. Hodge et al. (2001) saw that engaging in service-learning creates a course climate

of communication between other students and faculty. Communication skills were learned by first-year nursing students who participated in service-learning as well; these students identified recognizing the differences between communicating socially, as they would with friends, and communicating professionally as they would with their patients. Non-verbal communication skills were necessary to interact with certain patients because of their abilities but also to be very patient and listen to responses from those they interact with (Sedlak, Doheny, Pantohofer, & Anaya, 2003).

Critical Thinking Skills. Critical thinking is described in this student survey as: the ability to evaluate, analyze, make decisions, think creatively, solve problems, use logic, and acknowledge multiple perspectives. Students were able to identify critical thinking skills when they realized societal problems when interacting with others through service-learning (Eyler & Giles, 1999). Similar to communication skills, student's assessment of critical thinking was also tied to quality of service-learning placement and overall experience. Service-learning that was well integrated into the course impacted students critical thinking skills the most (Eyler & Giles, 1999).

Development of critical thinking skills for the students occurred through reflections on experiences and the decisions they were forced to make while participating in the service experience. Using Paul's (1993) critical thinking framework involving 1) elements of reasoning: identifying problems, developing multiple points of view; 2) having the ability to reason: developing new perspectives, identifying assumptions; and 3) having specific traits of reasoning such as humility, courage and confidence; Sedlak, et al. (2003) evaluated how critical thinking skills were gained for 94 first year nursing students who participated in service-learning. Two themes emerged: 1) development of a

professional self-perspective and 2) community perspective; both reflecting Paul's (1993) traits and elements of reasoning. In particular, students reflected on their status in society, the issues that society presents for those who are less fortunate than themselves and how as a result of this new knowledge they would move forward as a different person (Sedlak et al., 2003).

Diversity. Service-learning creates opportunities for students to interact with others different from themselves; 57% of students reported interacting with individuals of ethnic groups different from their own (Eyler & Giles, 1999). Diversity skills are described as: local and global multicultural awareness; knowledge on breadth of diversity; an ability to describe and analyze one's own cultural values, beliefs and biases; and an awareness of, sensitivity to, tolerance for, and respect for those from different cultures and lifestyles. Collaboration between a master's level social work program and an international community college allowed two student groups to study ageing on the population of Bermuda through service-learning and both gained diversity skills (Gutheil, Chernesky, & Sherratt, 2006). The master's students learned about Bermudan culture and the community college students learned how to interact with the aging population. Reflection papers from community college students (n=11) in Bermuda showed students positively viewed their experiences with the older population; learning more about the individuals past and Bermudan culture. Misconceptions and bias towards the aging population were challenged as students saw the value in past experiences of these individuals. Additionally, the master's level students were able to apply their learning through sharing their findings with the Bermudan government to address the needs of the aging population (Gutheil, Chernesky, & Sherratt, 2006).

Both students and community partners can benefit from service-learning and can identify diversity skills learned as a result (Jones & Hill, 2001). Two organizations were surveyed by Jones and Hill (2001), a food pantry and an AIDS/HIV outreach center, in addition to student participants. Relationship building between the two groups fostered diversity skills learning. Interactions led to greater appreciation for diverse perspectives and of each other's life circumstances. One student in the study reflected how being able to work with individuals with sexual orientations different from her own led her to a greater understanding and appreciation for the individuals she served. Additionally, students reflected having learned their privileged status in society (Jones & Hill, 2001).

Interpersonal Skills. Interpersonal skills have been defined as: teamwork, relationship management, conflict resolution, the ability to work with groups and putting personality differences aside, identifying and understanding various roles in group work, developing the ability to build consensus, manage conflict and communicate respect for other team members, and are another possible learning outcome for service-learning participants. Eyler and Giles (1999) describe most in-class learning as centered on students replicating what is taught by the professor. Learning to work with others was the most important learning outcome for 81% of surveyed students in their study. The impact that service-learning had on this skill was dictated by the quality of the experience (Eyler & Giles, 1999). Interpersonal learning may occur when service-learning participants realize the impact of their service on those whom they serve (Simmons & Cleary, 2006).

Required to complete 15 hours of service, with assigned reading, writing and reflection activities, students at a community college had increased understanding of course materials. Students (n=25) participated in a pre- and post-test survey for the

course. Stavrianopoulos (2008) reported that students were engaged in the course and took an active participatory role with the material and as a group. Students shared that they felt connected to each other and their community after having participated in the course (Stavrianopoulos, 2008).

Personal Skills. Personal skills are: ability to understand and manage self-change, learning personal responsibility and wellness; ethics and values; time and resource management; responsibility and lifelong learning skills. Students who chose to participate in service-learning already had higher levels of personal efficacy compared to other students; participation in service-learning was a predictor of additional learning (Eyler & Giles, 1999). Personal skills are most supported by engaging in reflection opportunities. Service-learning developed student skills to work together fostering commitment between group members and the organizations served (Yeh, 2010).

Impact of Service-learning on Faculty. Due to the pedagogical nature of service-learning, faculty outcomes and experiences are important to holistically understand student service experiences. Often student data is partnered with faculty reflections on their experience utilizing service-learning in their classes. Research on faculty perceptions of service-learning adds to the breadth research exploring their own reflections and interactions with students (Burr, 1999; Elwell & Bean, 2001; Largent, 2013; Gutheil, Chernesky & Sherratt, 2006; Hollis, 2002). Faculty found service-learning effective in the classroom for student engagement and practical application of course outcomes in a number of studies (Hodge et al., 2001; Prentice, 2011).

Hodge et al. (2001) found that faculty who taught using service-learning reported that the experience expanded their abilities to use collaborative teaching. As a teaching

practice they could transfer these skills to their other courses. Faculty also reported more engaged student interactions within service-learning classes (Hollis, 2002; Berson & Younkin, 1998). Largent (2013) noted a difference for students who participate in service-learning. Students grow personally and professionally and make better connections with course material (Largent, 2013).

Many positive views outweigh negative views for integrating service-learning into courses. Faculty have expressed that class time spent participating and reflecting on service took time away from students learning course objectives (Largent, 2013). Faculty also saw students who were already active volunteers in the community did not have time for additional service hours (Largent, 2013). Stravianopolous (2008) negatively expressed the time required developing the service-learning experience. Working with community organizations to create effective partnerships requires time away from the campus for faculty; students who participated in service also needed additional support.

Service-learning and Retention. As retention has become a primary method of evaluating a student's path to degree completion, research has explored the connection between a student's participation in service-learning, student success and persistence towards degree completion (Berson & Younkin, 1998; Bringle, Hatcher & Muthiah, 2010; Gallini & Moely, 2003; Yeh, 2010). Mundy and Eyler (2002) stated that theories of retention and service-learning work well together because of the emphasis placed on active learning and engagement with faculty, students, community partners and course material. Faculty and students are actively involved in learning through service-learning (Eyler & Giles, 1999). Service-learning does not exist independently to impact student retention; however, students increased interactions with each other and faculty does seem

to have an impact on retention. Findings indicate student success in terms of grades, re-enrollment in college, and student engagement.

Grades. Berson and Younkin (1998) used a series of measures to evaluate student success as a result of service-learning at a two-year college by reviewing student grades and college records and survey data for both students and faculty in the course. Using an experimental design the non-service-learning students served as a control group and service-learning students were experimental (n=286). Average grades for service-learning students were higher and students reported higher satisfaction in the course. Seven faculty surveyed felt that their students seemed more challenged in service-learning courses and were more motivated to learn (Berson & Younkin, 1998).

Re-enrollment. Re-enrollment at the institution in future semesters is an indicator of success and retention; in particular between the first and the second year. Bringle, Hatcher, and Muthiah (2010) surveyed 534 first-year students enrolled in service-learning courses and 271 first-year students in non-service-learning courses at 11 four-year institutions. A pre- and post-test Student survey was administered and institutional data were requested on all student re-enrollment the following fall semester. In the following fall semester, 84.9% of students had re-enrolled at the institution. The relationship between service-learning and re-enrollment was not significant; however, post-test responses were more applicable to predicting student re-enrollment in the next fall regardless of their participation in service-learning (Bringle, Hatcher, & Muthiah, 2010).

Summary

Research on retention and research on service-learning is vast. Retention research is grounded in the work of Tinto (1993) and until recently, retention research focused on four-year institutions. Student retention is based on individual student characteristics (Chaves, 2006; Nakajima et al., 2012), financial aid (Fike & Fike, 2008), and faculty relationships (Jacoby, 2006; Lau, 2003; Umbach & Wawrzynski, 2005). Service-learning impacts students in several ways: grades, course attendance, and overall academic engagement (Berson & Younkin, 1998; Hodge, Lewis, Kremer & Hughes, 2001; Hollis, 2000; Gallini & Moely, 2003). Learning outcomes vary, but common themes of communication skills, critical thinking, diversity, interpersonal skills and personal skills are evident (Eyler & Giles, 1999). Few studies, however, have demonstrated the relationship between service-learning and retention, especially in the two-year college environment (Berson & Younkin, 1998; Bringle, Hatcher, & Muthiah, 2010; Gallini & Moely, 2003; Mundy & Eyler, 2002; Yeh, 2010).

Conclusion

Exploring the relationship of retention and service-learning in the two-year environment is difficult because of the limited research done on the interaction of the two. Independently, retention research and service-learning research are expansive with both exploring different interactions but rarely in the two-year environment. Due to service-learning creating an active learning environment supported by faculty, service-learning may have an impact on student retention. Service-learning also impacts student learning outcomes and goals. Exploring the relationship between the two is necessary to support students in the two-year community college towards meeting their academic

goals; whether it is to earn an associate's degree or transfer to earn a bachelor's degree.

More research needs to be conducted to explore the relationship between student success and retention and participation in service-learning among two-year community college students. Research should evaluate these two together.

Chapter 3: Research Design

Introduction

The purpose of this research is to descriptively explore service-learning as a teaching pedagogy at one urban Midwest two-year public community college and its impact on student success and retention. The primary questions that this research will address are:

- 1) Is there is a relationship between student success and retention after participating in service-learning within the two-year community college?
- 2) Is there a relationship between service-learning and student learning outcomes?

This chapter will begin with an overview of how participants were selected for this study, an overview of the data collected, and how that data were analyzed.

Sample

Students who participated in service-learning courses at an urban Midwest community college during 2010-2011 served as the population for this study. This study analyzed two distinct data sets: student success and retention, and student survey data. The institution involved in the study is organized into three academic divisions: a School of Arts and Sciences, a School of Student Affairs, and a School of Workforce Development. The School of Arts and Sciences offered service-learning in courses including General Psychology, Human Anatomy and Physiology, and Interpersonal Communication. The School of Student Affairs houses the Introduction to College Learner Studies, a first year experience course. Finally, the School of Workforce Development included service-learning in courses such as Community and Transcultural Nursing, in culinary courses such as Advanced Table Service, or business courses such as

Fashion Merchandising. All courses which included a service-learning component during 2010-2011 were included.

Retention. Student retention data for this study was provided by Institutional Research and Planning and the Department of Service-Learning and includes a sample of 788 students. It is possible that dual enrolled high school students or early college students were involved in the course and earned a service-learning designation; students under 18 at the time of service were excluded from the retention data provided by Institutional Research and Planning.

Student Survey. The Department of Service-Learning also created a survey for students to complete after participating in academic service-learning experiences during fall 2010 and winter 2011. The department sent the survey to faculty and requested that they encourage their students to participate (n=280). Administered electronically using the web-based SurveyMonkey tool, student participation in the survey was anonymous and voluntary. While not every student who participated in the service-learning course completed the survey, using this additional data helped evaluate how a community college student might perceive their service-learning experience and its potential impact on their persistence and retention. The survey is included as appendix A.

Instrumentation

Retention. Service-learning participant data from Institutional Research and Planning (IRP) included demographic data: gender, age on January 1, 2010, number of credits in the 2010-2011 academic year, total number of credits earned at the college, current enrollment status, if applicable, and if they earned an Associate degree or transferred to a four-year institution; including the specific institution. The information

provided to the researchers was de-identified of personal information of the students. Data was coded and uploaded to SPSS to run descriptive statistics for this student population.

Student Survey. The questions for the survey were categorized into 16 topics including: understanding of community resources, future community involvement, commitment to volunteer service, understanding of the concepts of academic service-learning, influence on career plans, future on-campus and community involvement including participating in the honors program, service events and student organizations. Topics had additional questions for students to answer on how service-learning impacted their course experiences and learning outcomes. Additional questions focus on the development of skills: communication, computation, critical thinking, diversity, information management, interpersonal, personal and technology. A series of questions focused on specific skills such as communication, sensitivity to diversity, self-awareness, development of autonomy and independence and ownership of actions. While only a selection of questions will be addressed, a total of 57 individual questions were asked to service-learning students. Questions were organized by the researcher relating to institutionally defined learning outcomes: communication, critical thinking, diversity, interpersonal, and personal skills. No data on validity and reliability of the survey instrument has been reported but the survey follows a standard Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree) for 12 topics, yes and no questions for three questions, and one open ended response regarding the learning of course concepts. Data obtained will be analyzed using descriptive statistics and cross tabulation.

Data Collection

Prior to data collection and evaluation, permission was granted by Grand Valley State University Institutional Review Board (see Appendix B) and Grand Rapids Community College Institutional Review Board (see Appendix C). Approval to use the survey instrument was granted by the Director of Service-Learning (see Appendix D). Data were collected during at the end of the semester fall 2010 and winter 2012 and then provided to the researcher January 2014. Data were then entered into SPSS and descriptively analyzed by the researcher.

Students who participated in service-learning were identified by Institutional Research and Planning. The optional student survey was administered electronically using the web-based Survey Monkey tool. Student participation in the survey was anonymous and voluntary, no personally identifiable information was collected.

Analysis

Data were analyzed using descriptive statistics and SPSS; student success and retention data; earning a community college credential, transferring and current enrollment status were compared to general institutional student success data from 2011-2012. Survey data is categorized into themes based on learning outcomes; communication, diversity, critical thinking, interpersonal, and personal skills. A total of 27 questions from the survey were analyzed in addition to student perception of five learning outcomes. Data obtained from the institution regarding student retention were uploaded into SPSS.

Summary

Two sets of data were analyzed using descriptive statistics for this study of academic service-learning participants at an urban Midwest two-year community college, comparison retention data and student survey data. Service-learning participant data was provided by Institutional Research and Planning and includes student demographic information. Service-learning participants were also asked to complete a survey following their participation in a service-learning experience. Both data sets will be analyzed separately and presented in Chapter four.

Chapter 4: Results

Introduction

This chapter presents the findings of the study. The chapter will begin with a description of the participants in the study. Findings will be presented in two sections; service-learning participation and its potential impact on retention followed by student survey data from students who engaged in service-learning at the institution. A brief summary will conclude this chapter.

Context

This study examined two existing data sets. Service-learning participation was analyzed using institutional data on all students who received service-learning transcript designation in fall 2010 and winter 2011 semesters at one two-year public institution in the Midwest. During those two semesters, Institutional Research and Planning at this institution identified 788 students who were service-learning participants. This retention data will be compared with retention data from fall 2010 enrolled students (n=17, 920); students who participated in service-learning represent just over 4.37% of all students enrolled at the institution at the time of their participation. Of the 788 students who participated in service-learning, 280 (35.5%) completed an optional survey, the data from which is also presented in this chapter. The researcher was not able to correlate these two sets of data.

Findings

Demographic Data on Service-Learning Participants. Table 1 compares demographic data between the two sets of participants: service-learning participants and a comparison group of students based on institutional data reported in fall 2010 (Institutional Research and Planning, 2010). 504 (64.0%) students were identified as

female and 284 (36.0%) were identified as male. Female service-learning participants were overrepresented.

Age demographics were identified based on the individual's age on January 1, 2011; 508 (64.3%), students were between traditional college age, 17-24, and 281 (35.7%) students were adult learners, age 25 and older. Interestingly, age demographics mirrored the age demographics for the institution.

Credits earned are based on successful completion of courses. Students, who earned 0 credits, did not successfully complete any enrolled courses in 2010-2011. While they did not successfully complete their semester, they are included because of how student success is being analyzed. While some likely no longer attend higher education institutions, others have transferred. Students who did not successfully earn credits were not reported by the institution. Earning between 1 and 23 credits, 472 (59.9%) service-learning participants were considered to be enrolled part-time students for this study. Full-time students, those who earned more than 24 credits represent 38.7% (n=305) of service-learning participants. At the institution, 57% of students enroll as part-time students and 43% of students were enrolled full-time.

The institution studied has several partnerships with other area four-year institutions. Some students will earn an associate's degree, but still enroll concurrently at the two-year institution and the four-year institution. While the majority of students who participated in service-learning are no longer enrolled at this college, 710 (90.1%), and 78 (9.9%) were still enrolled winter 2014.

Table 1

Service-Learning Participant Demographics and Institutional Demographics, Percentages

Variable	Service-Learning Participants (N=788)	Institutional Data; Fall 2010 (N=17,920)*
<i>Gender</i>		
Female	64.0	52.1
Male	36.0	47.9
<i>Age (on January 1, 2011)</i>		
17-24	64.3	64.3
25+	35.7	35.7
<i>Credits Earned 2010-2011</i>		
0	1.4	
1-23	59.9	57.0
24+	38.7	43.0
<i>Enrolled Winter 2014</i>		
No	90.1	n/a
Yes	9.9	n/a

*(Institutional Research and Planning, 2010)

Student Success. Table two displays Student Success Indicators for both Service-Learning Students and Institutional Data for unduplicated students served. Student success includes many outcomes related to student goals. Earning a community college credential is defined as graduating with an associate degree or one-year certificate. Earning a community college credential and transferring includes students completing an associate degree or one-year certificate and who are currently enrolled at another institution. Student success also includes still being enrolled in higher education which may include transferring to a different institution or remaining enrolled at the institution.

Student success is calculated by the sum of earning a community college credential, earning a community college credential and transferring, transferring and current enrollment. Service-learning participant success rate data is presented as calculated by the institution for academic year 2011-2012. Service-learning students have a higher success rate than the institutional data. While only 4% of students at the institution earned a community college credential, 23% of service-learning participants earned a credential. Participants also earned a credential and transferred at a higher rate, 19%, only 4% of the students in the comparison group. Students who transfer without earning a credential represent 27% of service-learning students compared to a rate of 17% at the institution. The majority of students represented by institutional data, 38%, are still enrolled compared to 7% of the service-learning students. When the success indicators are combined, 76% of service-learning students were successful compared to 61% of students at the institution. Service-learning students earn credentials and/or transfer at higher percentages than their peers. Participating in a learning opportunity such as service-learning may influence student success.

Table 2
Student Success Indicators; Service-Learning Students and Institutional Data

	N	Credential	Credential and Transfer	Transfer	No Transfer/ No Credential	Still Enrolled	Success
Service-Learning	788	23%	19%	27%	24%	7%	76%
Institution	25,159	4%	2%	17%	n/a	38%	61%

Table 3 exhibits the range of college credentials earned and transfer rates for service-learning students who met success indicators and those who did not. Community college credentials include earning an associate degree or completing a one-year certificate. An associate degree is often a gateway for earning a bachelor's degree. For students who earned an associate degree, 18.9% transferred. Some associate degree earners, 20.7% did not transfer. A one-year certificate is considered a terminal credential because most often they provide students a form of vocational training. While only a small number of successful students earned this credential, 2.6%; 0.3% continued in education while 2.3% did not. Many students, 27.3%, choose not to earn a credential but have transferred. Likely, they chose to begin their college education in the community college; some will earn a credential while others will attend for a period of time before enrolling at another institution.

Table 3
College Credential and Transfer Percentage, Service-learning Participants

Variable	Transfer	No Transfer
Associate Degree	18.9%	20.7%
One-year Certificate	0.3%	2.3%
No Credential	27.3%	30.6%

A cross tabulation of the student demographic data including age, gender and credits earned is compared with the student success indicators of community college credentials, transferring or re-enrollment. Winter 2014 enrollment, as listed in table 1 is not included as a crosstab data since the column titled “still enrolled” will capture these

students and their success based on the specific demographic categories. Students who were over the age of 25 were more successful than traditional age college students, those in the age range of 17-24. Females have a higher percentage of earning a credential, still being enrolled, and overall success compared to males. However, a higher percentage of males completed a credential and transferred or just transferred to a new institution.

Table 4
Service-Learning Student Demographic and Success Percentage

	N	Credential	Credential/ Transfer	Transfer	No Transfer/ No Credential	Still Enrolled	Success
<i>Age</i>							
17-24	507	16.37%	19.32%	31.95%	32.34%	0%	67.66%
25+	281	34.87%	18.86%	18.86%	24.19%	3.2%	75.81%
<i>Gender</i>							
Female	504	25.39%	20.63%	25.19%	27.81%	1.58%	72.9%
Male	284	18.66%	33.09%	30.98%	33.45%	0.35%	66.55%
<i>Credits Earned 2010-2011</i>							
0	11	0%	0%	45.5%	54.5%	0%	45.5%
1-23	472	18.4%	10.6%	32.8%	39.8%	1.4%	60.2%
24+	305	30.9%	33.1%	23%	12.4%	0.6%	87.6%

While student success here is defined as earning a degree or transferring, institutions where students are currently enrolled are also reported. Table 5 displays the type of transfer institution for service-learning students. While some students earned a

community college credential; other students left the institution as a transfer regardless of having earned a degree. Schools where students transferred are represented by two-year schools, four-year schools, public, private institutions and proprietary institutions. Lateral transfers are students who transferred from one two-year college and are currently enrolled at another two-year institution; upward transfer are students who left the two-year college for a four-year institution (Hirschy, Bremer, & Castellano, 2011). Of the service-learning students who transferred, 91% of students transferred to a four-year institution.

Table 5
Student Institutional Type Transfer, Service-Learning

Variable	Frequency (%)
Upward Transfer	91.0
Lateral Transfer	9.0

Student Survey. Students participated in an optional online survey at the end of the semester. All 788 students were eligible to participate in the survey, 280 students completed the survey (37.1%). During fall 2010, 146 students completed the survey (52.1%) and 134 students completed the survey (47.8%) during winter 2011. Data from the two surveys is combined for a cumulative analysis.

Learning Outcomes. Table 6 includes a summary of learning outcome mean scores and standard deviations. Students reported learning outcomes in two ways: through individual questions regarding learning and experiences as well as directly by

being asked about the learning outcomes listed. Questions relating to each outcome were grouped by the researcher based on institutional definitions; student responses are then evaluated. Table 6 displays the means and standard deviations when students were asked specifically about the outcome; they are listed in descending order by mean. A five-point Likert scale ranging from 1 (strongly disagree); 3 (neutral); and 5 (strongly agree) was used. Each learning outcome will be addressed through additional tables to display specific questions related to the outcome as identified by the researcher.

Table 6
Summary of Learning Outcomes

Learning Outcome	Mean	(SD)
Interpersonal Skills	4.19	(.789)
Diversity Skills	4.14	(.747)
Personal Skills	4.13	(.762)
Communication Skills	4.01	(.808)
Critical Thinking Skills	3.96	(.896)

Interpersonal Skills. Interpersonal skills were described as teamwork, relationship management, conflict resolution, ability to work with groups and putting personality differences aside, developing identity and understanding various roles in group work, and the ability to build consensus, manage conflict and communicate respect for other team members. Questions relating to interpersonal skills are presented in Table 7. Interpersonal skills had the highest mean (4.19) when compared to the other learning outcomes; the majority of students report agree or strongly agree that these skills were used and learned.

The type of service a student performs might impact the interpersonal skills that are learned; if there is little interaction with the community, they might not feel as connected, which may account for lower mean scores for communication connections (3.90) and interactions with the community (3.81). Individual roles when working with others include higher mean scores; personal benefit with campus and community involvement (4.05); and role in service activities as a student and community member (4.04). As a result of service, students recognized that others, students, community members, community organizations, were depending on their service (4.26). For individual questions, means ranged from 4.26 to 3.81; students tended to agree that interpersonal skills are learned knowing that others depend on them and understand their connection to the community.

Table 7
Interpersonal Skills

Survey Question	Mean	(SD)
I recognized that others were depending on me.	4.26	(.760)
I see great personal benefit in campus and community involvement.	4.05	(.868)
I have a better understanding of my role and responsibilities in my service activities, as a student and as a community member.	4.04	(.876)
I feel more connected to the community.	3.90	(.976)
I have had more interaction with the community.	3.81	(.903)

Diversity Skills. Table 8 demonstrates diversity skills learned as a result of participation in service-learning; having the second highest overall mean, 4.14, indicating agree or strongly agree. Diversity skills were described as: multicultural awareness-local and global; knowledge on breadth of diversity; ability to describe and analyze one's own cultural values, beliefs and biases; and awareness of, sensitivity to, tolerance for and respect for those from different cultures and lifestyles. Diversity learning is a transferable skill that students learn from service-learning. Through engagement in service-learning with others, diversity learning is impacted. Student's value cultural competence in the service-learning experience and it appears that students understand how diversity is necessary to work with others, its impact on the campus and community and their understanding of treating others with respect. Students learned diversity skills with a mean of 4.14; a range displayed in Table 8 is 4.02-4.32 with a mean of 4.18.

Table 8
Diversity Skills

Survey Question	Mean	(SD)
I think individual differences strengthen a team.	4.32	(.758)
I treat those different from me with respect and courtesy.	4.32	(.793)
I view diversity as a valuable component of the campus, community and work environment.	4.19	(.815)
I value cultural competence.	4.15	(.807)
I am aware of the impact of diversity on the campus and community.	4.12	(.800)
I have a deeper understanding of diversity.	4.02	(.889)

Personal Skills. Personal skills are listed in table 9. Personal skills are defined as the ability to understand and manage self change, learning personal responsibility and wellness, ethics and values, time and resource management, and responsibility and lifelong learning skills.

Participation in service-learning also appears to impact personal skills with students tending to agree or strongly agree that personal skills were impacted. In service experiences, students have been reliable (4.21), and can better identify personal strengths, limitations and goals (4.12). Students built self-confidence through working on tasks (4.12) and increased self-awareness influenced class and work performance and in their personal life (4.07). Each question listed has a lower mean than the identified personal skills learning outcome (4.13). This may indicate that student's struggle making the connection that learning more about oneself through service-learning is a personal skill. However, each measure shows that students indicated learning self-awareness skills as a result of service-learning.

Table 9
Personal Skills

Survey Question	Mean	(SD)
I have been reliable.	4.21	(.780)
I can better identify personal areas of strength, limitations and goals.	4.12	(.808)
I realize that accomplishing tasks on my own builds my confidence and self-esteem.	4.12	(.884)
I have noticed that increased self-awareness leads to greater understanding or performance in class, work, and/or personal life.	4.11	(.886)
Through my service work I am more self-aware.	4.07	(.867)

Communication Skills. Communication skills are presented in Table 10 and were described as reading, writing, listening, and thinking. Standard deviations show student perception of communication skills varies from neutral towards strongly agree. Different types of particular communication skills included interactions with others, group presentations and overall communication skills. Students tend to agree that their service experience taught communication skills (3.91). Skills were learned with opportunities to interact with organizations staff and program participants (3.99); engaging in a presentations in regard to service work with peers (3.97) was based on the curriculum of the course.

Table 10
Communication Skills

Survey Question	Mean	(SD)
My service activities gave me the opportunity to build communication skills through interaction with staff and program participants.	3.99	(.812)
I was provided opportunities to engage in small or large group presentation during or about my service work.	3.97	(.904)
My communication improved as a result of my service work.	3.91	(.861)

Critical Thinking Skills. Table 11 includes questions related to critical thinking skills which are described as evaluation, analysis, decision-making, creative thinking, problem solving, logic, and acknowledgement of multiple perspectives. Students were able to identify that the community organizations they served with were making positive differences in the community (4.39) and impacted the well-being of others (4.34). Service-learning was cited as a method to support students making connections between service and course concepts and material (3.99). Service-learning appears to support student independence in decision making and ability to confront new situations (4.12). Students also report understanding that their service-learning does have an impact on the community. Critical thinking was evaluated at 3.96; lower than nearly all individual questions which range from 3.95-4.39 as shown. Individual questions regarding critical thinking concepts had some of the highest means, while critical thinking overall was one of the lowest perceived learning outcomes. Similar to other learning outcomes students agree that these outcomes exist but may not be making the connection between how their actions are related to these outcomes.

Table 11
Critical Thinking Skills

Survey Question	Mean	(SD)
The services provided by community organizations make a positive difference.	4.39	(.754)
I understand that my contribution to the community has a major impact on the well-being of others in the community.	4.34	(.764)
I trust that I can go into a situation outside of my comfort zone and succeed.	4.12	(.869)
I can act on specific tasks without the constant guidance and direction from another person.	4.06	(.887)
I am more aware of and believe in my ability to make rational decisions.	4.05	(.891)
I often make connections between my service work and course concepts/material	3.99	(.877)
I am more confident in my decisions and actions.	3.95	(.918)

Summary

This study used two data sets to explore retention and service-learning at one, two-year community college. Using descriptive statistics, the potential relationship between student success, retention, and service-learning was explored for students at a two-year public community college. Retention data was compared with student demographics and transfer rate. Student survey data explored learning outcomes related to the service-learning experience. The primary questions guiding this research were: 1)

Is there is a relationship between student success and retention after participating in service-learning within the two-year community college? 2) Is there a relationship between service-learning and student learning outcomes; and 3) Is student success and retention influenced by classroom and community experiences?

Retention and Student Success. Students appeared to benefit from participating in service-learning; 76% of students met student success indicators compared to a 62% student success rate at this institution. Fewer service-learning students are still enrolled currently at the institution, but they earned community college credentials or transferred at a higher percentage compared to the total student population at this institution.

Service-Learning. Service-learning provides an opportunity for students to learn important skills such as interpersonal, diversity, personal, communication, and critical thinking skills. Students understand their connection to the community though various ways but experiences also support student's individual growth.

Chapter 5: Conclusion

Summary of the Study

This study examined how service-learning impacts retention in the two-year community college environment. Service-learning was limited to curricular opportunities where faculty used the service-learning teaching pedagogy in their course. Student success was measured by earning a community college credential, transferring to a different institution, earning a credential and transferring or still enrolled. The researcher believed that through using service-learning as a teaching pedagogy, faculty can support students to meet one of the indicators of success. Additionally, there are several skills that students learn after participating in service-learning. The researcher evaluated student survey data in regard to learning outcomes and student success data provided by the institution. Community college students are diverse and have different characteristics than peers in the four-year environment. Seeking meaningful ways to engage students in the academic environment better supports student success. The primary questions guiding this research were:

- 1) Is there is a relationship between student success and retention after participating in service-learning within the two-year community college?
- 2) Is there a relationship between service-learning and student learning outcomes?

To answer these questions the researcher reviewed two data sets. Student retention data was requested for students who participated in service-learning during fall 2010 and winter 2011 semesters at an urban Midwest public two-year college; retention data for 788 students was provided. These students were also able to complete an online survey regarding their service-learning experience. Access to this survey was provided by

the Service-Learning Department for analysis by the researcher; 280 students completed the survey after fall 2010 and winter 2011. Data was analyzed using descriptive statistics and Cross Tabulations.

Conclusion

There appears to be a relationship between student success and service-learning participation among community college students. There are many reasons why a student will be successful in college; student characteristics such as age, number of enrolled credits and financial aid status all contribute to this success (Fike & Fike, 2008; Nakajima et al., 2012). Tinto (2006) identified that social and academic integration, in addition to student demographics, are also indicators of success. Classroom experiences may be a factor to support student success in the two-year institution; in particular interactions with faculty. For students who participated in service-learning, 76% met a student success indicator; compared to the 62% of institutional enrollment. Specifically, 42% of service-learning students have earned a credential, compared to the 6% of the total student population who have earned a degree. Service-learning students often transfer from the two-year environment, 46%, compared to the general student body where approximately 19% transfer. When service-learning students transfer, 91% choose institutions that will grant bachelor's degrees upon successful completion rather than leaving for an institution that will offer an associate's degree. Students who have participated in faculty-led high-impact learning practices, such as service-learning, have a higher success rate than the institution rate at this two-year community college.

Student learning outcomes are achieved through service-learning. Students report that as a result of their service-learning experience, they learned skills such as

communication, critical thinking, diversity, interpersonal, and personal skills.

Interpersonal skills are woven throughout the other learning outcomes; students feel more connected with the community and understand how being involved with the community impacts themselves. Diversity learning is supported through service in that students report learning to treat others with respect and understand that diversity is an important part of a college campus, community and within the work environment. Students are more self-aware and report gains in confidence and self-esteem as personal skills learned. Students were encouraged to identify strengths and areas for personal growth. Service activities allowed students to develop communication skills through interactions with each other and with the community. Critical thinking skills help students to connect the course learning concepts with service work. Additionally, students are able to understand how their service impacts the organization but also the greater community. The level of student learning in relation to each outcome varies; in general the learning experiences are positive. Descriptive statistics suggest that students were likely or very likely to have identified these skills being learned as a result of service-learning experiences.

Discussion

The purpose of this study was to explore the relationship between student success, retention, and service-learning participation at a two-year community college. Findings from this study suggest that students who do participate in service-learning have higher percentages of success when compared to the general student population at the institution. The specific reasons why a student might be more successful is unknown. Several student demographic characteristics impact retention in the community college environment (Fike & Fike, 2008; Nakajima et al., 2012), including age, enrollment status,

and financial aid. Faculty can also influence student success through interactions with students in the classroom (Tinto, 1997).

When students feel that faculty care about success, students are more likely to persist (Nakajima et al., 2012). Increasing student success in college through extracurricular activities are common, and this research suggests that student success can be influenced within the course as well. Student learning outcomes identified by Eyler and Giles (1999) were present in this study. Eyler and Giles (1999) often tied the learning of skills to the quality of placement in a service-learning experience for students.

In this study, interpersonal skills had the highest mean score; followed closely by personal skills. Eyler and Giles (1999) saw that student's value interpersonal learning most in regard to service experiences and that connections to the community are important. Personal skills are an individual learning outcome where students become more self-aware and are able to identify goals, strengths, and reliability. Communication skills were also learned by students, higher student means were reported through learning communication by interacting with staff and other program participants, rather than working only with other students; this supports the previous research on placement quality to learn communication. Collaborative and cooperative teaching by faculty helps students learn critical thinking skills (Lau, 2003). Engaging practices such as service-learning create opportunities for students to communicate more with faculty and each other (Hodge et al., 2001; Mundy & Eyler, 2002). Students were able to make connections between their service work and the course material through critical thinking.

Recommendations

This research identified that there appears to be a relationship between student success and service-learning. Using a teaching pedagogy such as service-learning allows for increased interaction with faculty thus supporting student success. It cannot be assumed that service-learning was the only factor that impacted the success of these two-year community college students; personal goals, campus integration and friendships all influence retention. Nor can it be assumed that service-learning is the only way to impact learning outcomes as addressed.

A relationship appears to exist between two variables that show students who participate in service-learning earn community college credential and, or, transfer at a higher percentage than the general student population at this institution. Student success was broadly defined in this study, and it did not include student success within the course using service-learning. Although student grades are a predictor of success (Gallini & Moely, 2003), they were not included. In order for more connections to be made between service-learning and student success, future research should explore student success in terms of the course and its relationship to overall success. Campus climate studies should explore why students chose to re-enroll in the institution and what experiences encouraged re-enrollment.

Future research should look at the relationship between student success and learning outcomes related to service-learning. Faculty should be encouraged to help students better understand how service-learning impacts the learning outcomes. Professional development opportunities can explore how to best structure reflection opportunities to promote self-awareness and understanding. Additionally, future surveys

should show students the explicit connection between their experiences and the learning outcomes. This may help students better understand these relationships.

Faculty should better understand how classroom experiences influence student success. In many classes, student learning is measured by a student's ability to replicate what they are told (Eyler & Giles, 1999). Service-learning provided opportunities for student learning of skills outside of the classroom with individuals different from themselves. Institutions should identify faculty awareness of institutional indicators for student success and how faculty view their role as promoters of retention. Classroom experiences are necessary to support these outcomes for students, especially in the non-residential setting, such as this two-year community college (Tinto, 2006). Encouraging faculty to engage students in high-impact experiences will help students create powerful connections with their peers, with their faculty, and with the institution leading to greater levels of success.

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Appendix A

1. My Academic Service-Learning class impacted my awareness of and appreciation for community resources in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. The services provided by community organization make a positive difference
 - b. I have referred at least one person in need to a community organization
 - c. I have become more aware of community resources available
 - d. I feel more connected to my community
2. As a result of my Academic Service-Learning class I have become more involved in the community in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. I have had more interaction with the community
 - b. I have become more aware of the need for meaningful involvement in the community
 - c. I know how to find opportunities to get involved in the community.
3. My Academic Service-Learning class has impacted my commitment to volunteer service in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. I strived for constant improvement in my work performance
 - b. I produced quality work
 - c. I appreciated the opportunity to engage in academic service learning.
 - d. I plan to volunteer through the Academic Service Learning Center
 - e. I would recommend an academic service learning course to another students
4. As a result of my Academic Service-Learning class, I have a better understanding of core Academic Service-Learning principles in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. I value cultural competence
 - b. I think individual differences strengthen a team
 - c. I understand the difference across direct, indirect and advocacy service
 - d. I understand that service must meet a community need
 - e. I often make connection between my service work and course concepts/material
5. My Academic Service-Learning class has influences by career plans in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. My experience has confirmed my original career plans
 - b. I can use the knowledge I have gained from my service in my future career(s)
 - c. I am now aware of more career opportunities
 - d. I have changed my career plans as a result of my service

6. As a result of my Academic Service-Learning class, my on-campus and community involvement has changed in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. I see great personal benefit in campus and community involvement
 - b. I can apply the knowledge I've gained from my service to other activities and organization in which I participate in
 - c. I am now more aware of ways to become involved on-campus and in the community
7. I have joined the honors program
(yes/no/already a member)
8. I have attended other service-related event
(yes/no/if yes, which service-related events?)
9. I have joined a student organization
(yes/no/if yes, which student organization(s)?)
10. My service-learning experience helped me to understand the following course concepts:
(List up to 5)
11. My service-learning experience has helped me to develop the following skills:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
 - a. Communication Skills (e.g., reading, writing, listening and speaking)
 - b. Computation Skills (e.g., understanding and applying mathematical concepts, reasoning, analyzing and using numerical data, proportional reasoning)
 - c. Critical Thinking Skills (e.g., evaluation, analysis, decision-making, creative thinking, problem solving, logic, acknowledgement of multiple-perspectives)
 - d. Diversity Skills (e.g., multicultural awareness-local and global, knowledge on breadth of diversity, ability to describe and analyze one's own cultural values, beliefs and biases; awareness of, sensitivity to, tolerance for, and respect for, those from different cultures and lifestyles)
 - e. Information Management Skills (e.g., Collecting, analyzing and organizing information; ability to search, retrieve or obtain information from a variety of sources; ability to search, retrieve or obtain information from a variety of sources; ability to evaluate information as relevant; ability to paraphrase, synthesize and organize information within ethical and legal means)
 - f. Interpersonal Skills (e.g., teamwork, relationship management, conflict resolution, ability to work with groups and putting personality differences aside; identify and understand various roles in group work; ability to build consensus, manage conflict and communicate respect for other team members)

- g. Personal Skills (e.g., ability to understand and manage self, changes, learning, personal responsibility and wellness; ethics and values, time and resource management; responsibility; lifelong learning skills)
 - h. Technology Skills (e.g., retrieving and managing information via computer and the Internet, electronic communication skills-email work processing; basic computer skills and internet skills)
12. My Academic Service-Learning course helped me develop effective communication skills in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
- a. My service activities gave me the opportunity to build communication skills through interaction with staff and program participants
 - b. I was encouraged to identify strengths and areas to improve on in relation to my ability to communicate with others
 - c. I was provided with opportunities to engage in small or large group presentations during or about my service work
 - d. My communication improve as a result of the service work
13. As a result of my Academic Service-Learning course, I have an increased sensitivity to diversity in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
- a. I view diversity as a valuable component of the campus, community and the work environment
 - b. I have a deeper understanding of diversity
 - c. I am aware of the impact of diversity on the campus and the community
 - d. I treat those different from me with respect and courtesy
14. As a result of my Academic Service-Learning class I have become more self-aware in the following areas:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
- a. I can better identify personal areas of strength, limitations and goals
 - b. I have a better understanding of my role and responsibilities in my service activities, as a student and as a community member
 - c. Through my service work, I am more self-aware
 - d. I have noticed that increase self-awareness leads to greater understanding or performance in classes, work, and/or personal life
15. My service-learning class has helped me develop autonomy and independence in the following ways:
(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)
- a. I am more confident in my decision and actions
 - b. I realize that accomplishing tasks on my own builds my confidence and self-esteem
 - c. I am more aware of and believe in my ability to make rational decisions
 - d. I can act on specific tasks without the constant guidance and direction from another person

- e. I trust that I can go into a situation outside of my comfort zone and succeed

16. As a result of my Academic Service-Learning class, I have a stronger sense of ownership over my actions and lack of actions in the following ways:

(Strongly Disagree/Disagree/Neutral/Agree/Strongly Agree)

- a. I have been reliable
- b. I have completed my work as intended
- c. I recognized that others are depending on me
- d. I understand that my contribution to the community has a major impact on the well-being of others in the community

Appendix B



DATE: January 29, 2014

TO: Leah Kicinski
FROM: Grand Valley State University Human Research Review Committee
STUDY TITLE: [543623-2] Understanding the Relationship of Retention and Persistence among Two-Year Service-Learning Participants
REFERENCE #: 14-106-H
SUBMISSION TYPE: Revision

ACTION: EXEMPT
EFFECTIVE DATE: January 29, 2014
REVIEW TYPE: Exempt Review

Thank you for your submission of materials for your planned research study. It has been determined that this project: *IS COVERED* human subjects research* according to current federal regulations and MEETS eligibility for exempt determination under category 45 CFR 46.101 (b)(1).

Exempt protocols do not require formal approval, renewal or closure by the HRRC. Any revision to exempt research that alters the risk/benefit ratio or affects eligibility for exempt review must be submitted to the HRRC using the *Change in Approved Protocol* form before changes are implemented.

Any research-related problem or event resulting in a fatality or hospitalization requires immediate notification to the Human Research Review Committee Chair, Dr. Paul J. Reitemeier, 616-331-3417 **AND** Human Research Protections Administrator, Mr. Jon Jellema, in the Office of the Provost, 616-331-2400. See *HRRC policy 1020, Unanticipated problems and adverse events*.

Exempt research studies are eligible for audits.

If you have any questions, please contact the Research Protections Program, Monday through Thursday, at (616) 331-3197 or rpp@gvsu.edu. The office observes all university holidays, and does not process applications during exam week or between academic terms. Please include your study title and reference number in all correspondence with our office.

*Research is a systematic investigation, including research development, testing and evaluation, designed to develop or contribute to generalizable knowledge (45 CFR 46.102 (d)).

Appendix C



December 13, 2013

Leah R. Kicinski
235 Park Ave SE #3
Grand Rapids, MI 49503

Dear Ms. Kicinski:

TITLE OF PROPOSAL: Service learning at 2-year public institutions

This letter is to officially notify you of the approval of your request by the Institutional Review Board (IRB) at Grand Rapids Community College. It is the Board's opinion that you have provided adequate safeguards for the rights and welfare of the participants in this study. Your proposal has been classified as "Exempt."

You are responsible for immediately informing the Institutional Review Board of any changes to your protocol, or of any previously unforeseen risks to the research participants.

This approval is good from December 13, 2013 to December 13, 2014. If you wish to continue your research after this date, you must complete and submit an updated protocol.

Please let me know if you have any questions.

Sincerely,

A handwritten signature in black ink that reads "Donna Kragt". The signature is fluid and cursive, with the first name "Donna" and last name "Kragt" clearly visible.

Donna Kragt
Dean of Institutional Research & Planning
Chair of the IRB



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MISSION • As a public institution, GRCC serves the entire community and the world.

VISION • GRCC will make a difference in the lives of all who are part of the college and community.

Appendix D



January 13, 2014

To Whom It May Concern:

Leah Kicinski has requested my permission to use the Fall 2010 and Winter 2011 Academic Service Learning Student Survey Data that the Academic Service Learning Center developed as part of her research and to report on the student's responses in her EDG 695 paper.

I understand that this research has been reviewed by the Institutional Review Board (IRB) at Grand Rapids Community College. I provide her access to this data as outlined by the requirements of the IRB.

Sincerely,

A handwritten signature in blue ink, appearing to read "mf", is written over a light blue horizontal line.

Michael Schavey
Associate Director
Department of Experiential Learning
Grand Rapids Community College
mschavey@grcc.edu
616.234.4180



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mission • It is the mission of Grand Rapids Community College to provide the community with learning opportunities that enable people to achieve their goals.
vision • Grand Rapids Community College is a premier institution of higher learning, committed to excellence in teaching and contributing to the vitality of the community.

Appendix E



November 18, 2013

Dear Leah R. Kicinski,

This letter is to notify you that the Office of Graduate Studies has granted approval of your Thesis Committee Membership. This committee will oversee your masters thesis, "Service Learning at 2-year Public Institutions," in partial fulfillment of your Master of Education in Higher Education – College Student Affairs Leadership degree program in the College of Education. You will find the university policies and procedures for completion of your thesis on our web site, www.gvsu.edu/gs, under the "Current Students" tab by clicking on "Thesis and Dissertation Information." All of the required forms can be downloaded from our web site.

When your thesis defense is complete and all final revisions have been approved by your committee members and chair, please gather the signatures of all members of your thesis committee and academic college dean on the Thesis Approval Form and submit the form with an electronic copy of your thesis to the Office of Graduate Studies for final review and signature by the Dean of Graduate Studies. Please adhere to all deadlines to ensure that your Master of Education degree is awarded in the semester in which you intend to graduate.

If you have any further questions or concerns regarding dissertation policies and/or procedures, please contact our office at gradstudies@gvsu.edu or 616-331-7105. We wish you the best in your work and look forward to reviewing your completed dissertation when submitted for approval.

Sincerely,

A handwritten signature in black ink, appearing to read 'Jeffrey A. Potteiger'.

Jeffrey A. Potteiger, PhD, FACSM
Dean of Graduate Studies

cc: Jay Cooper, Thesis Committee Chair (and Graduate Program Coordinator)
Elaine Collins, Dean, College of Education