ACCEPTANCE

This dissertation, THE IMPORTANCE OF FINANCIAL LITERACY PROGRAMS AT A SMALL NONPROFIT UNIVERSITY FOR NEW AND UNDERREPRESENTED COLLEGE STUDENTS, was prepared under the direction of the candidate's Dissertation Committee. It is accepted by the committee members in partial fulfillment of the requirements for the degree of Doctor of Education in the School of Education, Concordia University Irvine.

Blanca Quiroz, PhD
Committee Chair

Barbara Howard, EdD
Committee Member

Gilbert Fugitt, EdD
Committee Member

The Dissertation Committee, the Dean, and Executive Director of the Doctor of Education Program of the School of Education, as representatives of the faculty, certify that this dissertation has met all standards of excellence and scholarship as determined by the faculty.

Kent Schlichtemeier, EdD
Dean

Dwight Doering, PhD
Executive Director

COPYRIGHT PERMISSION
AGREEMENT

Concordia University
Library 1530 Concordia
West
Irvine, CA 92612
www.cui.edu/library
librarian@cui.edu

I, Edgar López warrant that I have the authority to act on any copyright related matters for the work, THE IMPORTANCE OF FINANCIAL LITERACY PROGRAMS AT A SMALL NONPROFIT UNIVERSITY FOR NEW AND UNDERREPRESENTED COLLEGE STUDENTS, dated May 17, 2021, to be included in the Concordia University Library repository, and as such have the right to grant permission to digitize, republish and use the said work in all media now known or hereafter devised.

I grant to the Concordia University Library the nonexclusive worldwide rights to digitize, publish, exhibit, preserve, and use the work in any way that furthers the educational, research and public service purposes of the Concordia University.

This Agreement shall be governed by and interpreted in accordance with the laws of the State of California. This Agreement expresses the complete understanding of the parties with respect to the subject matter and supersedes all prior representations and understandings.

ACCESS RESTRICTIONS
My electronic thesis or dissertation can be made accessible via the Concordia University Library repository with the following status (select one):

☑ Option 1: Provide open access to my electronic thesis or dissertation on the internet

☐ Option 2: Place an embargo on access to my electronic thesis or dissertation for a given period from date of submission (select one):

☐ 6 months ☐ 1 year ☐ 3 years

Permission Granted By:

Edgar López
Candidate's Name *(as appears in academic records)*

Signature of Candidate

VITA

Edgar López

ADDRESS	1530 Concordia West Irvine, CA 92612 Edgar.lopez@eagles.cui.edu

EDUCATION

EdD	2021	Concordia University Irvine Educational Leadership
MA	2009	Concordia University, Irvine Business Administration
BA	2007	Concordia University, Irvine Administration and Leadership

PROFESSIONAL EXPERIENCE

17 Years	Bursar Concordia University, Irvine Bursar's Office

THE IMPORTANCE OF FINANCIAL LITERACY PROGRAMS AT A SMALL NONPROFIT UNIVERSITY FOR NEW AND UNDERREPRESENTED COLLEGE STUDENTS

by

Edgar López

A Dissertation

Presented in Partial Fulfillment of
Requirements for the
Degree of
Doctor of Education
in
Educational Leadership
May 15, 2021

School of Education
Concordia University Irvine

ABSTRACT

College administrators and the federal government have perceived the need for financial literacy education programs. Financial literacy is a complicated subject. University administrators understand the need to incorporate financial literacy programs in their college curriculum. A college degree opens up employment opportunities, but college graduates are entering the workforce with a tremendous amount of college debt. The average college student loan debt for the class of 2018 was $38,000.00 (Friedman, 2020). Starting a career with this amount of debt could impact home-buying potential and other investment opportunities for college graduates. It is very essential to equip college students with an understanding of financial literacy to help them prepare to make better financial decisions.

This study examined the financial literacy levels of first-time first-year College students and first-generation students at a small not-for-profit University. This study also examined the impacts of their financial efficacy and financial behavior planning of the participants. Mandell's (2008) Jump$tart college student survey was used to measure the participants' financial literacy levels. The financial literacy score of the 328 participants of this study was about 48 percent. This score is below the average level of financial literacy defined by Mandell (2008), 50 through 70 percent. Lown's (2011). Self-Efficacy Scale was used to measure the personal efficacy of the participants. The students' average self-efficacy score was 16 out of 24 possible points, below Lown's mean score of 17 points. Additional analysis of participants FLL and self-efficacy identified significant differences between the groups by race/ethnicity, income level, and first-generation status. Hispanic scored lower than White students in both measures. Students from low-income families scored lower than students from middle- or high-income families in both measures. Finally- first-generation students scored lower also in both measures than non-first-

generation students. These findings support previous results and reiterate the need for FL education, especially for disadvantaged students.

TABLE OF CONTENTS

LIST OF TABLES

LIST OF FIGURES

ACKNOWLEDGEMENTS

Throughout the research and writing of this dissertation, I received a great deal of support. I am forever grateful to my committee members, past and present. Dr. Peter Senkbeil, Ph.D. & Dr. Stephanie Hartzell, Ph.D., two former mentors, thank you for your provided insight and guidance. Dr. Barbara Howard, Ed.D. and Dr. Gilbert Fugitt, Ed.D., thank you for your willingness to serve on my committee, direction, encouragement, insightful comments, and advice to ensure quality work on my part. Dr. Blanca Quiroz, Ph.D., my committee chair, thank you for the continuous support, for her patience, motivation, enthusiasm, and immense knowledge. Her guidance helped me through the writing of this dissertation. Dr. Dwight R. Doering, Ph.D., executive program director, thank you for your patience and motivation throughout this journey "the best dissertation is a finished dissertation." Thank you all for your engagement and confidence in my ability to complete this project.

A special thanks to Mrs. Lori MacDonald, financial aid director, and colleague, for your research collaboration. Professor Dr. Rod Soper deserves a special mention. Thank you Dr. Soper for your guidance in my statistical analysis class. Professor like you change a student's life. To Robert Marquez and Kristy Fowler for cooperating with my research and allow me access to the summer bridge and freshman seminar programs. To Deborah Lee, for assistance in data collection. I would also like to thank all the students who participated in the study for collaborating with the survey and workshop participation.

Also, I would like to thank my family. Madre, te dedico esta disertación. Gracias por seguir conmigo, por el profundo compromiso, el empuje en todos mis estudios. Sé que papá estubiera muy orgulloso. Gracias por todos los sacrificios que has hecho por tus hijos. Por todo tu amor y paciencia. Te amo. To my little brother, Ozzie, thank you for your kind soul and bringing me food when studying late.

Finally, I could not have completed this dissertation without the support of my friends. Anabel Perez, Roberto Marquez, Ruben Amador and Rick Beaubouef, who provided stimulating discussion as well as happy distractions to rest my mind outside of my research.

To God Be the Glory.

CHAPTER 1

The need to integrate financial education into Small Nonprofit University (SNU) is a subject that cannot be ignored. Students choose to attend small institutions of higher learning for many reasons, such as, class sizes and opportunities for one-on-one contact with professors. In many cases, college students at these institutions increasingly assume loan debt and make financial decisions with limited knowledge of basic financial concepts. Students typically need money to close their tuition and fees gap and often rely on private lending as a loan-of-last resort. There are too many lender choices offering these loan funding to students who need them, however, students are not prepared to understand the implications of the many financial choices that differentiate loans and lending institutions. These lenders often offer various loan options relying on good credit. Students that do not meet the credit standard end up paying a higher interest rate, in some cases in the double digits, without knowing. Students need to understand basic financial concepts, like, loan variable versus fixed rates, repayment options (i.e., income-driven, public service careers, hardships), and loan consolidation options. The financial aid funds disclosed only cover tuition and fees, living on campus and other indirect cost (i.e., books and supplies, transportation, insurance, and other personal expenses) add substantially to the amount of debt students absorb and indirect costs are often not explicitly considered as college expenses. If SNU's are not training their students in making informed financial decisions, these colleges are simply contributing to the escalating $1.5 trillion student loan debt problem we are facing in the U.S. currently. These universities have a better opportunity to stimulate a student's financial development than public universities since they serve a significantly smaller number of students. These institutions have less bureaucracy than public colleges and are better able to implement programs that will help battle student loan debt. Unlike the public colleges and universities, which have “cumbersome” and governmental controls over their operations making it more difficult to implement new programs (Bok, 2013).

Student loan debt increases by the millions every year. This problem is simply worsening every year; lawmakers have started addressing the issue at the policy level. For example, when President Obama was in office, he enacted a presidential memorandum to help millions of Americans that are struggling with their student debt (The White House Office of the Press Secretary, 2015). This new policy helps Americans with their current debt but does not educate high school or current university students on how to manage their loans obligation. The student loan debt problem is a current campaign issue that is used to gain votes, but it should be more than a political platform. Policymakers have discussed methods to deal with the 1.3 trillion-dollar problem by offering additional “repayment options and student debt forgiveness” (Andruska et al., 2014, p. 125). However, most of these bills are not passed and we have yet to find a solution to stabilize or control student debt from mounting.

The U.S. Department of Education enacted the Higher Education Opportunity Act of 2008. Within the Act of 2008, the TRIO programs offer support services to disadvantaged students to help them graduate from college (Dorth, 2018). These federally funded programs mandate the integration of financial literacy programs at public colleges, but not for SNUs. Small Not-for-Profit Universities may apply for federal grants to offer TRIO programs at their institution, but they are not mandated One of the TRIO program objectives mandates post-secondary institutions to provide financial literacy programming to improve the financial literacy and economic literacy of students in areas such as:

(1) Basic personal income, household money management, and financial planning skills.

(2) Basic economic decision-making skills, the first college supported programs require

to do so. (Higher Education Opportunity Act, 2008, section 402D).

The scope of the problem is of national concern. College loan debt is a severe problem. It has surpassed auto and credit card debt in the United States (de Vise, 2012). Many studies have focused on the total amount of student loan debt students accumulate during college (Eisler & Garrison, 2014). According to American Student Assistance (2012), 12 million college students borrow annually to help cover college costs; this is 60% of the nearly 20 million Americans attending college each year. Furthermore, college loan debt was 1.2 trillion in 2013; this is 6% of the overall national debt and is the second-highest form of consumer debt behind mortgages (Denhart, 2013). According to Stolba (2021), data from Experian, a globally recognized credit-reporting agency, indicate student loans have had the greatest change of any debt during the Covid pandemic. From 2015 to 2019, student loan debt grew at an average of 6% every year. Student loans were the slowest growing consumer debts. Since 2019, the yearly student loan grew to 12%, increasing a record high of $1.57 trillion in 2020. Surprisingly, the total number of new accounts was only .03% (Stolba, 2021). This means that new accounts are not increasing the national student loan debt, but new borrowing on top of current accounts is not being paid off. The evidence that lenders are borrowing beyond their means is clear; over the past decade, the delinquency rate has increased from 11% to 17% on borrowers that are at least 30 days delinquent in at least one of their student loans (Sánchez & Zhu, 2015).

The burden of college loan debt creates a significant economic and social burden in our economy as it limits the buying potential of new college graduates. The number of first-time homebuyers is declining among young adults, which might be an outcome of credit problems related to delinquent debt. I could also be that their sizeable loan obligation precludes them from saving for a home down payment, creating a ripple effect in the housing market (Wiersch, 2014).

Furthermore, experts express concern about the impact of student loan debt on the entrepreneur spirit of recent college graduates. Young adults may be discouraged from starting their own business as their loan debt may prevent them from attaining business start-up loans (Wiersch, 2014). Finally, the rise of college debt is affecting long-lasting social patterns and contributing to other social implications. Students are pursuing careers in high-paying fields to afford student loan repayments. Their career choice steers them away from careers in social work and other humanities and social science careers (Holland, 2015). An individual having a passion for literature may choose a higher-paying profession to be able to afford to pay off college loan debt (Wiersch, 2014). We know that focusing on remediation of the problem is much more difficult and expensive than focusing on prevention. Thus, we propose to take a prevention step during students' college to prepare them to make better financial decisions, instead of trying to remediate the debt problem.

Financial Literacy Programs (FLP) will prepare students to take responsibility for financial decisions when funding their education. FLP will help students succeed in college and beyond. These programs could teach students good budgeting and spending habits (i.e., credit card usage, the importance of maintaining good credit, loan programs, and basic banking needs) to prevent unnecessary or expensive debt. The implementation of FLP at a small nonprofit University is a manageable solution that could help young college students understand their college loan debt and consequences affording them better decisions and possibly a better financial future.

The lack of financial literacy among students is of public concern (Bongini et al., 2012). The cost of failing to act is too high for the students and for our society. Financial literacy programs must be an essential component in the education of all college students, but especially those who are more likely to have low FL and most in need of financial support to pay for their college. Most colleges and university increase their tuition every year. For example, between the 2017-18 and 2018-19 school year published tuition and fees at a public two-year college increased in a range from $100, to $3,660 or 2.8 percent on average; for a nonprofit four-year college and university the increase was $1,130, to $35,830 or 3.3 percent on average (College Board, 2018, p. 3). Surprisingly, in one state, after a judicial audit, it was determined that the state was not adequately controlling tuition increase at their eight public colleges and universities by permitting the increase to reach $132 million over the past five years (Cortez, 2018). Meanwhile, according to College Board, financial aid has minimally increased, from $183.8 billion in 2016-17 to $184.1 billion in 2017-18 (College Board, 2018, p. 9). For example, between 2016-17 and 2017-18 Federal Pell grant increased from $196 to $218 per student (College Board, 2019, p. 4). With tuition and fee prices increasing substantially and a negligible federal and state aid increase, the out-of-pocket cost will continue to raise for students and their families (Bidwell, 2018).

In a report by Sallie Mae, Ipsos, a worldwide market research company, administered a survey to over 1500 participants. Sallie Mae reported that parents contribute 44% towards their child's education, followed by 30% from third parties (i.e., private scholarships, employer contributions, military) and 27% by the student (Sallie Mae & Ipsos, 2018, p. 5). Also, students attending private universities were more likely to discuss college affordability with parents than those attending public colleges (Sallie Mae & Ipsos, 2018, p. 2). According to Friedman (2018), the out-of-pocket cost for parents and students increased 42% in 2017-18 from the previous academic year. As a result, the amount borrowed by families to pay for college increased 53% in 2017-18 from 2016-17 (Sallie Mae & Ipsos, 2018, p. 3).

Some of the most common definitions of FL include knowledge and financial decision making. There are two elements that define FL, and they are interdependent. Financial education has to do with daily financial matters, and second, it relates to making the right choices based on available information (Špiranec et al., 2012). According to Remund (2010), FL also relates to a person's competency for managing money. Managing money encompasses the person's ability to read, analyze, manage, and communicate personal financial conditions that affect material well-being (Johnson & Sheridan, 2007). Level of FL impacts our decisions at many levels, "includes the ability to discern financial choices, discuss money and financial issues without (or despite) discomfort, plan for the future and respond competently to life events that affect every day financial decisions, including events in the general economy". In summary, FL is the ability to make informed judgments and effective decisions regarding the use and management of money (Gale & Levine, 2010).

Purpose of the Study

As exposure to student loans and credit cards grows on college students, higher education administrators are interested in understanding the students' financial behaviors or decisions (U.S. General Accounting Office, 2001; Xiao, 2007). Although we have plenty of evidence about the problematic implications of student loans debt and its relation to financial literacy and self-efficacy, we have limited understanding about the differing patterns of FL and self-efficacy between students in public and private universities. We also do not know much about patterns of FL among students from different racial and SES backgrounds. For the first time in the U.S., students who are the first in their families to attend college (first generation students) are having the opportunity to do so in large numbers. Given that college attendance is not part of their family background it is important to understand how students with this background are learning about financial literacy and how are they making financial decisions to cover the cost of their college education. It may be that students with more resources are also more likely to make decisions for future plans and more likely to exercise self-efficacy on making those decisions. Thus, the purpose of this study is to investigate students' financial literacy, self-efficacy and plans for financial decisions in a small private university with students from diverse backgrounds. Understanding the impact of access to financial literacy information and the students' and how it relates to self-efficacy and financial planning decisions will better prepare universities to assist in students' financial planning.

Research Questions

Research Question One (RQ1): Is there a difference in financial literacy level based on race/ethnicity and family income?

Research Question Two (RQ2): Is there a difference between the financial literacy levels of first-generation students and the other freshman at a SNU?

Research Question Three (RQ3): What is the relationship between the students' financial literacy level and future financial planning and decisions?

Research Question Four (RQ4): To what degree does self-efficacy relate to financial literacy levels?

Theoretical Framework

Educators and researchers agree that more attention needs to be paid to the emotional character of consumer behavior as it might guide financial planning decisions (Grable et al., 2010). Psychologists believe that external and internal factors influence human behaviors. Studies are needed to understand the impact that financial literacy knowledge can have on increasing self-efficacy and positive behavior. Bandura's Social Cognitive Theory (1997) and

Prochaska and DiClemente's Transtheoretical Model (1984) have been used often in the FL field to frame our understanding about financial behavioral change as it relates to self-efficacy, consumption, financial management, and other behaviors that could potentially reduce financial risk (Redding et al., 2000).

Drawing from these theoretical frameworks the critical concepts of Social Cognitive Theory and the Trans-theoretical Model will guide this study and help us define where FL, financial planning behavior, and self-efficacy intersect. Most importantly, these frameworks will define the effects this relationship may have on the financial well-being of first disadvantaged students. Furthermore, this outline can help demonstrate whether students from the first generation and low-income backgrounds, including other vital demographic factors (i.e., race), relate to a student's knowledge and confidence about finances and money management. Students' financial literacy level and their application of financial concepts and tools are probably impacted by their family's background, experience, and skills. In addition, student's self-efficacy is investigated here as the moderator of financial planning decisions. Students with higher financial self-efficacy have greater academic expectations, display better academic performance and are less likely to take part in behavior that will lead to drop-out of college when faced with a financial challenge (Chemers et al., 2001).

Self-efficacy has a significant impact on financial behaviors and is a central principle of Albert Bandura's Social Cognitive Theory (1997). According to Bandura (1997), individuals with a strong sense of self-efficacy are more likely to attempt, succeed, and persist at activities or tasks. Self-efficacy enables students to believe they will be successful at accomplishing a task or setting goals before taking action (Bandura, 1986). Similarly, students need to feel that the information is relevant to positively affect their own financial management behavior (Perry &

Morris, 2005). Studies have found that first-generation and low-income students have limited financial resources and parental support and lack role models within the faculty and staff (Evans, 2016). Their financial aid pays for tuition and fees, but not always for room, and board. Thus, they have little control of their financial decisions and college and their families might not have been able to teach or model financial management skills. Increasing their financial literacy could help them develop self-efficacy and enable them to demonstrate more agency, their financial behaviors (i.e., staying within a budget, minimizing the use of credit cards, and acquiring fewer student loans), which might help them avoid unnecessary student loan debt.

However, self-efficacy cannot change financial behavior alone. Prochaska and DiClemente’s Transtheoretical Model of Behavior Change approaches behavior change as a five-stage process relating to a person's emotional and cognitive readiness to change (Prochaska & DiClemente, 1984): pre-contemplation, contemplation, preparation, action, and maintenance. Prochaska, DiClemente, and Bandura's models have been combined and successfully applied to research studies used to understand an individual's financial behavioral change in the areas of debt and credit counseling (Xiao, 2008). High levels of self-efficacy motivate and improves decision making skills, thus, resulting in positive behavioral change (Xiao, 2008). College students need to learn how to make financial decisions, in order to determine whether FL has an impact on their behavior, we must first understand their level of self-efficacy. The results of this study will help college administrators set a foundation of information to guide interventions to improve the financial literacy development of college students. Aligning the concept of self-efficacy from the Social Cognitive Theory and the Transtheoretical Model will help us understand the college student's relationship between financial literacy, self-efficacy and behavior.

Significance of the Study

The student loan $1.5 trillion crisis has surpassed cars and credit cards, and it is second to mortgage debt (Friedman, 2019). Legislators have tried to address the problem by passing legislation, which is like applying a Band-Aid to the hemorrhaging wound of student loan debt. As the gap to cover tuition and fees increases amongst SNU, students will continue to make uneducated financial decisions by relying on private lending. Without the necessary skills to make better financial planning decisions, students will continue to accrue debt. College administrators have a moral duty to look out for their students' future financial well-being. Most SNUs take pride on nurturing their students by creating formal systems and procedures that identify problems and pitfalls students may endure pursuing their degree. Financial Literacy Programs at SNU will prepare students to take responsible financial decisions while funding their education and help them to take control of their future financial management.

This study intends to study first-time college student's financial literacy research at a small private nonprofit university. Integrating a financial self-efficacy measure developed to investigate how a student's confidence may impact literacy and financial decision-making. A FL curriculum offered at a small private university will be used to teach students FL and the assessment of this course will serve as the baseline for this comparative study. In the long-run, FL classes could give future generations the essential tools to help them lower the amount of debt they take on (Alexander, 2013). Increasing our knowledge on this topic will eventually help educators understand the impact of FL, self-efficacy, and financial planning decisions on educational outcomes, such as, persistence, retention, and completion.

Definition of Terms

The following definitions have been applied to ensure uniformity and understanding of the terms used through the study.

At-risk: Students are labeled as "academically underprepared;" they come from single-family household, have low self-efficacy, poor study habits deterring them from college success (Horton, 2015, p. 88; Walsh, 2003; Bulger & Watson, 2006).

Financial Literacy: Defined as "the ability to obtain information, analyze, manage and communicate about one's personal financial situation as it affects one's material well-being" (Vitt et al., 2000). Mandell (2006) simplified financial literacy as "What people must know in order to make important financial decisions in their own best interest." For this study, financial literacy is defined as: the ability to analyze, communicate and use knowledge and skills to manage financial resources effectively for a lifetime of financial well-being (Goetz & Palmer, 2012).

First-generation: Undergraduate student identified as a student whose parent(s) have not completed a bachelor's degree (Davis, 2010).

Self-efficacy: An individual being able to deal with situations effectively (Bandura, 1977). High levels of self-efficacy demonstrate the individual's ability to make decisions that will benefit the person's well-being (Bandura, 1977; Lim et al. 2014). This study uses self-efficacy in relation to the students' ability to overcome financial obstacles.

Underrepresented students: Students of ethnic minorities and low-income backgrounds (George-Jackson & Gast 2015).

Limitations and Delimitations

The study took place at a small private, not for profit, Christian, liberal arts, four-year

University in Southern California. First-time first-year college students participated in the study. Findings and recommendations based on the survey results are specific to this institution, which limits generalizability and implications of the results. Data collected for this study took place during the summer/fall 2016 and fall 2019 semester. The study will only report findings and conclusions on students attending these semesters and participating in the study. The Financial Education Proficiency developed for the study included questions adapted directly from Mandell's (2008) Jump$tart college student survey. The Financial Self-Efficacy Scale questions (Lown, 2011) allows for the evaluation of a respondent's awareness of their behavior and consequences associated with making specific financial decisions. Although these instruments have been validated with other samples, they were not created for college students, and this may impact the reliability and validity of the data. For each instrument, choice of wording and order were maintained and only slightly altered for a college student audience. In some instances, readability, word choice, and flow may have affected survey responses. Regardless of these limitations, the study sheds light on the much-needed topic, the importance of the relationship between college student financial literacy, self-efficacy, and financial planning.

Summary

The problem of financial illiteracy and student loan debt has been discussed in this chapter to demonstrate its role on the educational outcomes of college students and on their career trajectories. This problem is especially pronounced for disadvantaged students (first-generation students), and the social responsibility of the universities to provide some type of FL education has been presented here. There are many benefits to both the universities, the lending corporations and the and the students to adapt a FL curriculum and implement it during the first year of college. The purpose of this study and the specific research questions were presented here. The theoretical frameworks were presented as they guide the methodology of this study. The next chapter is a literature review depicting previous findings on the severity and nature of the problem as well as previous studies on the type of curriculum used in FL education and the levels of FL across different groups.

CHAPTER 2: REVIEW OF LITERATURE

In this chapter I introduce previous research on the nature of FL programs, its relevance to education, the curriculum of FL education, and previous research on the levels of FL across several groups. The following review of the literature provides an overview of the role of higher education in relation to financial literacy awareness among first-time first-year freshmen at SNU. The curricular themes on financial literacy that emerged from the literature are money management, budgeting, saving and investment, spending and credit cards.

Education on Financial Literacy

Educational leaders are always seeking innovative teaching methods and creating instructional curriculums to help improve the academic progress of all students (Hénard & Roseveare, 2012). Academic success is rooted in the learning objectives of all college curriculums, this commitment is publicly claimed in the mission statement of all colleges and universities (Chan et al., 2012). Paying for college is a necessary learning experience. Durband and Britt (2012), professors of personal finance, agree that FL should be a component of a college curriculum. Small Non-for-Profit Universities need to develop an instructional intervention that promotes financial education for all college students. The curriculum's specific focus should be on student debt, as recommended by other researchers (Alban et al., 2014). Financial Literacy is a difficult subject to understand. Institutions of higher learning need to understand the FL level of all their first-time first-year recruits. Part of the problem is that some colleges and universities have not defined FL and it is too broad to be captured through the admissions or financial aid application process. At the admissions level, counselors' priorities are to make sure their recruit meets the admissions requirements. They pass financial assistance inquiries to the financial aid department (FAD). Admission counselors and financial literacy need to be part of their recruit's first semester college experience.

The complexity of the financial aid process is a barrier admission counselor can help navigate. According to Long & Riley (2007), the students' lack of financial knowledge associated with the high cost of tuition intertwine with the admissions and financial aid process becomes a barrier for graduation for many students, but especially to disadvantaged students. Admissions' counselors can help overcome this barrier with their college experience. Most colleges and universities increase their tuition every year, but the amount of institutional discount, federal and state aid remains stagnant. As a result, most college students apply for loans to help close the gap between scholarships/grants and college cost (DesJardins et al., 2006). These decisions have implications in the end, which tend to be more damaging to the student's future. The amount of student debt correlates with the student's stress level; therefore, interfering with their overall school performance (Lim et al., 2014).

According to a financial aid director at an SNU, FAD is overwhelmed with bureaucratic changes and a continually increasing number of students seeking financial assistance makes it impossible to interact with students in financial literacy education (L. McDonald, personal communication, June 30, 2017). Moreover, federal and state regulations continuously change; this creates a compliance workload that increases every academic year making the financial aid award process more complicated. For example, as more students seek aid, the number of students selected for federal aid verification increases (i.e., tax documents requirements, professional judgments for loss of income). FAD award institutional aid based on financial need, but do not educate students on how to select funding to meet the gap between free assistance and tuition (L. McDonald, personal communication, June 30, 2017). "SNU have generous merit and need-based programs to assist alongside federal and state aid programs." Small Not-for-Profit Universities offer academic and athletic scholarships. Students meeting institutional academic policy receive academic aid. National College Athletic Association regulations, school budget, and student talent (L. McDonald, personal communication, June 30, 2017) determine athletic aid.

She further stated, that FAD are federally mandated to provide general information on how to apply for federal and state aid. These institutions rely on the information students provide on the federal application, Free Application for Federal Student Aid (FAFSA), to determine the Federal and State financial support. Likewise, NSU uses the FAFSA information along with institutional guidelines to determine the students' financial provision (L. McDonald, personal communication, June 30, 2017). In addition to providing general federal and state aid information, SNU is required to provide adequate financial aid counseling to all prospective, enrolled students and their families. For example, financial aid departments provide loan-counseling sessions. Students interested in Federal and Perkins loan programs are required to complete an entrance counseling session before funds disburse. Similarly, student borrowers complete loan exit advising session during their final semester (L. McDonald, personal communication, June 30, 2017).

A vast majority of students attending SNUs rely on parental financial support. SNU's financial aid staff depends on high schools to help their students apply for federal and state aid the year before they enter college. They rely on the FL and self-efficacy of their students. Lastly, she added that SNUs typically present financial aid workshops at local high school campuses to high school students and their parents (L. McDonald, personal communication, June 30, 2017).

Post-secondary institutions focus on costly instructional methods such as remedial courses, when it would be much less expensive to focus on preventive measures. Community colleges embed remedial courses in their current curriculum costing them 1.4 billion in 2006; six years later, the cost increased to 1.5 billion in 2012 (Smith, 2016). The National Bureau of Economic Research states that the annual cost for remedial coursework is nearly $7 billion nationally (Scott-Clayton et al., 2014). According to Finkel (2010), after the great recession of 2008, schools all over the country have taken notice of the importance of financial literacy.

The study of student financial knowledge, stresses that the relationship between FL and behavior is a phenomenon that only recently has been studied (Durband & Britt, 2012). Universities have started tackling this problem more actively about ten years ago. In a lending analytics survey administered to 260 financial aid administrators, 49% indicated offering financial literacy programs (Student Lending Analytics Blog, 2010). These programs are in addition to the federally mandated entrance and exit counseling online sessions required for all students receiving federal Stafford loans to complete. Although there are colleges that offered these types of programs, FL education, for the most part is provided online and not in the context of the students' experiences (Field, 2013).

Online instruction in higher learning has a low completion rate, and one-time seminars can be used as sales pitches for a product or service (Payzant, 2012; Grau-Valldosera & Minguillón, 2014). FL programs should be customized to educate students in commercial awareness, increase financial knowledge and help them change their economic behavior (Goetz & Palmer, 2012). Durband and Britt (2012) explain that institutions of higher learning have started offering these programs through various channels: online, individual financial planning, presentation, workshops and web links directing students to websites containing financial education information.

Money Management

Knowing how to handle finances is a lifelong learning process (Botos, 2014). Some experts advise we should begin teaching money management skills to pupils as early as elementary school. According to Allen (2009), teaching students money management skills at a young age enable students to make responsible financial decisions as adults. Ultimately, learning financial management skills will empower young adults to make lasting financial behavioral changes (Johnson & Sheridan, 2007).

In acquiring financial literacy students acquire knowledge of how to manage money for a lifetime (Beverly & Burkhalter, 2005). Most college students struggle with managing their money (Bidwell, 2015), this is mainly because they have not had to do this on their own before and financial managing skills are not taught explicitly by parents or at schools. For many college students, their first year will be the first exposure they get on how to handle money with or without parental supervision (Jagman et al., 2014). They will be expected to finance their college education with or without financial guidance and allocate their financial aid (i.e., scholarships, grants, work, and loans) to meet their education financial obligations (Jagman et al., 2014). Lack of money managing skills leads students to make uneducated financial decisions that might contribute to student loan debt. For example, college students have easy access to student loans, without basic financial awareness, they are inclined to take on debt to cover expenses that might not be necessary (Britt et al., 2017). According to Andruska et al. (2014), students who have no skills in money management and no understanding of the loan term consequences of over standing their spending often take on tremendous amount of liability and miscalculate their total amount of college loan obligation (p. 125). The effects of poor financial awareness can have adverse long-term effects on students' future, especially, those students making financial management decisions without parental support (Driscoll, 2013; Jagman et al., 2014). Ultimately, poor financial decisions may lead to financial stress, leading students to drop out of college (Britt et al., 2017).

Poor financial management skills create financial distress amongst college students; as result, their academic performance is negatively affected (Ross et al., 2006; Archuleta et al., 2013). Teaching first-time first-year college students the essential tools for money management would benefit them at many levels, but primarily by reducing the amount of financial distress incurred in covering college expenses. The relationship between financial stress and academic performance is a vicious cycle. Stress tends to impact academic performance, a poor academic performance, in turn, jeopardizes opportunities for academic scholarships as these types of assistantships are based solely on grades, consequently more loans are needed to cover the cost of education. Creating a tougher financial stress in the college environment may affect the student's mental or physical wellbeing in general. All of these may result in making it harder for the student to find employment after graduation, which affects their ability to pay student loans and so on (Bodvarsson & Walker, 2004).

Teaching students how to manage their money will have a long-term positive effect, especially for students who may need financial support after graduation; students who are starting a business after college (Murrell & Lopez-Fernandini, 2008). When students reach a high level of debt, they are less likely to attain capital to start a business as they have reached their "debt capacity" (Ambrose et al., 2015). Even those students who are able to start a business may be unable to add on more debt, making it difficult to grow their business (Ambrose et al., 2015). Bankruptcy is not an option for students to restart their lives. According to Andruska et al., (2014), college loans are less likely to be discharged when declaring bankruptcy (p. 126).

Ultimately, if students understood the long-term consequences of loan debt, they may be less likely to take large amount of college loans (Korkki, 2014).

Understanding how to repay debt is a vital money management skill (Washicko, 2013). Goetz & Palmer (2012) recommends managing debt skills as a core FL curriculum subject for college students. Teaching the importance of debt management at an early stage in college could empower first-time first-year college students with the financial awareness to make better decisions and avoid defaulting on college loan debt (Grable et al., 2012).

The total amount of Stafford loans available for a traditional college student throughout the four years at an SNU is $27,000.00. The total direct cost of this sample's SNU's (tuition, mandatory fees, room, and board) is approximate $186,000.00 (L. McDonald, personal communication, June 30, 2017). Private loans are often used to help cover the year-to-year gap between direct cost and financial aid. Financial Literacy classes will help students understand the complexity of the "terms and conditions" of all types of college-based, federal and private loans (Jagman et al., 2014); understanding the details will save them time and money. In addition, college students need to comprehend the wide variety of repayment options (Hillman, 2014) and the expectations they could have when they start working to determine how much debt they could handle. They need to understand that for some loans, the interest accrued on loans while enrolled. Upon graduation, making minimum payments on private loans with high interest will take many years to pay off. FL courses will help these students better understand the overall cost of their college expenses (Andruska et al., 2014, p. 134). Acquiring skills on how to manage money will students aware of the consequences of debt and might make them more cautious consumer. This awareness may make them more conservative about borrowing additional loan for unnecessary expenses (Andruska et al., 2014).

Budgeting, saving, spending, and the use of credit cards are subjects that need to be covered in financial education programs (Durban & Britt, 2012; Goetz & Palmer, 2012; Hoyt, 2014). FL programs need to address the needs of the students (Goetz & Palmer, 2012). Teaching students the value and benefits of these core subjects will empower them with financial knowledge and economic well-being (Goetz & Palmer, 2012). Most importantly, teaching student's money management skills will help them reduce debt, build savings and instill essential life-long skills (Aggarwal & Gupta, 2014).

Budgeting

An important piece to money management is budgeting, according to Bahls (2011), President of Augustana College, a small private not-for-profit liberal arts university, budgeting is one of the subjects needed to be taught in financial literacy instruction. Developing a monthly budget is an important segment of money management; first-time first-year College freshmen will benefit from learning how to develop and manage a monthly budget because it gives boundaries or spending limits that realistically fit to their means (Vien, 2015). MyMoney.gov is a federal website developed to "improve the financial capabilities and financial well-being of post-secondary students" (MyMoney.org, 2015). Several websites are available to teach the budget basics, from involving relatives to help with the budgeting process to making sure students plan for emergencies. Some states offer online budgeting calculators to help students budget for college. Rhode Island Student Loan Authority created a simple budgeting calculator at www.risla/budgeting-calculator. This online calculator allows students to type in their monthly income and expenses. As a result, the calculator provides students with results alerting them if they are going to have a surplus or deficit at the end of the month. Making these devices available to students could be a great beginning in their FL education.

Saving and Investment

For example, a 529 savings plan is a savings program sponsored by the state. This program is designed to help families save money for higher education expenses. According to Wiens (2013), experts agree that a 529 savings plan is the right college saving choice to save for their children's education. These types of plans offer a variety of tax benefits. Parents do not have to pay taxes when they pull the money out to pay for child's college expenses. Most importantly, the money is not available until the child reaches the age of 18 (Elliot & Nam, 2012). These saving plans also allow parents to take advantage of the benefits if they decide to return to school to complete their degree (Saving for College, 2015). College students will learn about these programs and share the information with their parents. FL classes will teach students the power of saving and how compound interest could benefit them in their retirement as well (Washicko, 2013).

College students participating in FL programs reflect a better understanding of investment principles than those students not involved in financial education courses (Peng et al., 2007). Goetz & Palmer (2012) state that young adults need to know the importance of investment as it is a powerful concept that will help generate wealth, financial stability, and retirement. FL instructors also teach safe investment measures to increase the interest in participating in the stock market, this is needed for people of all ages, as less than half of Americans partake on this venture. These instructors may also inform students of market risks and how to assess them, for example, investing in social security or pension plans are no longer considered safe investment; employees now are looking at other means of investment such as Individual Retirement Accounts (IRAs) (Lusardi & Mitchell, 2014). Learning this trend makes young adults consider where to invest so they someday could live from their investments

(Poterba et al., 2008).

Spending

According to a study sponsored by Higher One, 20% of college students purchased items they cannot afford. They get into unnecessary student loan debt, max out their credit cards and don't put money away in their savings account (Reaume, 2015). First-time first-year college freshmen need to know the difference between "needs versus wants," controlling this consumer behavior is an essential skill that enables self-efficacy and money management skills (Igrad, 2013; Koh, 2016). For example, college freshmen ordinarily do not need a car their first year in college. Yet, according to a U.S. news, 98% of students at a Midwest university brought cars to campuses in 2013-2014 (Snider, 2015). There are hidden costs that come with owning a car on campus that are typically not considered by students or included in their budgets (i.e., parking permits, tickets, car insurance, and maintenance) are also costs that come with owning a car (Moody, 2014). There are other expenses that are not considered in the cost of college, first-time college students are likely to travel home for the breaks. This could be quite expensive if you live far from your college. Whether it is by plane or car, the cost to travel home can be high and it adds up during the year (Moody, 2014).

Credit Cards

In addition to saving and investment strategies, students need to know the importance of building good credit. As students turn 18, they receive offers for credit cards by banks. Eighty-four percent of all undergraduates use at least one credit card, and more than half of these students have four or more cards (Sallie Mae, 2009). It is crucial for higher learning institutions to understand how their students are managing their finances to pay for college. Sallie Mae, a leading company in market research, surveyed 800 college students in December 2015.

According to Sallie Mae (2015), "Top consideration for using credit cards is:

- 26 percent said their parents or guardians suggested they get a credit card.
- 25 percent said they needed an easy way to shop online.
- 25 percent said they wanted a way to make purchases without carrying cash.
- 22 percent said they needed a way to access emergency funds.
- 20 percent said they are interested in earning rewards."

The number one reason for college students obtaining a credit card is to begin building good credit" (p. 11). Fifty-nine percent of the students surveyed use a credit card to build credit. Although this is a positive financial behavior, students do not know how to build good credit (Sallie Mae, 2015). Furthermore, 68% of the participants say their debt is attached to a loan and not their credit card(s) accounts. SNUs can offer first-time first-year college students financial literacy programs to help students understand the adverse effects of credit card overspending.

FL programs will instruct first-time first-year college students on the different types of credit and teach them how to understand their credit scores, which are some of the skills recommended by FL researchers (Farrington, 2016; CreditRepair.com, 2015). It is important for students to understand how building good credit helps them secure financial stability (Farrington, 2016). Some college students are using credit cards to fund their college lifestyle. Some researchers have studied credit card use behaviors (Blair et al., 2014). This type of spending behavior may be generational, as parents' typically model credit card use and other spending habits (Woosley & Gerson, 2016). A survey of students' credit card usage related to college spending demonstrated the need of educating students in this topic (Dempere et al., 2010). Furthermore, FL programs will caution students on taking on expensive private loans and credit card usage for school related expenses by teaching them about the different types of interest

(Farrington, 2016; Goetz & Palmer, 2012). These credit concepts are important since the raising level of college tuition, and related expenses have pushed students to depend on expensive financial options after exhausting all state and federal free assistance (Goetz & Palmer, 2012).

There are five key concepts that students need to learn about credit:

- what is credit.
- how do I build credit;?
- how do I avoid credit pitfalls;?
- how do I avoid college debt;?
- how will credit affect my future (pg. 2, CreditRepair.com, 2015).

These concepts (i.e., saving, investment, and credit) will improve the financial health of young adults. As the cost of a college education continues to climb, so is the likelihood of college student to continue the misuse of credit card usage. First-time first-year college students need financial guidance to avoid poor financial choices and behavior. Small nonprofit universities have the opportunity to mentor first-time first-year college students by implementing a FL curriculum that addresses credit card use and policies helping students develop financial well-being and lowering financial mismanagement. Most importantly, FL education will help combat financial illiteracy among young adults as it is very costly for students and our society (Harnisch, 2010).

Low-Income and First-Generation Students

There have been many studies that demonstrated how the socioeconomic status of low-income and first-generation college students affects their academic achievement (e.g., Coffman, 2011; Morales, 2014; Pelco et al., 2014; DeFreitas & Rinn, 2013; Lightweis, 2014). Researchers have also revealed that first-generation college students who are impoverished dropped out of college at a rate four times that of their peers from affluent households (Engle & Tinto, 2008). An area where research is limited is understanding the levels of financial illiteracy across different SES groups and how limited FL on students whose parents have limited income and resources impact their FL levels (Schuchardt et al., 2009). Close to one-third of all undergraduate students are low-income or/and first-generation college students; they are more likely to be of minority background, non-native English speakers, have single parents, or they do not have parental support (America's Promise Alliance, 2012). Financing college education is a main barrier for these students to succeed in attaining a college degree.

Low-income and first-generation college students lack parental financial support and guidance as their parents' might not be able to finance their college education, teach them FL, or model money managing skills (Park, 2004). Students from more affluent households are exposed and sometimes involved in family financial decisions, such as saving and investing so their financial education level is higher than the disadvantaged students (Tennyson & Nguyen, 2001). Although post-secondary education opportunities may be available to this vulnerable group of students in the same fashion as their peers whose parents are college graduates, they still have a tremendous economic disadvantage (Pascarella et al., 2004). They are not exposed to comprehensive information on planning and paying for college, in turn, they are susceptible to financial misinformation and to financial predators (Lerman & Bell, 2006). They are exposed to fewer resources (i.e., college guidebooks, parents, counselors, magazine rankings etc.) than their wealthier peers (Cochran & Coles, 2012). First-time first-year freshmen often rely on the college's financial aid department to help them pay for college. Targeting the FL education of this group will improve the retention of disadvantaged students and their college completion No knowing how to finance the college cost gap after scholarships, grants and federal loans; as a result, they often turn to private financing and to financial disaster. They take on debt, as they are unable to foresee the problem on borrowing from private lenders and the accruement of debt due to high interest rate loans (Lerman & Bell, 2006). These disadvantaged students often times undertake complete financial responsibility for their college education (Aspelmeier, 2012). Low-income and first-generation students' lack of access to financial capital and information about financing college negatively affect their college persistence rates and overall college attrition (Lohfink & Paulsen, 2005).

Financial management education studies have been performed on ethnically diverse college campuses and they indicate the needs for FL programs, especially for minorities. An exploratory study performed at a predominately African American College examined the influence that race, major and parental educational level had on financial awareness of undergraduate students (Murphy, 2005). The results were alarming; only three out of ten FL questions were answered correctly. The overall results indicated that African American universities have a greater opportunity to expose their students to broad FL topics and prepare them for professional life after graduation (Murphy, 2005). The study examined the connection between Financial Literacy and race. The results showed that non-blacks were more knowledgeable in financial education than African American students (Murphy, 2005). This demonstrates that minorities need to be exposed to financial education programs.

Underrepresented students are in great need of overall financial direction when financing their college education and guidance with the various forms of funding opportunities available (George-Jackson & Gast, 2015). Bok's (2013) without proper directions disadvantaged students may dropout as they realize that college education is too costly (p. 105). They perceive college as being high-priced and financial assistance "inadequate" (De La Rosa, 2006). Financial guidance through FL programs at SNUs will give underserved students the special guidance they need when exposed to financial jargon that might be confusing to them; most importantly, they will share valuable financial information with parents.

Parents of underrepresented students are more likely to miss calculate the overall cost of college tuition than white parents (Grodsky & Jones, 2007). The parents' level of financial literacy related to higher education cost and lack of guidance with the complicated financial aid process leads to their miscalculation of the overall cost of college education (Grodsky & Jones, 2007; Gibbons et al., 2006). FL classes will give students the tools needed to help their families become aware of their total tuition cost and advise their parents in taking financial decisions. At the end of every school year, parents weigh the annual tuition cost and financial aid assistance. Disadvantaged parents are most likely to become overwhelmed with the estimated costs often this lack of understanding of possible resources make parents hesitant to allow their child to pursue an education (Grodsky & Jones, 2007). Students form wealthy families, but low levels of financial literacy are also at risk.

In private schools, many students come from very privileged background. They often expect their parents to pay for 100% of their college education (Wolf, 2012). These students are at risk if their parents decide to stop financial support while they are in school. Without financial guidance, they turn to high-interest loans or simply drop out of college. According to Hauptman (2015), private student loans account for 20 % or more of what students borrow per academic year. Educators have a responsibility to inform students and communities about the importance of money management (Supon, 2012). Goetz & Palmer (2012) suggest that financial education programs will empower student from low-income families helping them breakaway from a "cycle of poverty." Most importantly, disadvantaged students will realize that wealth and financial independence can be achieved even with a moderate-income.

Stakeholders

Educators of all levels need to implement a system that incorporates educational and everyday life components, this approach will teach students on making sound financial decisions as a life-long skill (Peng et al., 2007, pg.15,). In addition, FL educators need to make an extra effort to understand the needs of their students. Understanding the struggles students undergo outside the classroom will help them better serve the students (Gjesfjeld, 2014). In order for this education to be successful, better curriculum in financial education will be needed (Durband & Britt, 2012). According to Darling-Hammond (2010), countries that improve students' success such as Finland, Korea, and Singapore attribute their success to the high investment in teacher preparation and development in the field. Pedagogy in FL education is needed for all employees in universities that deal directly or indirectly with the financial wellbeing of college students (Baron-Donovan et al., 2005). Research indicates that there is a need for FL curriculum in college campuses; it is up to educators to take the necessary steps to build it (Durband & Britt, 2012).

Institutions of higher learning were developed to help students make important life decisions that will affect their lives and assist them to prepare for adulthood and avoid missed opportunities (Lerman & Bell, 2006). President Bahls (2011) from Augustana College explains the top subject areas needed to be taught in financial literacy instruction are budgeting, credit cards, and loan debt. College is the ideal place for young adults to learn how to manage their money as financial counseling services for students offered on an individual level or in a classroom setting are great opportunities to implement FL that could impact students' behavior (Bahls, 2011). Many students consider college as the education path to progress and financial success (Hiler et al., 2016). The two top reasons why students gave to explain why they go to college are, to improve employment opportunities and to make more money (Fishman 2015). Unfortunately, many SNU have not focused on creating an in-depth financial literacy program for their student body. This is unfortunate, as students value education that relates to real life value, and FL is the epitome of the life-long value of education. Liberal arts colleges, especially not-for-profit colleges, enrolling first-generation college students have an obligation to teach financial education to all students (Bahls, 2011) if they are truly committed to the success of these students. On an average, low-income families spend an equivalent of 84 percent of their annual earnings in college related expenses compared to 15 percent of the expenditure of wealthy families (Marcus & Hacker, 2015). Institutions recruiting disadvantaged populations have the responsibility to educate the whole person, by promoting transparency, accountability and access" (Bahls, 2011).

Evidence and Values

According to Schuchardt et al., (2009), financial socialization is the process by which young adults acquire and develop values and attitudes that contribute to their financial welfare. Education plays a major role in financial socialization (Schuchardt et al., 2009). Understanding the behavior of students is an essential educational requirement needed to create an effective school curriculum (Tyler, 1949). Darling-Hammond (2010) states that high school educators need to create a challenging and engaging curriculum that prepares students for college course work (pg. 25). Professors must be compassionate and understand the very different skills of students in this area based on their background and they need to adapt to students' learning skills. Instructors want their students to be successful and are always seeking and finding innovative ways to teach students to core educational subjects FL should be taught with the same passion (Senge, 2012). Professors need to explore innovative teaching methods on money management, they have the responsibility to enhance their students' learning objectives; they need to use similar instructional methods used to teach core subjects (Beverly & Burkhalter, 2005). Teachers understand the critical educational needs of their pupils and create a coherent and engaging curriculum underlining the essential teaching objectives that will help high school students succeed in college and in life. Understanding the educational needs of their students has led institutions of higher learning to create summer programs, but often these are limited in time and packed with too much information.

According to Hicks (2005), many high school students undergo many challenges and change as they transition into college life. Many institutions of higher education established summer programs to help vulnerable students transition from high school to college and orient them to college life (De La Rosa, 2012). These programs are vital for first time and low-income college students as they need additional support to be successful in their journey in higher education (Jones & Becker 2002). The summer symposiums were developed to serve underrepresented students that tend to be academically under-prepared with different college expectations and financial constraints (De La Rosa, 2012). This population of pupils is very susceptible to the influences of their environment (Wyatt, 2011); thus, we must create an environment for success. Many underrepresented students help pay for their studies and come from lower socio-economic backgrounds than traditional students (Aquino & Flower, 2015). Underprivileged students need financial guidance to make sound financial decision when financing their education.

Offering FL programs in colleges and universities will help students borrow less money to pay for college by teaching them the complications attributed to having too much debt after graduation (Avery & Turner 2012). Arthur (2012) states, “if pupils are given to tools to help them make sound financial decision, in the end, these students will become productive citizens” (p. 108). Financial education programs are only as successful as the educators that supervise them (Halley et al., 2012). The better educators do at preparing students with primary financial education, the more we stand to save them in future college cost (Stinson, 2013). Most importantly, students will understand the value and the financial potential of the degree they are aspiring to receive (Oreopoulos & Petronijevic 2013). According to Britt et al., in general, students should not take on too much debt that surpasses their expected salary for their first year of employment (2017). For example, an accounting major seeking a CPA after college graduation might be able to take on $100,000 of debt since their degree justifies a similar salary. On the other hand, taking on $100,000 of debt to obtain a degree with an annual salary of less than the students’ college loan debt may not make financial sense. For students coming from low-income families this equation may vary, as they may have additional obligations. FL programs will help students research their earning potential, especially during their first year in college.

Summary

This chapter has provided evidence that the problem of financial illiteracy is not just for the students, it is a national issue that impacts our entire society, as such, it should be addressed at the institutional level. One of the most significant barriers to completing a college degree is often financial, especially for disadvantaged students. A study done by Classes and Careers (2011) indicated that 38% of students do not finish college due to not meeting the financial costs. According to Johnson et al. (2008), The Bill & Melinda Gates Foundation indicate that 54% of young adults leave college because they need to work and make money. Students need to receive instruction on how to search for resources to help them pay for college. Young adults must learn how to manage their money inside and outside the classroom. Educational institutions are great places to educate students in money management to help avoid future disasters, such as, the recession in 2008. According to Forbes, college student loan debt is the second highest form of consumer debt behind mortgages; Class of 2016 has an average loan debt of $37,172 (Douglas-Gabriel, 2017). According to Looney and Yannelis (2015), the amount of student debt has increased in the past decade. The increase of student debt is a strong indication that students continue to take on debt to pay for college-related expenses as the outstanding student debt has surpassed $1 trillion; if students are unable to repay college loans, “the market for student debt” may become a financial crisis (Akers & Chingos, 2014). The upsurge in college student debt contributes to a belief that there is a crisis in student loans amongst young Americans (Looney & Yannelis, 2015).

Policymakers are attacking the problem by passing legislation that will help the student make affordable monthly payments (The White House Office of the Press Secretary, 2015). In addition, the Democratic Party introduced a bill focusing on college loan “affordably” and “simplicity” (Affordable Loans for Any Student Act, 2019). This proposed amendment is aimed to help struggling borrowers. Politicians have also taken notice of the association between college student financial stress and performance (House Committee on Ways and Means, 2015)

CHAPTER 3: METHODOLOGY

There are three goals in this study. The first goal is to understand the financial literacy (FL) and self-efficacy levels of college first-time first-year freshmen attending a Small not-for Profit University (SNU) in Southern California. The second goal is to learn about the financial literacy levels across different students' characteristics (i.e., race, family income). Lastly, to study the relationship between the self-efficacy and decision making for a subsample of students who participated in a follow up survey after attending three years of college at the same Small Not-for Profit University. A description of the design, the settings and participants, the recruitment and participation procedure, and the plan for data collection and analysis is presented in this chapter.

In this mixed methods study a combination of three sources of data will be used to answer the following research questions.

RQ1. Is there a difference in financial literacy level based on race/ethnicity and family income?

RQ2. Is there a difference between the financial literacy levels of first-generation students and the other freshman at a SNU?

RQ3. What is the relationship between the students' financial literacy level and future financial planning and decisions?

RQ4. To what degree does self-efficacy relate to financial literacy levels?

There are two points of data collected here to validate the findings of this study. The first data point was collected summer '16 from students who participated in the first generation and at-risk (defined in Study Participants section) students' FL symposium. Understanding of FL will be studied using an assessment after they take FL class during the late summer through the student success program (SSP) before they commence their first college semester. This program is available to first generation and at-risk college first-time first-year freshmen. The one-week program provides academic and community development tools for these vulnerable groups of students. The summer program requires that first generation and at-risk, students participate in financial education workshops. These symposiums informed students on financial aid programs, scholarships, grants, federal and private loans, credit, and basic financial education knowledge about college education cost. The impact of this symposium will be evaluated across the groups. The second data collection was a survey that included the same measure of FL knowledge and self-efficacy administered during the summer to the subsample participating in the symposium and was given to the incoming freshmen class and it was collected from all freshmen students during the fall, 2016. This information will be used as a base-measure for the FL knowledge and self-efficacy. Finally, after three years of college attendance, these students will be invited to participate in a survey to investigate their understanding of financial literacy and financial decision making after experiencing college education expenses during the fall and spring, 2019-2020. The data from this survey will help us understand the relationship between financial literacy, self-efficacy and financial planning.

All first-time first-year college students are required to enroll full-time, taking 12-18 units. There will be three groups represented in the study: Wings, Jumpstart and traditional undergraduate students. Wing students are students who did not meet all admissions requirements, some of them are first generation and some are not. They have also low SAT/ACT score or are missing one college prep course from their high school curriculum. As part of the admissions requirement, they are required to participate in the summer success program. Jumpstart students volunteer to take advantage of the weeklong summer program to acclimate to college life, as many of them are first-generation college students. Traditional college freshmen participate in the survey of the study in the middle of fall ’16 semester during their freshmen seminar class that meets once a week and did not attend the summer success program.

The last data collection will take place after three years in late fall ‘19 early spring ’20. An email invitation will be sent to the 330 students who were the original participants with a six-question Financial Literacy survey about financial planning. Students will have the option to comment on three of the questions. Three of the questions will be measured on a four-point Likert scale: 1= Exactly true, 2= Moderately true, 3= Not very true; 4= Not at all true. After 1 month, students that had not responded will be sent a reminder email.

Sampling Procedures

The participants for the first and second data collection in this study were drawn from first-time first-year students enrolled at a SNU in Southern California during the Summer/Fall 2016 as part of their college onboarding experience. This secondary data will be available for analysis in this study. The third data collection will be a voluntary recruitment from students who replied to the invitation sent on the Fall’ 19 and Spring’ 20 semesters. The researcher is an administrator in this college and was given access to the secondary data from a FL course that was being implemented during summer 2016. All traditional freshmen were invited to take a survey as part of their freshmen seminar class. Jumpstart and wings students took the same survey during their summer success program (SSP). The SSP allows first generation students and at-risk students to move on campus one week early including commuter students. This program allows them to acclimate to college life and meet their mentors and peers for their academic year. As part of the SSP students are required to take a financial workshop. The survey was administered before the symposium. The purpose and benefits of the study was explained to all students.

Instrumentation and Measures

The Financial Education Proficiency Survey (FEPS) was given to all the participants in the study, and it consists of 67 questions divided up into three sections. Part I of the FEPS contains information regarding the purpose of the study survey, student informed consent (see Appendix A), and data confidentiality.

Part II consists of six statements from Lown's FSES measuring the participant's self-efficacy levels in handling financial challenges. Counselors, researchers, educators and advisors to measure how participants manage specific financial problems and how they cope with setbacks (Lown, 2011) use the 6-item FSES. This scale was originally developed to help understand the financial behavior of university employees (Lown, 2011). The FSES results predict the participants' level of confidence when managing their money. High levels of self-efficacy equate to good performance at specific tasks (Lown, 2011). As a result, the scores help develop financial education programs aimed to guide better, motivate and understand the participants (Lown, 2011). Lown granted permission to use the Financial Self-Efficacy Scale for this study (personal communication, December 23, 2015). The reliability of the survey was evaluated by using Cronbach's Alpha with a value of .76 (Lown, 2011). This self-efficacy construct was given to all of the participants in the initial survey which is used here as a base-line measure of self-efficacy and FL understanding.

The participants' level of agreement with the six statements will be measured on a four-point Likert scale: 1= Exactly true, 2= Moderately true, 3= Not very true; 4= Not at all true.

Part III entails questions derived from Mandell's JumpStart survey with multiple choice answers related to general financial literacy. All participants also answered these questions to assess their understanding of FL. This construct contains 55 questions from Mandell's (2008) Jump$tart college student survey. The college survey is comprised of 56 questions; the first 31 questions examined the financial education, and the last 25 questions surveyed the students' socio-economic background and patterns of financial behavior: credit card usage, college loan debt, basic tax preparation and checking account. Only the 31 questions on FL were used in this study. Mandell created the original personal financial literacy survey in 1997. The survey's initial intention was to quantify the financial literacy of high school seniors (Mandell, 1997). In 2008, he administered the survey to college students (Jump$tart Coalition, 2008). His survey is also referred to as the Jump$tart Survey as he administered the questionnaire under the umbrella of the non-profit organization based in Washington, DC. Jump$tart Coalition is an organization focused on advancing financial education among pre-school through college-age youth (Jump$tart Coalition, 2008). Jump$tart Coalition has been administering the Jump$tart Survey since 1997. In 1997-98 Jump$tart Coalition conducted that first Personal Financial Survey to 1,532 high school seniors. Since then, the survey has been administered semiannually nationwide amongst 12th-grade high school students. The number of high school seniors increased from 723 students in 2000 to 6,856 in 2008. In 2008, the first financial survey was administered to 1,030 full-time college students (Mandell 2008).

Finally, Part IV of the 2016 survey consisted of 24 questions to collect background information on the participants' demographics. These questions were modified in this study to make them relevant to the college students' population.

During the summer '16, Wings and Jumpstart students participated in a financial education workshop. The summer success program provides underrepresented students information on federal, state, private, and institution financial aid opportunities. They also learn fundamental financial education topics about college education costs. They learn on the different types of college loans, federal, parent, private, and repayment programs. The students are also exposed to real-world financial topics. The topics include- the importance of money management, saving and investing, credit, college degree improves their employment prospects and earning potential. This training is provided by the university, and it is used as secondary data in this study.

A subsample of students volunteered to participate in the follow up survey after three years of college, during the Fall of 2019 and Spring of 2020. This data collection consisted of a Financial Literacy self-constructed survey follow up consisting of six questions. The constructs measured in this survey is their knowledge of FL and their perceptions on future financial planning and decision-making. Students are given the option to comment on three of the questions in an open-ended format. Three of the questions are closed ended four-point Likert scale: 1= Exactly true, 2= Moderately true, 3= Not very true; 4= Not at all true. (See Appendix B).

Validity and Reliability

According to Gay, Mills and Airasian (2012), any measuring instrument used to collect data should be assessed for validity and reliability. Having experts in the field evaluate the measuring instrument is used to determine if the device is reliable. This is one way of addressing this requirement in this research; and reliability enhances validity (Gay et al., 2012). The large sample tested in this study took a comprehensive questionnaire modeled from the Jump$tart Coalition Survey of Personal Literacy among College Students created by Mandell (2008). The reliability of the survey was evaluated by using Cronbach's alpha with a value of .7. In addition, an expert on the field reviewed the measures for applicability to the sample.

Thomas Lucey, Associate Professor in the Department of Curriculum and Instructions at Illinois State University, evaluated The Jump$tart Coalition Survey of Personal Literacy among College Students for validity and reliability (Durband & Britt, 2012). Limited published data is available measuring these criteria, other than the repeated uses in other studies. The Jump$tart Coalition Survey of Personal Literacy has frequently been used to test college students and is the closest to standardized measure that exists when examining the financial education level of college pupils (Durband & Britt, 2012). The questionnaire is a valid measuring tool as it addresses two major forms of validity: content and construct (Durband & Britt, 2012). Content validity measures how accurate assessment or measurement tools taps into the various aspects of the specific construct in question; construct validity is determined by the degree to which the items measure what is intended to be assessed (Gay et al., 2012).

According to Lunenburg and Irby (2008), content validity is most important as it measures the instrument's content area. Content validity is essential for Wing students, as the study requires a pre-post-test to measure retained knowledge. These pupils were given a financial education workshop between the surveys. Mandell's survey measures the students' achievement as the questionnaire content examined what was taught and was expected to learn. The questions for the follow up survey were constructed based on theoretical understanding of the role of self-efficacy and FL learning as defined by the study's theoretical frameworks.

Plan for Data Collection

Jump$tart and Wings students will be the first group to participate in the study. They will take the survey the first day of their SSP during the Summer of 2016. The researcher and students will be the only ones present in the room. The survey will be administered before and after the financial workshops.

Informed consent will be given to all participants during the orientation. The researcher will introduce himself and provide contact information. The purpose of the study will be explained. Most importantly, the voluntary nature of the examination and right to withdraw from part or all of the survey at any time or to review the results will be emphasized. Participants under the age of 18 will be asked not to participate. Participants will be instructed to fill out the consent form if they agree to participate. If they chose not to participate, they would be asked to sit quietly and do other work in their seats. Students that decide to take part of the study will be invited to walk the completed consent form to the front and collect a survey and a pencil. After they complete the survey they will be instructed to place surveys in large envelope in front of the classroom.

The same procedures will be followed for traditional students at the beginning of their freshmen seminar class in October 2016. Since underrepresented students will be in the freshmen seminar classes, an additional question will be added to the survey asking students if they participated in the SSP. Surveys marked “yes” will be removed from the freshmen seminar examinations to avoid counting their answers twice.

A follow up survey was used late fall ‘19 early spring ’20. An email invitation was sent to the 330 students original participating in a six question Financial Literacy survey. Students are given the option to comment on three of the questions. Three of the questions will be measured on a four-point Likert scale: 1= Exactly true, 2= Moderately true, 3= Not very true; 4= Not at all true. After one month, students that had not responded will be sent a reminder email.

Plan for Data Analysis

Numeric and Alpha information will be assigned to some of the FEPS question responses to assist with interpretation. Surveying will take place in a paper-pencil format. Once surveying concludes, all the data collected will be uploaded into an Excel document and analyzed by the researcher using StatPlus statistical software. Data will be password protected to maintain confidentiality.

RQ1. Is there a difference in financial literacy level based on race/ethnicity and family income?

To address the first research question, one-way ANOVA will be used to compare FLL across major Ethnic groups and family income levels. A post-hoc analysis will be performed to learn which pairs of groups are significantly different beyond the $p \leq .05$ probability.

RQ2. Is there a difference between the financial literacy levels of first-generation students and the other freshman at a SNU?

The second research question will be answered using an independent t-test to compare the means between the first generation and the other students.

RQ3. What is the relationship between the students' financial literacy level and future financial planning and decisions?

For the third research question, a Linear Pearson Correlation test using continuous variable will be calculated to investigate if there is a statistically significant relationship between the students' financial literacy scores and their future financial planning and decisions.

RQ4. To what degree does self-efficacy relate to financial literacy levels?

This question will be answered using the same procedure as question 3 with the self-efficacy assessment scores and the assessment of students' financial literacy scores from the survey.

Ethical Issues

Addressing financial matters could bring discomfort to the participants. Invasion of privacy issues are likely to arise. Some students may feel socially at disadvantage when asked about socioeconomic information from their families. To minimize these potential risks, participants will be notified that their participation is voluntary for all students. They will be informed that they are permitted to withdraw at any time during the survey. The benefits and importance of the study will be shared with students. They will also be alerted to the school's study approval and given an informed consent form to acknowledge their consent to participate and their choice not to participate or withdraw without repercussions. The researcher will refer students to the wellness center if a participant wants to talk to someone about their discomfort. The researcher will be the only one managing the data. Upon completion, the FEPS will be stored under lock and key. The researcher will be the only individual with access to the data.

Confidentiality of the participants will be maintained. The investigator will be the only person able to identify the information collected from the study participants. According to Joyner, Rouse and Glatthorn (2013), the credibility of the results in any study depends on the accuracy of the data entry and coding. Study codes will be used to protect the confidentiality of the research participants. Using these codes will further safeguard confidentiality of the students as their identifying information will not be link individual responses with participants' identities.

Summary

The financial literacy and self-efficacy levels of first-time first-year students will be evaluated with data collected from the Financial Education Proficiency Survey (FEPS), the Financial Self-Efficacy Scale (FSES) questions, and Financial Literacy Survey (FLS). These measures were validated in previous studies, and they are being implemented here to learn about issues that complement our understanding of FL in this field. The FEPS was developed using Mandell's 2008 Jump$tart college student survey (Mandell, 2008). Similar surveys have been model of Mandel's Jump$tart and have been administered to over 2000 participants to test financial literacy levels (McKenzie, 2009). While other studies have been conducted on the correlation between financial literacy levels and the current economic climate (Dietz et al., 2003), the FSES questions (Lown, 2011) allows for the evaluation of a respondent's awareness of their behavior and consequences associated with making specific financial decisions. Other studies have also found that college students seek more information on financial topics (Goetz et al., 2011). Administrators would benefit from providing opportunities for student to gain financial literacy. Thus, we need to learn more about what type of information they need and how it impacts their self-efficacy in making financial decision.

In this chapter, I described the research plan to study the FL of freshmen college students and analyze data to answer the research questions proposed here. I presented the three points of data collection. The data collection procedures were explained in relation to the research questions. The instruments and measures used in the study were described in detailed with reference to their use in previous studies. Their validity and reliability were assessed to demonstrate the appropriateness of their us in this study. A plan for data processing and data analysis was presented to demonstrate the appropriateness of the analysis to answer the research questions. Finally, ethical issues that are foreseen were discussed as well as a plan on how I will address those issues during the data collection and according to the Institutional Review Board.

These studies will provide first-hand data that will help SNUs administrators understand the need for financial education programs at these institutions. The findings will also show how first-year first-time college students can benefit from these programs. Although the summer success program is only available to a selected number of first-year first-time college students, this study's findings should be useful for SNUs to reconsider expanding it to all students. The study results will identify several key subjects in the students' financial education levels—first, the difference in financial literacy level based on their race/ethnicity and family income. Second, the difference between the financial literacy levels of first-generation students and the other freshman. Third, the relationship between the students' financial literacy level and their future financial planning and decisions. Lastly, to what degree does self-efficacy relate to financial literacy levels.

CHAPTER 4: FINDINGS

There is little knowledge about the relationship between financial literacy and self-efficacy among first-time first-year college students. The purpose of this study is to understand the financial literacy level (FL) of college students, specifically from the underrepresented population in a private university (Jump$tart & Wings), and to investigate the relationship between FL, self-efficacy, and financial planning. The finding of the analysis of data is presented in this chapter. Self-efficacy results will be interpreted using the theoretical framework from Bandura's Social Cognitive Theory (1997) and Prochaska and DiClemente's Transtheoretical Model (1984) in Chapter 5.

This analysis was performed to address the following research questions:

1. Is there a difference in financial literacy level based on race/ethnicity and family income?
2. Is there a difference between the financial literacy levels of first-generation students and the other freshman at a SNU?
3. What is the relationship between the students' financial literacy level and future financial planning and decisions?
4. To what degree does self-efficacy relate to financial literacy levels?

First, I will present the demographic information on the sample and subsample. Then, the descriptive data from the main variables used in this analysis will be described as the analysis process evolved. Finally, the results of the study will be presented by research question. Only the results of the data analysis will be presented in this chapter, interpretations and discussion of these findings will be presented in Chapter 5.

Participants' Demographics

This study's participants are first-time first-year students enrolled at small private, not-for-profit, Christian, liberal arts, four-year University in Southern California during the fall, 2016. Data on students who are first-generation (Jumpstart) or/and received academic support (Wings) was collected earlier during a Summer Success Program (SSP) that these students attended before starting their first school semester. The data presented here includes a sample of 347 first-time first-year participants who answered the Financial Education Proficiency Survey (FEPS) during the fall of 2019. A subsample of first-year students participated in a financial literacy follow-up during Fall, 2019 & Spring, 2020. This survey with questions about self-efficacy and financial decisions was sent to 313 of the 347 students (from the 2016) after three years of college attendance and these data were collected during the Fall '19 & Spring '20 semesters. Two hundred fourteen opened the survey, and 57 of the invited students responded. Demographics on the different initial sample as well as the subsequent subsamples are presented on the tables below. The gender distribution of the sample's participants is presented in Table 1 below.

Table 1

Participants Gender Distribution

Gender	FEPS Participants	FEPS Participant Percentage Rate
Male	113	33%
Female	209	60%
No Answer	25	7%

Summer Success Program (Jump$tart and Wings)

The Summer Success Program (SSP) took place late summer of 2016. There were 104 Jump$tart and Wings students who participated in the Financial Education Proficiency Survey (FEPS). This program is offered to students who have been conditionally accepted to the University and first-generation students that wish to be part of the summer success program, thus, not all first-generation students were captured here. Table 2 below provides the overall distribution of the SSP participants.

Table 2

SSP Group Distribution

SSP Group Category	Number of FEPS Participants	FEPS Participant Percentage Rate	First Generation
Jumpstart	32	31%	84%
Wings	72	69%	60%

Academic Class Standing

Table 3 below indicated the academic class profile of all the participants. Only freshmen participated in the SSP, three did not respond to the academic standing question. The 10 sophomores, 5 juniors and 1 senior were traditional undergraduate participants. The new academic class included transfer students that is why some of these students selected a different class level when completing the survey during their first year at the university

Table 3

*Academic Class Standing Distribution (**N**=347) Summer/Fall 2016*

Academic Class	Number of FEPS Participants	FEPS Survey Respondent Percentage Rate	First Generation
Freshmen	307	88%	40%
Sophomore	10	3%	1%
Junior	5	1%	80%
Senior	1	1%	1%
No Answer	24	7%	

Table 4 below reflects the race/ethnicity distribution of all survey participants for the 2016 data collection by total and for each of the three groups (traditional, jumpstart, and wings). Students who indicated two or more races or ethnicities were listed under the “2 or more” category. The majority of the participants are White 123 and Hispanic 70. From the statistics below Jump$tart and Wings participants are as follow, one Wings no answer, nine indicated two or more races/ethnicities, 31 White, 9 Black/African, 44 Hispanic, 3 Asian, 1 Native America, and 6 selected Other. Of the traditional undergraduates, 23 did not answer and 15 are in the “2 or more” category. The majority of the JumpStart/first-generation students are Hispanics, followed by White students. The ethnicity of students in the Wings/academic support is distributed similarly for Hispanics and Whites, with African American students in the third place.

Table 4

Race/Ethnicity Distribution (N=347) Summer/Fall 2016

Race/Ethnicity	# of FEPS Participants	FEPS Survey Respondent Percentage Rate	# of Trad. UG	# of Jumpstart	# of Wings
Black/African	20	6%	11	0	9
Asian	20	6%	17	2	1
White	154	44%	123	6	25
Hispanic	70	20%	26	17	27
Native America	7	2%	6	0	1
2 or more	24	7%	15	4	5
Other	27	8%	21	3	3
No Answer	25	7%	24	0	1

Descriptive Statistics on Main Variables

The distribution of the factors used in this analysis is discussed to describe the general pattern of financial literacy of this sample. The participants' financial literacy level (i.e., scores) is calculated based on correct responses to the scored section of the Financial Education Proficiency Survey (the total maximum score a student could achieve was 31) as presented in Table 5 below.

Table 5

*Descriptive Statistics for Financial Literacy Score Level (Traditional Undergraduates and JumpStart/Wings (**N**=328) Summer/Fall 2016*

Group	Count	Financial Literacy Score Average	Standard Deviation	Minimum	Maximum	Range
Trad. UG	226	15.3	4.4	5	25	20
Jumpstart/Wings	102	13.4	3.7	3	21	18
Jumpstart	71	13	3.6	3	21	18
Wings	31	14.6	3.8	5	20	15

As expected first-generation (Jumpstart) students scored slightly lower on financial literacy assessment than traditional and wings. Surprisingly, wings scored higher than Jumpstart/first generation. The average for all of the groups is very low at 15.3 which is considered very low (49%). When combined the two underrepresented groups score also lower than traditional students overall (13.4 versus 15.3).

Self-Efficacy Level

Six questions with a 4 Likert scale (6 being the minimum and 24 maximum scores) were used to measure the financial self-efficacy level of the participants with the larger score representing a higher level of self-efficacy. The respondents' mean score is presented in table 6 below respectively. Traditional undergraduate's mean score was 16.1 out of 24 compared to Jumpstart/Wings participants' mean score which was 15 .4, the underprivileged groups scored lower than traditional students.

Table 6

Self-Efficacy Level Score (Traditional and JumpStart/Wings) (N=346) Summer/Fall 2016

Group	Count	Self-Efficacy Score Average	Standard Deviation	Minimum	Maximum	Range
Trad. UG	242	16.1	3.4	6	24	18
Jumpstart/Wings	104	15.4	3.3	7	24	17
Jumpstart	32	15.7	2.9	11	22	11
Wings	72	15.2	3.5	7	25	17

The pattern of self-efficacy is similar to FL scores, though not as low overall compared to other norms the average was 16 out possible 24. The differences between the traditional students and Jump$tart and Wings are not as pronounced either, and it is interesting that in self-efficacy both of this underrepresented groups are very similar, contrary to FL level scores.

Credit Card Use

Most of the participants did not have credit cards (including store credit cards). About 60%-68% of traditional and Jumpstart/Wings students respectively do not use a credit card. Surprisingly, the pattern of credit cards use is very similar between jumpstart, wings, and traditional students. (See Table 7 below).

Table 7

Descriptive Statistics for Credit Card Number Distribution (N=347) Summer/Fall 2016

Credit Cards	Number Traditional UG	Percentage Traditional UG	Number Jump$tart Wings	Percentage Jump$tart Wings
None	146	60%	71	68%
One	60	25%	25	24%
Two	12	5%	2	2%
Three	3	1%	3	3%
Four	0	0%	1	1%
Five or More	2	1%	0	0%
No Answer	20	8%	2	2%

Credit Card Balance

The credit card balance distribution in Table 8 shows that 43%-49% off all students who use a credit card have a credit card balance of under $1,000.00. Only about 3% of all participants have a credit card balance greater than $10,000.00. A significant number of participants 38%-40% did not answer this question. About 96 traditional undergraduate and 40 Jumpstart/Wings participants did not respond to this credit card debt question. Based on this information we can't determine if they do not have credit card debt or if they refused to answer this question, we did not specify the question enough to make this distinction. If the question was interpreted with the former, then the number of students who had less than $1,000.00 in debt could be larger.

Table 8

*Descriptive Statistics for Credit Card Balance Distribution (**N**=311) Summer/Fall 2016*

Average Credit Card Balance	Number of Respondents Trad. UG	Percentage Trad. UG	Number of Respondents Jumpstart/Wings	Percentage Jumpstart/ Wings
Under $1,000	118	49%	45	43%
$1,000 to $2,499	14	6%	7	7%
$2,500 to $4,999	6	2%	5	5%
$5,000 to $9,999	1	0%	4	4%
More than $10,000	8	3%	3	3%
No Answer	96	40%	40	38%

Loan Debt

The average anticipated student loan debt for all students when they finish their undergraduate education is $10,000 to $19,999. This anticipated debt is below the average debt accrued by college students in the nation $38,792 (Stolba, 2021). Sixty-three (9 percent) of the traditional students indicated they would not take on student loans. Seventeen (16 percent) of the Jumpstart/Wings students indicated they would not take on student loans. This pattern might be impacted by the accessibility of other type of financial support available to them (i.e., grants). About 14% of the traditional students and 18% of the non-traditional students are at the state average reported above. Twenty-six traditional students and five Jumpstart/Wings did not respond to the student loan debt question. (See Table 9 below).

Table 9

*Descriptive Statistics for Loan Distribution (**N**=316) Summer/Fall 2016*

Loan Debt	Number of Respondents Trad. UG	Percentage Trad. UG	Number of Respondents Jumpstart/Wings	Percentage Jumpstart/ Wings
Less than $5,000	19	8%	14	13%
$5,000 to $9,999	21	9%	14	13%
$10,000 to $19,999	33	14%	19	18%
$20,000 to $29,999	36	15%	12	12%
$30,000 to $49,999	24	10%	14	13%
$50,000 or more	21	9%	9	9%
Nothing	63	26%	17	16%
No Answer	26	11%	5	5%

From this brief snapshot of the pattern of students' financial practices, it seems that the students in this college are somewhat representative of state averages, except the amount of student's loan, which is anticipated much lower than the state average. The FL level of this sample is lower than the average as normed by the Mandell's national average of 50%-70%. Next, I will explain how each question was answered through the data collected during these three data collection periods with the sample and the subsample of students.

Research Question One

Is there a difference in financial literacy level based on race/ethnicity and family income? To answer RQ 1, an independent t-test comparing the group means between the two largest ethnic groups in the sample (Whites and Hispanics) was used to look at the role of race on financial literacy levels. For this particular analysis, 24 participants (23 traditional and 1 wings) were omitted as they responded to race and could not be included in this analysis. The financial education level of Hispanics (N = 71) was significantly lower on average M = 13.93 (SD = 3.49) than Whites (N = 154) whose average score was M = 15.86 (SD = 4.24). The independent t-test correcting for unequal group size yield a statistically significant difference in the Financial Literacy Score difference between Whites and Hispanics, (t =1.97, p <.05). White students score on their FLL was significantly higher than the FLL of the Hispanic students. (see Table 10 below).

Table 10

Financial Literacy Scores by Race (White/Hispanic) (N=225) Summer/Fall 2016

VAR	*N*	*Mean*	*Std Dev*	*Variance*	*Minimum*	*Maximum*
White	154	15.8636	4.2474	18.0401	5.0000	25.0000
Hispanic	71	13.9296	3.4819	12.1235	7.0000	21.0000

Based on this analysis we must conclude that there is a significant difference based on ethnicity between the two largest ethnic groups. Next we address the difference between SES groups to learn about the role of family income on students FLL.

Family Income

Family income reflected parents' total income as collected on the original survey of 2016. A one-way ANOVA was used to compare the difference between the six different family income categories. As presented on Table 11. 1 below. 76% of the families are in the 40k – 79.9k and 80k+ income. To analyze the significance of the differences between financial literacy levels, based on family income a Bonferroni post-hoc test will be performed correcting for unequal group size.

Table 11. 1

Descriptive Statistics for Family Income (N=321) Summer/Fall 2016

Loan Debt	Number of Respondents Trad. UG	Percentage Trad. UG	Number of Respondents Jumpstart/Wings	Percentage Jumpstart/Wings
Less than $20,000	8	7%	12	12%
$20,000 to $39,999	21	9%	24	24%
$40,000 to $79,999	57	25%	22	22%
$80,000 or more	103	46%	29	29%
Don't Know	31	14%	14	14%

The significance level of the p-value obtained from the learning sample was adjusted according to the Bonferroni correction About 26 participants were omitted from this particular analysis, as they failed to respond to this question. Those who omitted an answer were 23 traditional undergraduates, 2 wings and 1 Jump$tart FL scores were voided as they responded a null value to income. The ANOVA analysis indicated that there is a statistically significant difference between some of these family income categories. The Bonferroni post-hoc test identified the income groups that were significantly different with p-value less .05. The difference between group 2 (low income) vs 3 (middle income) and group 2 (low income) vs 4 (high income) were statistically significant.

Table 11. 2

ANOVA: Financial Literacy Scores and Family Income (Traditional Graduates and JumpStart/Wings) (N=322) Summer/Fall 2016

Groups	Mean diff.	t-test statistics	p-value
2 (20K – 30K) vs 3 (40K -79.9K)	-2.49	3.16	.02
2 (20K – 30K) vs 3 (80K+)	-2.43	3.32	.01

In summary, ethnicity and family income impact the financial literacy levels of students, Hispanic students and students coming from low-income families have lower financial literacy scores. If we consider the intersectionality between ethnicity and SES it might be that Hispanic students from low-income families might have even lower financial literacy than any of these two groups separately.

Research Question Two

Is there a difference between the financial literacy levels of first-generation students and the other freshman at a SNU? To answer RQ 2 we compared the financial literacy of traditional students and those who indicated that they were first-generation college students. Although Jump$tart students were all first generation, there were also first-generation students in the traditional students' group. It is also important to remember that there is some ethnic diversity within the first-generation group (see Table 4). An independent t -test was conducted to test the significance of the differences between all students who were first-generation college attendees and their peers who were not first-generation to answer this research question (see Table 13 below).

Table 11

Compared Means t-Test: Financial Literacy Levels between First Generation and other Freshman (Traditional Undergraduates and JumpStart/Wings) (N=320) Summer/Fall 2016

VAR	N	Mean	Std Dev	Variance	Minimum	Maximum
1st Gen.	130	13.8154	4.0131	16.1052	3.0000	24.0000
Not 1st Gen	190	15.2947	4.3979	19.3412	3.0000	25.0000

Results indicate that the difference between the financial literacy level of first-generation students (N = 130 with a Mean = 13.8134 and SD = 4.01) and the other freshmen (N = 190 with a Mean = 15.19 and SD = 4.39) was statistically significant (t =1.97, $p \leq .05$). This independent t-test indicates that the Financial Literacy Levels of First-Generation students is significantly lower than that of other freshmen.

Given that we found a statistically significant difference between these two groups on FL and that previous research supports a positive correlation between FL and self-efficacy, an exploratory analyzes was performed on the scores from these two groups to see if there was a difference in their Self-Efficacy levels as well. The results of this analysis indicate that there is a statistically significant difference in the self-efficacy scores with a p- value $\leq .05$ and $t = 1.65$ between first-generation versus non-first-generation students. As expected, the mean for the first-generation students was (13.81), which is lower than the mean for the non –first-generation students (15.3). For this analysis, 34 participants were omitted as they did not respond the first-generation question and could not be included in this analysis.

In summary, the findings of the analyses conducted to address the second research question revealed that the financial literacy levels as well as the self-efficacy scores of first-generation students were significantly lower than that of the other freshman at a SNU.

Research Question Three

What is the relationship between the students' financial literacy level and future financial planning and decisions? To answer RQ 3, a Linear Pearson Correlation analysis was performed between students' financial literacy scores and total score of financial planning and decisions for the subsample that was part of both, the summer bridge program workshop and responded to the 2019 survey (n =55). No significant correlation was found between the students' FL level and their financial planning scores. It is likely that the number of participants who had scores for both variables was too small to reach significance. In addition, the financial literacy workshop was so long ago and there were so many other factors between these three years that could have influenced the relationship between these two variables that any initial association could not be captured by this delayed measure of financial planning.

In summary, results indicated that no significant correlation was found between students' financial literacy level from 2016 and future financial planning and decisions amongst 2019 survey respondents and summer bridge program participants. Although Wing and Jump$tart students did not show a significant correlation between financial literacy levels and future financial planning, the study results indicated that at-risk students start college with lower financial literacy levels than traditional students.

Research Question Four

To what degree does self-efficacy relate to financial literacy levels? To answer RQ 4, a Pearson correlation analysis was administered to address this question. The relationship between self-efficacy and financial literacy were evaluated and 328 participants were included in the study. A significant positive correlation was found between self-efficacy and financial literacy levels. The strength of the correlation was small but significant r = 0.13 with a p =.02 (N 327). In summary, a Linear Pearson Correlation analysis revealed that the greater the financial literacy levels were the higher the score of self-efficacies were, which resonate with previous research findings or the hypothesis of the theoretical framework.

Summary

The analysis performed in the data from this study indicate that overall students in this university scored below average on FL compared to the national level. An analysis on financial behaviors indicate that these students have very limited experience with financial decisions. Their credit card usage revealed that only 5% of traditional undergraduate students and 2% of Wings/Jump$tart possessed credit cards. Most of the students have limited credit use as 43%-49% have a card balance of less than $1,000 and only 3% greater than $10,000. Participants also indicated they expect $10,000 to $19,999 in loan debt after graduation on average, which is below the actual national average. Answers to the research questions for this study were found to support previous studies in this area. I found a significant difference between students from different ethnicities as well as among the low family income families and middle- or high-income families. Hispanic students and students coming from low-income families scored lower on FL than White students and students from middle- or high-income families respectively. Similarly, the analysis of the financial literacy levels between first-generation students and the other freshmen at an SNU resulted in a statistical difference between first-generation students and other students. The financial literacy levels being lower for first generation students than the other freshman at an SNU. No significant correlation between students' financial literacy level and future financial planning and decisions was found amongst a subsample of students who responded to the 2019 survey and attended summer workshop during 2016. A Linear Pearson Correlation analysis revealed that the degree of the participants' self-efficacy has a significant relationship with financial literacy levels. The findings, including the study implications, recommendations, and suggestions for future research, are provided in Chapter 5.

CHAPTER 5: DISCUSSION

Summary of the Study

This study examined the financial literacy (FL) knowledge of first-time first-year college students and the relationship between FL, self-efficacy, and financial planning. The role of the characteristics of the students were also studied, specifically comparing race, family income and the underprivileged groups of first-generation population, Jumpstart, and Wings students. The study also assessed the relationship between the students' financial literacy level and future financial planning and decisions. The purpose of this chapter is to discuss the study's key findings in relation to previous research, implications for practitioners, future research suggestions, limitations and delimitations, and conclusion.

The study of financial literacy and self-efficacy levels for first-time first year and underrepresented college students took place at a small private, not-for-profit, Christian, liberal arts, four-year University in Southern California. The definition of FL used in this study was coined by Vitt et al., (2000), "financial literacy is the ability to obtain information, analyze, manage and communicate about one's personal financial situation as it affects one's material well-being" (p. xii). Mandell's (2008) Financial Literacy Level scale was used to determine the level of the participants who completed the survey. The national standards from previous studies for FL were used to compare the level of FL of this sample. According to McKenzie (2009), "a score of 70% translates to a C in most schools, and a C is viewed as a passing grade". Mandell (2004) uses the nationally accepted value of 70% to represent a "high level of financial literacy for college students" (p. 17).

Mandell's financial literacy standards are based on the following:

- 70 percent or greater are considered a high level of financial literacy

- 50 percent through 70 percent are considered as an average level of financial literacy
- 50 percent or less are considered as a low level of financial literacy

According to McKenzie (2009), “a score of 50% or less translates to an F, is viewed as an unsatisfactory or low level of Financial Literacy. Mandell (2004) uses the nationally accepted value of 50% or less to represent a low level of financial literacy” (p. 18). The Financial Literacy Level of the students in this study was 48%, which translates into an F according to Mandell’s and McKenzie’s standards of financial literacy score. This could be a reflection of the population that this study is representing, private universities, which include a majority of families with middle class or upper-class status. As shown by the distribution of family income in this sample, 76% of the families are in the 40k – 79.9k and 80k+ income level.

Additional analysis was conducted to understand the general patterns of financial literacy indicators of financial decisions. Credit card usage and credit card debt were analyzed and almost 50% of the students reported that they do not use credit cards and of those who use them, 77% have a balance of less than $1,000. The results are consistent with the results of other studies, McKenzie (2009) reported similar credit card balances and percentages amongst college graduating seniors. It is not surprising given that they are still full-time students and not earning a salary.

The students in this study indicated that the average student would anticipate borrowing by the time they graduate is between $10,000 to $19,999. Only, nine percent of traditional undergraduates do not plan to take on loan debt versus sixteen percent of Wings and Jump$tart students. Other studies indicate that graduating college seniors accumulate $38,000 in student loan debt (McKenzie, 2009). A significant number of published articles indicate high college debt levels are related to low levels of financial literacy (Kinzie, 2007; Pults, 2019; Young

Americans Center for Financial Education, 2007).

Research Question One

The differences on FL by race and family income resulted to be significant which is not surprising. According to Mandel (2008), ethnicity, and family income are associated with students' financial literacy levels (pg. 12). The difference between race and ethnicity are similar to previous findings showing that White students scored higher on the Jump$tart financial literacy survey than Hispanics (Mandel, 2008; McKenzie, 2009; Norvitils et al., 2006).

Former studies have also identified family income as a significant factor influencing the students' financial literacy levels (Mandell, 2008; Thaden & Rookey, 2005). Results from this study confirm those findings indicating a statistically significant difference in financial literacy level between three groups. The first group of students from families with low income (20k – 30k) was significantly smaller from two groups in middle- and higher-income status (40k – 79.9k & 80k+). The study results do not help us understand the why students of higher-income households appear to be more financially literate; however, it replicates findings about the role of ethnicity and family income on FLL from other studies. Some researchers have hypothesized on the reasons for in FL across SES groups and its relation to differences on financial stress, which is common amongst students with financial concerns (Fosnacht, 2013; Trombitas, 2012). Fosnacht (2013) found three significant contributors to financial stress. The first relates to race/ethnicity; White students are most unlikely to experience financial stress when compared with Latinos/Hispanics. The second is the students' parental education level. According to Fosnacht (2013), 44% of students whose parents did not complete a college degree were in the high financial stressed group versus 27% of students whose parents had completed a degree (pg. 10). The third reason behind high levels of financial stress amongst college students is parental income. Fosnacht (2013) states that over half of the students with a parental income of greater than $100,000 were members of the low financial stress group, compared to 15% of the students with a parental income of less than $35,000 that belong to the financially stressed group (pg. 11). Students coping with high financial stress engage in risky financial behavior (Lim et al., 2014). These characteristics that contribute to financial stress were reflected on the results of this study as Hispanics, students from low-income families, and first-generation students scored lower than their counterparts on FLLs and they might be experiencing financial stress.

Research Question Two

Is there a difference between first-generation students' financial literacy levels versus the other freshman at an SNU? First generation students had lower levels of FL than other students did.

According to Annabi et al., (2018), first-generation college students are less exposed to financial literacy topics like personal finance, as their parents are less likely to have attended college and talk about financial decisions with the family. In addition, an exploratory analysis was conducted to see if there were differences between first generation students and not-first generation students across their self-efficacy scores, and this analysis also showed significant differences. It is not surprising since a positive relationship was found between these two variables, self-efficacy and FL levels. Students make decisions based on experience. Their judgment can be positive or negative, and how they may deal with a particular hardship (i.e., financial) will depend on whether they believe they will be successful. Self-efficacy is related to self-confidence and motivation, but also requires learning and application of a particular task, activity, or goal. A student who may be deemed financially literate may still lack self-efficacy and engage in risky financial behavior (i.e., possess many credit cards). A student’s level of financial literacy or self-efficacy may also be compromised due to unforeseen situations (i.e., death of a family member, inability to borrow, or loss of income). These situations are often beyond a student's control and can negatively affect their financial behavior (i.e., high credit card balances, late fees for insufficient funds).

Research Question Three

What is the relationship between the students' financial literacy level and future financial planning and decisions? The relationship between the students' financial literacy level and future financial planning and decisions was not as expected. The study found no significant correlation between the students' financial literacy level (from the 2016 test) and future financial planning and decisions amongst the 2019 survey respondents. This may be because the initial data was collected 3 years earlier, or it could also be that the subsample was very small. The results are inconsistent with other studies' results (Barua et al., 2014). Previous research by Barua et al., (2014) indicated that students receiving financial planning education showed 11% improvement in financial knowledge scores. The evidence of this study is inconsistent with previous research, the higher the students' financial literacy level, the better equipped the students are in considering financial decisions.

Research Question Four

To what degree does self-efficacy relate to financial literacy levels? This study found a significant positive correlation between the participants' self-efficacy and financial literacy levels in an analysis that included three hundred forty-six participants completed Lown's Financial Self-Efficacy survey. For this sample the traditional undergraduate students' mean score was (M=16.1), and Jumpstart/Wings' means score was (M=15.4).

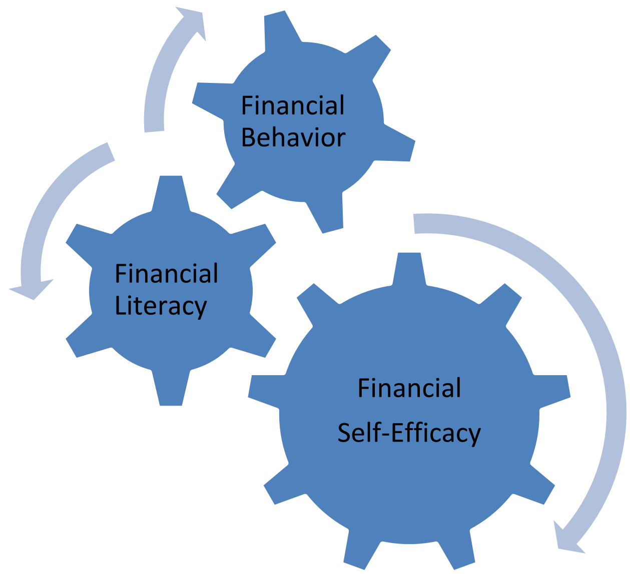
Recent studies on financial-help-seeking behavior of college students found that students having a "higher financial self-efficacy level" was associated with "lower financial stress" (Lim et al., 2014). Self-efficacy has a significant influence on financial behaviors and is a central principle of Albert Bandura's Social Cognitive Theory (1997). Schunk & DiBenedetto (2020) describe Bandura's Social Cognitive Theory of human functioning emphasizes the critical role of personal efficacy in human reasoning, motivation, and behavior. Bandura (1997) explains the central beliefs of personal efficacy as:

> Unless people believe they can produce desired effects by their actions, they have little incentive to act. Efficacy belief, therefore, is a major basis of action. People guide their lives by their beliefs of personal efficacy. Perceived self-efficacy refers to belief in one's capabilities to organized and execute the courses of action required to produce given attainment" (p. 3).

However, we know that financial literacy knowledge alone is unlikely to change behavior, it might just be the mediator to impact self-efficacy, which in turn affects behavior. The relationship between the components of financial literacy, behavior, and self-efficacy is shown centrally in Figure 1. The interplay between these components captures an individual's level of knowledge (i.e., financial literacy), confidence (i.e., self-efficacy), and ability to balance decision-making and behavior (financial behavior).

Figure 1

Financial Literacy, Behavior and Self-Efficacy

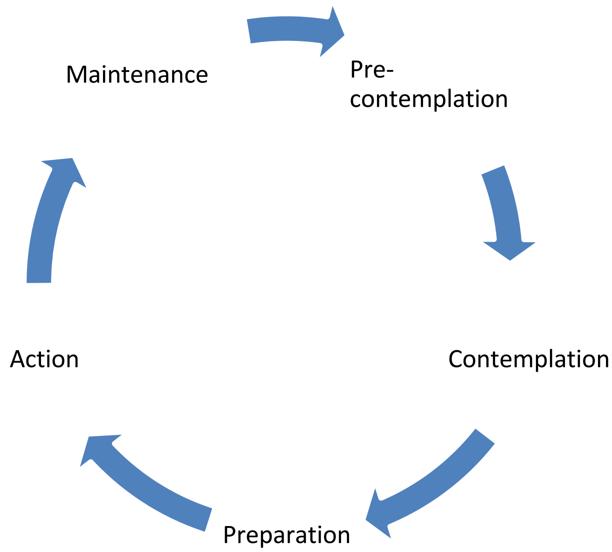


Self-efficacy cannot change students' financial behaviors alone. Prochaska and DiClemente's Transtheoretical Model of Behavior Change (TTM) approaches behavior change as a five-stage process relating to a person's readiness to change (Prochaska & DiClemente, 1984): pre-contemplation, contemplation, preparation, action, and maintenance.

According to Kubek & Weiland (2008), the first stage of the TTM starts with the individual acknowledging their problem, *pre-contemplation*. The second stage is when the person decides to act, *contemplation.* The third stage is preparation, setting goals, and priorities. The fourth stage is *action*, behavior change. The last TTM phase, *maintenance*, sustain accomplishments. Figure 2 below illustrates the TTM sequence.

Figure 2

Financial Framework



Although this study was not designed to capture the entire process of change. I found support for these theories of change in the patterns identified in this study. Financial stressors in the form of lower FL were replicated, such as, ethnicity, family income, and first-generation college students played a role on their FLL. In addition, self-efficacy was also higher for groups that experience fewer financial stressors. The relationship between FLL and self-efficacy is also an indication of support for the influence of growth as depicted on these theories of change.

Ethics

Several ethical issues arose during several phases of the research process. These issues must be addressed appropriately to avoid hurting the participants and stakeholders (Creswell, 2013). One of the most critical steps taken to avoid ethical dilemmas with this study is the successful completion of the Institutional Review Board (IRB) process. When addressing financial matters with participants, they must have a full understanding of why the study is being performed. Ignoring these matters will rise the suspicion of the participants and they could refuse to respond honestly, when it comes to talking about their finances, thus, threatening the validity of the study and increasing the risk of feeling anxiety or fear. The dissertation topic was approved by the university internal review as well. Since students were asked to complete a survey and play a major role in the study, before collecting data, a consent form was signed by all participants to indicate understand the purpose of your study. An explanation of the purpose of the study and the plan to maintain the confidentiality of their responses was included in the consent form before participants began to answer the surveys. Moreover, participants were informed that answering the survey was voluntary and that they could stop their participation at any time without any negative consequences. When reporting data, all results were disclosed at the group level and no identifying information of the individual participants will be published

Implications for Practice

Financial literacy is a complex subject. College students are impacted by economic, social, political, and cultural influences during their college years. At-risk students (first-generation and low-income students) may lack financial stability, confidence, and family support and be less exposed to financial resources and financial literacy. Students are in a vulnerable position as they start college, they take a responsibility to finance their studies for four years. Financial institutions often pray on this vulnerability by offering student loans easily and in abundance. College administrators need to take an active role in making sure all students obtain concise financial information related to paying for college. At-risk students are a large percentage of college attendees; first-generation students represent 22.2% at this university (Institutional Research, personal communication, February 2, 2021). It is imperative in small private, not-for-profit institutions to consider their needs when developing institutional policies and practices. Administrators need to implement financial literacy programs with an equity lens, so all students' needs are recognized. Educational leaders in higher education are always seeking innovative teaching methods and creating instructional curriculums to help improve all students' academic progress (Hénard & Roseveare, 2012). Student academic success is rooted in the mission statement of all colleges and universities (Chan et al., 2012). Paying for college is a learning experience. SNUs needs to develop an instructional syllabus that promotes financial education for all college students, but specially targeting the needs of those who have had limited opportunities to learn from their families, i.e., first generation students, students from low-income homes and ethnic minorities. Durband and Britt (2012), professors of personal finance, agree that FL should be a college curriculum component (pg. 1).

The study outcomes will help small not-for-profit universities better understand their first-time first-year students' financial awareness. These findings may guide administrators to develop equitable financial literacy programs. The results exposed differences and trends that will help small private colleges better understand the financial awareness of the first-generation and traditional first-time first-year freshmen. This study carries broader implications for all students, regardless of background. Administrators need to seek more support in developing financial literacy programs as the financial awareness of students is an essential aspect of life during and after college.

Limitations and Delimitations

The study took place at Concordia University, Irvine. A small private, not-for-profit, Christian, liberal arts, four-year University in Southern California. First-time first-year college students participated in the study. Findings and recommendations based on the survey results are specific to this institution, limiting the generalizability and implications of the results. Data collected for this study took place during the summer/fall 2016 and fall 2019 semester. The study will only report findings and conclusions on students attending these semesters and participating in the study. The Financial Education Proficiency developed for the study included questions adapted directly from Mandell's (2008) Jump$tart college student survey. The Financial Self-Efficacy Scale questions (Lown, 2011) allow for evaluating a respondent's awareness of their behavior and the consequences of making specific financial decisions. Although these instruments are validated with other samples, they were not created for college students, which may affect the data's reliability and validity. For each instrument, choice of wording and order was maintained and only slightly altered for a college student audience. In some instances, readability, word choice, and flow may have affected survey responses. Regardless of these limitations, the study sheds light on the much-needed topic, the importance of the relationship between college student financial literacy, behavior, and self-efficacy.

Recommendations for Further Research

There is limited research on first-time first-year college students at small not-for-profit universities. Further research should be completed between at-risk first-year college students related to race/ethnicity and family income. The findings could be helpful when developing financial education for first-generation students. In future research, college students of all classes should be given the Mandell’s (2008) Jump$tart college student survey. Results would help make proper curriculum changes on any financial education classes offered at the institution. These results could also be compared with public colleges. Financial stress plays a significant role in college students’ life. While financial aid can help lower the stress on low-income students, it is important to study other opportunities to lower the financial stress on all students regardless of their race/ethnicity and family income level.

Additional research to compare FLL between genders may help understand additional financial stressors amongst students. A study on women's financial literacy alumnae showed low literacy levels (Mahdavi & Horton, 2012). The results of this study could indicate that women acquire financial literacy differently from men.

All traditional undergraduate students could take part in the summer workshop during their traditional fall/spring semester and pre-and- 2 posts measures (one at the end of the workshop and one before graduation) of their FLL could be collected. This will allow us to learn about short term and long-term impact of the workshop. Information on students' majors could be collected in the survey to see if their selected degree affects financial literacy levels. Studying different colleges will also help us understand what the difference between general population and this particular sample is in a private non-for-Profit University. Finally, a longitudinal study that collects different type of data, not just surveys, would validate the findings and give us a more in-depth perspective of growth on financial literacy and its connection to behaviors.

Conclusions

The financial literacy score levels in this study on average was less than 50%. This score is well below Mandell's (2008) financial literacy level scale of 70% or greater (which is considered high level of financial literacy). It is actually below the average score reported in other studies (McKenzie, 2009; Cude et al., 2013). This study also showed that there is a significant difference on FLL by ethnicity and family income. White students and students coming from high-income families achieved a higher score than Hispanics and students coming from low SES. A significant difference was found also in the financial literacy levels between first-generation and other first-year students at this small not-for-profit university. This finding reinforces the need for financial education programs at these types of institutions. Financial literacy programs are needed at small not-for-profit universities now more than ever as students' financial pressures have increased due to increases in tuition and decreases in financial aid. College students live in a new normal, balancing several financial realities and coping with the fall out of the COVID-19 pandemic. Students are now faced with increasing financial hardships, intensified inequalities among students of color, and low-income students (Leader et al., 2020). Household breadwinners have lost their jobs, creating an unprecedented financial hardship. As result, the ability to pay for college tuition has declined. Financial literacy programs will educate students on how to pay for college.

Financial Literacy Programs will prepare students to take responsibility for financial decisions when funding their education. Students will learn good budgeting and spending habits (i.e., credit card usage, the importance of maintaining good credit, loan programs, and basic banking needs). Most importantly, these programs will help all students succeed in college and beyond.

REFERENCES

Affordable Loans for Any Student Act of 2019, H.R. 2065, (2019). https://www.congress.gov/bill/116th-congress/house-bill/2065

Aggarwal, M., & Gupta, M. (2014). Awareness of financial literacy among college students. *Apeejay - Journal of Management Sciences and Technology 2*(1). https://www.apeejay.edu/aitsm/journal/docs/issue-oct-2014/ajmst-020101oct14.pdf).

Akers, B., & Chingos, M. (2014, June). Is a student loan crisis on the horizon? Brown Center on Education Policy at Brookings. https://www.brookings.edu/wp-content/uploads/2016/06/Is-a-Student-Loan-Crisis-on-the-Horizon.pdf

Allen, R. (2009). Financial literacy: An imperative in economic hard times. In M. Scherer (Ed.) *Supporting the whole child* (pp. 204-209). ASCD.

Alexander, N. A. (2013). *Policy analysis for educational leaders: Step-by-step approach*. Pearson.

Alban, K., Britt, S., Durban, D., Johnson, M., & Lechter, S. (2014, March). *Financial literacy in higher education: The most successful models and methods for gaining traction* [White paper]. COHEAO Financial Literacy Awareness White Paper. https://www.coheao.com

America's Promise Alliance (2012, Oct. 22) Issue spotlight: Improving access and success for first-generation college students. https://www.americaspromise.org

Ambrose, B., Cordell, L. & Ma, S. (July, 2015). The impact of student loan debt on small business formation [Working paper No. 15-26]. https://www.philadelphiafed.org

Andruska, E., Hogarth, J., Fletcher, C., Forbes, G., & Wohlgemuth, D. (2014). Do you know what you owe? Students' understanding of their student loans. *Journal of Student*

Financial Aid, *44*(2). https://ir.library.louisville.edu/jsfa/vol44/iss2/3/

Annabi, A., González Ramírez, M. J., & Mueller, F. (2018). What determines financial knowledge among college students? *Journal of Financial Education, 44*(2). http://dx.doi.org/10.13140/RG.2.2.11822.25924/1

Aquino, E. & Flower K. (2015, May 15). Experts and students discuss effect of socioeconomic class*. The Dartmouth, Green Key Issue*. https://issuu.com/thednewspaper/docs/merged_document__42_

Archuleta K. L., Dale A., & Spann, S. M. (2013) College students and financial distress: Exploring debt, financial satisfaction, and financial anxiety. *Journal of Financial Counseling and Planning, 24*(2), 50–62. https://files.eric.ed.gov/fulltext/EJ1043230.pdf

Arthur C. (2012). Financial Literacy Education: Neoliberalism, the consumer and the citizen. Sense Publishers.

Aspelmeier, J. E., Love, M. M., McGill, L. A., Elliott, A. N., Pierce, T. W. (2012) Self-esteem, locus of control, college adjustment and GPA among first- and continuing-generation students: A moderator model of generational status. *Research in Higher Education, 53*(7), 755-781. https://psycnet.apa.org/doi/10.1007/s11162-011-9252-1

Avery, C. & Turner, S. (2012). Student loans: Do college students borrow too much—or not enough? *The Journal of Economic Perspectives, 26*(1), 165-192. https://doi.org/10.1257/jep.26.1.165

Bahls, S. (2011, June). *Time to teach financial literacy*. Inside Higher Ed. https://www.insidehighered.com/views/2011/06/13/time-teach-financial-literacy

Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavior change. *Psychological Review, 84*(2), 191-215. https://psycnet.apa.org/doi/10.1037/0033-295X.84.2.191

Bandura, A. (1989). Human agency in social cognitive theory. *American Psychologist*, *44*(9), 1175–1184. https://doi.org/10.1037/0003-066x.44.9.1175

Bandura, A. (1997). *Self-efficacy: The exercise of control*. W.H. Freeman.

Baron-Donovan, C., Wiener, R. L., Gross, K. & Block-Lieb, S. (2005). Financial literacy teacher training: A multiple-measure evaluation. *Journal of Financial Counseling and Planning, 16*(2): 63–75. https://www.scopus.com/

Barua, R., Koh, B., & Mitchell, O. S. (2017). Does financial education enhance financial preparedness? Evidence from a natural experiment in Singapore. *Journal of Pension Economics and Finance*, *17*(3), 254–277. https://doi.org/10.1017/s1474747217000312

Beverly, S. G., & Burkhalter, E. K. (2005). Improving the financial literacy and practices of youths. *Children & Schools*, *27*(2), 121-124. https://doi.org/10.1093/CS%2F27.2.121

Bidwell, A. (2015, April 2). *Survey: College students becoming less financially responsible.* https://usnews.com

Bidwell, A. (2018, October 17). *College tuition remains flat, but net price continues to increase.* NASFFA. https://www.nasfaa.org/

Blair, J., Czaja, R., & Blair, E. A. (2014). Designing surveys: a guide to decisions andprocedures (Third edition). Los Angeles: SAGE

Bodvarsson, O. B., & Walker, L. (2004). Do parental cash transfers weaken performance in college? *Economics of Education Review, 23* (5), 483–495. http://dx.doi.org/10.1016/j.econedurev.2003.11.009

Bok, D. (2013). *Higher education in America*. Princeton University Press.

Bongini, P., Trivellato, P., & Zenga, M. (2012). Measuring literacy among students: An application of Rasch Analysis. *Electronic Journal of Applied Statistical Analysis, 5*(3), 425-430. https://doi.org/10.1285/i20705948v5n3p425

Botos, K. (2014). Finances and life cycles. *Public Finance Quarterly, 4*, 413-424 https://www.penzugyiszemle.hu

Britt, S. L., Ammerman, D. A., Barrett, S. F., & Jones, S. (2017). Student loans, financial stress, and college student retention. *Journal of Student Financial Aid, 47*(1). https://ir.library.louisville.edu/jsfa/vol47/iss1/3

Bulger, S., & Watson, D. (2006). Broadening the definition of at-risk students. *Community College Enterprise*, *12*(2), 23–32. https://eric.ed.gov/?id=EJ846012

Chan, S. F., Chau, A. W. L., & Chan, K. Y. K. (2012). Financial knowledge and aptitudes: Impacts on college students' financial well-being. *College Student Journal, 46*(1), 114-132. https://eric.ed.gov/?id=EJ991174

Chemers, M. M., Hu, L., & Garcia, B. F. (2001). Academic self-efficacy and first year college student performance and adjustment. *Journal of Educational Psychology*, *93*(1), 55–64. https://doi.org/10.1037/0022-0663.93.1.55

Classes and Careers (2011). *Statistics of the college drop-out*. https://www.classesandcareers.com

Cochran, T., & Coles, A. (2012, Winter). *Maximizing the college choice process to increase fit & match for underserved students* [Brief]. Pathways to College Network, Institute for Higher Education Policy, & National College Access Network. https://files.eric.ed.gov/fulltext/ED585291.pdf

Coffman, S. (2011). A social constructionist view of issues confronting first-generation college students. *New Directions for Teaching and Learning*, (127), 81-90. https://doi.org/10.1002/tl.459

CollegeBoard (2018). *Trends in college pricing 2018*. https://research.collegeboard.org

CollegeBoard (2018). *Trends in student aid 2018*. https://research.collegeboard.org

CollegeBoard (2019). *Trends in student aid 2019*. https://research.collegeboard.org

Cortez, M. (2018, October 15). *Regents not doing enough to control college tuition increases, audit says*. Deseret News. https://www.deseret.com

CreditRepair.com (2015). Student's guide to credit. http://assets.creditrepair.com/students-guide-to-credit.pdf

Creswell, J. W. (2013). Qualitative inquiry & research design: Choosing among five approaches. Thousand Oaks: Sage Publications.

Cude, B., Kunovskaya, I., Kabaci, M., & Henry, T. (2013, April 11). *Assessing changes in the financial knowledge of college seniors* [Paper presentation]. ACCI Annual Conference, Portland Oregon. *Consumer Interests Annual*, 59, 1-17. https://www.consumerinterests.org/cia2013

Darling-Hammond, L. (2010) *The flat world and education: How America's commitment to equity will determine our future.* The Multicultural Education Series. Teachers College Press.

Davis, J. (2010). *The first-generation student experience: Implications for campus practice, and strategies for improving persistence and success.* Stylus Publishing.

DeFreitas, S. C., & Rinn, A. (2013). Academic achievement in first generation college students: The role of academic self-concept. *Journal Of the Scholarship of Teaching And Learning*, *13*(1), 57-67. https://eric.ed.gov/?id=EJ1011678

De La Rosa, M. L. (2006). Is opportunity knocking? Low-income students' perceptions of college and financial aid. *American Behavioral Scientist. 49*(12), 1670-1686. 10.1177/0002764206289139

De La Rosa, M. L. (2012, January 10). Borrowing and working of low-income students: The impact of a summer transition program. *Journal of Student Financial Aid, 42*(1), 5-16. http://publications.nasfaa.org/jsfa

Dempere, J.M., Griffin, R., & Camp, P. (2010). Student credit card usage and the perceived importance of financial literacy education. *Journal of the Academy of Business Education, 11,* 1-12. https://abeweb.org/proceedings/proceedings10/camp.pdf

Denhart, C. A. (2013, August.). *How the $1.2 trillion college debt crisis is crippling students, parents and the economy*. Forbes. Denhart, C. A. (2013, August 7). *How the $1.2 trillion college debt crisis is crippling students, parents and the economy*. Forbes. http://www.forbes.com

DesJardins, S. L., Ahlburg, D. A., & McCall, B. P. (2006). An integrated model of application, admission, enrollment, and financial aid. *The Journal of Higher Education*, *77*(3), 381–429. https://doi.org/10.1080/00221546.2006.11778932

Dietz, B. E., Carrozza, M., & Ritchey, P. N. (2003). Does financial self-efficacy explain gender differences in retirement saving strategies? *Journal of Women & Aging*, *15*(4), 83–96. https://doi.org/10.1300/j074v15n04_07

Douglas-Gabriel, D. (2017, October 25). *Families are paying more out of pocket for college as tuition increases surpass grant aid.* Washington Post. https://www.washingtonpost.com.

Driscoll, E. (2013, March 4). How College Grads Can Improve Money Management Skills Fox Business. https://www.foxbusiness.com

Durband, D. B., & Britt, S. L. (Eds.) (2012). *Student financial literacy campus-based program development,* New York. Springer, 9–26.

de Vise, D. (2012, March 6). *Student loans surpass auto, credit card debt*. Washington Post. http://www.washingtonpost.com

Eisler, D. L., & Garrison, S. (2014). Addressing college student loan debt Strategies for success. *College & Research Libraries News*, *75*(7). https://doi.org/10.5860/crln.75.7.9158

Elliott, W., & Nam, I. (2012). Direct effects of assets and savings on the college progress of Black young adults. *Educational Evaluation and Policy Analysis, 34*(1), 89–108. https://doi.org/10.3102%2F0162373711425957

Engle, J., & Tinto, V. (2008). *Moving beyond access: College success for low-incomes, first-generation students*. Washington, DC: Pell Institute for the Study of Opportunity in Higher Education. https://eric.ed.gov/?id=ED504448

Evans, R. (2016). *A qualitative exploration of first-generation student experiences at a rural community college* [Doctoral dissertation]. Old Dominion University, Norfolk, VA. https://doi.org/10.25777/6kj6-4087

Farrington, R. (2016, May 19). Importance of credit: The student's guide to credit.

Finkel, E. (2010). A bull market for financial literacy: The Great Recession compels school districts to teach dollars and sense. *District Administration*, *46*(8), 68-74. https://eric.ed.gov/?id=EJ897629

Fishman, R. (2015, May 28). College Decisions Survey: Deciding to go to college. https://www.newamerica.org/education-policy/edcentral/collegedecisions/

Fosnacht, K. (2013, March 6). *Undergraduate coping with financial stress: A latent class analysis* [Paper presentation]. Annual Meeting of the American College Personnel Association, Las Vegas, NV. https://hdl.handle.net/2022/24310

Friedman, Z. (2020, February 3). *Student loan debt statistics in 2020: A $1.6 trillion crisis.* Forbes. https://www.forbes.com

Gale, W. & Levine, R. (2010, October 1). *Financial literacy: What works? How could it be more effective*? Brookings. https://www.brookings.edu

Gay, L. R., Mills, G. E., & Airasian, P. W. (2012). *Educational research: Competencies for analysis and applications* (10th ed). Boston: Pearson.

George-Jackson, C. and Gast, M. (2015). Addressing information gaps: Disparities in financial awareness and preparedness on the road to college. *Journal of Student Financial Aid*, *44*(3), 202-234. https://eric.ed.gov/?id=EJ1054668

Gibbons, M. M., Borders, L. D., Wiles, M. E., Stephan, J. B., & Davis, P. E. (2006). Career and college planning needs of ninth graders—as reported by ninth graders. *Professional School Counseling, 10*(2), 168-178. https://doi.org/10.1177%2F2156759X0601000207

Gjesfjeld, C. (2014). Meeting student resistance with empathetic teaching in the college classroom. *Gauisus, 2*, 1-8. https://sotl.illinoisstate.edu/downloads/gauisus/GjesfjeldVolume2.pdf

Goetz J., & Palmer L. (2012) Content and delivery in financial education programs. In D. Durband and S. Britt (Eds.) *Student financial literacy: Campus-Based Program Development* (65-78). Springer, Boston, MA. https://doi.org/10.1007/978-1-4614-3505-1_6

Grable, J. E., Archuleta, K. L., & Roudi, N. (Eds.) (2010). *Financial planning and counseling scales.* Springer. https://psycnet.apa.org/doi/10.1007/978-1-4419-6908-8

Grable, J., Law, R., & Kaus, J. (2012). An overview of university financial education programs. In D. B. Durband & S. Britt (Eds.), *Student financial literacy: Campus-based program development* (pp. 9-26). New York: Springer. https://doi.org/10.1007/978-1-4614-3505-1_2

Grau-Valldosera, J., & Minguillón, J. (2014). Rethinking dropout in online highereducation: The case of the Universitat Oberta De Catalunya. *International Review of Research in Open and Distance Learning*, *15*(1), 290-308. http://dx.doi.org/10.19173/irrodl.v15i1.1628

Grodsky, E., & Jones, M. T. (2007). Real and imagined barriers to college entry: Perceptions of cost. *Social Science Research, 36*(2), 745–766. https://psycnet.apa.org/doi/10.1016/j.ssresearch.2006.05.001

Halley, R. E., Durband, D. B., & Britt, S. L. (2012). Staffing and recruiting considerations for financial education programs. In D. B. Durband & S. L. Britt (Eds.), *Student financial literacy: Campus-based program development* [pp. 27–36]. New York: Springer. https://doi.org/10.1007/978-1-4614-3505-1_3

Harnisch, T. L. (2010). Boosting financial literacy in America: A role for state colleges and universities. *Perspectives*. American Association of State Colleges and Universities. https://eric.ed.gov/?id=ED512025

Hauptman, A. M. (2015). The impact of the US financial crisis on how students pay for college. *International Higher Education, 54*. https://doi.org/10.6017/ihe.2009.54.8407

Hénard, F. & Roseveare, D. (2012, September). *Fostering quality teaching in higher education: Policies and practices.* Institutional Management in Higher Education. Organisation for Economic Co-operation and Development. https://www.oecd.org/edu/imhe/QT%20policies%20and%20practices.pdf

Hicks, T. (2005). Assessing the academic, personal and social experiences of pre-college students. *Journal of College Admission, 186,* 17-24. https://eric.ed.gov/?id=EJ682486

Hiler, T., Hatalsky, E. L., & John, M. (2016, May 24). Incomplete: The quality crisis at America's private, non-profit colleges. https://www.thirdway.org

Hillman, N. W. (2014). College on credit: A multilevel analysis of student loan default. *Review Of Higher Education, 37*(2), 169-195. http://dx.doi.org/10.1353/rhe.2014.0011

Holland, K. (2015, June 15). *The high economic and social costs of student loan debt.* CNBC. http://www.cnbc.com/2015/06/15/

Horton, J. (2015). Identifying at-risk factors that affect college student success. *International Journal of Process Education, 7(*11*)*, p. 88. https://www.ijpe.online/2015/risk.pdf

Hoyt, E. (2014). *30 money saving tips for students*.

iGrad (2013). *Wants vs. needs: The secret to successfully prioritizing your expenses. In your financial mastery workbook companion*. http://www.igrad.com/

Jagman, H., Lewis, K., Nunn, B., & Walter, S. (2014). Financial literacy across the curriculum (and beyond). *College & Research Libraries News, 75*(5), 254–257. https://doi.org/10.5860/crln.75.5.9124

Johnson, J., Rochkind, J., Ott, A. N. & DuPont, S. (2008). With their whole lives ahead of them: Myths and realities about why so many students fail to finish college [Report]. Public Agenda. https://files.eric.ed.gov/fulltext/ED507432.pdf

Johnson, E., & Sheridan, M.S. (2007). From financial literacy to financial capability among youth. *Journal of Sociology and Social Welfare*, *34*(3), 119-146. https://doi.org/10.7936/K77M07GS

Jones, R. & Becker, K. (2002). Getting prepared for the underprepared. *The Mentor: An Academic Advising Journal, 4*(2). https://journals.psu.edu/mentor/article/view/61696

Joyner, R. L., Rouse, W. A., & Glatthorn, A. A. (2013). Writing the winning thesis or dissertation: A step-by-step guide (3rd ed). Thousand Oaks, CA: Corwin Press

Koh, N. K. (2016). Approaches to teaching financial literacy: Evidence-based practices in Singapore schools. In C. Aprea, E. Wuttke, K. Breuer, P. Davies, and J. S. Lopus, (Eds.), *International Handbook of Financial Literacy*, 499-513. Springer

Korkki, P. (2014, May 24). *The ripple effects of rising student debt.* The New York Times. https://nytimes.com

Kubek, P. M., & Weiland, M. K. (2008, December 13). *"Stages of change" co-creator Carlo DiClemente discusses practical applications of his Transtheoretical Model for health, wellness and recovery.* Center for Evidenced-Based Practices at Case Western Reserve University. https://case.edu/socialwork/centerforebp/

Lerman, R.I., & Bell, E. (2006, August 17). *Financial literacy strategies: Where do we go from here* [Brief]? Opportunity and Ownership Project, Report 1. Urban Institute: Washington, DC. https://www.urban.org/

Lightweis, S. (2014). The challenges, persistence, and success of White, working-class, first-generation college students. *College Student Journal*, *48*(3), 461-467. https://eric.ed.gov/?id=EJ1045347

Lim, H., Heckman, S. J., Letkiewicz, J. C., & Montalto, C. P. (2014). Financial stress, self-efficacy, and financial help-seeking behavior of college students. *Journal of Financial Counseling and Planning*, *25*(2), 148–160. https://psycnet.apa.org/record/2014-55079-003

Lohfink, M. M., & Paulsen, M. B. (2005). Comparing the determinants of persistence for continuing-generation students. *Journal of College Student Development, 46*(4)*,* 409-428. https://eric.ed.gov/?id=EJ743893

Long, B. T., & Riley, E. (2007). Financial aid: A broken bridge to college access? *Harvard Educational Review*, *77*(1), 39–63. https://eric.ed.gov/?id=EJ765961

Looney, A., & Yannelis, C. (2015, Fall). *A crisis in student loans? How changes in the characteristics of borrowers and in the institutions they attended contributed to rising loan defaults.* Brookings Papers on Economic Activity, 1–64. https://brookings.edu

Lown, J. M. (2011). 2011 outstanding AFCPE® Conference Paper: Development and validation of a Financial Self-Efficacy Scale. *Journal of Financial Counseling and Planning, 22*(2)*,* 54–63. 2013-19795-003

Lunenburg, F. C., & Irby, B. J. (2008). *Writing a successful thesis or dissertation: Tips and strategies for students in the social and behavioral sciences.* Corwin Press. https://doi.org/10.4135/9781483329659

Lusardi, A. & Mitchell, O. (2014). The economic importance of financial literacy: Theory and evidence. *Journal of Economic Literature, American Economic Association, 52*(1), 5-44. https://doi.org/10.1257/jel.52.1.5

Mahdavi, M., & Horton, N. J. (2014). Financial knowledge among educated women: Room for improvement. *Journal of Consumer Affairs*, *48*(2), 403–417. https://doi.org/10.1111/joca.12032

Mandell, L. (2006). Financial literacy: If it's so important, why isn't it improving? *SSRN Electronic Journal*. https://dx.doi.org/10.2139/ssrn.923557

Mandell, L. (2008). The financial literacy of young American adults. In J. J. Xiao (Ed.) *Handbook of consumer finance* (pp. 163-183). https://doi.org/10.1007/978-0-387-75734-6_10

McKenzie, V. M. (2009). *The financial literacy of university students: A comparison of graduating seniors' financial literacy and debt level*. [Doctoral dissertation, University of South Florida]. University of South Florida Scholar Commons. https://digitalcommons.usf.edu/etd/2094

Marcus, J. & Hacker. H. K. (2105, December 17). *Here's the devastating way our college system fails poor kids.* Huffington Post. https://www.huffpost.com

Moody, K. (2014). *5 hidden costs of college-Kiplinger* www.kiplinger.com/slideshow/college/T007-S001-5-hidden-costs-of-college/index.html

Morales, E. E. (2014). Learning from success: How original research on academic resilience informs what college faculty can do to increase the retention of low socioeconomic status students. *International Journal of Higher Education*, *3*(3), 92-102. https://eric.ed.gov/?id=EJ1067580

Murphy, A. J. (2005). Money, money, money: An exploratory study on the financial literacy of black college students. *College Student Journal,* 39(3), 478. https://eric.ed.gov/?id=EJ725583

MyMoney.gov (2015). https://www.mymoney.gov

Murrell, K., & Lopez-Fernandini, A., (2008, December 15). *The effectiveness of youth financial education* [Policy paper]. New America. https://www.newamerica.org

Oreopoulos, P., & Petronijevic, U. (2013). Making college worth it: A review of the returns to higher education. *Future Of Children, 23*(1), 41-65. https://doi.org/10.1353/foc.2013.0001

Park, B. (2004, May). UC Davis student affairs research & information. *Parental involvement in the college education process*. SARI Report #324. https://www.sariweb.ucdavis.edu/downloads/324.ParentalInvolvement.pdf

Pascarella, E. T., Pierson, C. T., Wolniak, G. C., & Terenzini, P. T. (2004). First-generation college students: Additional evidence on college experiences and outcomes. *Journal of Higher Education, 75*(3), 249-284. https://doi.org/10.1080/00221546.2004.11772256

Payzant, E. (2012, April 1). *Don't fall for these 5 college scholarship scams*. U.S. News and World report. www.usnews.com/education/blogs/the-scholarship-coach/2012/07/26/dont-fall-for-these-5-college-scholarship-scams

Pelco, L. E., Ball, C. T., & Lockeman, K. S. (2014). Student growth from service-learning: A comparison of first-generation and non-first-generation college students. *Journal Of Higher Education Outreach and Engagement*, *18*(2), 49-66. https://eric.ed.gov/?id=EJ1029848

Perry, V. G., & Morris, M. D. (2005). Who is in control? The role of self-perception, knowledge, and income in explaining consumer financial behavior. *Journal of Consumer Affairs*, *39*(2), 299–313. https://doi.org/10.1111/j.1745-6606.2005.00016.x

Peng, T.-C. M., Bartholomae, S., Fox, J. J., & Cravener, G. (2007). The impact of personal finance education delivered in high school and college courses. *Journal of Family and Economic Issues*, *28*(2), 265–284. https://doi.org/10.1007/s10834-007-9058-7

Poterba, J., Venti, S., & Wise, D. (2008). The changing landscape of pensions in the United States. In A. Lusardi (Ed.), *Overcoming the saving slump: How to increase the effectiveness of financial education and saving programs* (pp. 17–46). Chicago and London: University of Chicago Press

Prochaska, J.O. & DiClemente, C.C. (1984). The transtheoretical approach: Crossing traditional boundaries of change. Homewood, IL: Dow Jones-Irwin Dorsey Professional Books

Pults, B. (2019, September, September 24). *Solving student loan debt through financial literacy* [Blog]. American Youth Policy Forum. https://www.aypf.org

Reaume, A. (2015, September 6). 6 Common money mistakes college freshmen make. *Time*. https://www.time.com/money/4023116/money-mistakes-college-freshmen/

Redding, C.A., Rossi, J. S., Rossi, S.R., Velicer, W.F., & Prochaska, J. O., (2000). Health behavior models. *The International Electronic Journal of Health Education*. *3*, 180–193. http://www.iejhe.siu.edu

Remund, D. L. (2010). Financial literacy explicated: The case for a clearer definition in an increasingly complex economy. *The Journal of Consumer Affairs, 44*(2), 276-295. https://doi.org/10.1111/j.1745-6606.2010.01169.x

Ross, S., Cleland, J., & Macleod, M.J. (2006). Stress, debt and undergraduate medical student performance. *Medical Education, 40*(6), 584-589. https://doi.org/10.1111/j.1365-2929.2006.02448.x

Sallie Mae. (2009). *How undergraduate students use credit cards: Sallie Mae's national study of usage rates and trends 2009.* Sallie Mae. https://docplayer.net/15666900-How-undergraduate-students-use-credit-cards-sallie-mae-s-national-study-of-usage-rates-and-trends-2009.html

Sallie Mae & Ipsos (2018). *How America pays for college 2018.* Sallie Mae. www.salliemae.com/assets/research/HAP/HowAmericaPaysforCollege2018.pdf

Sallie Mae & Ipsos (2015). *Majoring in money: How can American college students manage their finances.* Sallie Mae. https://files.eric.ed.gov/fulltext/ED577455.pdf

Sánchez, J. M., & Zhu, L. (2015). Student loan delinquency: A big problem getting worse? *Economic Synopsis, No. 7.* https://doi.org/10.20955/es.2015.7

Schuchardt, J., Hanna, S. D., Hira, T. K., Lyons, A. C., Palmer, L., & Xiao, J. J. (2009). Financial literacy and education research priorities. *Journal of Financial Counseling and Planning, 20*(1), 84-95. https://eric.ed.gov/?id=EJ859569

Schunk, D. H., & DiBenedetto, M. K. (2020). Motivation and social cognitive theory. *Contemporary Educational Psychology*, *60*, Article 101832. https://doi.org/10.1016/j.cedpsych.2019.101832

Scott-Clayton, J., Crosta, P. & Belfield, C. (2014). Improving the targeting of treatment: Evidence from college remediation. *Educational Evaluation and Policy Analysis*, *36*(3), 371-393. https://doi.org/10.3102/01623737135

Senge, P. M. (Ed.). (2012). *Schools that learn: A fifth discipline fieldbook for educators, parents, and everyone who cares about education* (1st revised edition). New York: Crown Business.

Smith, A. A. (2016, April 6). *The cost of remediation*. Inside Higher Ed www.insidehighered.com/news/2016/04/06/parents-and-students-pay-high-price-college-remediation-study-finds

Snider, S. (2015, April). Universities where the most students brought cars to campus. US News and World Report. http://www.usnews.com/education/best-colleges/the-short-list-college/articles/2015/04/21/universities-where-the-most-students-brought-cars-to-campus

Špiranec, S., Zorica, M. B., & Simončić, G. S. (2012). Libraries and financial literacy: Perspectives from emerging markets. *Journal of Business & Finance Librarianship*, *17*(3), 262–278. https://doi.org/10.1080/08963568.2012.686438

Stolba, S. L. (2021, February 24). *Student loan debt record high as most repayment Is paused*. Experion.com. https://www.experian.com/blogs/ask-experian/state-of-student-loan-debt/

Stinson, S. (2013, October 1). *Debt lessons: How financial aid literacy programs are helping keep student debt under control*. University Business. https://www.thefreelibrary.com

Student Lending Analytics Blog (2010, November 4). Financial Literacy Survey. http://studentlendinganalytics.typepad.com

Supon, V. (2012). Helping students to become money smart. *Journal Of Instructional Psychology*, *39*(1), 68-71. https://eric.ed.gov/?id=EJ979011

Tennyson, S., & Nguyen, C. (2001). State curriculum mandates and student knowledge of personal finance. *The Journal of Consumer Affairs, 35*(2), 241-262. https://eric.ed.gov/?id=EJ640424

Thaden, L. L., & Rookey, B. D. (2005). *Financial decision-making and economic inequality: Sources of influence on college students' financial literacy* [Presentation]. AFCPE Annual Conference, Inequalities Seminar, Scottsdale, AZ.

The Jump$tart Coalition for Personal Financial Literacy. (2008). www.jumpstartcoalition.org

The House Ways and Means Committee (2015, October 7). *The rising costs of higher education and tax policy* [Hearing]. 114th Congress. https://www.govinfo.gov/content/pkg/CHRG-114hhrg22150/pdf/CHRG-114hhrg22150.pdf

The White House Office of the Press Secretary (2015, March 10). *Presidential memorandum: Student Aid Bill of Rights* [Press release]. https://obamawhitehouse.archives.gov/the-press-office/2015/03/10/presidential-memorandum-student-aid-bill-rights

Tyler, R. W. (1949). *Basic principles of curriculum and instruction.* Chicago: University of Chicago Press.

United States General Accounting Office. (2001). Consumer finance: College students and credit cards. https://www.gao.gov/assets/gao-01-773.pdf

Vien, C. (2015, September 20). College students think they manage money well, but they don't, survey. https://www.journalofaccountancy.com

Vitt, L. A., Anderson, C., Kent, J., Lyter, D. M., Siegenthaler, J. K., & Ward, J. (2000). *Personal finance and the rush to competence: Financial literacy education in the U.S.* Institute for Socio-Financial Studies. https://www.isfs.org/documents-pdfs/rep-finliteracy.pdf

Washicko, C. (2013, July 24). What college students should know about retirement. www.money.usnews.com

Wiens, C. (2013). *The experts: Are 529 plans the right choice for all families savings to send their kids to college?* The Washington Post. https://www.wsj.com

Wiersch, A. M. (2014, January 31). *The cost of college: Student loan debt on the rise.* Forefront. https://www.clevelandfed.org/en/newsroom-and-events/publications/forefront/ff-v5n01/ff-v5n014501-the-cost-of-college-student-loan-debt.aspx

Wolf, N. (2012, March 22). *This pampered private school elite can only lead to U.S. decline.* The Guardian. https://www.theguardian.com

Wyatt, G. L. (2011). Nontraditional student engagement: Increasing adult student success and retention. *The Journal of Continuing Higher Education, 59*(1), 10-20. https://doi.org/10.1080/07377363.2011.544977

Xiao, J. J. (2008). Applying behavior theories to financial behavior. In J.J. Xiao (Ed.) *Handbook of Consumer Finance Research*, (pp 69–81). Springer. https://doi.org/10.1007/978-0-387-75734-6_5

APPENDIX

Appendix A: The Financial Education Proficiency Survey

Part I – Description of study intent, confidentiality and consent information

Welcome!

Thank you for your participation in the Financial Education Proficiency Survey. If you are at least 18 years old and are an undergraduate college student, please read the information below about the study before taking the survey.

Information and Consent Form

I invite you to participate in my research study about the financial education of college students. The purpose of this project is to measure financial education and factors influencing financial behavior. There are questions about financial attitudes, financial knowledge, influences on financial education, and demographic information. Please try to answer every question. If there is a question you do not feel comfortable answering, you may skip it. All of the information gathered will be remain private.

Print Name: ______________________

Signature: _______________________Date: ________________

Part II – Financial Self-Efficacy Scale

Please respond to the following statements using these response categories:

1= Exactly true2= Moderately true

3= Not very true4= Not at all true

1. It is hard to stick to my spending plan when unexpected expenses arise.

2. It is challenging to make progress toward my financial goals.

3. When unexpected expenses occur I usually have to use credit.

4. When faced with financial challenges, I have a hard time figuring out a solution.

5. I lack confidence in my ability to manage my finances.

6. I worry about running out of money.

Part III – Study Questions and General Financial Information

1. Inflation can cause difficulty in many ways. Which group would have the greatest problem during periods of high inflation that last several years?

   a.) Older, working couples saving for retirement.

b.) Older people living on fixed retirement income.

c.) Young couples with no children who both work.

d.) Young working couples with children.

2. Which of the following is true about sales taxes?

a.) The national sales tax percentage rate is 6%.

b.) The federal government will deduct it from your paycheck.

c.) You don’t have to pay the tax if your income is very low.

d.) It makes things more expensive for you to buy.

3. Rebecca has saved $12,000 for her college expenses by working part-time. Her plan is to start college next year and she needs all of the money she saved. Which of the following is the safest place for her college money?

a.) Locked in her closet at home.

b.) Stocks.

c.) Corporate bonds.

d.) A bank savings account.

4. Which of the following types of investment would best protect the purchasing power of a family’s savings in the event of a sudden increase in inflation?

a.) A 10-year bond issued by a corporation.

b.) A certificate of deposit at a bank.

c.) A twenty-five-year corporate bond.

d.) A house financed with a fixed-rate mortgage.

5. Under which of the following circumstances would it be financially beneficial to you to borrow money to buy something now and repay it with future income?

a.) When you need to buy a car to get a much better paying job.

b.) When you really need a week vacation.

c.) When some clothes you like go on sale.

d.) When the interest on the loan is greater than the interest you get on your savings.

6. Which of the following statements best describes your right to check your credit history for accuracy?

a.) Your credit record can be checked once a year for free.

b.) You cannot see your credit record.

c.) All credit records are the property of the U.S. Government and access is only available to the FBI and Lenders.

d.) You can only check your record for free if you are turned down for credit based on a credit report.

7. Your take home pay from your job is less than the total amount you earn. Which of the following best describes what is taken out of your total pay?

   a.) Social security and Medicare contributions.

   b.) Federal income tax, property tax, and Medicare and Social Security contributions.

   c.) Federal income tax, social security and Medicare contributions.

   d.) Federal income tax, sales tax, and social security contribution.

8. Retirement income paid by a company is called:

   a.) 401 (k).

   b.) Pension.

   c.) Rents and profits.

   d.) Social Security.

9. Many people put aside money to take care of unexpected expenses. If Juan and Elva have money put aside for emergencies, in which of the following forms would it be of LEAST benefit to them if they needed it right away?

   a.) Invested in a down payment on the house.

   b.) Checking account.

   c.) Stocks.

   d.) Savings account.

10. David just found a job with a take-home pay of $2,000 per month. He must pay $900 for rent and $150 for groceries each month. He also spends $250 per month on transportation. If he budgets $100 each month for clothing, $200 for restaurants and $250 for everything else, how long will it take him to accumulate savings of $600.

   a.) 3 months.

   b.) 4 months.

   c.) 1 month.

   d.) 2 months.

11. Sara and Joshua just had a baby. They received money as baby gifts and want to put it away for the baby's education. Which of the following tends to have the highest growth over periods of time as long as 18 years?

   a.) A checking account.

   b.) Stocks.

   c.) A U.S. Govt. savings bond.

   d.) A savings account.

12. Barbara has just applied for a credit card. She is an 18-year-old high school graduate with few valuable possessions and no credit history. If Barbara is granted a credit card, which of the following is the most likely way that the credit card company will reduce ITS risk?

a.) It will make Barbara's parents pledge their home to repay Karen's credit card debt.

b.) It will require Barbara to have both parents co-sign for the card.

c.) It will charge Barbara twice the finance charge rate it charges older cardholders.

d.) It will start Barbara out with a small line of credit to see how she handles the account.

13. Chelsea worked her way through college earning $15,000 per year. After graduation, her first job pays $30,000. The total dollar amount Chelsea will have to pay in Federal Income taxes in her new job will:

a.) Double, at least, from when she was in college.

b.) Go up a little from when she was in college.

c.) Stay the same as when she was in college.

d.) Be lower than when she was in college.

14. Which of the following best describes the primary sources of income for most people age 20-35?

a.) Dividends and interest.

b.) Salaries, wages, tips.

c.) Profits from business.

d.) Rents.

15. If you are behind on your debt payments and go to a responsible credit counseling service such as the Consumer Credit Counseling Services, what help can they give you?

    a.) They can cancel and cut up all of your credit cards without your permission.

    b.) They can get the federal government to apply your income taxes to pay off your debts.

    c.) They can work with those who loaned you money to set up a payment schedule that you can meet.

    d.) They can force those who loaned you money to forgive all your debts.

16. Rob and Mary are the same age. At age 25 Mary began saving $2,000 a year while Rob saved nothing. At age 50, Rob realized that he needed money for retirement and started saving $4,000 per year while Mary kept saving her $2,000. Now they are both 75 years old. Who has the most money in his or her retirement account?

    a.) They would each have the same amount because they put away exactly the same

    b.) Rob, because he saved more each year

    c.) Mary, because she has put away more money

    d.) Mary, because her money has grown for a longer time at compound interest

17. Many young people receive health insurance benefits through their parents. Which of the following statements is true about health insurance coverage?

a.) You are covered by your parents' insurance until you marry, regardless of your age.

b.) If your parents become unemployed, your insurance coverage may stop, regardless of your age.

c.) Young people don't need health insurance because they are so healthy.

d.) You continue to be covered by your parents' insurance as long as you live at home, regardless of your age.

18. Don and Bill work together in the finance department of the same company and earn the same pay. Bill spends his free time taking work-related classes to improve his computer skills, while Don spends his free time socializing with friends and working out at a fitness center. After five years, what is likely to be true?

a.) Don will make more because he is more social.

b.) Don will make more because Bill is likely to be laid off.

c.) Bill will make more money because he is more valuable to his company.

d.) Don and Bill will continue to make the same money.

19. If your credit card is stolen and the thief runs up a total debt of $1,000, but you notify the issuer of the card as soon as you discover it is missing, what is the maximum amount that you can be forced to pay according to Federal law?

a.) $500

b.) $1000

c.) Nothing.

d.) $50

20. Which of the following statements is NOT correct about most ATM (Automated Teller Machine) cards?

a.) You can generally get cash 24 hours-a-day.

b.) You can generally obtain information concerning your bank balance at an ATM machine.

c.) You can get cash anywhere in the world with no fee.

d.) You must have a bank account to have an ATM Card.

21. Matt has a good job on the production line of a factory in his hometown. During the past year or two, the state in which Matt lives has been raising taxes on its businesses to the point where they are much higher than in neighboring states. What effect is this likely to have on Matt's job?

a.) Higher business taxes will cause more businesses to move into Matt's state, raising wages.

b.) Higher business taxes can't have any effect on Matt's job.

c.) Mark's company may consider moving to a lower-tax state, threatening Matt's job.

d.) He is likely to get a large raise to offset the effect of higher taxes.

22. If you have caused an accident, which type of automobile insurance would cover damage to

your own car?

a.) Comprehensive.

b.) Liability.

c.) Term.

d.) Collision.

23. Scott and Eric are young men. Each has a good credit history. They work at the same company and make approximately the same salary. Scott has borrowed $6,000 to take a foreign vacation. Eric has borrowed $6,000 to buy a car. Who is likely to pay the lowest finance charge?

a.) Eric will pay less because the car is collateral for the loan.

b.) They will both pay the same because the rate is set by law.

c.) Scott will pay less because people who travel overseas are better risks.

d.) They will both pay the same because they have almost identical financial backgrounds.

24. If you went to college and earned a four-year degree, how much more money could you expect to earn than if you only had a high school diploma?

a.) About 10 times as much.

b.) No more; I would make about the same either way.

c.) A little more; about 20% more.

d.) A lot more; about 70% more.

25. Many savings programs are protected by the Federal government against loss. Which of the following is not?

a.) A U. S. Savings Bond.

b.) A certificate of deposit at the bank.

c.) A bond issued by one of the 50 States.

d.) A U. S. Treasury Bond.

26. If each of the following persons had the same amount of take-home pay, who would need the greatest amount of life insurance?

a.) An elderly retired man, with a wife who is also retired.

b.) A young married man without children.

c.) A young single woman with two young children.

d.) A young single woman without children.

27. Which of the following instruments is NOT typically associated with spending?

a.) Debit card.

b.) Certificate of deposit.

c.) Cash.

d.) Credit card.

28. Which of the following credit card users is likely to pay the GREATEST dollar amount in finance charges per year, if they all charge the same amount per year on their cards?

a.) Jessica, who pays at least the minimum amount each month and more, when she has the money.

b.) Vera, who generally pays off her credit card in full but, occasionally, will pay the minimum when she is short of cash

c.) Megan, who always pays off her credit card bill in full shortly after she receives it.

d.) Erin, who only pays the minimum amount each month.

29. Which of the following statements is true?

a.) Banks and other lenders share the credit history of their borrowers with each other and are likely to know of any loan payments that you have missed.

b.) People have so many loans it is very unlikely that one bank will know your history with another bank

c.) Your bad loan payment record with one bank will not be considered if you apply to another bank for a loan.

d.) If you missed a payment more than 2 years ago, it cannot be considered in a loan decision.

30. Dan must borrow $12,000 to complete his college education. Which of the following would NOT be likely to reduce the finance charge rate?

    a.) If he went to a state college rather than a private college.

    b.) If his parents cosigned the loan.

    c.) If his parents took out an additional mortgage on their house for the loan.

    d.) If the loan was insured by the Federal Government.

31. If you had a savings account at a bank, which of the following would be correct concerning the interest that you would earn on this account?

    a.) Earnings from savings account interest may not be taxed.

    b.) Income tax may be charged on the interest if your income is high enough.

    c.) Sales tax may be charged on the interest that you earn.

    d.) You cannot earn interest until you pass your 18th birthday.

Part IV – Classification Questions

32. What is your gender?

    a.) Male

    b.) Female

33. What is the highest level of education you expect to achieve?

  a.) Associate degree (two-year).
  b.) Bachelor's degree (four-year).
  c.) Master's degree.
  d.) Doctorate, law or professional (six year or more)

34. What is your best estimate of your parents' total income last year? Consider annual income from all sources before taxes.

  a.) Less than $20,000.
  b.) $20,000 to $39,999.
  c.) $40,000 to $79,999.
  d.) $80,000 or more.
  e.) Don't know.

35. What is the highest level of schooling your father or mother completed?

  a.) Neither completed high school.
  b.) Completed high school.
  c.) Some college.
  d.) College graduate or more than college.
  e.) Don't know.

36. How do you describe yourself?

a.) White or Caucasian.

b.) White or Caucasian.

c.) Black or African American.

d.) Hispanic American.

e.) Asian-American.

f.) American Indian, Alaska Native, or Native Hawaiian

g.) Other

37. When you start to work full-time, after you finish your education, how much do you expect to make per year before deductions for taxes and other items?

a.) Under $30,000.

b.) $30,000 to $39,999.

c.) $40,000 to $49,999.

d.) $50,000 or more

38. How many credit cards do you use, including store credit cards?

a.) None.

b.) One.

c.) Two.

d.) Three.

e.) Four.

f.) Five or more.

39. Which of the following statements best describes the way in which you make payments on your credit cards?

a.) I always pay off the total balance each month.

b.) I always pay off the total balance each month.

c.) I occasionally do not pay off the balance for a month or so when I am short on funds.

d.) I generally have an outstanding balance but occasionally am able to pay it off.

e.) I seldom, if ever, pay off all my balances, but try to pay them down when I can.

f.) I generally pay only the minimum required payment each month.

40. What is the outstanding balance on all of your credit cards?

a.) Under $1,000

b.) $1,000 to $2,499

c.) $2,500 to $4,999

d.) $5,000 to $9,999

e.) More than $10,000

41. When did you get your first credit card?

    a.) Before graduating high school

    b.) When I graduated from high school

    c.) When I started college

    d.) During my first year in college

    e.) After completing my first year of college

42. How often are you late paying your credit card bills?

    a.) Never

    b.) Once or twice since I’ve had credit cards

    c.) Once or twice per year

    d.) More than two times per year

43. When you finish your undergraduate education, how much do you expect to owe in student loans?

    a.) Nothing

    b.) Less than $5,000

    c.) $5,000 to $9,999

    d.) $10,000 to $19,999

    e.) $20,000 to $29,999

f.) $30,000 to $49,999

g.) $50,000 or more

44. Aside from any credit card debt or student loans you might have, what other types of debt do you have? (check ALL that apply)

a.) Auto loans

b.) Home Mortgage

c.) Personal debt or other debt

45. Do you have a checking account?

a.) Yes

b.) No

46. How often have you bounced a check (had it returned for insufficient funds)?

a.) Never

b.) Once or twice in my lifetime

c.) Once or twice per year

d.) More than twice per year

47. How often do you balance your checkbook?

a.) After every check, deposit and ATM withdrawal

b.) About once a week

c.) About once a month

d.) Several times per year

e.) Once or twice per year

f.) Never

48. In what form do you hold for your savings and investments? (Check ALL that apply)

a.) Savings account.

b.) Certificates of deposit.

c.) U. S. Savings Bonds.

d.) Stocks.

e.) Mutual funds.

f.) Bonds other than U. S. Savings Bonds.

g.) Retirement accounts such as 401k's and IRAs.

49. How would you rate the savings and investments that you have?

a.) Adequate for my needs right now

b.) Slightly less than I should have right now

c.) Much less than I should have right now

50. How much do you worry about your debts?

a.) Never

b.) A little

c.) Sometimes

d.) Often

e.) Nearly all the time

51. Who prepares your income taxes?

a.) I do it myself by hand

b.) I do it myself using a computer program

c.) A tax preparer

d.) My parents

52. Which of the following classes did you have in high school? (Check ALL that apply)

a.) An entire course in personal money management or personal finance.

b.) A portion of a course where at least a week was focused on personal money management or personal finance.

c.) An entire course in economics.

d.) A portion of a course where at least a week was focused on economics.

e.) A course in which we played a stock market game.

53. Which of the following best describes your status as a student?

a.) I am a full-time undergraduate student at a Four-year college or university

b.) I am a full-time undergraduate student at a Two-Year college or university

54. What is your class standing?

a.) Freshman

b.) Sophomore

c.) Junior

d.) Senior

55. Are you part of any of these programs?

a.) JumpStart

b.) Wings

c.) Neither

Appendix B: Financial Literacy Follow Up Self-Constructed Survey

1. How did you manage to cover the cost of your school so far?

   Work

   Student Loans

   Scholarship (based or merit)

   Grants (based on financial need, FAFSA)

2. What influence the decisions above?

3. Please respond to the following statements.

   When faced with financial challenges, I have a hard time figuring out a solution.

   It is challenging to make progress toward my financial goals.

   I lack confidence in my ability to manage my finances.

   I worry about running out of money.

   When unexpected expenses occur I usually have to use credit.

   It is hard to stick to my spending plan when unexpected expenses arise.

4. If you participated in the 2016 summer success financial literacy workshop (Wings or JumpStart), did the workshop influence the financial decisions you made?

   I am more responsible at using my credit cards now than I was as a freshman.

   I haven't changed my financial decisions.

   I feel I don't need to focus on financial management since my education will get me a high paying job.

   I am afraid to face financial decisions.

5. How many years has it taken you to graduate?

   Two

   Three

   Four

   More

   Is this related to financial challenges?

6. Would you take a personal finance course as an elective if offered?

   Yes

   No

   Why or Why Not?