

1-1-2011

# Financial Well-Being Among Selected Students At Eastern Illinois University

Eric John Mazoch

*Eastern Illinois University*

This research is a product of the graduate program in [Counseling and Student Development](#) at Eastern Illinois University. [Find out more](#) about the program.

---

## Recommended Citation

Mazoch, Eric John, "Financial Well-Being Among Selected Students At Eastern Illinois University" (2011). *Masters Theses*. 155.  
<http://thekeep.eiu.edu/theses/155>

This Thesis is brought to you for free and open access by the Student Theses & Publications at The Keep. It has been accepted for inclusion in Masters Theses by an authorized administrator of The Keep. For more information, please contact [tabruns@eiu.edu](mailto:tabruns@eiu.edu).

**\*\*\*\*\*US Copyright Notice\*\*\*\*\***

**No further reproduction or distribution of this copy is permitted by electronic transmission or any other means.**

**The user should review the copyright notice on the following scanned image(s) contained in the original work from which this electronic copy was made.**

**Section 108: United States Copyright Law**

**The copyright law of the United States [Title 17, United States Code] governs the making of photocopies or other reproductions of copyrighted materials.**

**Under certain conditions specified in the law, libraries and archives are authorized to furnish a photocopy or other reproduction. One of these specified conditions is that the reproduction is not to be used for any purpose other than private study, scholarship, or research. If a user makes a request for, or later uses, a photocopy or reproduction for purposes in excess of "fair use," that use may be liable for copyright infringement.**

**This institution reserves the right to refuse to accept a copying order if, in its judgment, fulfillment of the order would involve violation of copyright law. No further reproduction and distribution of this copy is permitted by transmission or any other means.**

### THESIS MAINTENANCE AND REPRODUCTION CERTIFICATE

TO: Graduate Degree Candidates (who have written formal theses)

SUBJECT: Permission to Reproduce Theses

The University Library is receiving a number of request from other institutions asking permission to reproduce dissertations for inclusion in their library holdings. Although no copyright laws are involved, we feel that professional courtesy demands that permission be obtained from the author before we allow these to be copied.

PLEASE SIGN ONE OF THE FOLLOWING STATEMENTS:

Booth Library of Eastern Illinois University has my permission to lend my thesis to a reputable college or university for the purpose of copying it for inclusion in that institution's library or research holdings.

\_\_\_\_\_  
*[Handwritten Signature]*  
Author's Signature

\_\_\_\_\_  
*5/23/2011*  
Date

I respectfully request Booth Library of Eastern Illinois University **NOT** allow my thesis to be reproduced because:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

\_\_\_\_\_  
Author's Signature

\_\_\_\_\_  
Date

**This form must be submitted in duplicate.**

---

Financial Well-being Among Selected Students at Eastern Illinois University

---

(TITLE)

BY

Eric John Mazoch

---

**THESIS**

SUBMITTED IN PARTIAL FULFILLMENT OF THE REQUIREMENTS  
FOR THE DEGREE OF

Master of Science in College Student Affairs

---

IN THE GRADUATE SCHOOL, EASTERN ILLINOIS UNIVERSITY  
CHARLESTON, ILLINOIS

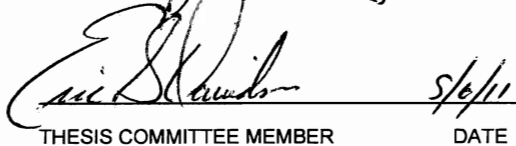
May 2011

---

YEAR

I HEREBY RECOMMEND THAT THIS THESIS BE ACCEPTED AS FULFILLING  
THIS PART OF THE GRADUATE DEGREE CITED ABOVE

 5/6/11  
\_\_\_\_\_  
THESIS COMMITTEE CHAIR      DATE

 5/6/11  
\_\_\_\_\_  
THESIS COMMITTEE MEMBER      DATE

 5/6/11  
\_\_\_\_\_  
THESIS COMMITTEE MEMBER      DATE

 5-23-11  
\_\_\_\_\_  
DEPARTMENT/SCHOOL CHAIR      DATE  
OR CHAIR'S DESIGNEE

\_\_\_\_\_  
THESIS COMMITTEE MEMBER      DATE

\_\_\_\_\_  
THESIS COMMITTEE MEMBER      DATE

### **Abstract**

This study examined the financial well-being of Eastern Illinois University undergraduate students. Specifically the areas of financial debt, stress, and specific buying habits were addressed in determining the financial status of EIU students. The study was completed during spring 2011 by means of an online survey.

Significant correlations were found between the level of debt students had and their overall level of self-reported stress using a local five item semantic differential measure. There were no significant differences between student academic class standing and collective outstanding debt. Major on-campus versus off-campus spending differences were the cost of utilities and in the cost of owning and operating a vehicle. Off campus and outside of Charleston living situations were typically found to be more expensive than living on-campus.

## **Dedication**

I would like to dedicate this thesis to my former supervisor Kate Burrow. As a supervisor for 2.5 years and a role model for four years, Kate has helped me and many other individuals develop into stronger people. She has tirelessly dedicated herself to her position and has helped to contribute to the Student Affairs Profession through assisting in the maturation of many Student Affairs Professionals. Kate has been a large inspiration to me in my life and has set me on the course I am presently traveling.

## Acknowledgements

I would like to thank all of the individuals that have come together and assisted me in some fashion with my thesis project. First and foremost I would like to thank Dr. Charles Eberly for his efforts in challenging my writing style as well as enriching me in ways that far exceed the confines of his assigned duties.

I also would like to thank the Health Education Resource Center and Illinois Higher Education Center for their assistance with providing me direction with SPSS, an idea of how to construct my survey, and being a sounding board for ideas. Eric Davidson has been a great help in giving my study a logical design, and Levi Kosta-Mikel has been a major support in helping me interpret the data.

Dr. Jenny Sipes has been a great help with editing the grammar and non-numerical content of my thesis. She has been a major force in finding areas of improvement and breaking them down into smaller and more manageable tasks.

Finally, I would like to thank my friends and family for supporting me in my schooling. From the supervisors I have interacted with at Eastern and subsequently become friends with, to the peers I have been fortunate to share the experience of being in a cohort with, to the students that comprise most of my schedule, I would like to thank you all for the support you have provided along the way.

## Table of Contents

Abstract.....	i
Dedication.....	ii
Acknowledgements.....	iii
Table of Contents.....	iv
Chapter I.....	1
Statement of Purpose.....	2
Chapter II.....	4
The Financial Knowledge of College Students.....	5
Credit/Debit Card Use and Impulse Buying.....	6
Stress Related to Financial Instability.....	8
Effective Teaching Methods.....	9
Summary.....	10
Chapter III.....	12
Purpose of the Study.....	12
Research Questions.....	12
Site.....	15
Sample.....	16
Instrumentation.....	16
Data Analysis.....	17
Limitations of the Study.....	18
Overview of Study.....	18
Summary.....	19
Chapter IV.....	20
R <sub>1</sub> : Financial Debt and Self-Reported Stress.....	20
R <sub>2</sub> : Class Standing and Level of Debt.....	23
R <sub>3</sub> : Comparison of Spending Habits by Residential Type.....	23
Summary.....	30
Chapter V.....	31
Discussion.....	31
R <sub>1</sub> : Financial debt and self reported stress.....	31
R <sub>2</sub> : Class standing and level of debt.....	32
R <sub>3</sub> : Comparison of spending habits by residential type.....	33
Limitations.....	36
Conclusions.....	37
Recommendations.....	38
Student affairs practitioners.....	38
Future researchers.....	38
Summary of the Findings.....	39
References.....	41
Appendices.....	44
Appendix A - Financial Literacy and Practices Survey.....	45
Appendix B - Sample Informed Consent.....	48
Appendix C - Standard Email to Research Subjects.....	51



## **Chapter I**

### **Introduction**

Over the past decade the financial crisis within the American economy has created a strong need for financial awareness among college students. Affordability and access to higher education is diminished or lost if a student's parents cannot find work or if the student him/herself does not have the financial means to attend college. Even if a student is able to afford college up-front, students are under the impression that they should be able to pay off their debts quicker than what most people do in actual fact (Norvilitis et al., 2006). If students are realistic with their job-related goals and actually know how to financially plan, post-graduation debt can be reduced or even eliminated. Unfortunately, Chen and Volpe (2002) found that students are lacking adequate financial knowledge when it comes to budgeting, saving, and spending appropriately.

College and university professionals are in a strong position to assist students in developing the skills necessary for savvy financial management. According to Cooke, Barkham, Audin, and Bradley (2004), there is a correlation between financial concerns and levels of mental health issues; therefore, acquiring the skills necessary for getting through college with as little financial stress as possible is extremely important. According to Brougham, Zail, Mendoza and Miller (2009), both men and women reported higher levels of stress associated with managing finances; furthermore, their study demonstrated that female students typically became more stressed due to their financial situation than males. Women appeared to have a greater need for financial management knowledge than did men according to these authors. The costs of attending

college are not small and some people must borrow large sums of money to get through to graduation. All college students in general can benefit from their respective institutions providing adequate training to prepare them for their lives after they leave the campus.

### **Statement of Purpose**

Insight into the common spending habits of students is a necessity in order to provide adequate feedback to college administrators, faculty members, and students in order to promote positive financial behavior. The focus of the present study was to find financial knowledge deficiencies. Through finding issues, action plans may be created in order to improve needed areas. The main focus of the survey was to gather information on financial behaviors, attitudes, and knowledge among students at EIU. Data collected were analyzed to provide an idea of how much debt students at EIU typically have both in credit cards and in loans.

The data collected in this study provided helpful information about the financial well-being of Eastern Illinois students. Additionally, the data being collected gave insight into the attitudes and beliefs of EIU students in regard to their fiscal management ability. Through the data, the researcher worked toward the ultimate goal of providing the basis for a more solid foundation for EIU student finances. The data were collected from a random sample of Eastern Illinois University students at the undergraduate level.

Three research questions were asked in this study:

R<sub>1</sub> = Does financial debt affect the levels of measured stress in EIU undergraduate students?,

R<sub>2</sub> = Does a student's class standing affect the levels of debt being carried?,

R<sub>3</sub> = Is there a difference in selected spending habits among EIU undergraduate students based on different types of residential options?

The data collection took place via an online survey which was developed in conjunction with the Illinois Higher Education Center for Alcohol, Other Drugs and Violence Prevention (IHEC) and distributed to 2,000 randomly selected Eastern Illinois University students. Students had a period of no less than three weeks to complete the survey. Reminders were forwarded to students after 7 days and 14 days to increase sample return.

The second chapter of this thesis contains a review of literature related to student financial well-being. The third chapter of this thesis contains the methods of collecting and analyzing the data used for the purposes of the present study. The fourth chapter contains the results of data analysis for each of the hypotheses stipulated in chapter three. The fifth chapter contains a discussion of the results and conclusions based on the present study related to information introduced in the literature review. Suggestions for professional practice and future research conclude the thesis.

## **Chapter II**

### **Literature Review**

This study was on the topic of personal financial well-being of undergraduate students currently enrolled at Eastern Illinois University. The main topics focused on in the review of literature are the current financial knowledge of college students, the debt practices of college students, impulsivity, stress related to financial conditions, and effective teaching methods related to financial information.

The review of literature contains information on several topic areas of financial well-being. The following paragraph describes in detail the importance of the specific areas. The section on average student financial competency has information on the general strengths and challenges students have with their financial knowledge. Debt practices provide an overview of the frequency and levels of debt being carried by current college students across the United States in addition to the volume of debts being carried from month to month by the average college student. Impulsivity contains information on the amount of unnecessary expenditures students make on a common basis which will shed light on the reasons for large debt accumulation in college students. The documents on stress related to personal financial conditions provide information on some of the effects that debt may have on college students in addition to a description of why it may be detrimental to students. Finally, the review of literature covers the topic of effective teaching methods in order to provide the reader with an idea of the important practices which are being utilized in other higher education institutions focused on student financial education.

## **The Financial Knowledge of College Students**

College freshmen surveyed at Texas A&M were found to have very low levels of understanding about financial concepts dealing with investing, saving, and risk associated with various financial options. Avard, Manton, English, and Walker (2005) found that 92% of the 407 students surveyed would have failed a test of financial literacy given to them if 60% of items correct were the pass-fail criterion. Overall, students answered only 34.8% correct on the 20 item test, which means that there was most likely a large gap in the financial knowledge base of students coming into college. Avard et al. suggested that although measures are taken at the high school level, colleges may need to intervene and provide a general education course for freshmen focused on improving their financial knowledge to make up for this apparent deficiency. High school students are able to show improvement in financial knowledge based on their participation in a financial education program (Walstad, Rebeck, & MacDonald, 2010), and that may mean that it would be helpful for college students as well.

According to Huston (2010), there are some mixed feelings about the effectiveness of financial education programs. Huston stated that there are no benchmarks in place to gauge how successful a student is when it comes to financial literacy. Huston also suggested that the only way for financial literacy educators to know whether or not they are actually providing help to students is for them to develop a metric for assessing financial literacy among students. The objective of the present study is to identify potential deficiencies in financial knowledge among EIU students, and develop

the prototype for a targeted program addressing those deficiencies through services provided by the EIU Health Education Resources Center (HERC).

Researchers must know their target population as well as possible before performing any sort of study. According to Chen and Volpe (2002), women generally perform lower than men when it comes to financial market knowledge. Perhaps a more direct focus should be paid when dealing with women and financial knowledge development. The men in the Chen study also had a higher mean score in their self-perception of their ability levels. Based on Edwards, Allen, and Hayhoe (2007), young women were more likely to be more financially dependent on their parents than young men. The authors suggested financial dependency as a possible reason for the difference in the knowledge base that women have in financial knowledge compared to men. Educators need to account for this difference as Chen and Volpe (2002) suggested and create separate curricula for students coming from different financial knowledge bases.

### **Credit/Debit Card Use and Impulse Buying**

Purchasing items with credit cards through being able to shop online 24/7 is increasingly easy. According to Hayhoe, Leach, Turner, Bruin, and Lawrence (2000), many factors influence student spending habits. Males were generally more likely to use their credit cards for electronics and non-grocery food while females were more likely to use their credit cards to purchase clothing. These incidental items are detrimental to student finances if purchases are frequent and are for a larger sum than a student makes within a given time period. Due to their ease of use, credit cards facilitate excessive

spending both online and offline since most vendors accept credit cards as a form of payment.

The materialism of Western culture influences impulsive credit card use among students. Kacen and Lee (2002) found that hedonism, risk avoidance, perceived consequences, and potential influence on others impacted American spending habits. Most Americans are predisposed to impulsive purchasing according to Lai (2010), and people emotionally deflecting stress by making impulsive purchases spend more money. Hedonism impacts impulsive purchasing in the same way that strong emotional attachment to materialism encourages spending.

Responsible credit card use is an imperative topic to introduce in college because so many students carry large balances on their credit cards. According to the NellieMae (2005) study on credit card use, the average college student maintains a month-to-month balance of \$2,327 on all of his or her credit cards combined. This figure is important because a lot of college students do not have large amounts of personal income to pay down the balance while they are attending school. According to Norvilitis, Szablicki, and Wilson (2003), the mean balance being carried by students in their study was \$1,518 with their debt-to-income ratio at .24. The debt to income ratio is a calculation of the percentage of debt a person has in comparison to their yearly earnings. In the Norvilitis, et al. (2003) study, the average student was carrying about 24% of their yearly income in debt. In a second study by Norvilitis et al. (2006), the debt-to-income ratio was as high as .31, meaning debt equaled 31% of the students' income. Practically speaking, students are borrowing far more than they should be able to afford in any given year.

Having an external locus of control is a detriment in a person's ability to successfully manage credit card debt (Watson, 2009). Locus of control is a person's view on responsibility for a problem; for example, if a person blames an external source for issues surrounding an issue such as debt, they are more likely to have issues with financial mismanagement. In Watson's study, it was demonstrated that individuals taking personal responsibility for their debt would typically have lower amounts of debt misuse based on a 12 item scale. Having an external locus of control is also a detriment when concerning compulsive buying behaviors; Watson's study demonstrated a significant interaction between an external locus of control and high compulsive buying behavior scores on the seven-item clinical screener used in the study.

Roberts and Jones (2001) confirmed a prediction that each generation has increasing amounts of impulse buying. Their study discussed how credit cards have strengthened the mixed relationship students have between financial attitudes and compulsive buying. Roberts and Jones found a relationship between compulsive buying habits and anxiety levels. This relationship between spending and anxiety is dangerous since stress and anxiety add more complexity into a student's already busy life. The relationship of impulsive buying to momentary stress reduction needs to be discussed in this study.

### **Stress Related to Financial Instability**

Academic and personal issues already create stress in college students. Large amounts of financial stress are clearly not necessary in order to help a student succeed. Cooke et al. (2004) found that students with higher "debt-worry" (p. 58) scores typically



felt more anxious, tense, nervous, and unhappy. Further, students with a higher concern for their personal debt were also more likely to feel less "OK" with themselves. If this is true, students can be negatively affected by stressors created due to financial mismanagement. O'Guinn and Faber (1989) found that financial stress stemmed from compulsive purchasing. One of the issues with compulsive purchasing is in the creation of excess debt because of a cyclical process of purchasing to relieve stress but then amassing debt which creates more stress. Roberts (1998) made the point that students who use credit cards irresponsibly will often suffer financially and psychologically. He also stated that there was a relationship between anxiety and compulsive buying habits.

Brougham, Zail, Mendoza, and Miller (2009) found that men and women faced different levels of stress when it comes to financial issues. The results of their study demonstrated a need for women to receive more focus on financial issues since they are affected more negatively and severely from financial issues. Further, women reacted to their stress in a more self-punishing manner in order to cope with their issues. The researchers suggested that the focus of stress management should focus on emotional control. When developing a curriculum for a financial management program, specific focus should be paid to coping mechanisms to stress and how to avoid self-abusing behaviors.

### **Effective Teaching Methods**

Ford, Devoto, and Kent (2007) found that the most effective teaching method for teaching finances is vicarious learning. Vicarious learning (experiential learning) is also suggested in Ford and Kent's (2010) study as being an effective tool. The act of actually

experiencing the learning situation rather than being taught is what is being suggested, which is important for setting up a curriculum for developing financial skills and awareness. People need to learn in a way which may be different from the standard conception of financial learning.

Huston (2010) defined “financial literacy” as being “how well an individual can understand and use personal finance-related information” (p. 306). In order to develop a successful program, Huston emphasized the need for more than just knowledge. Application of the information learned must also be built into the curriculum. Developing and assessing a program based on both knowledge and application is paramount in the dissemination of knowledge. Huston asserted that education should be specific to the students learning the information – no two classrooms should necessarily be taught in the same way. Through being able to assess the student's current deficiencies, a more enriched learning environment can be tailored to the needs of the individuals being served.

### **Summary**

There is currently a need for research on financial literacy among college students. As soon as college students enter campus for the first time, they become more responsible for managing time, money, and education. It is clear that there are deficiencies in the financial knowledge base of students as they are coming onto college campuses. Through more focused educational practices, the objective of this research was that college students will be less likely to risk financial loss due to ignorance of some of the more difficult aspects of personal financial management. The research also

covered information on stress related to poor financial management. This stress is an output of the mixture of impulsivity and poor debt management practices among current-day college students. A large number of college students in debt exhibit an external locus of control, which means that they blame outside forces that are not within their control for the negative financial situation that they are in rather than taking personal responsibility for their actions.

The third chapter of this thesis contains the methods of collecting and analyzing the data used for the purposes of the present study. The fourth chapter contains the results of data analysis for each of the hypotheses stipulated in chapter three. The fifth chapter contains a discussion of the results, and conclusions based on the present study related to information introduced in the literature review. Suggestions for professional practice and future research conclude the thesis.

## **Chapter III**

### **Methodology**

#### **Purpose of the Study**

The purpose of the present study was to provide information on the current financial literacy level among college students at Eastern Illinois University. The study provided information on not only the knowledge level of current students but also investigated their money management practices. The information assisted in exposing gaps in necessary information which students attending Eastern Illinois University should acquire as they gain financial independence.

#### **Research Questions**

Previous work at Eastern Illinois University has demonstrated students are deficient in their financial practices (Cooper, 2008). A focus for the present study was kept on the basic areas of financial knowledge, the use of financial tools, and the levels of debt students carry. According to Norvilitis et al. (2006), students owning more credit cards are more likely to have increased levels of debt; additionally, the more credit cards held, the more likely they are to be in debt. In terms of financial knowledge, Chen and Volpe (2002) speculated that women generally were less knowledgeable in financial matters compared to men. This study took into account the possibility that men differ from women in their overall financial perspective. Based on the research mentioned above, the following research questions were used as a guide to examine how Eastern Illinois University students described their financial literacy, what the students knew and

believed, if or how they used financial planning tools and credit cards, and how students assessed levels of personal debt.

Three research questions were utilized for the study.

$R_1$  = Does increasing financial debt affect the levels of self-reported stress in EIU undergraduate students?

Estimated financial debt will be assessed at two different points of time, current outstanding debt balance (item 32) and anticipated outstanding debt at graduation (item 33). Research Question 1 thus had two related hypotheses, one of current debt, and one for projected debt at graduation.

$$H_0: O = E$$

$$H_a: O \neq E$$

$H_{01}$ : There will be no statistically significant difference in the level of current student debt, or projected student debt at graduation, compared to the level of student self-reported stress.

$H_{a1}$ : There are statistically significant differences in the level of current student debt, and the level of projected student debt at graduation, compared to the level of student self-reported stress.

Current financial debt (item 32, Appendix A) was estimated by asking respondents to self-report their “current outstanding balance,” and projected debt was estimated by asking respondents to project their outstanding balance at graduation (item 33). Self-reported stress was measured by a locally constructed five item semantic differential scale (items 27 – 31) with levels of response from

1 to 7, with lower cumulative scores reflecting lower overall stress. All measures were considered continuous variables for purposes of analysis.

R<sub>2</sub> = Does student class standing affect levels of debt being carried?

$$H_0: O = E$$

$$H_a: O \neq E$$

H<sub>02</sub>: There will be no statistically significant differences in student class standing and the estimated level of debt students expect to carry at graduation.

H<sub>a2</sub>: There are statistically significant differences in student class standing and the estimated level of debt students expect to carry at graduation.

Current financial debt (item 32, Appendix A) was estimated by asking respondents to self-report their “current outstanding balance,” and projected debt was estimated by asking respondents to project their outstanding balance at graduation (item 33). Student class standing (item 1) was determined to be freshman, sophomore, junior, or senior. Level of debt is considered a continuous variable and student class standing is determined to be a categorical variable. An ANOVA test was run to determine if there was a difference among the groups.

R<sub>3</sub> = Is there a difference in selected spending habits among EIU undergraduate students based on different types of residential options?

$$H_0: O = E$$

$$H_a: O \neq E$$

H<sub>03</sub>: There will be no statistically significant differences in living environment and the selected spending habits of EIU undergraduate students.

H<sub>a3</sub>: There are statistically significant differences in living environment and the selected spending habits of EIU undergraduate students.

Student residential type was determined by asking if a student lived on-campus or off-campus in Charleston or off-campus outside of Charleston (item 8). The spending habits of undergraduate students were determined by responses to items 19 to 26. The areas analyzed through an ANOVA were utility bills, rent, food, alcohol, automotive, phone, pet, and entertainment expenses. The spending habit responses were considered continuous and the subjects were able to respond freely. The post hoc analysis was completed using the Scheffe Post-Hoc Analysis.

### **Site**

Eastern Illinois University is a Midwestern University comprised of approximately 12,179 undergraduate and graduate students with about 58% of them being women and 42% men. The racial diversity of the campus was 78% Euro-American, 11% Black/Non-Hispanic, 3% Hispanic American, 1% Asian American, and 0.5% Native American, and 6% unclassified (EIU Fact Sheet, 2010).

EIU offered on-campus housing options through traditional residence halls, apartments, and fraternity and sorority housing. Traditional residence halls are comprised of male only, female only, and co-ed options. One residence hall had an upperclassman designation for student housing meaning only students that are over 21 and at least junior standing may live there. University owned apartments are single-sex per apartment unit and traditionally house upper-class students. Fraternity and Sorority Housing is available

to students in Greek Organizations; these buildings are single sex. Approximately 5,400 students lived on-campus and 4,500 lived off-campus.

### **Sample**

A random sample of 2,000 students (full- and part-time) currently enrolled at Eastern Illinois University were drawn from the undergraduate population (Housing, 2011). Students were contacted via email. Informed consent was implied when students agreed to complete the survey instrument (Appendix B). Research subjects were able to opt out of the study at any time without penalty.

### **Instrumentation**

An online survey distributed through the auspices of the Health Education Resource Center was utilized to collect data for this study. The survey instrument (Appendix A) was comprised of 34 items asking for descriptive demographic data, factors about the student's attitudes, beliefs, and behaviors, and a set of items measuring self-perceived levels of stress. The survey included open ended questions dealing with financial expenses and spending habits and closed response questions concerning targeted attitudes, beliefs, practices, and financial stress levels.

A measure of perceived social-emotional stress was created specifically for the purposes of the present study (items 27-31, Table 1). Based on the type of question being asked, a semantic differential scale was derived (Al-Hindawe, 1996) in order to gather an overall measure of self reported stress. Each item included a pair of mutually opposing words to which participants indicated on a seven-point scale how closely they ranked



from high to low. Individual responses were summed across the five items to create a scale ranging from a low of 5 to a high of 35, representing the subject's self-perceived level of overall self-reported stress. The self-reported stress measure was checked for internal consistency reliability and produced a Cronbach Alpha of  $\alpha = .873$  (Table 1). The high level of reliability suggested the items measured a unitary construct and could be used as a measure of self-perceived stress (Krathwohl, 1993).

**Table 1**

*Means and Standard Deviations for Self-Perceived Stress Scale Items*

Questions	M (SD)
<b>Item 27 - How has your financial situation negatively affected your personal relationships</b>	2.66 (1.66)
Slightly	Severely
<b>Item 28 - How has your financial situation negatively affected your academics</b>	2.57 (1.63)
Slightly	Severely
<b>Item 30 - How has your financial situation negatively affected your family life</b>	2.87 (1.81)
Slightly	Severely
<b>Item 31 - How often do you worry about your financial situation</b>	4.58 (1.54)
Rarely	All of the Time
<b>Item 32 - I feel the following about my financial condition</b>	4.02 (1.66)
Calm	Anxious

Note:  $n = 140$ ,  $\alpha = .873$

### **Data Analysis**

The data collected in the study were analyzed using the statistical analysis program, SPSS, version 17, in order to assess the financial background and knowledge of students at Eastern Illinois University. The resulting data were presented using charts and tables which displayed the level of relationships between variables.

A two-sample t-test of independent means was used to determine if there was a difference between high stress and low stress individuals in terms of current debt and projected outstanding debt at graduation (Hypothesis 1). An analysis of variance (ANOVA) was performed in answering research questions two and three. An ANOVA was performed in order to determine if there was a difference by class standing and overall current debt (Hypothesis 2). An ANOVA was also performed in determining if there was a difference in the spending habits of students living on-campus, off-campus in Charleston, or off-campus outside of Charleston (Hypothesis 3). Scheffe post-hoc analyses were completed to determine which paired comparisons of spending habits by living situations contributed to the overall F test result (McMillan & Schumacher, 2006).

### **Limitations of the Study**

Since responses were self-reported, self-report bias could potentially have led students into reporting incorrect amounts of income, debt, and other various facets of their financial standing. Students may have over-estimated or under-estimated their actual behaviors and knowledge when completing the survey. Low sample return size also inhibited the ability to properly use the statistical tools required to analyze the collected data and generalize results to the entire student population at EIU.

### **Overview of Study**

This present study assessed the financial knowledge-base of EIU students, their behaviors, attitudes, financial expenditures, and their level of debt being carried. It is important for administrators to be aware of the students for whom they intend to provide

services. This study provided university administrators a direction to the planning and implementation of future financial planning education courses or workshops. Adequate planning of materials could help administrators provide more useful information to assist students in leading them away from debt and the increased anxiety it has the potential to create.

### **Summary**

This chapter has presented the design of the research, participants, the instrument, the data collection, and the treatment of the data. This study utilized quantitative survey methodology. The data were analyzed through the statistical program SPSS, version 17.

The fourth chapter contains the results of data analysis for each of the hypotheses stipulated in chapter three. The fifth chapter contains a discussion of the results, and conclusions based on the present study related to information introduced in the literature review. Suggestions for professional practice and future research conclude the thesis.

## Chapter IV

### Results

A total of 140 students completed the quantitative survey which was administered over a three-week period in March 2011 at Eastern Illinois University. The study was completed using an online surveying tool, QuestionPro<sup>®</sup>, and the resulting data analyzed through SPSS, version 17, a statistical analysis tool. For all tests of hypotheses an alpha of .05 was accepted as a meaningful, statistical difference. This study considered the following three research questions.

- $R_1$  = Does increasing financial debt affect the levels of self-reported stress in EIU undergraduate students?
- $R_2$  = Does student class standing affect levels of debt being carried?
- $R_3$  = Is there a difference in selected spending habits among EIU undergraduate students based on different types of residential options?

#### **R<sub>1</sub>: Financial Debt and Self-Reported Stress**

The relationship between self reported financial debt and self-reported stress was observed in this study through five questions utilizing a semantic differential scaling system (Al-Hindawe, 2009). The Self-Perceived Stress scale was developed in order to collect information about levels of stress as perceived by the individuals responding to the survey. Self-perceived stress was the dependent variable and the independent variable was self-reported current level of debt (items 32) and anticipated level of debt upon graduation (item 33). A t-test of independent means compared those students reporting high stress (defined as those respondents falling above the overall group mean

stress score) versus those students reporting low stress (defined as those respondents falling below the overall group mean stress score). An alpha score of .05 or lower was considered statistically significant for the purposes of the present study.

Participants were categorized into “High Stress” or “Low Stress” using a dummy coding system. Participants with scores less than the mean self-perceived stress score ( $M=16.70$ ) were coded with a “0” representing low stress and participants with a self-perceived stress score over the mean were coded with a “1” representing high stress (Table 2). Two t-tests of independent means were performed using SPSS, version 17.

The first t-test performed (Table 3) was between the two levels of stress represented by high and low stress participants and the level of self-determined current outstanding debt (item 32). There was no significant difference for self-perceived stress between the high stress and low stress groups,  $t(129) = -1.221, p = 0.224$ .

The second t-test performed (Table 4) was between the two levels of stress represented by high and low stress participants and the level of anticipated debt upon graduating from college (item 33). There was a significant difference for self-perceived stress,  $t(130) = -2.352, p < 0.05$ , with high self-perceived stress individuals anticipating a higher level of debt upon graduation.

Table 2  
*Collective Outstanding Debt and Anticipated Debt at Graduation for High/Low Stress Groups*

Question	Low Stress <sup>a</sup>		High Stress <sup>b</sup>	
	M (SD)	M (SD)	M (SD)	M (SD)
Item 32: What is your current collective outstanding debt balance	\$12,060 (\$18,591)	\$16,813 (\$25,761)		
Item 33: What do you anticipate your outstanding debt to be at graduation	\$16,220 (\$23,551)	\$26,821 (\$28,244)		

Note. <sup>a</sup>  $n = 70$  <sup>b</sup>  $n = 61$

Table 3  
*Independent Samples t-test of Outstanding Debt and High/Low Scoring Stress Types*

	t	df	Sig. (2-tailed)	t-test for Equality of Means		
				M	SE	95% CI - Difference
Item 32: What is your current collective outstanding debt balance	-1.221	129	0.224	-\$4,753	\$3,891	LL - \$12,452 UL \$2,946
Item 33: What do you anticipate your outstanding debt to be at graduation	-2.352	130	0.020**	-\$10,602	\$4,508	LL - \$19,520 UL -\$1,683

Note. \*\*  $p < .05$

## R<sub>2</sub>: Class Standing and Level of Debt

A one-way ANOVA was computed (Table 4) to test for differences in current collective debt (item 32) across academic class standing (item 1). Current collective outstanding debt did not significantly differ by class standing,  $F(3, 131) = 1.308, p =$

Table 4  
*ANOVA of Current Collective Outstanding Debt Based and Class Standing*

Variable and source	df	SS	MS	F
Current Collective Outstanding Debt				
Between groups	3	1,891,317,691	630,439,230	1.308
Within groups	131	63,159,340,190	482,132,368	

.275. Table 6 displays current collective outstanding debt by academic class standing.

Table 5  
*Current Collective Outstanding Debt*

Class Standing	N	M (SD)	95% CI	
			LL	UL
Freshman	13	\$3,285 (\$6,671)	-\$747	\$7,316
Sophomore	21	\$13,181 (\$27,083)	\$853	\$25,509
Junior	46	\$13,956 (\$25,646)	\$6,341	\$21,572
Senior	55	\$16,648 (\$18,439)	\$11,664	\$21,633
Total	135	\$13,905 (\$22,033)	\$10,154	\$17,655

## R<sub>3</sub>: Comparison of Spending Habits by Residential Type

A series of one-way ANOVAs compared selected demographic variables (residential type) and selected areas of spending (Table 6). The available options for living situations (item 8) were on-campus in the residence halls, on-campus in an apartment, on-campus in Greek housing, off-campus in Charleston, and off-campus not in

Charleston. Due to low response rates in the on-campus university apartment and Greek housing categories, these categories were collapsed into a single on-campus housing variable. Descriptive statistics for residence location (item 8) and selected estimated spending habits (items 19 to 26) follow (Table 7). There were statistically significant differences in the estimated spending habits of students living on-campus, off-campus in Charleston, or off-campus outside of Charleston in the spending areas of utility bills ( $F(2,133)=27.577, p < 0.01$ ), rent ( $F(2,133)=24.606, p < 0.01$ ), food ( $F(2,138) = 23.655, p < 0.01$ ), Alcohol ( $F(2,138) = 6.544, p < 0.01$ ), car related expenses ( $F(2,134) = 22.906, p < 0.01$ ), phone ( $F(2,130) = 19.746, p < 0.01$ ), and pet-related expenses ( $F(2,134)=15.664, p < 0.01$ .) There was no difference determined among on and off-campus residents in the area of estimated entertainment expenses ( $F(2, 137) = 2.130, p = 0.123$ ).

A Scheffe Post-Hoc Analysis was performed on the spending habit variables showing statistical significance in order to determine which paired comparisons contributed to the overall significance of the overall F-tests for each spending habit (Tables 6 and 7)



Table 6

*One-Way Analyses of Variance for Residential Living Situation and Amount of Self-Reported Expenses*

Variable and source	df	SS	MS	F
19. Utility Bills				
Between Groups	2	806,345	403,173	27.577***
Within Groups	133	1,944,459	14,620	
20. Rent				
Between Groups	2	2,946,699	1,473,350	24.606***
Within Groups	133	7,963,798	59,878	
21. Food				
Between Groups	2	595,343	297,672	23.655***
Within Groups	138	1,736,606	12,584	
22. Alcohol				
Between Groups	2	18,972	9,486	6.544**
Within Groups	138	200,036	1,450	
23. Car Related Costs				
Between Groups	2	752,382	376,191	22.906***
Within Groups	134	2,200,735	16,423	
24. Phone bill				
Between Groups	2	102,247	51,124	19.746***
Within Groups	130	336,581	2,589	
25. Pets				
Between Groups	2	15,065	7,532	15.664***
Within Groups	134	64,437	481	
26. Entertainment				
Between Groups	2	6,333	3,167	2.130
Within Groups	137	203,648	1,486	

Note \*  $p < .05$  \*\*  $p < .01$  \*\*\*  $p < .001$

**Table 7**  
**Descriptive Statistics of Specified Expenses by Residential Type with Post Hoc Analysis**

Item	On-campus (1)			Off-Campus in Charleston (2)			Off-Campus Outside of Charleston (3)			Post hoc
	M (SD)	95 % CI	M (SD)	95 % CI	M (SD)	95 % CI	M (SD)	95 % CI		
Item 19: Utility Bills	\$30 (\$102)	[\$4, \$57]	\$112 (\$60)	[\$94, \$130]	\$228 (\$198)	[\$156, \$301]				1 < 2 < 3
Item 20: Rent	\$66 (\$149)	[\$27, \$105]	\$302 (\$92)	[\$274, \$329]	\$420 (\$458)	[\$252, \$588]				1 < 2, 3
Item 21: Food	\$81 (\$92)	[\$58, \$104]	\$124 (\$74)	[\$102, \$146]	\$249 (\$178)	[\$184, \$314]				3 > 1, 2
Item 22: Alcohol	\$20 (\$25)	[\$13, \$26]	\$46 (\$54)	[\$29, \$62]	\$24 (\$33)	[\$11, \$36]				2 > 1, 3
Item 23: Car Related Costs	\$75 (\$96)	[\$51, \$100]	\$113 (\$97)	[\$83, \$142]	\$264 (\$202)	[\$189, \$338]				3 > 1, 2
Item 24: Phone bill	\$16 (\$28)	[\$9, \$23]	\$13 (\$24)	[\$5, \$20]	\$80 (\$94)	[\$46, \$115]				3 > 1, 2
Item 25: Pets	\$2 (\$13)	[-\$1, \$5]	\$6 (\$16)	[\$1, \$11]	\$28 (\$38)	[\$14, \$42]				3 > 1, 2
Item 26: Entertainment	\$37 (\$35)	[\$28, \$46]	\$35 (\$29)	[\$26, \$43]	\$52 (\$53)	[\$32, \$72]				1 = 2 = 3

A one-way ANOVA was used to test for differences in utility costs across three types of residence location (Table 6). Costs of utility expenses differed across the three groups,  $F(2, 133) = 27.577, p = .000$ . Scheffe post-hoc comparisons of the three residential groups indicated that the on-campus group ( $M = \$30.30, 95\% \text{ CI } [\$4.07, \$56.53]$ ) gave significantly lower utility cost estimates than the off-campus in Charleston group ( $M = \$111.71, 95\% \text{ CI } [\$96.35, \$129.76]$ ),  $p = .000$ . There were indications that the Off-Campus in Charleston group gave significantly lower estimates of their utility costs than the Off-Campus outside of Charleston group ( $M = \$228.19, 95\% \text{ CI } [\$155.53, \$300.86]$ ),  $p = .000$ . There were indications that the On-campus group gave significantly lower utility cost estimates than the off-campus outside of Charleston group,  $p = .000$ .

A one-way ANOVA was used to test for rent costs across three types of locations of residence (Table 6). Costs of rent expenses differed across the three groups,  $F(2, 133) = 24.606, p = .000$ . Scheffe post-hoc comparisons of the three groups indicated that the on-campus group ( $M = \$65.68, 95\% \text{ CI } [\$26.72, \$104.63]$ ) gave significantly lower rent cost estimates than the off-campus in Charleston group ( $M = \$301.63, 95\% \text{ CI } [\$274.39, \$328.87]$ ),  $p = .000$ . There were indications that the on-campus group gave significantly lower rent cost estimates than the off-campus outside of Charleston group ( $M = \$420.03, 95\% \text{ CI } [\$252.09, \$587.97]$ ),  $p = .000$ . Comparisons between the off-campus in Charleston and off-campus outside of Charleston groups were not statistically significant at  $p < 0.05$ .

A one-way ANOVA was used to test for differences in food costs across three types of locations of residence (Table 6). Costs of food expenses differed across the three groups,  $F(2, 138) = 23.655, p = .000$ . Scheffe post-hoc comparisons of the three groups indicated that the on-campus group ( $M = \$80.63, 95\% \text{ CI } [\$57.53, \$103.72]$ ) gave significantly lower food cost estimates than the off-campus outside of Charleston group ( $M = \$248.87, 95\% \text{ CI } [\$183.58, \$314.16]$ ),  $p = .000$ . There were indications that the off-campus in Charleston group ( $M = \$123.91, 95\% \text{ CI } [\$101.90, \$145.93]$ ), gave significantly lower food cost estimates than the off-campus outside of Charleston group,  $p = .000$ . Comparisons between the on-campus and off-campus in Charleston groups were not statistically significant at  $p < 0.05$ .

A one-way ANOVA was used to test for differences in alcohol costs across three types of locations of residence (Table 6). Costs of alcohol expenses differed across the three groups,  $F(2, 138) = 6.544, p = .002$ . Scheffe post-hoc comparisons of the three groups indicated that the on-campus group ( $M = \$19.62, 95\% \text{ CI } [\$13.41, \$25.82]$ ) gave significantly lower alcohol cost estimates than the off-campus in Charleston group ( $M = \$45.56, 95\% \text{ CI } [\$29.42, \$61.69]$ ),  $p = .002$ . There were indications that the off-campus outside of Charleston group, ( $M = \$23.55, 95\% \text{ CI } [\$11.38, \$35.72]$ ), gave significantly lower alcohol cost estimates than the off-campus outside of Charleston group,  $p = .002$ . Comparisons between the on-campus and off-campus outside of Charleston groups were not statistically significant at  $p < 0.05$ .

A one-way ANOVA was used to test for differences in automotive costs across three types of locations of residence (Table 6). Costs of automotive expenses differed

across the three groups indicated that the on-campus group ( $M = \$75.32$ , 95% CI [ $\$50.83$ ,  $\$99.82$ ]) gave significantly lower automotive cost estimates than the off-campus outside of Charleston group ( $M = \$263.65$ , 95% CI [ $\$189.42$ ,  $\$337.87$ ]),  $p = .000$ . There were indications that the off-campus in Charleston group ( $M = \$112.59$ , 95% CI [ $\$83.10$ ,  $\$142.08$ ]), gave significantly lower automotive cost estimates than the off-campus outside of Charleston group,  $p = .000$ . Comparisons between the on-campus and off-campus in Charleston groups were not statistically significant at  $p < 0.05$ .

A one-way ANOVA was used to test for phone costs across three types of locations of residence (Table 6). Costs of phone expenses differed across the three groups,  $F(2, 130) = 19.746$ ,  $p = .000$ . Scheffe post-hoc comparisons of the three groups indicated that the on-campus group ( $M = \$16.07$ , 95% CI [ $\$8.96$ ,  $\$23.17$ ]) gave significantly lower phone cost estimates than the off-campus outside of Charleston group ( $M = \$80.13$ , 95% CI [ $\$45.55$ ,  $\$114.70$ ]),  $p = .000$ . There were indications that the off-campus in Charleston group ( $M = \$12.54$ , 95% CI [ $\$4.84$ ,  $\$20.24$ ]), gave significantly lower phone cost estimates than the off-campus outside of Charleston group,  $p = .000$ . Comparisons between the on-campus and off-campus in Charleston groups were not statistically significant at  $p < 0.05$ .

A one-way ANOVA was used to test for pet costs across three types of locations of residence (Table 6). Costs of pet expenses differed across the three groups,  $F(2, 134) = 15.664$ ,  $p = .000$ . Scheffe post-hoc comparisons of the three groups indicated that the on-campus group ( $M = \$1.90$ , 95% CI [ $-\$1.36$ ,  $\$5.17$ ]) gave significantly lower pet cost estimates than the off-campus outside of Charleston group ( $M = \$28.39$ , 95% CI [ $\$14.44$ ,  $\$42.33$ ]),  $p = .000$ . There were indications that the off-campus in Charleston group

( $M = \$6.36$ , 95% CI [ $\$1.51$ ,  $\$11.22$ ]), gave significantly lower pet cost estimates than the off-campus outside of Charleston group,  $p = .000$ . Comparisons between the on-campus and off-campus in Charleston groups were not statistically significant at  $p < 0.05$ .

### **Summary**

This chapter contained the statistical analysis of the data for three research questions. A t-test of independent means compared means of low stress participants and high stress participants based on a self-reported stress scale (items 27-31). The data analyses showed no significance between the two stress groups when looking at current levels of debt (item 32). There was significance at the alpha level of .05 or less between the two stress groups when looking at perceived debt at graduation (item 33), with higher stress participants holding higher anticipations of debt upon graduation.

There was no significant difference between academic class standing (item 1) and level of current debt (item 32). There were significant differences in the reported levels of specific expenses across three types of locations of residence for utility costs, rent, food, alcohol, automotive, phone, and pet expenses. There was no significant difference in the entertainment expenses across the three different locations of residence.

The fifth and final chapter contains a discussion of the results, and conclusions based on the present study related to information introduced in the literature review. Suggestions for professional practice and future research conclude the thesis.

## Chapter V

### Discussion, Conclusions, and Recommendations

The purpose of the present study was to gather information on college-related financial expenses and a measure of self-reported financial stress. The study specifically investigated student money management practices. The information contained within this document should help to expose gaps in necessary financial information that students attending Eastern Illinois University need to acquire as they gain financial independence. A total of 140 students completed the online survey originally sent to 2,000 randomly selected students from the overall university database. This chapter discusses conclusions based on the data analysis and lists recommendations for professional practice as well as suggestions for future research.

#### Discussion

Detailed in the following sections are the results of the data analysis. Results are presented in order by research question.

#### **R<sub>1</sub>: Financial debt and self reported stress**

R<sub>1</sub> = Does increasing financial debt affect the levels of self-reported stress in EIU undergraduate students?

There was no statistical significance in the t-test of independent means between the high self-perceived stress and low self-perceived stress participants when considering their current level of self-reported outstanding debt,  $t(129) = -1.221, p = .224$  (Table 2). Participants in this study had similar levels of stress regardless of the amount of debt they

currently carried as a college student. The null hypothesis of no difference between high-stress and low-stress groups is accepted for the first research question dealing with level of self-perceived stress and current level of self-reported debt.

There was a statistically significant difference found in the t-test of independent means between high self-perceived stress participants and low self-perceived stress participants when the level of perceived debt upon graduation (item 33) was considered. Participants in the high stress group showed a significantly higher level of anticipated debt upon graduation compared to the low stress group  $t(130) = -2.352, p = .020$  (Tables 2 and 3). This could mean that a relationship exists between the amount of debt an individual *anticipates* to have upon graduation and their current level of stress.

These results may suggest that there is a relationship between individuals thinking they will owe more money upon graduation and higher levels of financially related self-reported stress (Cooke et al., 2004). Increased stress in individuals with higher conceptions of their own debt may show a need for either debt related counseling in order to more effectively plan for the student's future or an increased need for helping students find a more realistic view of their future debt if they misconceive the amount of money they will owe.

### **R<sub>2</sub>: Class standing and level of debt.**

R<sub>2</sub> = Does student class standing affect levels of debt being carried?

According to an ANOVA comparing class year with level of current self-reported debt, there was no difference found amongst the class groups within the study. This means that there were no differences between the four class groups (item 1) and the self-



reported dollar value of current debt held by participants (Table 5). There was a small increase in the mean level of self-reported debt from freshman to senior year among survey respondents (Table 5). Overall, the total level of debt of the 140 participants in this study had a mean dollar amount of debt of \$13,904 when compared to an average debt of \$11,547 for EIU graduates in a 2009 study (Eastern Illinois University, June 2010.)

Mean debt load between the 2009 data based on graduating seniors in spring 2009 and the present data are not comparable since they represent two different groups of EIU students. However, one can infer that the economic turmoil in the United States in the past few years along with reductions of financial aid may well have increased the level of debt the average student has assumed. Students are currently in an environment which requires more time spent working and more debt to be carried in order to afford a college education (Norvilitis et al., 2006).

### **R<sub>3</sub>: Comparison of spending habits by residential type.**

R<sub>3</sub> = Is there a difference in selected spending habits among EIU undergraduate students based on different types of residential options?

Based on a series of ANOVAs comparing specific expenses across three types of locations of residence (Table 6), there were significant differences in the areas of utility, rent, food, alcohol, car, phone, and pet expenses. There were no significant differences among residence locations for entertainment expenses.

Participants who lived on-campus estimated utility bills of \$30 / month, which was significantly lower than the estimated monthly utility bills of both off-campus in

Charleston (\$111) and off-campus outside of Charleston residents (\$228) (Table 6). On-campus residents also estimated significantly lower monthly expenses in the areas of rent (\$65), food (\$85), alcohol (\$19), car-related (\$75), and pet (\$1.90) expenses in comparison to the two off-campus groups (Table 6).

The most apparent differences in spending habits were in the areas of utility bills, rent, alcohol, and car related expenses. Residents living on-campus typically pay their housing costs upfront in one lump sum. Utility costs are included in the cost of on-campus housing and students therefore do not have to worry about the amount of any of the utilities they use as they pay the same price regardless of their personal amount of usage (Eastern Illinois University, 2011). Off campus residents reported paying significantly higher monthly utility expenses with Charleston residents paying \$111 and non-Charleston residents paying \$228. These amounts may differ across respondents based on the number of people living together or the types of utilities being considered in the responses. Additionally, there may be more families living together in housing that is outside of Charleston. Differences in number of housing occupants were not accounted for in the demographic section of the survey.

On-campus residents estimated the lowest reported rental expenses (Table 6) because on-campus housing is paid each semester in one lump sum. Participants clearly did not take into account the amount of money they paid for room upfront as the average of \$65/ month does not compare to the amount of money actually spent on housing.

Residents living in Charleston typically estimated they spent less on food, with on-campus residents projecting they spent \$80 / month and off-campus residents paying \$123 / month in comparison to residents living outside of Charleston who estimated they

paid on average \$248/month (Table 6). These differences suggested that residents living in Charleston are more cost conscious with their money when it comes to food, although residents living on-campus paid a similar amount of money compared to off-campus in Charleston residents, which is interesting as residents living on-campus typically purchase a meal plan. These data suggest that residents living on-campus do not utilize their meal plans as the sole source of their food while in school.

Residents living on-campus (\$19) estimated they spent under half the amount of money on alcohol in comparison to residents living in Charleston but not on-campus (\$45, Table 6). These data imply that students living on-campus typically drank less or drank cheaper forms of alcohol. The age of on-campus residents may have impacted this dollar amount as traditional freshmen are required to live on-campus. The results may also imply that living in the residence halls provided more structure for students and kept them more focused on school work and positive social interactions.

Residents living in Charleston reported they paid less on car related expenses (Table 6) with on-campus residents paying \$75 a month, off-campus paying \$112 a month, and outside of Charleston residents paying \$263 a month. These data demonstrate the cost effectiveness of living near the campus when considering living options. Through living near campus, less driving needs to occur as students are either living within walking distance to class, or are a short distance away by vehicle.

Overall, it appears that living on-campus is a more affordable option based on the numbers provided by the participants and the analysis of the data that followed. It is important that students recognize that there are different costs and expenses for living on

and off-campus, and the data provided through this study is relevant to their decision making process.

### **Limitations**

There are several limitations in this study; the overarching limitation, however, was the low sample size. Optimally, a minimum of 300 students would have completed the survey available online over the course of three weeks. Some of the categories within variables had too few responses for statistical analysis, so categories had to be collapsed into a smaller number of categories within a variable to meet the underlying assumptions of the statistical procedures (Krauthwohl, 1993). A low number of new, first year students completed the survey, so low numbers for freshmen may have influenced the data analysis in establishing whether or not spending habits changed over the course of attending college.

The second limitation of the study was in the survey method chosen. Although an online delivery tool is a cost-effective and quick method of delivering surveys, ease of opting out or disregarding the messages sent to the provided email addresses may have limited the number of responses able to be gathered. Whereas email messages were originally designed to be sent to personal computers, many students now read their email via the use of a smart phone. Messages containing surveys embedded within the message are very likely discarded, materially reducing the number of possible survey responses no matter how many reminders are sent to students selected for the survey.

The third limitation is a lack of an ability to determine specific factors that comprise an individual's estimated expenses. The average estimated expense for on-

campus students in the area of monthly rent was around \$80. Nearly all students living on-campus have some cost associated with their housing; either students are not considering all of the specific cost centers involved in housing when budgeting money, or they are unaware of the relative costs of living expenses on-campus or off-campus. Therefore, some of the estimated expenses reported in this study may be far different from what students actually paid for their expenses. There was also no question in the survey about how expenses are paid for the off-campus residents. Individuals living with more roommates may pay less per month for some expenses because more people share the cost.

### **Conclusions**

1. There is a relationship between the amount of debt a student anticipates to have upon graduation and their overall self-perceived stress level.
2. The on-campus population, off-campus in Charleston, and the outside of Charleston groups of students all have different spending habits.
3. Within the confines of the present study, it appears students do not necessarily understand the amount of money they are spending to live on-campus or off-campus.
4. There was not a significant relationship between a student's academic classification (freshman, sophomore, junior, and senior) and the perceived level of debt they were carrying. Most students carried a similar perceived level of debt.

5. Car and utility costs were areas that showed significant differences between students living in Charleston and those living outside of Charleston. Students should consider living on or near campus when considering saving money at school.

## **Recommendations**

### **Student affairs practitioners.**

1. When considering the needs of commuting students, take into account the increased travel expenses. This may be an area where students can find cost-saving mechanisms in order to best benefit their financial well-being.
2. Students residing on-campus may not be aware of the costs of living in the halls or the amount it truly costs to live off-campus.
3. College students with a larger debt burden may experience higher levels of stress in their everyday life. Practitioners that interact with students on a counseling level should consider the implications debt may play into the student's mental health. Debt counseling services should be available on a campus in order to assist in alleviating some of the financial stressors in college student lives.

### **Future researchers.**

1. Future researchers should explore the area of financial stress more closely. Specific focus should be spent on the area of personal financial knowledge and its interaction with stress.

2. Future researchers should include a measurement on locus of control and its interaction with financial debt.
3. Research should be performed on the best teaching and learning practices of financial management techniques for college students. Introducing effective financial management practices to students will enable practitioners to proactively reduce some of the debt levels among students as well as reduce overall stress.
4. Carrying out related studies at other institutions would provide a better perspective of how Eastern Illinois University students' financial standing is in comparison to those of other institutions. Cross-campus comparisons may allow researchers to uncover some of the better practices in teaching financial management techniques to individuals within the campus setting.

### **Summary of the Findings**

The goal of this study was to determine the financial well-being of Eastern Illinois University students and how specific characteristics interacted with these levels of well-being. The literature supported the need for more countermeasures to reduce stress caused by student financial mismanagement. The research conducted within this study supported the proposition that there was a connection between self-perceived stress and financial debt. More information needs to be gathered in order to determine the true cause of this connection.

The results of this study demonstrated there was a difference in the spending habits of students living in the residence halls and those students living off-campus.

Future research should uncover more information in this regard and find the specific shortcomings in knowledge present in students living in various living options related to the college campus.

It is with great hope that this study is helpful in future research. The future of student affairs may require a greater focus on student finances and as such utilizing some of the information contained within this document as a starting point will be helpful in guiding students toward financial independence.



## References

- Al-Hindawe, J. (1996). Considerations when constructing a semantic differential scale. *LaTrobe Papers in Statistics, 9*.
- Avard, S., Manton, E., English, D., & Walker, J. (2005). The financial knowledge of college freshmen. *College Student Journal, 39*(2), 321-339.
- Brougham, R., Zail, M., Mendoza, C., Miller, J., (2009). Stress, sex differences, and coping strategies among college students. *Current Psychology, 28*, 85-97.
- Chen, H., & Volpe, R. (2002). Gender differences in personal financial literacy among college students. *Financial Services Review, 11*, 289-307.
- Cooke, R., Barkham, M., Audin, K., & Bradley, M. (2004). Student debt and its relation to student mental health. *Journal of Further and Higher Education, 28*(1), 53-66.
- Cooper, B. M. (2008). Financial Assessment of University Students: A Holistic Approach. Eastern Illinois University, School of Family and Consumer Sciences.
- Eastern Illinois University. *EIU Fact Sheet (2010)*. Retrieved on February 9, 2011. <http://castle.eiu.edu/~planning/institutional/factsheet/2010/>.
- Eastern Illinois University. *Housing Rates (2011)*. Retrieved on May 2, 2011. <http://www.eiu.edu/~housing/rates.php>
- Eastern Illinois University. (2010, June 21). Meeting of the Eastern Illinois University Board of Trustees.
- Edwards, R., Allen, M., & Hayhoe, C. (2007). Financial attitudes and family communication about students' finances: The role of sex differences. *Communication Reports, 20*(2), 90-100.

- Ford, M., & Kent, D. (2010). Gender difference in student financial market attitudes and awareness: An exploratory study. *Journal of Education for Business, 85*, 7-12.
- Ford, M., Devoto, S., & Kent, D. (2007). Threat, intimidation, and student financial market knowledge: An empirical study. *Journal of Education for Business, 1*, 131-139.
- Hayhoe, C., Leach, L., Turner, P., Bruin, M., & Lawrence, F. (2000). Differences in spending habits and credit use of college students. *The Journal of Consumer Affairs, 34*(1), 113-133.
- Housing and Dining Services (2011). Current undergraduate student sample [data file]. *Eastern Illinois University*.
- Huston, S., (2010). Measuring financial literacy. *The Journal of Consumer Affairs, 44*(2), 296-316.
- Kacen, J., & Lee, J. (2002). The influence of culture on consumer impulsive buying behavior. *Journal of Consumer Psychology, 12*(2), 163-176.
- Karhwohl, D. (1993). *Methods of educational and social science research: An integrated approach*. New York: Longman.
- Lai, C. (2010). How financial attitudes and practices influence the impulsive buying behavior of college and university students. *Social Behavior and Personality, 38*(3), 373-380.
- McMillan J.H. & Schumacher, S. (2006). *Research in education: Evidence based inquiry*. Columbus, Ohio: Allyn & Bacon.
- Nellie Mae: Undergraduate Students & Credit Cards. (2005, May 1). *Nellie Mae Undergraduate and Graduate Student Loans and Student Loans for Parents*.

Retrieved October 3, 2010, from

[http://www.nelliemae.com/library/research\\_12.html](http://www.nelliemae.com/library/research_12.html)

- Norvilitis, J., Osberg, T., Young, P., Merwin, M., Roehling, P., & Kamas, M. (2006). Personality factors, money attitudes, financial knowledge, and credit-card debt in college students. *Journal of Applied Social Psychology, 36*(6), 1395-1413.
- Norvilitis, J., Szablicki, B., & Wilson, S. (2003). Factors influencing levels of credit-card debt in college students. *Journal of Applied Social Psychology, 33*(5), 935-947.
- O'Guinn, T., & Faber, R. (1989). Compulsive buying: A phenomenological exploration. *Journal of Consumer Research, 16*(2), 147-157.
- Roberts, J., & Jones, E. (2001). Money attitudes, credit card use, and compulsive buying among college students. *The Journal of Consumer Affairs, 35*(2), 213-240.
- Walstad, W., Rebeck, K., & MacDonald, R. (2010). The effects of financial education on the financial knowledge of high school students. *The Journal of Consumer Affairs, 44*(2), 336-357.
- Watson, S. (2009). Credit card misuse, money attitudes, and compulsive buying behaviors: A comparison of internal and external locus of control (LOC) consumers. *College Student Journal, 43*(2), 268-275.

## **Appendices**

## Appendix A - Financial Literacy and Practices Survey

To help improve services, the EIU Health Education Resource Center is instituting a survey about the financial health of EIU students and their views about money management. You have been randomly selected as one of 3000 students who are being invited to participate. Your opinions are very important to us. Those opinions allow EIU to provide students with the services they need most. It will take approximately 15 minutes. Your survey responses will be strictly confidential and data from this research will be reported only in the aggregate. Your information will be coded and will remain confidential. If you have questions at any time about the survey or the procedures, you may contact Eric Mazoch at 217-581-7678 or by email at [ejmazoch@eiu.edu](mailto:ejmazoch@eiu.edu). At the end of this survey, you will be given information on how to register to win one of 4 \$20 dollar University Bookstore gift cards! Thank you for your assistance in completing this survey!

1. Academic classification:

Freshman  
Sophomore  
Junior  
Senior

2. Age:

--

3. Sex:

Male  
Female

4. Race:

White/Non-Hispanic  
Black/Non-Hispanic  
Hispanic  
Asian/Pacific Islander  
Other

5. Marital status:

Married/Partnered  
Single, Never married  
Divorced  
Widowed

6. Do you have any children?

Yes  
No

7. If so, how many?

1  
2  
3  
4  
5  
6  
7 or more

8. Location of Residence:  
 On-campus, Residence Halls  
 On-campus, University Court or University Apartments  
 On-campus, Greek Court  
 Off-campus in Charleston  
 Off-campus outside of Charleston

To what degree do you agree or disagree with the following:

9. It is cost effective to live in a residence hall  
 Agree 1 2 3 4 5 6 7 Disagree
10. It is cost effective to live in an on-campus apartment  
 Agree 1 2 3 4 5 6 7 Disagree
11. It is cost effective to live in an off-campus apartment  
 Agree 1 2 3 4 5 6 7 Disagree
12. It is cost effective to live in an off-campus house  
 Agree 1 2 3 4 5 6 7 Disagree
13. It is cost effective to live in on-campus greek housing  
 Agree 1 2 3 4 5 6 7 Disagree
14. With whom do you live?  
 Significant other  
 Alone  
 Roommate(s)  
 Parents or other family members

15. Do you currently work?

Yes  
 No

16. Approximately how many hours per week do you work?

17. Enrollment status:

Full-time student  
 Part-time student  
 Full-time student in the School of Continuing Education  
 Part-time student in the School of Continuing Education

18. What is your cumulative GPA?

0.00- 0.99  
 1.00- 1.49  
 1.50 – 1.99  
 2.00- 2.49  
 2.50 – 2.99  
 3.00- 3.49  
 3.50 - 4.00

Within the last month, how much do you estimate you spent on...

19. Utility Bills (i.e. cable, internet, gas, electricity, water)?

20. Rent?

21. Food?

22. Alcohol?

23. Car Related Costs (insurance, monthly car payment, gas, maintenance)?

24. Phone bill?

25. Pets?

26. Entertainment?

For the following 5 Questions, rate the level you agree or disagree with the statement. In this specific question, rate each of the items based on how closely the two words or phrases at each end of the scale best relate to you.

27. How has your financial situation affected your personal relationships?  
Slightly/None 1 2 3 4 5 6 7 Severely
28. How has your financial situation affected your academics?  
Slightly/None 1 2 3 4 5 6 7 Severely
29. How has your financial situation affected your family life?  
Slightly/None 1 2 3 4 5 6 7 Severely
30. How often do you worry about your financial situation?  
Rarely 1 2 3 4 5 6 7 All of the Time
31. I feel the following about my financial condition:  
Calm 1 2 3 4 5 6 7 Anxious
32. What is your collective outstanding balance now?  
\$(FREE RESPONSE, NUMERIC ONLY)
33. What do you anticipate your outstanding balance to be at graduation?  
\$(FREE RESPONSE, NUMERIC ONLY)
34. How long do you think it will take to pay off your student debt?  
1-2 Years  
3-4 Years  
5-6 Years  
7-8 Years  
9+ Years

## **Appendix B - Sample Informed Consent**

You are invited to participate in a research study conducted by Eric Mazoch under the supervision of Dr. Charles Eberly, from the Counseling and Student Development Department at Eastern Illinois University.

Your participation in this study is entirely voluntary. Please ask any questions that may arise about things that you do not understand before deciding whether or not to participate.

You have been selected at random from all currently enrolled undergraduate and graduate students at Eastern Illinois University. Based on the nature of the study all currently enrolled students should be able to complete the survey.

### **Purpose of the Study**

The purpose of this study is to assess the level of “financial literacy” amongst the students currently attending Eastern Illinois University. Financial literacy is a mixture of the knowledge of financial terms and the application of that knowledge into everyday use. Through the data collected in this study, more intentional programming will be formed in order to assist student in their financial independence in college and after.

### **Procedures**

If you volunteer to participate in this study, you will be asked to:  
Complete the survey which you will be taken to after completing this form of consent.

### **Potential Risks and Discomforts**

Some of the information contained within this survey may cause emotional discomfort or discomfort due to having to disclose personal information.

### **Potential Benefits to Subjects and/or Society**

There is no intended direct benefit to the subject from the completion of this study.

Completion of this survey and this study will contribute to the overall knowledge-base of Eastern Illinois University about the financial literacy of students enrolled. Through the information collected, programming and financial awareness programs are able to be more intentionally developed to the needs of the population of students at Eastern Illinois University.

### **Incentives for Participation**

Four students completely finishing the survey will be entered into a random drawing for one of four *\$20 Eastern Illinois University Book Store gift cards*. The students will be selected and notified within 2 weeks of the end date of the study and the gift cards will be distributed promptly upon confirmation with the student of a valid address.

### **Confidentiality**



Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained by means of coding all data collected throughout the data collection process. Names will only be utilized for confirmation of informed consent. Data will be stored with the Illinois Higher Education Center's secure data collection software. Data will only be distributed to others if names or other identifying information is removed or the data is summarized and names of participants are disassociated from the study.

### **Participation and Withdrawal**

Participation in this research study is voluntary and is not a requirement or condition for being the recipient of benefits or services from Eastern Illinois University or any other organization sponsoring the research project. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind or loss of benefits to services to which you are otherwise entitled.

You may also refuse to answer any questions you do not want to answer. There is no penalty if you withdraw from the study and you will not lose any benefits to which you are otherwise entitled.

### **Identification of Investigators**

If you have any questions or concerns about this research, please contact:

Eric Mazoch (217) 581-7678, [ejmazoch@eiu.edu](mailto:ejmazoch@eiu.edu)

or

Dr. Charles Eberly (217) 581-7235. [cgeberly@eiu.edu](mailto:cgeberly@eiu.edu)

### **Rights of Research Subjects**

If you have any questions or concerns about the treatment of human participants in this study, you may call or write:

Institutional Review Board  
Eastern Illinois University  
600 Lincoln Avenue  
Charleston, IL 61920  
Telephone: 217-581-8576  
Email: [eiuirb@eiu.edu](mailto:eiuirb@eiu.edu)

You will be given the opportunity to discuss any questions about your rights as a research subject with a member of the IRB. The IRB is an independent committee composed of members of the University community, as well as lay members of the community not connected with EIU. The IRB has reviewed and approved this study.

---

I voluntarily agree to participate in this study. I understand that I am free to withdraw my consent and discontinue my participation at any time. I have been given an electronic copy of this form.

### Appendix C - Standard Email to Research Subjects

Dear [subject's name]:

This email is in regards to being randomly selected to participate in a study being conducted through the Illinois Higher Education Center at Eastern Illinois University. This study is in regards to collecting data from EIU students about their financial knowledge and practices. Data being collected in this survey will remain confidential and any data that is given out to interested parties will be made anonymous or summarized to protect the participant's identity.

The primary researcher in this study is Eric Mazoch, a graduate student in the Counseling and Student Development department with the supervision of Dr. Charles Eberly. If you have any questions about the survey at any time or would like to discuss the survey please contact me at [ejmazoch@eiu.edu](mailto:ejmazoch@eiu.edu) or call (217) 581-7678.

If you would like to participate in this study, please click on the hyperlink below. The survey will take approximately 15 minutes to complete and all participants fully completing the study will be entered into a drawing for one of four \$20 gift cards for the EIU Bookstore.

If you need to speak with a counselor because of any emotion created at any point during this survey, please contact (217) 581-3413

Thank you in advance for your time,

Eric Mazoch

Associate Resident Director

Graduate Student, College Student Affairs