Proceedings of the Association for Financial Counseling And Planning Education

SM

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# **Editor's Note**

Welcome to the 2008 AFCPE Conference Proceedings! The program committees have selected an outstanding array of presentations for this year's meeting. Thanks to those who submitted items and to Cara Defibaugh, AFCPE Member Services Coordinator, who did the hard work required to create the 2008 AFCPE Conference Proceedings from a collection of individual documents.

Whether you are a practitioner, an academic, a student, a vendor, or another supporter of financial counseling and planning education and service, please take the time to read our colleagues' submissions. They have been reviewed by committees of peers and are presented here as a written record.

Posters and workshops have abstracts that are only one page long. They are easy to read quickly. However, don't let the length of the research papers discourage you. Don't let the technicalities of the research methods and statistical analysis keep you from learning about the findings and recommendations. Use the author contact information to ask the authors to help you apply their findings to your work. Even the references may give you solutions to problems you face or ideas for future work. If you aren't a grass-roots program provider and don't care about how programs are presented, seek to understand the theoretical basis of that education and use the author contact information to gain deeper understanding or to launch a mutually beneficial program evaluation/research project. Benefit from your colleague's knowledge and experience!

Push yourself to really understand a new research finding or a highly successful practical application. If you are an academic, especially pay attention to the practitioner work presented here. If you are a practitioner, take time to learn what researchers are doing. Each role supports and informs the other. From the beginning, our organization was designed to provide true communication among and support of each segment of our membership. If we fail to view AFCPE as a broad organization and segment ourselves into narrow interest groups who only seek their own specific current needs, we will fail as an organization and a profession.

As we continue to discuss our profession, its name, the theories we use, and the unique niche our work represents in today's world, and seek to position ourselves to grow and meet the needs of our members and society, consider the work included here. What are we truly doing? Are we doing everything that is needed by our membership and society both now and into the future? Are we developing and supporting the necessary research base, professional preparation programs, and professional support systems? Where are there gaps that we need to address? How can we best prepare for a productive, useful future? How can we document the impact of our work so that those outside our profession understand and value it?

AFCPE has an important role for all who care about influencing the well-being of families, individuals and society through providing financial education, counseling, and planning. Each of us should contribute positively to the future of our profession. These proceedings offer each of us the opportunity to take stock of where we are individually, as an organization, and as a profession. Take advantage of them! Use them to launch your work in the coming year.

Please consider submitting your work for publication in the 2009 AFCPE *Proceedings* and for presentation at the conference to be held in Scottsdale, AZ. Visit the AFCPE website (<u>www.afcpe.org</u>) for conference details and submission guidelines.

Irene E. Leech and Patti J. Fisher Virginia Tech 2008 Proceedings Editors <u>ileech@vt.edu</u>; <u>pafisher@vt.edu</u> Proceedings of the Association for Financial Counseling and Planning Education, 2008

### Recognition of 2008 Conference Program Reviewers

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#### Providing Estate Planning Education via the Web

Marilyn Bischoff<sup>1</sup>, Beverly Healy, University of Idaho; Joanne Bankston, Kentucky State University; Elizabeth Gorham, South Dakota State University; and Debra Pankow, North Dakota State University

Key Words: estate planning, wills, advance directives for health care, record keeping, living will

Sixty percent of Americans die without a will and nearly seventy percent report they do not have a living will or medical directive for health care. Many people procrastinate in preparing these legal documents because they don't know how to begin. University Cooperative Extension faculty from six states developed end-of-life legal education resources to help families avoid unnecessary stress and expense resulting from not having these documents.

#### Objectives

- Deliver teaching resources to professionals via the web, enabling them to teach a 3-seminar course titled, *Legally Secure Your Financial Future: Organize, Communicate, Prepare*
- Expand Cooperative Extension's outreach by providing consumers access to estate planning information 24/7 through web-delivered resources

#### Methods

An estate planning education program, *Legally Secure Your Financial Future* (LSYFF), is available in two webbased formats:

- Educator materials: An Extension Family Economics team developed a teaching curriculum that includes Instructor Guides; PowerPoint slides and teaching notes for three seminars: 1. Organize Your Important Papers, 2. Communicate Your Final Wishes, and 3. Prepare Your Estate Plan; marketing resources; and course evaluation. All resources can be downloaded from <a href="http://www.ag.uidaho.edu/lsyff/">http://www.ag.uidaho.edu/lsyff/</a>.
- 2) Materials for direct consumer access: The LSYFF teaching curriculum was adapted into learning lessons for consumers, accessable through Cooperative Extension's eXtension website at <u>http://www.extension.org/pages/Legally\_Secure\_Your\_Financial\_Future</u>. This website includes worksheets that consumers can download, enter their personal information, and save on their home computers. Downloadable forms include: a) Record of Important Papers, b) Household Inventory, and c) Smart Goal Setting worksheets.

#### **Evaluation/Impact**

The LSYFF course was taught by an Extension educator ten times to 920 adults in Idaho's largest metropolitan area. Pre- and 6-month follow-up evaluations document results:

Legal Tasks	Pre-	6 months afterward
Completed living will	30%	87%
Completed health care		
Power of Attorney	32%	81%
Organized family records	40%	88%
Wrote will	44%	81%

This estate planning teaching curriculum has been adopted by university Extension faculty in seven states: Colorado, Idaho, Kansas, Kentucky, North Dakota, New Hampshire, and South Dakota.

LSYFF materials on the consumer website received more than 5,000 visits during the first 10 weeks of the eXtension launch. LSYFF eXtension downloadable forms are among the most used of eXtension resources.

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#### Louisiana House - Home and Landscape Resource Center: Open for Business

Frances C. Lawrence<sup>1</sup>, Claudette H. Reichel, and Margaret Pierce Louisiana State University Agricultural Center

Key Words: housing, horticulture, hurricane protection, landscape, sustainable home, sub-tropical climate

For most people, the largest and most important purchase they will ever make is their home. To help homeowners make the most of their investment, while doing their part for our nation and future generations, the Louisiana State University Agricultural Center and its partners have developed Louisiana House - Home and Landscape Resource Center (LaHouse).

Located on the Louisiana State University campus in Baton Rouge, the center focuses on housing and landscape techniques specific to the gulf coast region's sub-tropical climate and hazards. The demonstration house is designed around the concept of being a *sustainable* home. With exceptional indoor air quality and universal design, it is energy and resource efficient while also comfortable, safe, durable, and healthier for its occupants.

An unusual and powerful strength of the house and landscape is that many different options are presented, and homeowners may pick and choose the options that are either most affordable or meet their need or desire for optimal performance. The high-performance house includes four different building and foundation systems, three space conditioning systems, five attic treatments, and a wide variety of materials, products, and technologies with "green," healthy, and low-maintenance characteristics. The layout and interiors exhibit "universal design" concepts and family-friendly features that accommodate diverse and changing needs and abilities. LaHouse demonstrates Building America, ENERGY STAR, Healthy Home, Green Building, as well as Fortified for Safer Living program guidelines.

Both consumers and professionals can see first hand and learn about many solutions -- from ways to protect their homes from hurricanes, floods, mold, and termites to the employment of highly energy efficient and healthy building, air conditioning, and lighting systems to interiors that combine beauty, comfort, and convenience with eco-friendly benefits.

The house will not only serve as an educational showcase, but the garage is actually a multi-media classroom for audiences such as builders, designers, and consumers to obtain the latest, science-based information or to rent for their own educational programs. Cut-aways and an unfinished exhibit room allow visitors to see the special components used in construction.

Featured attractions include not only the house itself but also the seven-acre site that is designed around being a sustainable landscape exhibit. A pond on the site plays dual roles in storm water pollution prevention and in the heating and cooling of the house through a geothermal heat exchange system. Winding trails lead visitors through drought-resistant, native plants, a rain garden, and other special horticulture exhibits. A programmable irrigation system minimizes the amount of water used to keep the plants healthy.

LaHouse Resource Center was made possible by the support of partners and private contributors who share its vision of shaping the future with sustainable homes and development. Top LaHouse Key Partners include the La. Dept. of Natural Resources and U.S. Dept. of Energy Building America Program. Top Key Contributors include Entergy of Louisiana, Paula Garvey Manship, the Borate-Treated Wood Alliance (U.S. Borax, Osmose and Louisiana-Pacific), Louisiana Home Builders Association, Roy Domangue, Roy O. Martin Lumber Co., and Building Science Corporation. For more information, visit www.LouisianaHouse.org or call 225-578-2378.

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#### **Mortgage Acceleration Schemes**

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Key Words: mortgages, consumer protection, pre-payment, acceleration

Schemes to entice homeowners to pay off their mortgage early and reduce their interest payments are proliferating on the web and through multi-level marketing companies. Typically backed by a finance company, the schemes purport to help homeowners pay off their mortgage in one-third to one-half the typical 25 to 30 year term. Backed by sophisticated web-based audio-visual presentations, these schemes claim savings of tens of thousands of dollars without having to make any change in spending habits or lifestyle.

The purpose of this poster is to inform AFCPE attendees about these schemes and to provide them with data and examples to answer client questions and educate them to avoid high fees while illustrating how they can pay off a mortgage more quickly on their own. Note however, that using "extra" funds to pay off a mortgage early may not be the best use of limited resources. Extra funds might better be used to build an emergency fund or save for retirement.

#### How Mortgage Acceleration Schemes Work

The concept originated in Australia with interest-only mortgage, and is based on paying extra each month by depositing one's entire paycheck in a home equity line of credit (HELOC), paying extra on the mortgage each month, and borrowing living expenses from the HELOC. Using proprietary software, the homeowner is directed to open a HELOC and funnel all income (deposit paychecks) and payments through the HELOC, essentially using it as a checking account. Essentially the homeowner makes a mortgage payment each month equal to her or his entire take home pay, using the HELOC to pay for living expenses, which reduces the interest owed on the mortgage.

#### **Problems with Mortgage Acceleration Schemes**

The homeowner is required to purchase costly software, typically costing about \$3,500. For those who do not have \$3,500 sitting idly, the finance company behind the scheme is more than happy to finance the software purchase. In addition to a high upfront cost, the system requires a lot of discipline to adhere to the program. HELOC rates are typically priced at the prime rate plus <sup>1</sup>/<sub>4</sub> to 1<sup>1</sup>/<sub>2</sub> percent. Borrowing at 8.6% to pay off 6% mortgage (an example from one of the websites) doesn't make sense, especially when the HELOC rate is likely to rise in the future. Paying extra on a mortgage (or any loan) by borrowing at a higher rate makes no sense even if the HELOC interest is tax deductible. About 70% of taxpayers are in the 10 or 15% federal marginal tax bracket so tax savings are minimal, even if all the HELOC interest is deductible. Interest rates on HELOC are variable and since currently (mid-2008) interest rates are very low, they are likely to rise in the future.

#### Alternatives

A homeowner can accomplish the same result by prepaying on their own which also requires discipline but can be set up as an automatic transfer (which can be terminated by the consumer at any time). Using the PowerPay debt reduction program, this poster illustrates how a homeowner can accomplish the objective of saving on interest by repaying a mortgage early without buying costly software.

#### Conclusions

There are lots of schemes to part consumers from their money. Paying for special mortgage acceleration software is one that homeowners should be warned against. The promoters have taken a very simple concept and made it complex to sell their software. The website (with fancy graphics and animation) conveniently leaves out the cost of the software. One has to phone and be exposed to the hard sell to find out the cost. The websites are sophisticated and convincing, but simple financial strategies can accomplish similar savings at no cost.

Consumers in search of a way to supplement their income may be enticed to pay a fee to become an "independent agent" (salesperson) selling this software. This is a multi-level marketing system that may cost more than they earn in commissions.

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#### Evaluation of a Web-Supported Personal Finance Course for College Students

Jeanna Hennick<sup>1</sup>, Mohamed Fazli Sabri, and Douglas Borkowski, Iowa State University

#### **Course Development and Objectives**

In response to the increasing need for financial education as college students take on greater educational loan debt and manage finances in other ways that will affect their adult development, the Department of Human Development and Family Studies (HDFS) in the College of Human Sciences at Iowa State University (ISU) sponsored a teaching initiative in Spring 2008 to demonstrate and assess a new introductory personal finance course for undergraduate students. The course was developed and taught by the staff of the ISU Financial Counseling Clinic, which provides counseling for ISU students and the Ames community. Based on the clinic staff experience in counseling undergraduates, the course was designed to deal with financial issues during the first few years in college and to be delivered conveniently for students. It was taught on campus with substantial web-based supplementary content, but offered as a continuing education course (HDFS 493F, Financial Development for Young Adults) in Spring 2008. The delivery of the course was a combination of web-based and face-to-face, i.e, in person via lecture or streaming video via the internet. This method was chosen so that there was flexibility in when the students received the content. Despite the relatively late notice, 17 students from all ISU Colleges enrolled in and completed the course.

#### Evaluation

The level of knowledge gained from the new course was assessed with a test administered at the end of the semester. The accuracy of the students' knowledge of topics such as financial aid, credit, and budgeting for financial planning was also compared to the findings of a similar test/survey of 1,541 students administered by the Iowa State University's Office of Student Financial Aid (OSFA) in Spring 2007. Overall the results indicated that the 493F students (N = 17) answered 71% of comparable questions correctly, which exceeds the 63% correct for OFSA respondents. The 493F students scored markedly better (53% correct vs. 32%) on credit knowledge, about the same on financial aid (75% vs. 74%) and somewhat lower (82% vs. 85%) on budgeting and investments. 493F students did not perform as well as expected when computations were required in post-test questions concerning the total cost of a credit card purchase (493F 24% correct vs. OFSA 16% correct) and the least cost repayment plan for student loan debt (493F 65% correct vs. OFSA 80% correct). On a somewhat negative note, the College of Human Science students who took 493F scored substantially below students from other Colleges (particularly when compared to Business and Engineering students). Males answered more 493F post-test questions correctly than females and upper-level 493F students scored better than those in their 1<sup>st</sup> or 2<sup>nd</sup> year. The 493F summary course evaluations demonstrated that students appreciated the opportunity (overall course mean was 4.1 on 5-point scale) and a majority said they intended to study financial management in the future. Additionally, they expressed a preference for a combination of on-campus and web-based course delivery. The student evaluation open-ended comments included statements affirming that the course assignments were relevant to their financial concerns, and they were particularly impressed with the credit reporting content and the use of the "financial path to graduation" material.

#### Implications for Curriculum Development

College of Human Science faculty and administrators have learned that there is a need for more financial development education in the College. To expand enrollment by providing time flexibility, the web-based content of the 493F financial development course will be used to supplement other materials for the HDFS 283 Introduction to Financial Management class and it will be offered more frequently. The content for HDFS 283, and counseling support for ISU undergraduates, will be expanded in the areas of budgeting and investment. Also course instruction for HDFS 283 should include more emphasis on financial computations.

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#### Parents, Educators, and the Financial Literacy of Young Adults

Bryce Jorgensen<sup>1</sup>, Virginia Tech

Key Words: financial literacy, college students, financial influences, family resource management theory, social learning theory

A current national concern is the low financial literacy of college students. Most young adults don't have the financial knowledge necessary to be successful in today's fast paced economy. This study investigated the personal financial literacy of 462 undergraduate and graduate students recruited from the following states: Tennessee, Nevada, Oklahoma, South Dakota, Idaho, and Virginia. The researcher examined parental and peer influences, and examined how students' financial knowledge and attitudes correlated with their financial behavior. The present research used family resource management theory, based in systems theory, to understand the financial management practices of college students.

The College Student Financial Literacy Survey (CSFLS) was created to collect data on-line and specifically for this study. The survey measured parental and peer influences, personal characteristics, financial knowledge, financial attitudes, and financial behavior. According to family resource management theory, students' financial behavior is influenced by their demands and available resources (i.e., values, attitudes, knowledge, and personal characteristics). Social learning theory explains that available resources increase from learning developmentally through interaction with the environment (Bandura, 1977). How family members interact with each other greatly impacts child learning. For behavioral change to take place and be significant, knowledge and attitudes must change (Hayhoe, Allen, & Edwards, 2005).

The key findings from this research were the significant differences found in students' financial literacy due to class rank and parental influence. Gender, socioeconomic status (SES) and peer influence were not found significant in college students' financial literacy. Another interesting finding showed correlations to be consistent across financial knowledge, attitudes, and behaviors. The unique contributions made by this study provide implications for future practice, policy, and research. College students need to receive more financial education during this important time of their life so they can be better financial consumers in today's complex marketplace. The ability to make important personal financial decisions will affect them for the rest of their lives.

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#### Personal and Family Finance in the Marriage and Family Therapy Domain

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Key Words: personal finance, marriage and family therapy

Personal and family finance courses have not typically been offered in marriage and family therapy (MFT) program curricula yet financial issues are consistently reported as a difficulty by married couples. Several researchers (Aniol & Snyder, 1997; Dean, Carroll, & Yang, 2007; Grable, Britt, & Cantrell, 2007) have documented the co-occurrence of financial and relationship distress within marriages and similar intimate relationships. Nearly 20 years ago, Poduska and Allred (1990) reviewed 25 accredited MFT programs finding only one that required a family finance course. The authors concluded that even though finances are a known source of marital problems, related courses were not an integral part of training offered by MFT programs.

A recent review of the American Association of Marriage and Family Therapy's (AAMFT) Commission on Accreditation for Marriage and Family Therapy Education (COAMFTE) directory of accredited graduate and postdoctoral clinical programs in the U.S. and Canada revealed little information on coursework or preparation related to personal and family finances. Therefore, the purpose of this study was to determine what changes have occurred, if any, in MFT programs in terms of student preparation for treating financial issues.

A web survey of the accredited MFT program directors was conducted using the AAMFT/COAMFTE web directory. Survey invitations were sent via email to 85 program directors with a final response rate of 21% (n=18). The program directors were asked to forward a survey invitation and web link to their current graduate students. The number of graduate students currently enrolled in MFT programs is unknown. Student responses resulted in 102 completed surveys.

In general, there were notable differences in the responses of the MFT program directors as compared to MFT graduate students. Results mirrored those of the earlier study in that only two master's programs and two doctoral level programs in this study listed a personal or family finance course elective. When asked what factors would impact their decision to offer such a course, program directors commented that the number of required credits makes it difficult to get a course approved and they would need a faculty member with the interest/ability to teach it.

Over half of the graduate students reported that they would benefit from the additional coursework. Of the graduate students, 60.78% (n=62) reported that they would take an elective course in personal and family finance if it were offered. When asked about taking an elective course in financial counseling, 62.75% (n=64) said they would take it. Students were asked to rank their comfort level of talking with clients about financial concerns on a 10-point scale. After combining categories those who marked the lower half of the scale by indicating a 5 or less, comprised 22.54% of the sample; those who marked the upper end of the scale (8, 9 or 10) comprised 39.22%.

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#### Losing Out on the Earned Income Tax Credit: Differences between EITC Recipients and Eligible, Non-Recipients

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Key Words: EITC, EITC non-recipients, rural low-income families

The Federal Earned Income Tax Credit (EITC) has become the largest federal aid program targeted towards working low-income families. The tax credit has many significant benefits including that it increases families' purchasing power and builds savings, provides an incentive for single mothers to remain in the labor force, reduces income inequality, and is the single largest program that has decreased child poverty. However, not all working families who are eligible file for the tax credit. This study examined the differences between eligible, non-filing families and eligible, filing families.

Data from the USDA-funded multi-state longitudinal project, NC-223/NC1011, "Rural Low-Income Families: Tracking Their Well-Being and Functioning in the Context of Welfare Reform," were used (see http://fsos.cehd.umn.edu/projects/rfs.html for a complete project description). The sample consisted of 224 rural families who were entitled to the EITC payment; only 65% (145 families) of them, however, claimed it. Rural families who were in the sample had annual incomes at or below 200% of the Federal poverty line and had at least one child under the age of 13 years. They were from 23 counties in 13 states: California, Indiana, Kentucky, Louisiana, Massachusetts, Maryland, Michigan, Minnesota, Nebraska, New Hampshire, New York, Ohio, and Oregon. The mothers were recruited through programs that serve low-income families such as the Food Stamp Program.

We hypothesized that EITC eligible but non-participating mothers are less educated, are likely ethnic minorities, have lower income and receive TANF/food stamps, experience depression, face greater food insecurity, borrow money from family/friends, consider their income inadequate, view their present economic circumstances less favorably, are less satisfied with life, and live in relatively more rural counties and in states without a state or a refundable state EITC.

Results indicated that the non-filing mothers were less likely to have a high school diploma, but more likely to be Hispanic, have more children, consider their income inadequate, borrow money from family or friends, and live in counties that are relatively more rural. On the other hand, working mothers who claimed the tax credit were more likely to be high school graduates, be White or African-American, be food secure and at the same time receive food stamps, report an improvement in their economic situation over the past two years, and be more satisfied with their life.

Rural mother's age, income level, receipt of TANF, maternal depression, and availability of a state or refundable state EITC made no difference in whether or not eligible rural mothers applied for the EITC. Policy makers must design ways to highlight the importance of the EITC among eligible rural low-income families and increase their participation.

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#### Problem Gambling in Rural America: Considerations for Financial Counselors

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Key Words: problem gambling, effective treatment, financial strategies

This study explored gambling addiction from the perspective of adult gamblers who initiated gambling addiction treatment between 2003 and 2008 from Gambler's Choice, a program of Lutheran Social Services of North Dakota that works with problem gamblers and their families offering group and individual interventions at five sites across North Dakota. Data were collected via a mailed survey instrument, which included qualitative interview interest cards, sent to 450 individuals meeting the study criteria. Ninety-seven valid surveys were returned to the researchers and 15 individuals over the age of 50 participated in qualitative interviews either in person or over the telephone.

Survey respondents ranged in age from 20 to 82 (mean: 51), 43% men and 57% women. Sixty-one percent of respondents reported being married or in a marriage-like relationship, 76.8% of respondents reported earning \$50,000 or less per year (46.4% earned less than \$24,000), and 23% reported having filed bankruptcy due to their gambling. The casino game played the most was slot machines followed by card games. The amount of money spent during respondents' most recent casino visit ranged from seven to nine-thousand dollars with the majority of respondents claiming to have spent \$300. Sixty-four percent of survey respondents endorsed having had a mental health condition during the time they applied for gambling treatment services while only 17% endorsed having had a medical condition during the same time period. Engagement in illegal activities due to gambling was reported by 42% of survey respondents.

Qualitative interview participants constituted a subsample of those completing mailed surveys. Survey respondents indicated their interest in participating in an interview by returning an interview interest card with their contact information. Age of these participants ranged from 50 to 82. Interviewees not only reported having lost jobs and relationships due to their gambling, they reported a loss of self esteem and trust. Many participants, while expressing the disease aspect of their gambling, also took responsibility for their behavior.

Financial issues are at the core of this disorder, so recovery steps employed by participants included financial strategies such as removing themselves from positions of financial management at home or work. Participants reported turning over household financial responsibilities to another adult and working with a small weekly allowance to avoid having money as a trigger for gambling. An individual working in a casino arranged to have his cash tips "tracked" by his supervisor, who held the tips during his shift and sealed them in an envelope, recording the amount to keep him "honest" until he gave the envelope to his spouse. Respondents reported ways to build in accountability for cash transactions and of disengaging themselves from checkbooks, debit cards, and credit cards.

Financial counselors need to be cognizant of the underlying issues precipitating financial difficulties for their clients; many problem gamblers perceive gambling as a way to supplement their income rather than a financial stressor, they tend to distort financial reality with "gamblers' math" in that they recall wins rather than losses. Denial is a symptom of gambling addiction so clients may truly not be aware of the role gambling plays in their financial situation. Financial counselors may need to ask clients specifics about their entertainment expenses or request itemization of cash advances from ATMs or credit cards. Gambling addiction has a high rate of comorbidity with mental health disorders and suicide therefore it is important for financial counselors to work closely with mental health counselors and gambling addiction treatment programs to make appropriate referrals for assessment and treatment. Financial restitution is a foundational aspect of recovery for gambling addicts so caution should be implemented with clients seeking bankruptcy declaration as a solution to financial insolvency.

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#### College Students' Financial Literacy: Implications for Financial Planning Professionals and Educators

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Key Words: college students, financial literacy, financial planning professionals.

The acquisition of financial knowledge and the skills necessary to manage and take control of financial resources is a foundation for building a solid and stable future for the individuals and families within American society (National Endowment for Financial Education [NEFE], 2002; Rhine & Toussaint-Comeau, 2002). Financial education endeavors have been implemented as early as kindergarten, with considerable effort placed on integrating basic financial knowledge into math and reading during elementary-, middle-, and high-school curricula (U.S. Department of the Treasury, 2002). Efforts to provide adults with the skills necessary to disseminate knowledge and model important behaviors related to financial skills and management of resources has been undertaken by the Cooperative Extension's Consumer and Family Economics outreach programs (Tennyson & Nguyen, 2001). However, despite concentrated efforts to improve financial literacy through education and outreach, overall effectiveness was not demonstrated according to the results from the first four Jump\$tart surveys conducted biennially beginning in 1997 (Mandell, 2006). The most recent Jump\$tart survey (2008) revealed a mean score of 48.3% (N = 6,856) a decrease from the 2006 survey results which had a mean score of 52.4% (N = 5,775). In 2008 the Jump\$tart survey was given to college students for the first time. The results from the college students' survey indicated a mean score of 62.2% (N = 1,030). Norvilitis et al. (2006) had previously used the Jump\$tart Survey to determine if college students had more financial knowledge than high school students and reported a mean score of 60% (N = 448).

In 2007 the researchers of this study used the Jump\$tart survey to explore financial literacy of 204 female firstgeneration college students as part of a larger research study. The Survey was administered via a secure online data collection protocol, with questions related to demographics and behavioral characteristics preceding the Jump\$tart Survey. The mean Jump\$tart Survey score for these research participants was 58.11%. The majority (51.5%) of participants identified their ethnicity as Caucasian, 21.3% as Black or African American, 19.3% as Hispanic American, and 4.5% as Asian American. Seven participants (3.5%) reported their ethnicity as "other." A one-way analysis of variance of Survey test scores and student ethnicity generated a significant F-ratio; F(4,197) = 9.10; p <.001. Students who identified as White or Caucasian scored higher than students who identified as Black or African American, or Hispanic. Ethnicity of the participants explained 16% of the variance in the Survey test scores ( $r^2 =$ .16). A moderately positive significant correlation was found between the student ages and Survey test scores, r(200) = .44, p < .01. Participant age accounted for 20% of the variation in Jump\$tart scores ( $r^2 = .20$ ). Participation in high school or college personal finance or personal financial planning courses did not produce a statistically significant mean difference in Jump\$tart scores.

Implications for the results of these findings include the importance of educated, trained, personal financial professionals in the future. The financial success and stability of young adults as they transition through the lifespan will be dependent on solid financial advice and guidance from trained professionals who are cognizant of potential differences among various ethnicities and can adapt to the needs of their clients. University personal financial planning programs will be called upon to recruit, educate, and train more new professionals as the financial world becomes more and more complex and the financial literacy of adults continues to be less than optimal. Financial planning and resource management in extension, the military, and counseling venues will continue to be fundamental to individual, family, and community financial success as we progress through the 21<sup>st</sup> Century. Additionally, the necessity to provide substantive evaluative measures to our current educational efforts for increasing financial literary among our youth and young adults needs to be explored.

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#### Practicum Experiences: Bridging Theory and Practice in Financial Counseling and Planning Curricula

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Key Words: financial planning and counseling curricula; practicum experience

Coursework provides the basic foundation in the Family Financial Planning curriculum of the Great Plains Interactive Distance Education Alliance<sup>2</sup> (GPIDEA). Building upon the coursework, a practicum experience is also required. It is an essential element that bridges theory and practice.

Students in the GPIDEA program are required to complete 6 credits in a practicum. Typically, students fulfill this requirement by completing a 3-credit practicum course in each of two semesters. The objective of the practicum is to provide the students with an opportunity to integrate the knowledge, skills, and attitudes learned in the classroom with actual practice. It is expected that students will have met prerequisite competencies in financial planning and counseling so they can gradually be given responsibilities similar to those they will experience in the financial counseling and planning services industries.

Practicum requirements are developed on an individual basis between the student and his/her major professor. In the semester prior to the practicum experience, the student completes a detailed questionnaire that addresses tquestions such as 1) future career plans, 2) type of position aspired to upon graduation, 3) type of client population they would most like to work with in their practicum or the types of research and scholarly project that would be most helpful in advancing their career, 4) desired type of setting to complete practicum, 5) professional strengths, 6) areas needing further development, and 7) three or four goals established for the practicum experience. Practicum experiences are planned so not to replicate past experiences or present employment. Rather, they are designed to build upon these and contribute to the students' future career goals. Possibilities include participating in an internship, researching and writing a paper for publication, developing a program or project approved by the advisor, creating and presenting educational programs to adults or youth, volunteering in the area of counseling or tax preparation, or participating in a guided independent study with the professor. Financial planners, or other financial services professionals, serve as supervisors for the internships.

Students are required to have 120 contact hours for each 3-credit practicum experience. Weekly reports are submitted to the professor in which the student summarizes the activities performed that week and reflects on his/her practicum experience. A final report/portfolio is submitted at the end of the course. The portfolio includes practicum logs, learning goals, practicum description, abstracts and reflections of research articles related to experience, midterm and final practicum evaluations, an updated resume, and any supplemental materials that were developed as part of the practicum. The portfolio can serve as a primary resource in the "job-seeking" process.

Students identify the practicum experience as being extremely beneficial to their professional development. "This practicum experience has enabled me to develop a great resource that I can use to further my career and to provide my clients and members of my community with information that will help them."

A practicum experience is a critical component of financial counseling and planning curricula. The practicum experiences bridge theory with practice providing a crucial step in assisting the student to successfully move into full-time financial planning and counseling employment.

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<sup>&</sup>lt;sup>2</sup>GPIDEA institutions participating in the family financial planning degree are Iowa State University, Kansas State University, University of Nebraska-Lincoln, North Dakota State University, South Dakota State University, Oklahoma State University, Montana State University, and the University of Missouri-Columbia.

#### Providing Collaborative Financial and Couples Counseling: Experiences of the Financial Counselors and Couples Therapists

Leslie Green Pimentel<sup>1</sup>, Joseph Goetz, Jerry Gale, and Maria Bermudez, University of Georgia

Key Words: financial counseling, couple's counseling, counseling techniques

#### Introduction

It is often the case that couples in financial stress also have relationship stress, and it is not unusual for couples in relational stress to also have issues over their financial situation. There is literature suggesting that a relationship exists between relational and financial stress. Prior research has indicated marital satisfaction is affected by the presence of financial stress (Johnson, Lee, Lee, & Schramm, 2006) and that couples in marital therapy also report having financial stress or problems (Aniol & Snyder, 1997; Miller, Yorgason, Sandberg, & White, 2003). However, there are no training programs preparing professionals in the skills and knowledge of both disciplines. Thus therapists and financial counselors can each find themselves ill prepared to address the complexity of clients presenting both relational and financial issues (Miller et al., 2003). Suggestions have been made for a collaboration of the two fields (Johnson et al., 2006) or at a minimum being able to recognize simultaneous financial and relational stress in order to make appropriate referrals (Kerkmann, Lee, Lown, & Allgood, 2000).

A research study was recently conducted at a southern university where couples experiencing both relational and financial stress were invited to attend five sessions with both a couples therapist and financial counselor present at each session. Criteria for participation included the following: at least one partner employed, live together for at least six months, experiencing relational and financial stress, not currently undergoing therapy/counseling and living at or below the poverty level. The couples were compensated after each meeting and at a follow-up interview held three months post intervention. A total of three student therapists and three student financial counselors participated in counseling 12 couples<sup>2</sup>. This poster presents a summary of the survey results of the six counselors' perspectives on the collaborative financial and couples counseling project. Client data is not presented as this poster focuses on the perspectives of the counselors. The counselors answered an eleven question (open ended) survey<sup>3</sup> about their experience. An overview of the results is summarized below and will be elaborated in the actual poster.

#### Results

Results are summarized into seven themes. (1) the importance of the relationship between financial and relational stress such that relationship dynamics can intensify with more serious financial issues; (2) the benefits of collaboration experienced by the financial counselors and couple's therapists; (3) the limitations of the collaboration; (4) different styles of preparation by the therapists and financial counselors; (5) the importance of rapport between the counselors and therapists; (6) the benefits of working across disciplines; and (7) how well this type of collaboration would succeed in a pro bono context.

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<sup>&</sup>lt;sup>2</sup> Student therapists/counselors were masters or doctoral students; four were professionally certified in their field.

<sup>&</sup>lt;sup>3</sup> Survey available upon request

#### Dollar Decision\$ Revisited – What We and Our Clients Learned

Linda S. Gossett<sup>1</sup>, Marsha Lockard, and Marilyn C. Bischoff, University of Idaho

Key Words: basic budgeting, wants versus needs, track expenses, spending and savings plan, increase income, decrease expenses.

Even before the current economic downturn, many young adults struggled to pay their bills on time and got calls from collectors. Only 59 percent of the roughly 23 million young adults in Generation Y, those aged 18-29, paid their bills on time every month. Only a minority of people kept close track of their expenses and spending, and a majority of the public did not have an emergency fund (National Foundation for Credit Counseling, 2008).

#### **Target Audience**

Personnel from Health and Welfare and Social Service agencies told Idaho Extension educators that the growing number of minorities and low-income adults could benefit from basic financial management classes tailored to their specific needs. Dollar Decision\$, a curriculum composed of two lessons and a video, was developed to meet this need. The video, PowerPoint slides, teaching resources, class evaluations, and marketing materials were available in English and Spanish. Dollar Decision\$ provided a practical approach to teach diverse audiences how to track expenses and make ends meet, basic budgeting principles, differentiating between wants versus needs, savings, and methods to increase income and decrease expenses. Low-income groups such as Head Start, homeless and housing groups, workforce preparation trainees, military families, pregnant and parenting teens, life-skills and bankruptcy classes, as well as prisoners, all benefited from the practical lessons.

#### Results

From lesson evaluations Idaho Extension educators learned that low-income participants did not: set goals, know the difference between wants or needs, or understand how to establish a budget. Few participants saved money for emergencies such as car repairs or medical visits. Participants who had major credit cards used them for unexpected expenses, while those without credit cards used payday loans or title loans for emergency cash.

After attending Dollar Decision<sup>\$</sup> Lesson #1, 41 percent of the participants indicated that they would track their spending, 36 percent would ask themselves when purchasing "do I really need this?" and 17 percent learned the difference between a want and a need. After taking Lesson #2, 62 percent would use a spending and savings plan, 57 percent would save money for emergencies, and 49 percent of the participants indicated that they would set financial goals. Forty-one (41) percent learned how to increase their income, 40 percent learned how to decrease their expenses, and 35 percent would track their household expenses. A variety of written comments from the participants indicated that they learned: "how much the little items I purchase really adds up," "how to budget using envelopes," and "[I need to] pay bills instead of spending money on things I don't need."

Adoption of the Dollar Decision\$ curriculum spanned the nation and Canada. Users included senior high schools, Extension, community action and credit counseling groups, and military bases. One Wyoming Extension educator wrote the Dollar Decision\$ authors that: "Dollar Decision\$...is the centerpiece of my three hour class....The materials are simple and easy for my clients to understand, yet provide them with outstanding information and tools for handling the basics of their finances." (Taylor, 2008)

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#### Use of the EITC among Low-income Rural Families in an Economic Downturn

#### Clinton G. Gudmunson<sup>1</sup> & Patricia D. Olson, University of Minnesota

This project examines eligibility and use of the Earned Income Tax Credit (EITC) for low-income, during an economic downturn. Our data come from the Rural Families Speak (RFS) project, a multi-state examination of the social and economic well-being of rural families with data documenting household economic conditions from 1999 to 2001. This data collection period corresponded with the period before, during, and after the collapse of many dot-com companies (beginning March 2000) that sparked a downturn in the US economy. Income statistics in our data show average increases followed by decreases in earned household across three time points in the study, consistent with these broader changes in the US economy.

The EITC provides working, low-income families with a refundable credit up to 40% of their earned income. In 2001, the credit benefitted recipients with two children and earned incomes from \$10,000 to \$13,000 with \$4,008 of additional non-taxable income. Families who earned less than \$10,000 received 40% of their earned income as a benefit, and based on a sliding scale, families with up to \$32,121 in income could receive some portion of the credit. Policy research has linked the EITC to positive outcomes associated with combating poverty (Greenstein, 2005; Scholz, 1994) and increasing rates of employment (Holt, 2006). Other research suggests that periodic use of the EITC occurs more often than the patterns of longer-term dependency that occur for some other government transfer programs (Dowd, 2005).

Based on our estimates, 85-95% of the RFS sample in each wave of the study was eligible to receive the EITC, but reports of participation ranged from only 44-60%. Thus, we compare the characteristics of families who were eligible but did not receive the EITC with those who did receive the EITC in each wave. Furthermore, we track the extent to which (non)participation followed years of (non)eligibility and (non)participation and document the characteristics of families with different use patterns. We wish to present our findings in a poster session at AFCPE in 2008. We will emphasize practical research implications.

*Implications*. This study will help financial counselors, educators, and social service providers identify the characteristics of rural families that may benefit most from information about the EITC and tax preparation assistance. Presently, the most aggressive outreach to families who qualify for the EITC is provided by commercial tax preparers who charge a fee to help families file and who also benefit from tax refund advances made to low-income families. Early identification of families who are eligible but do not receive the EITC is an important step for outreach to low-income rural families. Enabling families to receive the EITC could provide families a benefit that is large in comparison to the effort required. Service providers who work with rural families or families facing expecting economic downturns are most likely to have an interest in the findings of the study.

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#### Financial Literacy Assessment Project: Introducing a Framework and Developing an Instrument

Sandra J. Huston<sup>1</sup>, Dorothy B. Durband, Michael S. Finke, Vickie L. Hampton, Hyrum L. Smith, & Sonya L. Britt Texas Tech University

Key Words: financial literacy, financial knowledge, measurement

#### Purpose of project

The objectives of this research project are twofold: to create a conceptual framework to understand the relation between financial knowledge and financial literacy and to use this conceptual framework in the development of an instrument to measure financial literacy among American adults. The first of the two main goals of this project is to establish and maintain an annual phone survey to track changes in annual adult financial literacy rates. The second goal is to make available a reliable and valid instrument that can be used a) in subsequent research for those interested in using financial literacy to explain variation in financial behavior and/or b) to evaluate the impact of financial education/literacy programs.

#### Why is this project important?

Financial literacy has increasingly become a buzz term. Countless educational, government, non-profit, and financial industry organizations promote the need for increased financial literacy education. There appears to be a consensus that Americans are woefully lacking in the skills required to operate effectively in today's financial marketplace. However, while there is a plethora of claims regarding financial illiteracy among Americans there is no consensus on the definition and measurement of financial literacy. It is difficult to compare research studies and to determine effectiveness of education programs with no standard measurement for the concept of financial knowledge (and other concepts related to literacy) or a threshold to determine when a person is financially "literate".

Semester	Stage	Activities (3-year period, from Summer 2007 to Spring 2010)		
Summer/Fall	Forming	forming ideas, building a team, and establishing a Plan of Action (POA)		
2007	C	• Form team (originally 8 members) and objectives/goals		
		Consult existing literature (measures & concepts)		
		• Establish scope (originally 8 topic areas, CFP Board)		
Spring 2008	Storming	developing a conceptual framework (CF) and scope		
1 0	C C	Struggling with concepts & framework		
		<ul> <li>Brainstorming – 2 dimensions, 4 elements, over 9 topic areas in financial</li> </ul>		
		planning, establish scoring grid		
		• Web survey to test 89 potential items (4/9/08-6/18/08, N=509)		
Summer 2008	Transforming	analyze item data to create instrument to measure financial literacy		
		• Team transformation (6 members), CF transformation (from 2-D to 3-D)		
		Refinement of scoring grid		
		• Pre-test instrument (8/5/08-8/20/08, N=36)		
Fall 2008	Norming	using sample (pre-test, state) to standardize instrument		
		• Survey currently in the field (9/2/08-10/14/08?), N=500		
Spring 2009	Conforming	internal (team) and external (expert panel) review and validation		
		Analyze state data, seek funder for national survey		
		Recruit and convene expert review panel (CF and empirical results)		
Summer 2009	Reforming	make adjustments/improvements to instrument based on review		
		<ul> <li>Analyze review data – implement changes</li> </ul>		
		Secure funder, disseminate initial results		
Fall 2009	Performing	administer, monitor, and analyze data from first annual national administration		
		• 6-8 weeks, N=1000		
Spring 2010	Informing	promote & advertise results, encourage use of survey in subsequent research, continue to		
		track changes from 2009 baseline		
		• Make instrument available		
		Publish baseline results from first annual survey		
		Continue tracking (2010-?)		

#### **Project Development Process**

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#### The Impact of Changes in Financial Stressor Events on Financial Well-Being of Debt Management Program Clients

Aimee Prawitz<sup>1</sup>, Northern Illinois University; Barbara O'Neill, Rutgers University; Benoit Sorhaindo, InCharge Education Foundation; Jinhee Kim, University of Maryland; and E. Thomas Garman, Personal Finance Employee Education Foundation

The current study examined whether changes in credit card debt, financial stressor events, and time in a debt management program (DMP) influenced levels of financial distress/financial well-being of credit counseling clients. Mailed surveys were returned by 828 DMP clients, and results revealed that less credit card debt, fewer negative bill-paying events, less exhaustion of liquid assets, and increased time in a DMP predicted less financial distress/more financial well-being. Reduction in both negative bill-paying events (e.g., paying bills late and receiving overdue notices) and exhaustion of liquid assets were the best predictors. Findings offer implications for financial practitioners.

#### Introduction

Lack of financial literacy and over-indebtedness force many Americans to struggle with debt management. Many consumers turn to credit counseling agencies to seek help with their debt management. As credit counseling agencies have become an increasingly important resource for debt management, the effectiveness of the financial counseling and education provided to their clients has been a topic of interest to family economics researchers. Previous studies have found that credit counseling programs have decreased financial stressor events (Kim, Sorhaindo, & Garman, 2003) and improved individuals' credit performance (Staten, Elliehausen, & Lundquist, 2002).

#### Purpose

The purpose of this study was to determine whether changes in outstanding credit card debt, frequency of financial stressor events, and length of participation in a debt management program would make a difference in the financial distress/financial well-being of financially distressed consumers. The current study measured financial distress/financial well-being using a recently developed instrument which has been shown to be both valid and reliable in the measurement of the construct, financial distress/financial well-being (Prawitz et al., 2006).

#### Results

Financial distress/financial well-being was measured using the InCharge Financial Distress/Financial Well-being Scale (Prawitz et al., 2006). The instrument is now called the Personal Financial Well-Being Scale, or PFW. PFW scores were regressed on age, monthly income, outstanding credit card debt, negative bill-paying behaviors, exhaustion of liquid assets, and number of days in the debt management program. Length of participation in the debt management program as well as all of the individual characteristics and the occurrence of both negative bill paying behaviors and exhaustion of liquid assets were significant in predicting financial distress/financial well-being. Those with more credit card debt and higher frequency of both negative bill-paying events and exhaustion of liquid assets reported more financial distress/less financial well-being. Holding other variables constant, longer participation in the debt management program resulted in less financial stress/more financial well-being.

#### Implications

The results provide important implications for financial counselors and educators. Scores from the PFW Scale can serve as a barometer of levels of financial distress for use with those experiencing financial problems, both initially and following interventions designed to help consumers make positive changes in financial behaviors. Since financial distress lessens as the time spent in a debt management program increases, the credit counseling process needs to be sustained for a period of time long enough to produce positive results. The structured bill-paying procedures of the DMP help clients develop timely bill-paying habits; practitioners should emphasize continuation of such behaviors (e.g., automated bill-paying) in order to sustain the reduction in financial distress.

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#### **Benefits Quicklink: A Valuable Resource**

Madeleine Greene<sup>1</sup>, Grandfamilies of America and AARP Foundation

Key Words: state-specific free counselor resource

#### Summary

The benefits Quicklink allows counselors advising individuals/families about their eligibility for various national and state specific government benefits. The database also connects to fact sheets and resources of the AARP Foundation, government agencies and other service providers.

Access to the database and intake sheets is available following the completion of an online intake application. Benefits Quicklink allows financial counselors access to the latest information regarding benefit eligibility for clients, as well as the appropriate application forms for onsite completion and immediate submission.

Benefit programs included but not limited to: State Children's Health insurance, Earned Income Tax Credit, TANF Child Only Grants, Medicaid for Children, Supplemental Security Income for Children, Medicare Savings programs, Medicare RX programs, Food Stamps, Low Income Energy Assistance, State Property Tax Relief, Supplemental Security Income and telephone Assistance (Link-up and Lifeline).

This capacity is especially beneficial to counselors helping clients with financial planning who may not be current users of the local and state social services programs. Through this program counselors can accurately advise clients on current potential benefit dollar parameters.

An especially vulnerable financially needy population is boomers and elderly providing care for dependent children outside the foster care system (kinship care). It is reported that 9% of all children in the U.S. are being raised by relatives (one of every 12), 53% of these caregivers and children (1.3 million children) are living below the poverty level. Those with assets are depleting retirement savings and at risk of running out of money. They are not users of benefit programs because they are fearful of loosing the child should social services become involved.

The database is made available by the AARP Foundation.

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#### Differences in Financial Knowledge between Incarcerated and Low-Income Populations

Lindsay Larson Call<sup>1</sup> and Randal D. Day, Brigham Young University, W. Justin Dyer and Angela Wiley, University of Illinois at Urbana-Champaign

Key Words: incarceration, financial knowledge, financial behaviors

#### Methods

We conducted 81 interviews with adult males at two Midwestern county jail sites. To measure financial knowledge, we used a previously-published assessment (Zhan, Anderson, & Scott, 2006), created to test the knowledge of participants in the Financial Links for Low-Income People (FLLIP) program.

#### Results

*Research Question 1*. What level of financial knowledge do incarcerated individuals possess? How does the financial knowledge of inmates compare to that of a general low-income population? Table 1 shows the comparison of mean percentages of correct responses of the incarcerated population and the low-income population studied in Zhan et al. (2006).

	Incarcerated	Low-income
	Population	Population <sup>a</sup>
	(N = 81)	(N = 163)
All knowledge items	61%	54%
Knowledge areas		
Predatory lending practices	61%	58%
Public and work-related benefits	46%	50%
Savings and investing	55%	47%
Banking practices	76%	68%
Credit use and interest rates	67%	61%

Table 1. Mean Percentages of Correct Responses on Financial Knowledge Assessment

<sup>a</sup> As reported in the pre-training knowledge test in Zhan et al. (2006).

*Research Question 2*. What demographic factors, financial behaviors, and criminal history characteristics are related to inmates' financial knowledge? Are these similar to factors correlated to financial knowledge in other populations? Most notably, the correlation analyses revealed that the most significantly correlated variables (p < .001) were the financial behaviors of having a bank account and credit card, as well as having filed a federal tax return. Zhan et al. (2006) also found that bank accounts and filing tax returns were highly significant. In contrast to Zhan's et al. (2006) sample, those incarcerated men who were never married scored lowest on financial knowledge. Regression analyses further showed that just two variables, filing a tax return and marital status (never married, currently married, ever married), accounted for nearly 55% (adjusted  $R^2$ ) of the variance in financial knowledge.

#### Implications

While incarcerated men scored higher on financial knowledge overall and in most content areas, they particularly need further education on public and work-related benefits. This is not surprising in light of their intermittent employment histories, but may limit the incentives they perceive for legitimate employment. Although incarcerated men scored high in knowledge of banks, nearly one-third of the sample had never had a bank account, indicating that there may be a gap between their knowledge and experiences that financial education programs can address.

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#### More for Your Money Financial Education Web Site

Evelyn Prasse<sup>1</sup> and Susan Taylor, University of Illinois Extension

Key Words: money management, financial education, credit, debt management

#### Summary

Having enough money to pay bills and other expenses and yet save for unexpected expenses and future goals is a challenge. It's not easy managing money. It takes time and planning. University of Illinois Extension Consumer and Family Economics Educators recognized that individuals like choices in how they receive financial education information and that many use the Internet to gain information. Funded by grants from University of Illinois Extension and the Grand Victoria Foundation, Extension Educators developed the *More for Your Money* web site.

The web site contains six sections: Values and Goals, Income and Expenses; Spending Plan; Credit; Debt Management, and Saving. It provides users with the opportunity to gain knowledge on how to spend and save money wisely. The *More for Your Money* web site is different from many financial management web sites in that it is highly interactive, allowing users to enter personal information, work through activities related to the content in the sections, and learn financial management concepts. Users can set goals, enter personal income and expenses to develop a spending plan, assess credit needs, work though strategies for managing debt, and begin a saving program. They can print information, input pages, and activities for future use or return to the site to add, edit, or delete information. In addition, the web site contains a glossary of saving and investing terms, additional resources, and a Teacher's Guide.

At the end of each section is a "Review" page of five true/false questions that help users assess whether they learned the concepts presented in the section. Data from these pages is being collected by Extension to ascertain whether using a web site is an effective method of learning. The site has met the guidelines of the University of Illinois Institutional Review Board for conducting research.

The majority of the web site content and activities was adapted from information in the University of Illinois Extension's *All My Money* and *Your Money & Your Life* curricula. Content and materials in the web site are written for the low- to moderate-income individual and designed with a lower reading level. Information for activities is easy to input, and navigation throughout the site follows a step-by-step procedure. However, users can go to a specific section if they desire.

The *More for Your Money* web site was introduced at the 2007 AFCPE Annual Conference during a Practitioner's Forum titled, *Teaching Financial Skills to Limited Resource Audiences Using E-Learning Tools*. During the workshop, Extension Educators explained that instructors in the Extension grant-funded Your Money & Your Life Financial Education Program (FEP) have used the web site to supplement their face-to-face classroom instruction.

The Your Money & Your Life FEP is a unique partnership between community not-for-profit agencies and organizations throughout Illinois and University of Illinois Extension to teach financial literacy skills to low-income audiences. The web site provides an opportunity for class participants to enhance their classroom learning. Instructors have found that the web site helps to make learning fun, while helping users develop financial management skills. A side benefit that has been expressed is that individuals using the web site have also gained computer skills.

The *More for Your Money* web site can be used in numerous ways-individual study, group teaching/workshops, or counseling situations. To learn how the web site might help individuals and families build a secure financial future, go to <u>MoreforYourMoney.extension.uiuc.edu</u>.

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#### Making Every Dollar Count—Designing Effective Online Financial Education

Karen P. Varcoe, Ph. D.<sup>1</sup>, Connie Costello, University of California Riverside Margaret Johns, M.S., R.D., University of California Cooperative Extension, Kern County

Key Words: financial literacy, budgeting, food shopping, goals, choices

#### Target Audience

The primary target for this curriculum is limited-resource, low-literacy adults, especially those participating in EFNE or FSNE programs. A secondary venue is teachers who work in adult schools, continuation schools, library literacy programs, and other appropriate locations.

#### **Objectives/Purpose:**

- Provide an overview of an online and written version of a financial education curriculum,
- Discuss the obstacles and challenges of developing an online financial education curriculum for limitedresource audiences,
- Provide data on the effectiveness of an online financial management curriculum as compared to classroom instruction only or combined classroom and online instruction, and
- Assess the usability of the program, both online and classroom versions, for use with limited-resource families and other audiences.

#### Description

A new financial literacy program, Making Every Dollar Count (MEDC), has been developed to provide families with the basics of smart money management and help provide them with the information they need to make good financial choices. Eight easy-to-understand lessons have been designed with limited-resource, low-literacy adults in mind. The printed curriculum includes simple-to-use lessons with bilingual (English and Spanish) PowerPoint visuals, activities, and handouts needed to help families and individuals take control of their daily finances. The program is also available as an online self-paced English/Spanish tutorial that can be read or listened to at times and locations convenient for learners. The web version is complete with interactive activities for participants to use as they complete the lessons.

The MEDC lessons include Setting Goals; Making Choices; Stretch Your Dollars with Personal and Community Resources; Budgeting Basics; Paying Bills on Time Saves Money; When You Can't Pay Cash; Saving Money on Food; and Food Advertising. An introductory video introduces the MEDC curriculum and web site to capture the interest of the target audience.

A pre-test was conducted at an adult school where three separate groups were taught Setting Goals, Making Choices, and Stretch Your Dollars. The first group served as the control group and received the traditional classroom instruction only (n=58). The second group was a combination of classroom instruction and computer instruction (n=66). The third group received computer instruction only (n=45). Participants in the computer instruction only group were not given any directions and completed the lessons at their own pace.

All participants in this study completed the family record form, pre- and post-tests for knowledge, and a retrospective behavior checklist. There were significant increases in knowledge and a significant number indicated they had learned a lot. Those that were taught with computer only or with combined computer/classroom indicated they would prefer to learn the lessons using the computer only. Overall, all participants indicated that they were comfortable using the computer. Thus, it appears that using the computer will be an appropriate methodology to teach financial management to limited-resource audiences.

The complete curriculum is currently being tested with Food Stamp eligible individuals in both its printed and webbased formats in five counties. The data provided from this assessment will help provide direction for the use of the Internet for financial education and nutrition education with limited-resource families and individuals.

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#### **Electronic Newsletters and Podcasts**

Luke Erickson<sup>1</sup> and Lyle Hansen, University of Idaho Extension

Key Words: podcasts, electronic newsletters, technology, internet

#### Target audience

Professionals who wish to introduce podcast and electronic newsletter technology into their programming.

#### Purpose

Some technology based tools are very complicated and difficult to implement. Podcasts and electronic newsletters can also be difficult, but once the initial learning curve is overcome these tools are very cost-and time-effective in reaching large numbers of clients and participants. They are not designed to replace face-to-face contact, but have proven to be very effective supplements to face-to-face programs.

#### Description

It has been documented that electronic methods of disseminating educational messages have been effective in reaching audiences particularly of the younger generation. Combining humor with real world know-how, Luke Erickson and Lyle Hansen of University of Idaho Extension have made pioneering efforts in their region by disseminating the timely topic of personal finance education via electronic newsletters and audio podcasts. Issues and episodes have steadily grown in popularity and currently reach across state *and* international boundaries.

Newsletters are developed in-house and are delivered via email lists. They are accessible via any web browser and are in a printable format making hard copies very simple to produce from anywhere in the world. Catchy graphics and a humorous writing style are designed to attract and retain audiences and have been very successful in doing so. Emailed newsletters do not require printing or postage.

Audio podcasts are produced with the same type of creative and humorous content. Our technique requires only inexpensive microphones and a five-dollar-a-month podcast hosting service. Using a free online chat service and a free digital shareware audio recorder, episodes which contain complete uninterrupted conversations are produced from the comfort of each of the educators' respective offices, no travel required. Podcasts are available for download through an RSS feed in mp3 format from popular podcatchers such as Itunes or Podcast.com, or can simply be listened to on any computer with audio capabilities.

These innovative methods of education require very little input of time and costs. It is calculated that approximately 250-300 readers/listeners exist for each hour of input by the educators.

Due to the viral nature of these electronic outlets, materials continue to circulate long after they are produced and attract a growing number of subscribers each month. These innovative forms of education are especially vital in an increasingly electronic world, and are particularly useful in targeting youth, and homebound audiences.

While our targeted audiences include high school and college age individuals, our podcasts and newsletters have been effective in reaching many audiences including the home bound, and those who would not otherwise attend a live class. Additionally, we have received an positive response to these materials as supplements to our traditional face-to-face classes.

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#### SAILing Towards a Financially Secure Future: Saving and Investing for Life

Jeanette A. Tucker<sup>1</sup>, Ginger Boutwell, Margaret Burlew, Sheri Fair, Gloria Nye, Diane Uzzle, Adrianne Vidrine, and Valerie Vincent Louisiana State University Agricultural Center

Key Words: Saving, investing, workplace financial education, financial literacy, investor literacy, educator, child care providers

#### **Target Audience**

The original target audience for the Saving and Investing for Life (SAIL) program was K-12 school system employees and their spouses/significant others. Specific sub-groups included 1) educators and administrators, and 2) support staff including teacher's aides, clerical staff, food service workers, custodial workers, bus drivers and mechanics. However, challenges reaching these audiences, prompted educators to redirect program delivery to other groups of workers. The primary audience reached by this program was child care providers and center directors.

#### **Objectives/Purpose**

The objectives of the SAIL program include:

1) To encourage and educate female employees to take control of their financial futures and to check the background of investment professionals prior to doing business with them.

2) Employees to implement recommended investor education and protection practices to meet the unique needs of women.

3) Employees to reduce personal debt and increase investment holdings to meet the unique needs of women.

#### Description

Research suggests that there is a need for comprehensive investor education literature and face-to-face investor education programs that address the varied economic and literacy levels of female employees. A high proportion of Louisiana K-12 school system employees and child care providers are women, suggesting that this is an ideal audience for addressing the unique financial needs of women.

Funded by the Financial Industries Regulatory Authority (FINRA) Investor Education Foundation (formerly National Association of Securities Dealers Investor Education Foundation), curricula including multi-media presentations, participant workbooks, activities, and marketing tools was developed at income and literacy appropriate levels to reach the diverse needs of women employees. Specific topics addressed include: 1) Financial Basics, 2) Investment Options, 3) Basics of Investing, and 4) Protecting Your Investments.

Classes, taught by experienced financial educators, were conducted at the employee's jobsite or other convenient, non-threatening locations. Teaching methods addressed the learning needs of adult audiences. Originally developed as a series of four, 2-hour sessions, the curriculum has been adapted for presentation in a variety of formats and audiences. Fifteen series of classes have been conducted, reaching over 300 participants.

Post-then-pre evaluation instruments were developed to measure the short-term knowledge gain and intent to change. Telephone surveys, conducted 3-4 months after the completion of each series provide long-term evaluation data. Surveys identify stages of behavioral change and specific practices adopted.

A technology based replication system will be shared with financial educators. For world-wide access, key components of the curriculum are posted on the LSU AgCenter webpage, <u>http://www.lsuagcenter.com</u>.

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#### **Teaching Basic Investing in Mutual Funds**

Celia Ray Hayhoe,<sup>1</sup> Virginia Polytechnic Institute and State University Michael S. Gutter, University of Florida

#### Target Audience

This session is for Financial Counselors, educators, and planners that teach basic investing to students, employees, military, and the general public.

#### **Objective/Purpose**

The purpose of this workshop is to share examples of teaching basic investment concepts emphasizing mutual funds as the first place of entry into investing.

Topics to be discussed include:

- visual interactive ways to teach asset allocation, diversification, and dollar-cost-averaging, and how a mutual fund works
- what to look for in a prospectus
- how to use Morningstar and mutual fund evaluation reports
- what do the ratios mean in lay terms, and how to examine funds in your retirement plan that are not rated

#### Description

Would you like to teach investment concepts so that they are easy to understand and apply? Then this is the workshop for you.

The need to accumulate retirement savings is significant for most households today and may even become more critical in the future. Recent trends over the last several decades have been for employers to cease offering defined benefit plans, also known as formula based pensions, and in their place instituting defined contribution plans. In many defined contribution plans an employee needs to contribute part of their income and the employer may match all or part of that contribution. However, many who are eligible for employer provided retirement plans do not participate. Samwick and Skinner (1998) using the 1995 Survey of Consumer Finances (SCF) found that approximately 28% of workers were covered by defined contribution plans. Approximately 79% of covered workers actually contributed to these plans. Basset, Fleming, and Rodrigues (1998) found that 35% of people offered 401(k) plans do not participate. While 81% of workers with incomes \$75,000 and above participated, only 36% of workers with incomes of less than \$15,000 participated.

As people are being given more and more responsibility for investing for their retirement, financial counselors, educators, and planners are being asked to give workshops on investing. Based on a recent live chat on eXtension, the public website for Cooperative Extension (<u>www.extension.org</u>), people are interested in the basics, especially how to evaluate mutual funds. The problem is making complex information easy to understand. This interactive workshop will demonstrate teaching techniques used by the presenters to teach basic investment concepts and the evaluation of mutual funds.

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#### An Exploration of the Relationship between College Student Personal Financial Knowledge and Credit Card Use Behaviors

Cliff A. Robb<sup>1</sup>, University of Alabama

Concerns over the general lack of personal financial knowledge among college students in the U.S. have resulted in increased attention being given to educational programs designed to improve financial literacy. These educational programs have improved researchers' understanding of how education impacts students' knowledge scores, but questions remain as to how knowledge influences behavior. Ideally, improving financial knowledge among college students should result in improved financial behavior.

#### **Purpose and Objectives**

The present study analyzes the potential relationship between personal financial knowledge and specific financial behaviors among college students, specifically credit card use behavior. Do more knowledgeable students differ in terms of credit card use than their less knowledgeable peers? If so, what differences exist, and what do they suggest about the influence of personal financial knowledge on observed behaviors? It was hypothesized that increased knowledge is associated with more responsible credit card use behaviors, providing clear, measurable justification for financial education programs among college students.

#### Description

Data were collected via an online survey among students at a large, public university in the southeast. After collecting and cleaning the data, a sample of 1,354 was retained. Respondents were analyzed in a series of regression analyses based on 12 separate credit card use behaviors (see Roberts and Jones, 2001 for a discussion of the credit card use scale). Each of the items included in the credit card use scale was coded on a 5-point Likert-type scale ranging from strongly agree to strongly disagree, with higher scores indicating riskier behavior. Based on this scale, individuals were categorized as either engaging in risky behavior or not (0/1). The primary independent variable of interest was a measure of personal financial knowledge. The present study used a six-question scale designed to capture an array of general financial information that individuals might encounter in an introductory personal finance course. Potential scores on this measure of personal financial knowledge ranged from 0 to 6, depending on the number of correct responses provided.

Results from the analysis suggest that there is a relationship between personal financial knowledge and credit card use behavior. Knowledge was significant in 7 out of the 12 models, and was consistently related to more financially responsible behavior among respondents. Specifically, financial knowledge had an impact on whether students reported having credit cards at the maximum limit, using one credit card to pay off another, always paying off cards at the end of the month, how often they reported making only the minimum payment, delinquency, whether they reported going over their credit card limit, and whether they took cash advances on their cards. Knowledge did not have a significant influence on impulse behaviors or the more emotional aspects of purchase decisions.

Findings from the present analysis suggest that financial education has a significant impact on credit card behaviors among college students. Further, the data suggest that decisions involving consumer emotions may not necessarily be influenced by an individual's knowledge. Such findings may have strong implications for planners who help their clients deal with financial situations that involve emotions, though future research is needed to determine whether these findings are unique to the college student sample. Further research should consider other specific behaviors, using longitudinal data, and explore the course experience and knowledge variables in more detail.

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#### First-Generation Female College Students' Financial Literacy: Real and Perceived Barriers to Degree Completion

Susan J. Eitel<sup>1</sup>, Ph.D. and Jennifer Martin, Ph.D., Texas Woman's University

#### Abstract

This study identified the financial literacy needs of first-generation female college students, explored differences in perceived and actual financial literacy needs, and examined barriers to persistence and degree completion. Participants in this study were 204 first-generation female college students from one Texas university. Quantitative analysis was used to explore financial literacy using the 2006 Jump\$tart survey. The analysis revealed that participants were not financially literate. Only age, ethnicity, and student classification were predictors of Jump\$tart Scores. Qualitative analysis exposed perceived needs related to financial literacy did not translate into information-seeking behavior. Perceived barriers to persistence and degree completion were linked in both the quantitative and qualitative analyses primarily to factors related to money and resource management.

Key Words: first-generation college students, financial literacy, persistence, degree completion

#### Introduction

A college education acts as a conduit to higher social and economic class as well as lifetime financial stability (Billson & Terry, 1982; Brower, 1992; Ishitani, 2006; Sandefur, Meier, & Campbell, 2006; Terenzini, Springer, Yaeger, Pascarella, & Nora, 1996). Within the diverse landscape of today's collegiate population, students are "expected" to have the necessary financial knowledge to manage a complex and stressful lifestyle that is often too short on time and financial resources (Chen & Volpe, 1998; Lange & Byrd, 1998). The traditional parental financial safety nets (Hogarth & Hilgert, 2002) are often absent from the lives of many first-generation college students (Kasworm, 2003). These students are often plunged into an academic environment with exposure to a new and different set of peers, access to financial aid, student loans, credit cards, and income from employment without the knowledge and skills required to manage and succeed (Chen & Volpe, 1998, 2002; Henry, Weber, & Yarbrough, 2001; Inman & Mayes, 1999; Joo, Grable, & Bagwell, 2003; King, 1999, 2003). Although "access" to higher education is obtainable by most people in the U.S., success is not distributed equally among entrants (Pike & Kuh, 2005; Terenzini et al., 1996). First-generation college students are particularly vulnerable to financial stress and the inability to manage scarce resources which can impede persistence and degree completion (Lyons, 2004).

The acquisition of financial knowledge and the skills necessary to manage and take control of financial resources is a foundation for building a solid and stable future for the individuals and families within American society (National Endowment for Financial Education [NEFE], 2002; Rhine & Toussaint-Comeau, 2002). However, despite concentrated efforts to improve financial literacy through education and outreach, overall effectiveness was not demonstrated according to the results from the first four Jump\$tart surveys conducted biennially beginning in 1997 (Mandell, 2006). The most recent Jump\$tart survey (2008b) of high school students revealed a mean score of 48.3% (N = 6,856) a decrease from the 2006 Jump\$tart survey results which had a mean score of 52.4% (N = 5,775). In addition to the biennial survey of high school students, Jump\$tart also surveyed college students for the first time. The results from the college students' survey (Jump\$tart, 2008a) indicated a mean score of 62.2% (N = 1,030). Norvilitis et al. had previously used the Jump\$tart Survey to determine if college students had more financial knowledge than high school students and reported a mean score of 60% (N = 448).

Evidence indicates that the gap between financial knowledge and the skills required to effectively manage financial resources can have a significant impact on success and persistence for college students (Joo et al., 2003; Yorke & Thomas, 2003). Training in financial knowledge and the skills necessary to manage financial resources have not been a traditional support for first-generation college students. Support for first-generation college students has focused primarily on academic readiness and environmental support.

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#### Purpose

The purpose of this paper is to (a) identify the financial literacy needs of first-generation female college students and related demographic and behavioral characteristics; (b) explore the differences in perceived and actual financial literacy needs of first-generation female college students; and (c) examine the first-generation female college student's perception of barriers to and support of persistence and degree completion.

#### **Review of Literature**

*First-generation College Students.* The National Education Longitudinal Study (NELS:92) found that 22% of students who entered college immediately after high school between 1992 and 2000 were first-generation college students; only 24% of them earned a bachelor's degree (Chen, 2005). The benefits of a completed postsecondary education make the lack of completion costly for individuals, families, communities, and society. The U.S. Department of Education's National Center for Education Statistics (1998) reported many first-generation college students were older, had lower income, had dependents, enrolled part-time, and had lower persistence and degree completion in both two- and four-year institutions. First-generation college students are overrepresented among students who leave college after their first year (Billson & Terry, 1982; Ishitani, 2006; Johnson, 1997; King, 1999; 2003; Lohfink & Paulsen, 2005; Quinn, 2004; Terenzini et al., 1996; U.S. Department of Education). Rodriguez (2003) found that many first-generation college students worry about academic readiness and their ability to support themselves while in college. Bui (2002) and Kasworm (2003) also found that first-generation college students had fear and concern about financial resources. Among the 2006 cohort (N = 47,957) of the Community College Survey of Student Engagement (2006), more than 50% of first-generation college students stated lack of finances was either likely or very likely to force them to withdraw from class or college.

*Persistence.* In a six-year longitudinal study, Johnson (1997) examined factors that lead to persistence and completion of a college degree. Among the first-generation students who failed to persist, 75% were female. Lohfink and Paulsen (2005) also found that female students, as well as Hispanic students, were at a greater risk of failing to persist, particularly between the first and second years of college. The primary focus of existing literature on persistence has been campus integration (Brower, 1992). Seminal literature (Billson & Terry; 1982; Tinto, 1982) on college persistence noted that focus on integration to improve persistence was not suitable for commuter and non-residential students, yet it remains the primary focus of persistence literature. Pratt and Skaggs (1989) found that first-generation and continuing-generation college students were not different in their need for campus integration, yet first-generation students often have responsibilities and roles that preclude them from campus activities associated with success (First-generation college students struggle, 1999; Gibbons & Shoffner, 2004; Pike & Kuh, 2005; Terenzini et al., 1996).

*Financial Literacy.* Currently there is no widespread study to measure the financial literacy of college students or young adults; however, the Jump\$tart Survey has been used as a standard to measure the financial literacy of high school students. Norvilitis et al. (2006) used the Jump\$tart Survey to determine if college students (N = 448) had more financial knowledge than high school students and reported a mean score of 60%, less than 8% higher than the 2006 scores reported by the Jump\$tart Coalition for Financial Literacy for high school students (Casserly, 2006).

Mandell (2006), who created the Jump\$tart Survey, reported that overall financial literacy has not improved with education according to the results of the first four Jump\$tart Surveys. Casserly (2006) reported that, among the 5775 high school senior participants in the 2006 Jump\$tart Survey, 17% reported they had completed a money management or personal finance course. However, the high school participants who completed the 2006 Jump\$tart Survey scored an average of 52.4%.

*Financial Decisions and Resource Management.* Wise financial decisions can facilitate degree completion, yet many college students make choices counterproductive to their college success (King, 2003). Employment has been found to impact persistence and graduation rates among college students (Billson & Terry, 1982; Christie, Munro, & Rettig, 2001; Community College Survey of Student Engagement, 2006; Inman & Mayes, 1999; King, 1999, 2003; Pascarella, Pierson, Wolniak, & Terenzini, 2004). Students work for a myriad of reasons including nonessentials, but many students work because they are financially incapacitated by the responsibility of home and school (King, 2003). Some students were forced to work to make up the disparity between "expected family contribution because their family cannot or will not contribute" (p. 81). Paid employment, loans, and credit cards were needed by many students to fill the gap left by grant aid and family resources. Dropping a class to accept extra work hours has tradeoff costs that are often not considered (King). Pascarella et al. (2004) found that working more hours coupled

with work responsibilities had negative consequences for first-generation college students, which included completing fewer credit hours over a three-year period than their non-first-generation college student cohort. The lack of financial support from family can force decisions related to work and debt that compromise the student's best intentions of persistence and degree completion (Christie et al., 2001).

*Borrowing and Debt.* The National Center for Education Statistics reported that students who did not utilize student loans and worked part-time also attended college part-time (U.S. Department of Education, 1998). Student loan utilization can, if it results in full-time attendance, increase persistence, provide the student an opportunity to work less hours, spend more time on school work, and progress to graduation more quickly (King 1999; Saunders, 1997). All types of financial aid were found to correlate positively with year-to-year persistence and graduation (Fenske, Porter, & DuBrock, 2000; St. John, 1989). However, in Palmer, Pinto, and Parente's (2001) study, many college students used their student loan proceeds to pay off and reduce debt that is unrelated to college.

*Need for Financial Literacy.* Financial education is paramount to the success of future generations. Competent choices are required in early adulthood to make certain later life financial stability (Anthes, 2004). In Chen and Volpe's (2002) study, more than 75% of the participants ranked personal finance as third in importance in education following behind English and mathematics, but often did not seek information until they made financial mistakes. Chen and Volpe (2002) concluded that effective programs for financial literacy are vital to current and future success and stability and King (1999; 2003) suggested financial planning be integrated into core areas of learning for students to benefit.

#### Methodology

This study utilized a two-phase, sequential, mixed-methods approach. Quantitative inquiry through the use of a survey was used to acquire statistical data to explore the financial literacy and the financial literacy needs of first-generation female college students. Qualitative inquiry was used to explore perceived financial literacy needs, and examine barriers to persistence and degree completion. Surveys are useful tools for identification of gaps in knowledge (Kitzinger, 1995) and for descriptive and exploratory purposes (Babbie, 2001), but qualitative methods provide insight into specific survey items by blending the methodological processes (Ouimet, Bunnage, Carini, Kuh, & Kennedy, 2004). Combining the two methodologies provides a layer of richness that communicates depth as well as provides triangulation across several different data sources (Creswell, 2003; Fontana & Frey, 2003; Huberman & Miles, 1998; Locke, Silverman, & Spirduso, 1998; Ouimet et al.).

#### Findings

#### Phase 1: Quantitative Study.

Two hundred and four students completed the survey of Phase 1. Because of occasional missing or invalid data, the sample size is identified in all quantitative analyses. All participants were females from one university in Texas. The mean age of the participants was 24.29 (n = 202), with 26.7% (n = 54) aged 25 or older. Slightly more than one-third (35.6%) of participants were freshmen. The balance of participants were fairly evenly distributed among the remaining three student classifications: 20.3% sophomores, 22.3% juniors, and 21.8% seniors. The majority (51.5%) of participants were White or Caucasian, 21.3% Black or African American, 19.3% Hispanic American, and 4.5% Asian American. Seven participants (3.5%) reported their ethnicity as "other," and three (1.5%) were international students. The majority (62.2%) of participants were employed. The number of hours worked each week were: 32 hours or more (n = 29, 14.3%), 25 to 31 hours (n = 21, 10.3%), 19 to 24 hours (n = 27, 13.3%), and 1 to 18 hours (n = 50, 24.6%).

A step-wise regression analysis was performed to explore the relationship of Jump\$tart scores to the following 20 variables: (a) age, (b) cumulative grade point average, (c) personal income, (d) household income, (e) access to credit cards and type of credit card access, (f) number of credit cards, (g) unpaid credit card balance, (h) parental and family education levels, (i) marital status, (j) student classification, (k) ethnicity, (l) credit hour enrollment, (m) ATM/Debit card use, (n) ownership and type of ownership of stocks and mutual funds, (o) financial aid use and type, (p) source of learning about money and personal finance, (q) spending and saving habits, (r) confidence level in management of personal finances, (s) participation in personal finance or financial planning in high school, and (t) participation in personal finance or financial planning in college. The step-wise regression analysis found that being older, being Caucasian, and having a high student classification were significant predictors of high Jump\$tart scores (see Table 1) for these research participants.

Variable	В	SE B	Beta	t	р	
Age	.441	.142	.272	3.103	.002	
Caucasion	7.789	2.216	.272	3.515	.001	
Student Classification	2.868	1.079	.234	2.659	.009	
(Constant)	36.830	3.260		11.297	.000	

Table 1	
Correlation of Jump\$tart Scores with Age,	e, Ethnicity, and Student Classification

 $R = .57, R^2 = .32, Adj-R^2 = .31, SE = 11.98,$ 

F(3,120) = 19.02, p = .001

Because of the multiple hypotheses used in the analysis of the data from Phase 1, acceptable p values were adjusted downward using the Levene approach to reduce the risk of Type I errors. The Levene approach was chosen instead of Bonferroni because it is a less conservative approach and the researcher reasoned that using Bonferroni and adjusting the alpha to .002 would result in an increase of Type II errors. Using the Levene approach all significance levels were based on .027 for acceptance or rejection of the null hypotheses. Tukey post-hoc tests used a significance level of .05 in view of the fact that original significance levels were set at .027 or below using the Levene approach. Examination of the three predictors from the regression analysis provided additional information.

*Age.* A Pearson correlation was conducted on the Jump\$tart Survey test scores of respondents and their ages. A moderately positive significant correlation was found between the student ages and Jump\$tart Survey test scores, r(200) = .44, p < .01. As student age increased, Jump\$tart scores increased. Student age accounted for 20% of the variation in Jump\$tart scores ( $r^2 = .20$ ).

A one-way analysis of variance of Jump\$tart scores by student ethnicity generated a significant F-ratio. Tukey posthoc comparisons revealed that Jump\$tart Survey test scores were significantly higher for students who selfidentified as White or Caucasian than for students who self-identified as Black or African American (p < .001) or Hispanic American (p = .006). Ethnicity of the participants explained 16% of the variance in the Jump\$tart Survey test scores ( $r^2 = .16$ ).

*Classification*. A one-way analysis of variance of Jump\$tart Survey test scores by student classification generated a significant F-ratio. Tukey post-hoc comparisons revealed that Jump\$tart Survey test scores were significantly higher for students whose student classification was junior (p < .001) or senior (p < .001) than students whose classification was freshman or sophomore. Participant student classification explained 19% of the variance in the Jump\$tart Survey test scores ( $r^2 = .19$ ).

*Confidence in Managing Finances.* Examination of the reality and perception of financial literacy was explored with a one-way analysis of variance of Jump\$tart Survey scores by students' confidence levels and did not produce a significant F-ratio. Confidence in management of finances did not result in significantly higher Jump\$tart scores.

*Financial Education*. Participation in high school or college personal finance or personal financial planning courses was explored for a difference in Jump\$tart test scores. Results from a *t-test* for independent samples revealed there was no significant difference in Jump\$tart scores between students who participated in high school personal finance
or personal financial planning course and those that did not participate in either high school or college courses. Results from a *t-test* for independent samples revealed no significant mean difference in Jump\$tart scores between students who participated in a college personal finance or personal financial planning course and those that did not participate in either college or high school courses.

### Phase 2: Qualitative Study.

Thirty-nine students participated in the four Phase 2 focus groups, consisting of 8 to 11 participants. The focus groups included freshman (28%, n = 11), sophomores (28%, n = 11), juniors (13%, n = 5), and seniors (30%, n = 12). Qualitative analysis revealed the following themes: (a) *not knowing vs. not wanting to know*, (b) *the graduation cure*, (c) *the institution as the problem*, and (d) *money as a continual constraint*.

Two themes related to perceived and actual financial literacy needs of first-generation female college students: *not knowing vs. not wanting to know,* and *the graduation cure*. During Phase 1 of the research study participants responded to a survey question pertaining to their confidence level in managing their personal finances. Multiple students in each of the focus groups commented that, if they had been asked the question about how confident they were after they completed the JumpStart survey, they would have expressed less confidence. Participants perceived that their financial literacy needs were extensive but were unable to articulate their needs, using only general terms for what they might need (e.g., budgeting, dealing with credit issues, and juggling resources). Participants reported that their current method for budgeting and management of their resources was "trial and error," "messing up really bad," and "learning the hard way." Some participants suggested that they would not be interested in learning about finances through an additional class or seminar because of time constraints linked to their current lives. "It's not something I am interested in. I can take care of it later" was a common response from participants. Many participants shared hope that, upon graduation, any woes related to finances would be cured. One participant stated, "I'm going to win the lottery or something's going to happen and I'll be covered."

Two themes related to perceived barriers to persistence and degree completion: *the institution as the problem* and *money as a continual constraint*. Identification of barriers related to the University as an institution was extensive throughout each of the focus groups. Perceptions of the institution involved multiple obstacles the participants encountered as they attempted to navigate a complex and unfamiliar system. Financial aid was perceived as a convoluted process that was fraught with unwritten rules, requirements that were unreasonable, and the expectation that traditional roles of family be firmly ensconced to meet the application requirements and any unmet financial needs. Many students perceived that the institution had control over the guidelines governing award amounts and types of financial aid received. Misperceptions of how financial aid award amounts were determined permeated the discussion: "The money they say your family is supposed to contribute is kind of crazy" Students indicated frustration with their inability to get answers: "It's like you're at the courthouse and you ask someone, 'Can you give me a little hint?'—and they say, '... can't give you any legal advice'"

Monetary constraints and the lack of financial support led to forced compromise of career goals and increased the time to complete the undergraduate degree. Work complicated the lives of many participants, particularly those who perceived that work was essential to their own survival. Two students reported that family members had either used the student's credit to make purchases or had spent their financial aid proceeds to pay off personal debt: "I think he [dad] took it and used it to pay off his debt and then he just gives me money when I need it." "Right now I am not going to be in school for fall or summer because I need to work," a result of allowing her father to use her credit to make cell phone purchases for the family.

## Discussion

Although no standard measure of the financial literacy of college students exists, Norvilitis et al. (2006) also used the Jump\$tart survey with 448 college students to determine if they had more financial knowledge than high school students. The mean score for the college students in the Norvilitis et al. study was less than 8% higher than the 2006 scores reported by the Jump\$tart Coalition for Financial Literacy with high school students (Casserly, 2006). It was anticipated that the scores for this study would be similar to those in the Norvilitis et al. study. In the current study the scores for the first-generation female college students averaged 58.1%, which is almost 2% less than the college students in the Norvilitis et al. study and only 6% higher than the scores from the high school students. In all standard testing environments the majority of the participants in all three studies would have failed the exam. In the

study conducted by Norvilitis et al. (2006), only one-third of the participants were female and almost 98% of the females were White. In the current study using all female participants almost 50% of the participants reported an ethnicity other than White or Caucasian. Participants who were White or Caucasian had significantly higher Jump\$tart scores than participants of color. Having an ethnicity of White or Caucasian was one of only three predictors in this study for having a higher Jump\$tart score.

Most participants' perceived financial literacy needs were out of sync with the results from Jump\$tart scores. Although Chen and Volpe (2002) found that more than 75% of their participants ranked personal finance as third in importance in education following behind English and mathematics, the participants in this study were conflicted with *Not knowing vs. not wanting to know*. Despite an overall awareness that participants' financial literacy was less than adequate, many participants in this study were unwilling to take on any additional learning endeavors, but were content with learning the hard way and by making mistakes. Participants reported that their focus was on "getting by"; and, if they were "getting by," it was not necessary to learn anything else. Other participants did not see financial literacy as relevant to management of financial resources while they were students and would "blow off" any attempts to enhance their knowledge. Many students felt that financial woes and a miraculous onset of financial knowledge would occur when they received *the graduation cure*.

It was anticipated in concordance with Mandell's (2006) study that overall financial literacy would not be higher as a result of current educational efforts. Participation in a high school or college personal finance or personal financial planning course did not result in higher Jump\$tart scores in this study. The number of students who reported participating in a high school course was low (n = 30), which was surprising in light of the considerable efforts to integrate basic financial knowledge into math and reading during elementary-, middle-, and high-school curricula (U.S. Department of Treasury, 2002). It was anticipated that this group of students would have been included in some of the efforts to include financial knowledge in the school curricula. Participation in a college course related to personal finance are not part of core curriculum and very few majors require a course related to this topic. Less than 12% of participants (n = 24) in this study had participated in a college course. However, it was anticipated that participants who had taken a college course related to financial planning or personal financial planning would have higher Jump\$tart scores. Again, as in participation in a high school class, participation in a college course did not result in higher Jump\$tart scores.

One of the three predictors of high Jump\$tart scores in this study was being older. Experience and making mistakes could have accounted for the higher Jump\$tart scores in older participants. No research reviewed for the current study addressed being older as a correlate to having more financial literacy. Student classification was the final predictor of higher Jump\$tart scores in this study. Student classification explained 19% of the variance in scores with juniors and seniors scoring significantly higher on the Jump\$tart scores, contributed to the finding related to student classification.

Financial aid was perceived to be an illusive and mysterious process, where the University controlled application requirements and award amounts, and the real needs of the students were not considered. Personal responsibility to follow instructions, read the literature available, and acknowledge their own role in seeking information was largely absent among the participants in this study. Although the students acknowledged a need as a result of not having the financial safety net of their parents (Hogarth & Hilgert, 2002), there was a sense of entitlement that continued enrollment in higher education and the receipt of financial aid was a right, rather than a privilege. The participants did not acknowledge that the role as first-generation college student had inherent shortcomings that had to be compensated for through increased effort and knowledge seeking that their non-first-generation student counterpart did not experience. With feelings of being overwhelmed by the financial aid process, yet not assuming control for their own destiny, many participants felt frustrated and helpless.

Money was a constant worry for many participants. Financial aid was seen as having considerable control over not only the student's tuition and books, but was also linked to housing and the ability to have food to eat during the semester. Multiple students reported that, if they did not get financial aid, they would not only be unable to attend school; they would also have no place to live and nothing to eat. Without family support, many participants, particularly those that were older and single or divorced, were entirely dependent on financial aid for survival. Not knowing how much money they were going to have from financial aid created an uncertainty about the future as

early as a month away. Money constrained living as well as occupational goals. A desire to become a doctor was compromised with becoming a nurse because the availability of long-term financial aid to continue education was perceived as being unrealistic.

Without the knowledge and skills required to manage and succeed, the participants were particularly vulnerable to financial stress (Lyons, 2004), which was demonstrated through a dialogue of feeling overwhelmed and the constant constraint of actions due to limited resources. In Rodriguez's (2003) qualitative study of first-generation college students, she found that many students worried about their capacity to support themselves while in college. Fear and concern about financial resources were also found in Bui's (2002) and Kasworm's (2003) research on first-generation college students. Among the 2006 cohort from the Community College Survey of Student Engagement, more than 50% of the first-generation students surveyed reported that lack of finances was either likely or very likely to compel them to withdraw from college.

Employment has been found by numerous researchers to impact persistence and graduation rates (Billson & Terry, 1982; Christie et al., 2001; Community College Survey of Engagement, 2006; Inman & Mayes, 1999; King, 1999, 2003; Pascarella et al., 2004). Having to work to pay bills in order to survive was a reality for many of the students in this study. Work for some students was necessitated by parents' use of the student's credit, and using the student's financial aid proceeds to pay off debt. Earning more money was seen as a financial management skill, rather than expertise in managing what they already had. Only one participant reported using a management system that included budgeting, saving, and long-term goals.

### Conclusions

According to the results of the Jump\$tart survey in Phase 1, these first-generation female college students are not financially literate. Does the lack of financial literacy create a barrier to persistence and degree completion for first-generation female college students? These participants presented a complexity of perceptions that does not point to a specific variable as a primary focus. In fact, when combining the qualitative analysis with the results from the financial literacy survey, the focus becomes blurred in a quagmire of the multiplicity of challenges faced by these students.

It was anticipated by the researcher that effective financial literacy programs would improve persistence and graduation rates, but the results reveal that there are many other factors in the lives of these students that would not be remedied or improved by a single narrow focus. Yes, increased financial literacy could improve the current lives of many of the participants, but would it actually increase their potential to persist and complete their undergraduate degrees without intervention in other areas? Financial literacy education might relieve some of the pressure related to daily financial struggles with increased resource management techniques, but it is doubtful that increased financial literacy alone would be anything more than the *graduation cure* anticipated by some of the participants. The family prerogative perception that resulted in financial aid proceeds being used for family gain, rather than the participant's education, is particularly problematic. Compromise in education and career goals based on the constraints of money rather than the aptitude of the student cannot be remedied with financial literacy education.

### Implications

This research, while extending the focus to include other variables, does not exclude the importance of alleviating the risk of financial strain (Lyons, 2004) for these students. Access to and integration of personal financial planning into existing core curriculum or as a component of receiving financial aid could provide an ounce of prevention for first-generation female college students.

The lack of financial literacy for the first-generation female college students has important implications for higher education degree programs that prepare practitioners in personal and family financial planning. With the anticipated increase in income from earning a degree and the lack of financial literacy found in this study, it will be necessary for many of these adults to seek competent, qualified, and degreed professionals to assist with financial planning throughout their lifespan. The complexity and abundance of financial products of the 21st century will not provide the opportunity to learn by trial and error or by making mistakes without risking the ability to achieve financial security and stability. In addition, programs to produce academics in the area of personal finance and personal financial planning will be essential to provide current research as well as to meet the needs of a citizenship that will be dependent on competent degreed practitioners to guide and manage their financial assets.

#### Recommendations

Although it appears that the Jump\$tart survey is a reliable instrument, the validity is questionable. In light of the extensive educational efforts for financial literacy is it possible that the instrument being used is not measuring financial literacy? Is it possible that the efforts to educate are so ineffective that there has not been an improvement in financial literacy? In addition, measuring the financial literacy of college students with an instrument that was developed to assess the financial literacy of high school students does not reflect the complexity of experience of traditional college or non-traditional college students.

Research that compares the financial literacy of first-generation college students and their barriers to success and degree completion with the financial literacy and barriers to success and degree completion of subsequent-generation students is recommended. Although this research assumes that there is a difference in the lives, needs, and aptitude of first-generation college students, much of the current literature focuses on non-specific generational status of students. The determination of whether real differences exist could create a better informed university system.

Of the variables explored in this study specifically related to Jump\$tart scores, the gap between the financial knowledge of the White or Caucasian students and the students of color (e.g., Black or African American and Hispanic), demands immediate attention. Exploration of why that gap exists and methods to eliminate the gap need to be a part of future research.

There are inherent vulnerabilities in being a first-generation college student. A wise first-generation college student will undertake a quest for information in addition to academic requirements. A wise first-generation college student will share information to contribute to the success of others. One young, wise participant in this study reported, "Sometimes not knowing is good. . . . I think college is a process of learning—every semester you learn more." Along with the process of learning comes the responsibility to share through friendships and mentoring.

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## Finding Teens' "Tudes"

Syble Solomon<sup>1</sup>, LifeWise / Money Habitudes and Nancy Reigelsperger, Cornell Cooperative Extension

Key Words: teens, young adults, money psychology, money games, financial literacy

#### **Target Audience**

Educators, counselors and youth leaders teaching financial literacy and fiscal responsibility to young adults (15-25).

#### Purpose

- Develop an awareness of their habits and attitudes ("habitudes") which subconciously influence their money choices and can support or sabotage achieving their financial and life goals.
- Engage young people in an activity to explore how they can take control of their money by providing a non-threatening, familiar card game with non-judgmental, positive language.

### A Documented Need

CBS News reported (5/17/07) that U.S. companies are spending nearly eighteen billion advertising dollars annually to target teens and credit card companies are sending college students an average of 25-50 solicitations each semester. Those efforts are working. The average college student has at least 2-3 credit cards and graduates owing \$3000 in credit card debt. The recently published study by the Federal Reserve Board reports that U.S. teens spent \$179 billion dollars in 2006 (that's an average of \$107 each week per teen) and also influenced how billions of additional dollars were spent. A study at Indiana State University reported 20 to 24 year olds represent the fastest growing segment of bankruptcy filings and that bankruptcy rates for 25 year olds are at an all-time high. The concern has sparked interest from the US Treasurer's Department, financial institutions, the military, educators and youth leaders and has led to a wide array of programs aimed at teaching financial literacy.

While these programs provide the necessary skills to help young adults become financially literate, it's not enough. Financial behaviors are not necessarily rationale and logical. Instead, habits and attitudes (which reflect underlying emotional issues and subconscious messages) have a major influence on all financial decisions and everyday money behavior. Learning how-to manage money is essential but it doesn't typically change behaviors.

Money Habitudes for Teens<sup>TM</sup> (and young adults) is a welcome new tool that can be used in conjunction with the comprehensive money management programs or as a stand-alone activity to empower young adults to discover the underlying issues and messages which influence their money decisions and motivate their actions. The advantages of using this tool are:

- The deck of cards is a familiar, fun activity associated with positive social interactions. The game-like format is more appealing than taking a written or computer generated test where answers are scored.
- It's non-judgmental. There are no right or wrong answers. Every habitude is associated with both positive strengths and challenges. Everyone is a combination of different habitudes. There are no winners or losers.
- The language is non-threatening and the focus is on the positive which makes it easier to talk about money.

### Content

The Money Habitudes Guide for Educators and Youth Leaders provides lesson plans for five activities with pages that can be downloaded, copied, adapted and customized to be used as handouts and assignments to supplement each activity. The five lesson plans cover: (1) What is a *habitude* and how do money habitudes develop, (2) Money Habitudes Solitaire, (3) Focusing on a Goal, (4) Setting SMART personal goals and (5) Planning for Success.

The six habitudes represent the six most common patterns of how people relate to money and are as follows: **Status** (to create a positive image and gain acceptance); **Planning** (to use intentionally to achieve goals); **Carefree** (no interest in managing money); **Spontaneous** (to take advantage of the moment); **Giving** (to feel good by helping others); and **Security** (to provide safety, security and control.) When young people play the most popular activity, *Money Habitudes Solitaire*, their discussion of the results help them see what motivates the way they manage their money. The result of this awareness is that teens and young adults can plan how they can control the way they spend, save, give and avoid money relative to their own subconscious needs instead of just reacting out of habit.

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## Right on the Money: Talking Dollars and Sense with Parents and Kids

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Key Words: financial literacy, financial literature, children and money

### **Target Audience**

Low to moderate income families with children ages 5-7. However, the program can be used with any parents with kids in the 5-7 age range.

#### **Objectives/Purpose**

Objectives of the Right on the Money are to:

- 1) Help parents learn or reinforce their knowledge and skills to manage money successfully.
- 2) Encourage parents to teach children financial concepts using enjoyable reading.
- 3) Expose children to books with basic financial concepts.
- Expose parents to local resources that can be used to promote reading and positive money management skills in their children.

#### Description

ROM is a four session educational program that uses children's books to introduce kids to financial concepts and provides their parents with information to reinforce their financial knowledge and tools to help them positively influence their children's money skills, knowledge and attitudes. Except for lesson one, the parents' lesson and the kids' lesson has the same theme.

Lesson	Parents' Theme	Kids' Theme
1	Planning to Succeed Financially	Earning Money
2	Planning your Spending	Spending Money
3	Planning your Savings	Saving Money
4	Planning your Borrowing	Borrowing Money

The sessions can be taught in any community setting (e.g. library, school, and community center) that has at least two meeting rooms. Each session begins with parents and children assembling in the same room, having a snack and listening to the story the children will hear again in their individual lesson. The parents or kids move to a separate room for the evening to participate in their lesson. Each parent's lesson includes basic information on the theme and suggestions for ways to teach and shape their kids money skills, attitudes, and knowledge in positive stress free ways. The children's lesson involves re-reading the themed book for the evening, questions and answers related to the story and hands-on activities which reinforce the financial concepts introduced in the book. The children get a book to take home at the end of each lesson.

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## Financial Knowledge Improvement Among Credit Union Employees

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Key Words: financial education, financial literacy

### Overview

This presentation addresses the importance of financial education in light of changes in the American financial services industry. In particular, it shares highlights of a forthcoming white paper for the President's Council on Financial Literacy documenting a successful pilot program to provide financial education in the workplace. In short, the presentation provides on an 18-month pilot project working with 10 employers (approximately 5,000 employees) to provide pre- and post-testing along with over 10,000 hours of online financial education to employees leveraging a new powerful and cost-effective online delivery platform. The presentation concludes with the results of select case studies, including pre- and post-test data, to illustrate the significant impact of financial education on the participating employees and their organizations.

## Background on the Need for Financial Education

Over the past 35 years, there has been a proliferation of new financial products and services for consumers and major changes to the ways Americans save and pay for retirement. Despite these changes, less than 5% of Americans have had formal training in personal finance and on average Americans score less than 55% on basic financial literacy tests. Not only do Americans have poor financial knowledge, but there is growing evidence that this lack of knowledge has resulted in poor financial behaviors as well. For instance, the United States currently suffers from a negative savings rate and record levels of consumer debt with the average household carrying \$9,000 in credit card balances. Surveys also show one in four American workers suffer from significant financial distress. In 2005 alone, nearly one household in 60 filed for bankruptcy. In today's market, some estimate that one homeowner in 50 is likely to lose a home in foreclosure. We may also face serious threats to Social Security and Medicare as future generations retire. Nearly 50% of American workers lack access to defined contribution plans and 70% of those with plans do not contribute adequate amounts.

## **Details on Pilot Program**

As part of the pilot study, 2000+ employees at ten credit unions took an online financial literacy pre-test with 25 questions on personal finance, investing basics and retirement planning. A unique feature of the survey was that no two participants got the exact same quiz since the technology used allowed survey designers to pull from a pool of 25 to 50 standardized questions on each of 21 selected topic areas to deliver a unique quiz to each participant. The participants scored an average of 55.7% indicating that credit union employees did not do significantly better on such topics than the average citizen. There was no significant difference in results for participants based on years working in the industry or on education level. These employees and others within the credit union industry have subsequently completed over 5,000 interactive online courses on a wide variety of personal finance topics (over 10,000 hours of training). On average, the participants' scores on the post-test improved to an average of 77%. Exit surveys revealed that employee satisfaction with the training was at 90% and that 91% would recommend the training to colleagues, family and friends.

While the individual results of these efforts have been outstanding, financial education also has a tremendous positive impact through changes in employee behavior at the organizations participating in this program. First, the credit unions that participated in this program have seen that their employees are more confident, comfortable, and effective in promoting savings and investing than the industry as a whole now that they have knowledge about these topics. As a group, employees at the participating credit unions participating have helped promote over \$700,000,000 in additional personal savings allocated to mid and long-term vehicles such as certificates of deposit and IRAs, greatly outperforming the efforts of their peers. Furthermore, both research findings and employers participating in this program demonstrate that individuals with poor financial knowledge tend not to make the best decisions, which can lead to lower productivity and satisfaction due to financial distress at home, to have higher rates of absenteeism and turnover, to make use of more costly benefits, and to be more likely to make complaints with state and federal regulators. In a study by Dr. Thomas Garman, helping employees move away from, or avoid, financial distress can generate a total estimated annual savings of up to \$2,000 per individual.

To help demonstrate some of the positive impacts this program has had for the employees, employers and the customers they serve, this presentation will conclude with specific details of case studies from how two organizations, Desert Schools Federal Credit Union and Mountain America Credit Union, delivered online financial education to their employees and a summary of the results of such programs.

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## The Impacts of Mandatory Financial Education: Evidence from a Field Study

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## Abstract

Very-low-income families in a subsidized housing program were randomly assigned to a five-course financial skills training program and tracked for 12 months (n=127). Based on difference-in-differences comparisons, financial literacy education stimulated \$450 in additional savings, a 21-point increase in credit score, a 25 percent improvement in self-reported financial knowledge, and a 45 percent improvement in positive self-reported financial behavior. Participants were single mothers with low incomes and of subprime credit quality, a highly relevant group to explore the effects of financial literacy education.

Key Words: financial literacy evaluation

### Introduction

Public policies mandate financial education for consumers with credit problems such as bankruptcy or foreclosure, as well for consumers with impending financial decisions, such as before buying a home or graduating from high school. Financial education and counseling are provided in the workplace, in schools, by community programs, and as part of public programs. Despite a growing interest in and support of financial education (for example: the 2008 President's Advisory Council on Financial Literacy), the effects of financial education on credit behavior are relatively untested. This study provides a unique opportunity to test the effects of a highly targeted mandatory financial education curriculum among very-low-income clients in a randomized field experiment.

### Literature Review

Several studies have documented the extent to which consumers in the U.S. and other countries fail to demonstrate financial literacy, numeracy, or both (for a review, see: Lusardi & Mitchell, 2007b). Financial knowledge measures tend to be highest for more-educated consumers, and lower for lower-income consumers (Agnew & Szykman, 2005; Bernheim, 1998; Bernheim & Garrett, 2003; Lusardi & Mitchell, 2006; Mandell, 2004). Understanding interest and interest rates tends to be a particular area of weakness (Moore, 2003).

Knowledge and behavior are closely linked. By comparing data on 18 financial behaviors with scores on a 28question financial knowledge questionnaire, Hilgert, Hogarth, and Beverly (2003) find that lower-scoring respondents engage in less savings and are less likely to pay bills on time or maintain a budget. The authors point out that engaging in regular savings or budgeting behaviors might be the source of the knowledge, however, rather than a result of the knowledge. Further analysis by Hogarth and colleagues strengthens the linkages between levels of financial knowledge and financial behavior (Hogarth, Beverly, & Hilgert, 2003; Hogarth & Hilgert, 2002). Courchane and Zorn (2005) provide data from a survey linked to credit data. They conclude that levels of objective and subjective knowledge about financial issues influence savings and credit behavior and are reflected in events in consumer credit records.

Much of the research on the effects of financial education programs are based on school-based financial education or workplace-based retirement planning seminars (Martin, 2007). Studies of workplace-based education seminars, typically focused on retirement choices, show modest effects. Studies of retirement plans are hard to interpret, however, since firms often simultaneously promote retirement planning seminars and introduce new retirement savings programs (Bernheim, 1998; Bayer, Bernheim & Scholz, 1996, 2003; Lusardi & Mitchell, 2007a; Muller, 2003).

Another set of studies examine counseling and education provided to consumers facing certain problems. Elliehausen, Lundquist, and Staten (2007) compared clients who received counseling to a general population control group over a 3-year period. Consumers who received counseling reduced total debt, showed evidence of improved credit card management, and had lower credit card delinquency rates. Other studies suggest credit counseling and education has positive effects, although generally small in terms of magnitude (Collins, 2007; Hartarska & Gonzalez-Vega, 2005).

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One problem in financial literacy research is determining a measure of knowledge. Many studies rely on self-reported knowledge scales ("how confident are in your knowledge of..."). At least one study shows that most people overestimate their knowledge relative to what they actually know. Based on a comparison of answers to a self-reported scale and scores on an actual test of investment knowledge, Agnew and Szykman (2005) find low correlations, especially for people without a college education. Thus, studies relying on self-reported data can lead to ambiguous results.

A more significant problem with existing studies of financial literacy programs are selection effects (Meier & Sprenger, 2007). Unobserved characteristics drive more-motivated clients or more-patient individuals to seek out financial education and also to succeed financially. Hogarth (2006) summarizes 25 papers that evaluate financial education. Only two studies use forms of a quasi-experimental technique to evaluate financial education, both in the workplace setting. The first, by Bernheim, Garrett, and Maki (2001), makes use of changes in state high school curricula to predict retirement savings, finding a positive effect of states with increasing mandates. The second, by Duflo and Saez (2003), implemented a randomized experiment for a retirement planning seminar, finding marginally positive results of the offer of education on enrollment in a savings plan. One promising series of studies randomly assigning an offer of credit card education and credit management training to college students was hampered by low response rates and strong selection effects among responders (Gartner & Todd, 2005). Another nonexperimental used length of exposure to financial education as an evaluation technique for examining lowincome clients in a matched savings program, finding each additional hour of education improved savings behavior (Schreiner, Clancy, & Sherraden, 2002). Hirad and Zorn (2001) evaluated the loan performance of mortgages on which financial counseling was required before purchase, finding that improved loan performance was better among borrowers receiving education using a quasi-experimental control group but not random assignment. Other studies use nonrandomized control groups or self-reported knowledge and behaviors (or both). There currently are no field experiments of financial education among low-income consumers that use random assignment and behavioral measure of outcomes.

Overall, the evaluation literature suggests that financial education can help individuals gain additional financial knowledge and that knowledge is linked to financial behavior. Evidence of the impact of financial literacy education is suggestive of greater levels of savings, usage of bank accounts, and improved credit. Because of problems with selection effects, however, further studies are needed.

### Model of the Impact of Financial Education

It is expected that clients completing financial literacy education will show positive changes in follow-up measures compared to baseline measures in three areas: (1) consumers assigned to financial literacy will exhibit greater positive changes at follow-up in their perceived level of understanding of personal finance topics than consumers not assigned to financial literacy education; (2) consumers assigned to financial literacy education will show greater positive changes in objective measures of financial behavior, such as credit reports and bank account balances, than consumers not assigned to financial literacy education; (3) consumers assigned to financial education will show greater positive changes in confidence about savings and budgeting as compared to consumers not assigned to financial literacy education.

### Procedures

Data for this study were provided by the Community Development Corporation of Long Island, New York (CDCLI). This nonprofit agency is the regional administrator for federal rental housing vouchers. Low-income families receive a voucher to subsidize rental payments made to private landlords. Qualification for a voucher is based on income and family size and is adjusted each year. As administrator, CDCLI recertifies that families in the program are in compliance with income limits and other conditions of the program. As a result, the agency maintains a database of income, assets, and other characteristics for all clients over time. CDCLI created a financial literacy course called "Financial Fitness," delivered over five sessions and covering topics such as credit, savings, and budgeting.

Out of an initial pool of 181 clients required to take the course, 144 clients consented to participate in a study of "how people like you manage their financial credit and savings." According to case notes provided by CDCLI, of the 37 nonconsenting clients, 22 were in the process of leaving the program or being terminated for noncompliance. Six cited personal or family health issues that prevented them from potentially taking the education course, and 5

simply refused without any reason provided. Only 4 refused to consent because they wanted to take the course immediately and were not willing to be on a waiting list if they took part in the study.

The remaining 144 clients were divided such that odd-identification-number clients were assigned to receive financial education in 2006, while even-numbered clients were assigned to take the course in 2007. This process resulted in 73 clients being assigned to the "treatment" group, which meant they were required to take the financial literacy education course in the next year, and 71 being assigned to the "control" group, which meant they were prohibited from completing the course for one year. All five courses in the "Financial Fitness" series were provided at the CDCLI offices every month from September 2005 to September 2006 for treatment group clients and after this date for control group clients. All courses `were taught by the same set CDCLI staff using a standardized curriculum. Treatment group clients completed their baseline data collection the month before they began taking financial literacy courses and their follow-up data collection took place 12 months later. The majority of treatment group clients completed the five financial education courses in one month or less. Completing the course was mandatory, and failure to comply would jeopardize the client's eligibility to receive a housing voucher. Neither group of clients received any other special education or financial services other than financial education. The consent form included an agreement to fill out the baseline and follow-up 50-item surveys. Like treatment group clients, control group clients received a follow-up survey and completed other data collection 12 months after the date of their baseline data collection. Clients received \$30 as an incentive to complete the baseline survey at the beginning of the study and an additional \$30 to complete a follow-up survey.

Assignment to treatment and control groups appears to be random. A chi-squared test of assignment based on an even or odd client identification number by consent status shows a nonsignificant difference (77% vs 82%,  $\chi^2 = 0.907 \ p = 0.341$ ). Poststudy, 17 clients failed to complete a second survey because they were uncooperative or no longer in the program, including 13 in the treatment group and 4 in the control group, resulting in 127 clients with complete data in both periods. Unlike consent, attrition between the two groups does not appear to be random (82% vs 94%,  $\chi^2 = 5.124 \ p = 0.024$ ). The final sample consisted of 60 clients in the treatment group and 67 in the control group, with data in both the pre- and posttreatment periods.

### Study Attrition

Ideally, a randomized design overcomes selection bias and yields a valid comparison group for estimating the effects of an intervention, in this case the effects of financial education. However, it takes time for the effects of a financial education course to be exhibited in the behavior of clients. A study of this nature not only must track data over a sufficiently long time period to be able to detect any changes but must also be aware that as the time between baseline and follow-up lengthens, more clients will be lost from the sample because of moving, changes in circumstance, withdrawal from the program, or even death. The problem of attrition is common in longitudinal evaluations, and when attrition does occur the nature of any bias introduced can be difficult to estimate (Orr, 1999).

In this study 5.6 percent of the control group was lost to attrition by the time of the follow-up data collection. Notes in the administrative data provided for this study suggest that 8 of the 13 treatment group clients failing to complete follow-up data were terminated or withdrew from the housing program, compared to 1 of the 4 control group clients. Termination could occur as a result of noncompliance with the terms of the program, or because the client increased income beyond program limits. Of the remaining clients not available for the follow-up data, 2 were deceased, both in the control group. The other control group client and 5 treatment group clients simply refused to complete a final survey or to complete education classes. The effects of attrition bias are difficult to diagnose. It is possible that financial literacy education influenced behavior leading to withdrawal, such as spurring motivation to obtain a higher-paying job. Completing the second round of data collection might also be a signal of more motivation compared to those clients who were noncompliant, who withdrew, or who were terminated. The direction of bias remains unclear and suggests the need for a quasi-experimental design to supplement the estimates derived from the simple randomized comparisons (LaLonde, 1986; Orr, 1999).

### **Baseline Characteristics**

Overall clients in this study had little savings, poor credit ratings and high debt levels. About 16 percent of clients received income support through a welfare program (in addition to housing assistance) and over 90 percent of clients in were female and single parents. About half of the clients in the study were African American, one in ten were Latino or Hispanic, and the remaining one-third were White. Differences in these statistics were not statistically significant between treatment and control groups, as would be expected given random assignment. Income for the

treatment group was significantly higher at baseline than for controls, however (\$23,239 vs. \$19,382, t=1.9). This does not appear to be evidence of any systematic problems with assignment to the treatment group and simply occurred by chance.

Table 1

Behavioral Difference-in-Differences: Bank Accounts, Credit Reports, Self-Reports

	Estimated				Weighted	
	Treatment				with	
	Effect on		Weighted		Program	
	Treated	t	Estimate	t	Controls	t
Administrative Data:				-		
Amount in Checking Account	-\$738	[0.94]	-\$351	[1.62]	-\$319	[1.61]
Amount in Savings Account	\$489	[2.17]*	\$454	[2.35]*	\$474	[2.41]*
Receive Welfare (TANF)	-0.057	[0.76]	0.064	[0.95]	0.071	[1.26]
Credit Report:						
Delinquencies Reported	-0.131	[0.88]	-0.224	[1.19]	-0.222	[1.25]
Discharges Reported	0.354	[1.01]	0.309	[0.84]	0.336	[0.92]
FICO Credit Score	0.333	[0.03]	20.19	[1.43]	20.805	[1.73]+
Number of Credit Cards	0.695	[1.96]+	0.424	[1.08]	0.464	[1.30]
Subprime (FICO<620)	0.035	[0.44]	0.016	[0.16]	0.02	[0.23]
Total Dollars in Debt	\$2,533	[1.64]	\$2,241	[1.29]	\$2,276	[1.29]
Self Report:						
Financial Behavior Index (0-4, 4=good)	0.529	[4.54]**	0.548	[4.27]**	0.547	[4.17]**
Grade self at following budget	0.552	[2.91]**	0.492	[2.17]*	0.488	[2.13]*
Grade self at planning for financial future	0.765	[3.83]**	0.83	[3.40]**	0.858	[3.57]**
Grade self at providing for family	0.437	[2.23]*	0.469	[2.07]*	0.476	[2.04]*
Grade self at managing finances	0.621	[3.19]**	0.482	[2.16]*	0.488	[2.17]*
Financial Knowledge Index (0-4, 4= a lot)	0.523	[3.19]**	0.441	[2.17]*	0.446	[2.18]*
Grade self understanding of current interest rates	0.746	[3.63]**	0.854	[2.74]**	0.935	[3.59]**
Grade self understanding of own credit report	0.519	[2.64]**	0.576	[2.21]*	0.627	[2.57]*
Know a lot about credit	0.397	[1.97]*	0.239	[0.94]	0.269	[1.06]
Know a lot about investing money	0.247	[1.23]	0.372	[1.57]	0.403	[1.67]+
Know a lot about managing finances	0.621	[3.19]**	0.482	[2.16]*	0.488	[2.17]*
Learned a lot about managing money and using						
credit from training courses outside of school	1.06	[4.82]**	1.125	[4.92]**	1.185	[4.91]**
Financial Worry Index (0-4, 4=always)	-0.184	[1.21]	-0.214	[1.15]	-0.218	[1.16]
How frequently feel "I am worried about having	0.005	[4 70]	0.007		0.007	 [4 4 <del>7</del> ]
enough money"	-0.335	[1./2]+	-0.327	[1.44]	-0.337	[1.47]
Self Esteem/Control Index (0-4, 4=always)	-0.133	[1.01]	-0.152	[1.09]	-0.149	[1.08]
How often feel "there is really no way I can solve	0.070	[4 OC]	0 507	· · ·	0 540	 [0 45]*
some of my problems"	-0.379	[1.96]+	-0.507	[2.30]*	-0.513	[2.45]"
Stress Symptoms Index (0-4, 4=always)	-0.039	[0.32]	-0.051	[0.35]	-0.051	[0.35]

Absolute value of t statistics in brackets

+ significant at 10%; \* significant at 5%; \*\* significant at 1%

Controls: duration in FSS program, household size, rent subsidy, debt level, & income

#### **Evaluation Approach**

The average treatment effects of financial literacy education on clients completing the 5-course sequence are estimated using three difference-in-differences specifications. All three estimates are presented in Table 2 and discussed below.

#### Difference-in-Differences Estimation

Each outcome can be tested using a conventional regression-adjusted impact estimate (Orr, 1999) of the form:

Eq. 1  $Y_{follow-up} = \beta 1 Y_{baseline} + \beta 2 X_{Treatment} + \epsilon$ 

The model tests whether the outcome,  $Y_{follow-up}$ , is impacted by the treatment, X, where the treatment is a client being assigned to financial literacy education. When the  $\beta 2$  coefficient on  $X_{Treatment}$  is statistically significant, this suggests the program has an effect. This approach controls for each client's baseline state, so that each outcome is relative to

the client's status at the start of the study  $(Y_{baseline})$ . The standard errors in these and all other models in this study are corrected for heteroskedasticity.

#### Propensity Score Matching Differences Estimation

One way to balance the treatment and control groups based on observable factors is to use a propensity score. The propensity score is the predicted probability that a client in the control group would have been assigned to the treatment group given pretreatment characteristics. The propensity score can then be used as a weight to increase the influence of control group clients who are more similar to the average treatment group client, controlling for a range of client characteristics (Heckman, Ichimura, & Todd, 1997; Rosenbaum & Rubin, 2001; Smith & Todd, 2005). The propensity score is the probability of being assigned to and completing financial literacy education as well as completing all follow-up data collection. This was estimated using the following probit specification of baseline data:

Eq. 2 Prob(completed) =  $\beta_1$  age +  $\beta_2$  age 2 +  $\beta_3$  financial knowledge index +  $\beta_4$  debt +  $\beta_5$  bankruptcy +  $\beta_6$  savings +  $\beta_7$  household size +  $\beta_8$  rent subsidy +  $\beta_9$  income +  $\beta_{10}$  white +  $\beta_{11}$  welfare +  $\beta_{12}$  #delinquencies +  $\beta_{13}$  Length of time in program +  $\epsilon$ 

Each control borrower was assigned a weight relative to his or her probability of actually being in the control group (number of treatment subjects divided by the number of control subjects in each quintile). Weights ranged from 0.23 to 2.57. Weighted t-tests of the baseline variables show that the propensity score weights effectively balance the treatment and control groups (Morgan & Harding, 2006). The specification for the weighted difference-in-difference estimator is shown in Eq 3. This model is similar to Eq 1, with the exception of the addition of weights (w=1 for all treatment cases). Again, robust standard errors are used to address heteroskedastic standard error terms. The coefficient on  $\beta$ 2 provides a propensity score weighted estimate of the impact of the program, controlling for baseline levels.

Eq. 3 
$$Y_{\text{follow-up}} = \{ \beta 2 Y_{\text{baseline}} + \beta 2 X_{\text{Treatment.}} + \epsilon \} * [w]$$

### Weighted Differences Estimator with Covariates for Other Services Received

All treatment and control clients in this study receive housing vouchers to help pay their rent and are part of the family self-sufficiency program (FSS). However, the benefits of these programs are provided at different levels. The voucher has more value for low-income clients with more family members and high rent amounts. The longer clients are in FSS, the more opportunities they have had to earn more income without losing voucher benefits. A client with larger benefits from the FSS voucher might also show stronger impacts for the outcomes of interest in this study.

The third difference-in-difference specification includes covariates of baseline data to model the extent to which clients are exposed to these services. The covariates used in these models include how long the client was enrolled in the FSS program prior to the experiment and the factors that help determine the amount of the voucher subsidy, including household size, rent amount, total debt, and total income. The specification used in these models is shown in Eq. 4 below, where *w* is the weight derived from the quintiles of propensity scores:

Eq. 4  $[Y_{follow-up}]*[w] = [\beta 1Y_{baseline} + \beta 2xTreatment + \beta 3 Months in FSS + \beta 4 Household size + \beta 5 Rent level + \beta 6 Amount of total debt + \beta 7 Total income + <math>\varepsilon$ ] \* [w]

### **Estimated Impacts**

Using the three difference-in-difference estimation procedures described in Sections 6.2 and 6.3, the effect of financial literacy education is developed for 20 measures of financial behavior, 7 measures of self-reported financial literacy, and 7 measures of financial attitudes or perceptions, as shown in Table 1. Including such a large number of dependent variables of interest presents a potential multiple measures problem; by chance several of these measures will show statistically significant differences. To counter this problem, key dependent variables were designated for each of the predicted outcome categories, and when possible indices or scores are used to aggregate similar measures into a composite score.

The impacts of financial literacy education are presented using the simple difference-in-differences estimator (Eq. 2), the weighted difference-in-differences estimator (Eq. 3), and the weighted difference-in-differences estimator with covariates (Eq. 4). In most cases the results become more robust using the weighted estimator with controls, as might be expected. Given the small sample size, results are reported if the 10 percent statistical significance level is achieved.

#### Financial Behavior Estimates

Based on the prior literature, it is predicted that financial literacy education would have a positive effect on savings levels and credit scores and a negative effect on debt levels and credit card use. At baseline the weighted mean account balance in a savings account for clients was \$517 (including \$0 for clients with no savings accounts). The estimated average effect of financial literacy education on savings account balances was positive, with an additional \$489 saved using the conventional experimental difference-in-differences estimator, an additional \$454 saved using the matching difference-in-differences estimator without covariates, and \$474 saved using the weighted difference-in-differences estimator with covariates. These results are strongly significant at the 1 percent level.

Credit report data include a FICO score, which ranges from 300 to 800. These scores are used by creditors, insurance companies, and even employers to assess the behavior of an individual. Because financial literacy education focuses on the topic of credit and credit reports, it was expected that clients would make an effort to at least check their report for errors and engage in activities that might improve their credit rating, such as paying past due accounts or using less of available credit lines. The weighted estimator with covariates model suggests a 20.8 point increase in scores, compared to a baseline score for both groups combined of 570.

According to one analysis provided by Fair Isaac Corporation, the difference between a FICO score of 570 and 590 can result in a decrease in interest rate on a 48-month automobile loan of 2.5 percentage points (the difference between and APR of 14.45% and 16.97%). This would reduce the borrowing cost of a \$10,000 loan by \$618 over the four-year life of the loan.

Although it was predicted that financial literacy education would be associated with clients paying down debt and reducing the use of credit cards, there were no results significant at standard levels. Using the simple, unweighted differences estimator, but not the weighted estimators, clients completing financial literacy education hold more credit cards at follow-up. Total debt levels for the treatment group also appear to increase after financial literacy education, although again not at statistically significant levels. An analysis of other credit report measures, such as the number of reported delinquencies, deficiencies, discharges, share of credit limit borrowed, and number of credit cards showed no such tendencies, however. The lack of difference between treatment and control groups in these areas could be attributed to the fact that credit report data are additive, much like a grade point average (GPA). Past problems remain on the report for up to 7 years. Clients with improvements in items on their credit reports in the last 12 months would only slowly counteract those historic problems.

In addition to the data collected from bank account statements and credit reports, clients answered a series of questions at baseline and then at follow-up in which they self-reported financial behavior. The survey includes eight types of behavior, each scored on a 0-to-4 scale, which provides an array of behaviors summarized in this analysis as a single index. This index is reliable using Cronbach's reliability statistic ( $\alpha$ =.87). Most clients graded themselves as poor in most areas at baseline. The index mean increased by up to 0.55, which is a 45 percent increase over baseline. These results are quite robust at the 1 percent statistical significance level. Examining the questions that make up the index, the items related to budgeting and financial planning showed significant and positive results, while the other items were not significant. This is consistent with the focus of this financial literacy program on budgeting and financial planning skills.

#### Financial Knowledge Estimates

Based on prior studies, financial knowledge has a strong association with financial behavior. It is expected that clients who completed the financial literacy education course would exhibit greater increases in self-reported understanding of a variety of financial topics covered in the course. All clients completed a series of questions about how much they understood about various financial topics. These questions provide a 0-to-4 assessment of the client's self-assessment of her understanding of interest rates, credit ratings, managing finances, investing, and what is on her own credit report. Responses ranged from "nothing" (0) to "a lot" (4). Similar to the behavioral measures

drawn from the client survey, an index of self-reported financial understanding was developed based on 5 items contained in the survey. The index provides an aggregated measure of how well each client perceives his or her understanding or comfort level with various financial topics. This index was reliable at similar levels to the financial behavior index using Cronbach's statistic ( $\alpha = .82$ ).

The weighted mean index value at baseline was 1.96 for both groups combined. The average estimated impact of financial education on the financial knowledge index 0.45 using a weighted estimator with covariates, a 26 percent increase over the baseline index value. Decomposing the components of the weighted mean index values, nearly one-half of the gain was due to an increase in reported understanding of current interest rates, and the remainder primarily due to improvements in understanding of credit reports and how to manage personal finances (issues such as budgeting and expense tracking).

All clients completed a question at baseline and follow-up asking where they learned about financial issues. This provides a check of the extent to which the financial literacy education course was the source of the client's self-assessed gains in knowledge. Clients indicating "training courses taught outside of school" nearly doubled for the group assigned to financial literacy education. It is likely clients are attributing the source of the knowledge to the financial literacy education they received. This finding was also significant at the very strong 0.1 percent level.

#### Financial Attitude Estimates

There is less literature on the connections between financial attitudes and financial literacy education. Changing preferences, attitudes, or values regarding financial issues is a different objective than imparting factual information and developing financial management skills. Nevertheless, staff of the program cited anecdotal evidence of clients for whom they believed financial literacy education triggered improvements in how clients viewed money and their personal financial situation overall.

Attitudes are more challenging to reliably measure than behavior or knowledge . However, there were several questions in the survey which provide some data changes in client attitudes. One set of questions asked about how frequently clients feel worried or stressed about managing money. It was expected that the financial education course would reduce the level of stress clients felt about financial issues as they gained further knowledge and skills. As with other survey questions, the set of 4 responses was condensed into an index, which is shown to be reliable ( $\alpha = .83$ ) using Cronbach's alpha statistic. Another category of survey questions were not directly related to financial literacy education but may serve as a general indicator of each client's perceived ability to make changes in financial or other aspects of their lives (internal versus external locus of control). It is expected that financial literacy education would result in an increase in clients viewing their level of control over their lives. This index of 7 items was also reliable ( $\alpha = .81$ ). The third category of survey questions measured the frequency of headaches, fatigue, insomnia, or other physical or emotional symptoms of stress or anxiety. Financial literacy education might be expected reduce stress levels. This index was reliable at slightly higher levels than the other indices ( $\alpha = .86$ ).

In general these indices did not yield significant estimates of the impact of financial literacy education. One question about how frequently the client feels "worried about having enough money" shows a reduction for clients in the treatment group of -0.34, or about an 11 percent decrease. This was significant at the 10 percent level and only for the simple difference-in-differences estimator, however. The question about how often clients felt "there is really no way I can solve some of my problems" showed a significant decrease between the baseline and follow-up survey for clients assigned to financial education relative to controls using all three estimators, suggesting an effect of up to 0.51, or about a 30 percent decrease from baseline. Since most of the questions in the survey are related to financial topics, clients may have answered this question in the context of their financial problems. Ideally, overall indices of questions would be statistically significant and none were in this study. It is possible that a larger sample size would have yielded more robust results. Given the available data, there is not strong support for the hypothesis that financial literacy changed client attitudes about financial issues.

### Discussion

The financial literacy course in this study was designed to help low-income consumers to learn budgeting skills, boost savings, and repair credit problems. Based on a field study with a very-low-income population, this study shows that financial literacy education is related to improved financial behavior outcomes at least in the context of this program. The primary evidence of behavioral change is a significant increase in savings account balances, along with modest improvements in credit scores. Client perceptions of financial knowledge also show evidence of

improvement, particularly around interest rates, credit, and budgeting. Responses to a survey question about how clients learned about financial issues also suggests that the financial literacy classes in this program may have played an important role. The findings of this study are surprisingly robust in many cases, especially given the relatively small sample sizes and the weak impacts shown in past studies.

This study has several advantages over previous studies. First, this study includes objective measures of behavior from bank accounts and credit reports, rather than replying on self-reported data. The second advantage of this study is that all clients in the study were mandated to receive financial literacy education, thereby reducing the effects of clients selecting into the program. Clients were randomly assigned to either receive the education course immediately or to defer receipt, thereby creating a randomized control group. A third advantage of this study is that the longitudinal design allows for an assessment of impact over a year-long period using a difference-in-differences specification. This allows the knowledge gained from the education course to be incorporated into behavior and for that behavior to be reflected in credit report and bank account data. A final advantage is that because all the clients in the study are enrolled in a housing voucher subsidy program, they are closely monitored and data are regularly available as part of the administrative process for the program.

There are several caveats worthy of discussion. Generalizing these results to other programs requires caution. Clients are at a numerically lower starting point than other populations as measured by initial financial circumstances. This might result in these clients responding more strongly to financial education than consumers at a more moderate initial level. On the other hand, administrative notes included in the data suggest clients in this study experienced problems with domestic violence, unstable employment, drug and alcohol abuse, and problems finding and maintaining adequate daycare. Given this array of problems, a training program on managing financial resources may be expected to have only a limited impact.

Because clients in this study were enrolled in other programming, they may have differential responses to financial literacy education than other consumers not enrolled a housing subsidy or similar program. The application of financial literacy education in another setting with clients not enrolled in similar programs may not show the same effects.

There are several problems related to the study design. First, the sample is small, as might be expected in a field study. But the size of the sample was reduced considerably by the consent process and attrition. The effects of consent and attrition are only partially observable. In general the assignment of treatment and control groups was not significantly distorted by the consent process—it appears that failure to consent was random. Attrition was not random; clients in the treatment group were more likely to leave the program. The propensity score model addresses this issue based on observable characteristics, although it cannot account for unobserved characteristics of the decision to leave the program. The second problem with the design is the control group assignment process. The consent process alerted clients to their need to complete a financial education course. Clients who were subsequently told they were not permitted to complete the course for at least 12 months (or "wait listed") may have reacted to this information in ways that could have impacted survey responses or even financial behavior. For example, they may have wanted to create a budget or savings plan but decided to wait until they took the course. Staff of the program suggest that while some clients were excited about the program, most viewed it as just another obligation in order to remain in compliance for receipt of their housing voucher.

## Implications

The implications of this study are threefold. First, mandating financial education, at least in the form of "Financial Fitness" with a similar population in a housing subsidy program, can have positive effects on savings and credit behavior. Financial education can also lead to improvements in self-reported understanding of financial issues. If increasing savings levels and improving credit status is a goal of other public programs, mandating similar financial education programs as part of other programs serving low-income people may be a successful public policy.

Second, from a social welfare perspective, mandating financial education may lead to improvements in savings levels and in credit quality, which are more valuable than the costs of delivering services. Savings levels for 100 clients are estimated to increase by nearly \$50,000 in aggregate in one year. Additional gains will be obtained as clients with improved credit ratings benefit from lower borrowing costs and greater access to credit. To the extent that the delivery of education can be accomplished at or below the marginal benefit, public policies mandating

financial education may be a good investment of public and private resources if improving the financial status of low-income families is a policy goal.

Third, this study suggests that if influencing clients' attitudes and perceptions is deemed important—and the literature suggests beliefs are a precursor to behavior changes—then the content of financial literacy efforts should focus more on examining attitudes toward spending, saving, incurring debt, and taking financial risks. This study found little influence of the course on self-reported attitudes or beliefs. One consideration may be to complement educational efforts with the emerging field of financial coaching. Coaches can help clients formulate and achieve their own financial goals, providing support over time (Grant, 2001; Minzner, Hebert, St. George, LoConte, 2006). Peer groups may also provide a successful support structure to shape positive attitudes about money and savings.

Methodologically this study demonstrates the use of a randomized design in a field-based setting. The common barrier to random experiments is that some clients are denied services. In this case all clients benefited from financial literacy education; all that was randomized was the timing of the service delivery. This study also provides an example of how a propensity score estimator can be used to address problems of attrition bias.

Future research on financial literacy education could augment the findings in this study by examining longer time periods and larger samples. It is possible that as clients began practicing new behaviors, their knowledge and behavior continued to improve. It is also possible that following an initial burst of careful financial management after completing the financial education course, clients slid back into negative behaviors. A longer study period would allow confirmation that credit problems are not increasing for clients with newly learned financial skills and knowledge and also would potentially detect stronger changes in credit score data. Given the increased risk of attrition as the study period is lengthened, however, such an approach will require a substantially larger initial sample to allow for more extensive modeling.

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### **Retire Well: Preparing Boomers for Retirement**

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Key Words: retirement planning, baby boomers, teaching, seminars

### **Target audience**

Mid-life adults, ages 45- 62

### Objectives

Baby boomers will:

- 1) develop an attitude that they can achieve a satisfying and financially secure retirement by taking a comprehensive review of their situation and developing a plan
- become aware that non-financial issues such as maintaining physical and mental health, engaging in community organizations and hobbies, and establishing a support system can enhance retirement satisfaction
- 3) understand financial issues that impact retirement: estimating retirement income needed, determining net worth, Social Security and Medicare benefits, developing a diversified investment portfolio, investment risk, how investment fees and expenses affect returns, how to select an investment advisor, dollar cost averaging, how inflation and taxes affect a nest egg, asset allocation, and managing investment withdrawals.

### Description

Baby boomers will live longer and will spend more years in retirement than previous generations. Recent research indicates that successful retirement planning programs should emphasize not only financial planning, but also how to develop retirement goals, maintain physical and mental health, and engage with people, interests and organizations.

A University of Idaho Cooperative Extension team developed *You can Retire Well*, a course that teaches boomers how to prepare for a holistic retirement and take steps to begin their personal retirement plans. During 2008 they conducted two course pilots in mid-sized cities. *You can Retire Well* is taught during four seminars: 1) It's More Than Money; 2) Crunching the Numbers; 3) Taking the Mystery Out of Investing; and 4) Making Your Money Last.

Seminars include lectures with PowerPoint slides, participant activities, Fact Sheets, worksheets and homework assignments. University extension educators and the state specialist, the Educational Outreach Coordinator from the Idaho Department of Finance, and the Public Affairs Specialist from the Idaho office of the Social Security Administration developed and provided instruction. The state extension specialist secured funding for the pilots from the Idaho office of AARP and the Idaho Department of Finance.

The team enrolled more than 50 participants in the first pilot course. There was a low rate of attrition; most participants attended all four seminars. Presenters will explain their marketing techniques and how they encouraged course completion.

Participant demographic information was collected in a Pre-course survey; evaluations were conducted at the conclusion of each seminar. A follow-up evaluation of knowledge gained and behaviors adopted was analyzed. The presenters will share this data.

This presentation will demonstrate portions of the course and share retirement education resources that practitioners can use individually with clients or to teach similar seminars in their communities or worksite settings.

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## Factors that Influence the Amount of Net Worth of Older Households: A Comparison of Retired and Working Households

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### Abstract

As the proportion of older households in the United States continues to increase, it is important to examine their economic status. The purpose of this study was to determine the factors that influence net worth of older households and to compare net worth of retired and working older households. Data on 1,011 households with a head older than 62 from the 2004 Survey of Consumer Finances showed that being employed, education, marital status, health, income, risk tolerance, and length of the planning horizon were determinants of net worth. Working households had more net worth than retired households.

Key Words: net worth, older households, Survey of Consumer Finances

### Introduction

The older population in the United States is growing at a much faster rate than the population as a whole. The older population represented 12.4% of the U.S population in 2006 (US Department of Health and Human Services, 2007). As the number of older adults has increased, researchers have become very interested in studying their economic status. According to life-cycle theory, an individual or a couple will accumulate assets during their working years for the purpose of funding their consumption during retirement (Gomes & Michaelides, 2005). The life-cycle model defines retirement as complete withdrawal from the labor force (Maestas, 2004).

Scholarly attention to economic well-being of older adults has focused on retired households. However, many older adults continue to work after the typical retirement age. According to the Bureau of Labor Statistics (U.S Department of Labor, 2005), about 34% of men aged 65 to 69 and 24% of women aged 65 to 69 work after retirement. With increasing longevity, many older Americans say they want to keep working. It is not surprising that labor force participation rates at older ages have been increasing (Johnson & Kawaki, 2007).

Despite the fact that many older adults continue to work after retirement age, there is little existing research on the economic status of older adults who are working. Also, opinions vary about the economic well-being of older adults. Hungerford, Rassette, Iams and Koenig (2002) suggested that the economic well-being of older Americans improved between 1976 and 2000. They argued that the overall poverty rate fell during this period and median income, relative to the working-age population, was relatively stable. However, Lusardi, Skinner, and Venti (2002) found that some households who are only a few years away from retirement hold little or no assets while other households hold a significant amount of assets.

It is important to examine the economic status of the working household using net worth as the measure of status. When households have negative net worth, it is assumed that they are financially vulnerable (Chen & DeVaney, 2002). Greater net worth allows older households to maintain their standard of living when income falls because of retirement, health problems or widowhood (Federal Interagency Forum on Aging Related Statistics, 2006). Furthermore, Warneryd (1999) argues that behavioral factors provide insight to economic phenomena that cannot be understood solely using economic and demographic factors. Therefore, it is important to study both behavioral and demographic factors influencing the level of net worth for retired and working older households. This research should help financial advisors and educators to understand the distribution of net worth among older households. Also, it should provide insight on factors that influence the level of net worth.

### **Statement of Purpose**

The purpose of this study is to: 1) examine the factors that influence older households' net worth, and 2) compare net worth of working and retired households. The dependent variable, net worth, is the difference between assets and liabilities in the household balance sheet.

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### **Review of Literature**

#### The Effect of Financial Behavior on Household Net Worth

According to Hilgert, Hogarth and Beverly (2003), financial management plays a pivotal role in household economic decisions. Hilgert et al. (2003) focused on financial management in terms of behavior and psychological factors. They concluded that increase in financial knowledge and experience could lead to improvement in financial status. Financial management includes financial planning for long-term and short-term financial goals and investment for the future (Garman & Forgue, 2006; Joo, 2008; Mathus, 1989). Titus, Fanslow and Hira (1989) found a positive relationship between level of financial planning and household net worth. They suggested that households were more likely to have a higher level of net worth if the money manager used optimum planning practices. Therefore, the following hypothesis is proposed to explain the relationship between planning horizon and net worth. H<sub>1</sub>: Compared to households with a short planning horizon for saving and investing, households with a longer planning horizon for saving and investing will have more net worth.

The effect of risk tolerance on household net worth could be positive. Finke and Huston (2003) found that older households whose heads are willing to accept higher financial risk had a significantly higher level of net worth compared to older households whose heads were risk averse. They stated that those who are willing to sustain higher financial risk are more likely to invest in financial assets that yield a higher expected rate of return. Chen and DeVaney (2002) also proposed that there was a positive relationship between risk tolerance and household net worth. They found that households with more tolerance for risk held larger amounts of net worth (Chen & DeVaney, 2002). This leads to the following hypothesis.

 $H_2$ : Compared to households whose heads are willing to take average risk, household whose heads are willing to take above average or substantial risk will have more net worth.

#### Employment Status and Net Worth

According to previous research, being employed is expected to have a significant impact on household net worth. Earnings from continuing to work could positively impact the amount of older households' net worth. However, Bieker, DeVaney and Chen (2001) found that individuals who received Social Security and pension benefits were less likely to be working full time than individuals who were not receiving similar benefits. H<sub>3</sub>: Older households whose heads are working will have more net worth compared to older households whose heads are retired.

#### Health Effects and Net Worth

Poor health is known to reduce labor force participation. Baker (2005) found that older individuals with major health problems returned to work at a substantially lower late than did their healthier counterparts. Poor health reduces work and employment after retirement among individuals age 65 and over. In addition, poor health can increase medical costs. Previous research showed that relatively high medical costs had a negative impact on household economic well-being. The expected relationship between health and net worth is described as follows.  $H_4$ : Older household heads that are in good or excellent health will have more net worth than older household heads that are in poor or fair health.

### Socioeconomic Factors and Net Worth

Socioeconomic factors that might impact the amount of net worth include education, race, marital status, age and income. Previous studies suggest that education affects wages and unemployment and these are expected to affect economic well-being during retirement. Becker (1993) studied the relationship between education level and income level of workers. He calculated the rate of return to education and showed that as education increased, so did earnings. Therefore, the following hypothesis is stated.

 $H_5$ : Household heads with more education will have more net worth than households whose heads have less education.

Race is a factor that is expected to influence the amount of net worth of older households. Previous research has shown that minority (or nonwhite) individuals tend to have less formal education. The difference in the level of formal education has meant that nonwhite individuals earn less than white individuals (Gottschalk, 1997). Miller and Paxson (2006) reported that older white individuals had a much higher average income than older nonwhites. Also, the poverty rate of older nonwhite individuals was higher than that of white individuals. The expected relationship between race and net worth is stated as follows.

H<sub>6</sub>: Compared to older households with non-white household heads, older households with a white head will have more net worth.

Previous research suggests that married people will have more net worth than singles. For example, Sullivan, Warren and Westbrook (2000) showed that a higher proportion of bankruptcy filers were single, divorced, separated, or widowed compared to the proportion of filers who were married. According to the US Census Bureau (2003), married households had the largest median net worth followed by single male households and then single female households. This leads to the following hypothesis about marital status and net worth. H<sub>7</sub>: Compared to older households with a head who is not married (never married, widowed, separated or divorced), older households with a head who is married will have more net worth.

According to life-cycle theory, the relationship between age and net worth will be hump-shaped (Ando & Modigliani, 1963). That means that younger and older households will have less net worth than middle-aged households. Poverty tends to increase with age, and poverty rates are higher for the oldest old (U.S Department of Health and Human Services, 2007). Because the sample for this study consists of only older households, it is expected that net worth will decrease as the household head ages.

H<sub>8</sub>: As age of the household head increases, net worth will decrease.

As suggested by the permanent income hypothesis (Friedman, 1957), lower income households have a higher propensity to consume while higher income households have a lower than average propensity to consume. Because those who have low-incomes are likely to expect that their income will increase in the future, they overspend before their expected income increase. Titus et al. (1989) found that household income was positively related to household net worth. This leads to the following hypothesis about income and net worth. H<sub>9</sub>: As income of the household increases, net worth will increase.

### Methodology

### Data and Sample

The data for the study were drawn from the 2004 Survey of Consumer Finances (SCF). The Survey of Consumer Finances (SCF) is a triennial survey of U.S families. The survey is designed to provide detailed information on the families' balance sheets and their use of financial services, as well as on their pension, labor force participation, and demographic characteristics as of the time of the interview (Kennickell, 2006).

The 2004 SCF consisted of 4,159 households. This study included only older households because the purpose was to examine the determinants of net worth among older households and to compare net worth of working and retired households. Because individuals can begin to collect Social Security retirement benefits at age 62, the sample included households whose heads were over 62 years old. The sample for this study consisted of 1,011 households.

### Variables

The dependent variable was household net worth. Net worth is defined as assets minus liabilities. The SCF identifies assets as being either financial assets or nonfinancial assets. Financial assets included checking accounts, savings accounts, stocks, bonds, trusts, cash value of whole life insurance, Individual Retirement Accounts and Keogh plans, certificates of deposit, mutual funds, money market accounts, and other assets. Nonfinancial assets are the sum of the current value of the home and gross value of other properties, business assets, and the total value of automobiles. Household debts included housing debt, credit card debt, installment loans, and other consumer debts. The SAS code provided in the SCF codebook was used to calculate household net worth. The log of net worth was used for the regression analysis to reduce the effect of outliers (e.g., households who had either extremely high or extremely low net worth).

Four sets of independent variables: financial behavior, employment status, health status and socioeconomic factors were used to examine factors that influence net worth. Financial behavior included length of the planning horizon for saving and investing and risk tolerance.

Planning horizon was measured by the question, "In planning your family's saving and spending, which of the following time periods is most important to you?" The responses range from less than a few years to over 10 years. Risk tolerance was measured by the response to the question, "Which of the following statements comes closest to

the amount of financial risk that you are willing to take when you save or make investments? The responses were: take substantial, above average, average or not willing to take any financial risk.

Employment status was categorized as: retired or working. Health status was measured by the question, "Would you say your health is excellent, good, fair or poor?"

Socioeconomic factors included education, race, marital status, age and income. Each variable was measured on the head of household. Education level was measured by the number of years of education. Race was coded as white or non-white. Marital status was coded as married or otherwise. Age-squared was included in the regression to test for the non-linear effect of age. Age, age-squared, education, and household income were continuous variables. The log of household income was used in the regression analysis. See Table 1 for the coding of variables.

*Table 1.* Coding of variables

Variables	Coding
Dependent variable	
Net worth (log)	Continuous
Independent variables Financial behavior	
Risk tolerance	
No risk tolerance	1 if yes, 0 otherwise
Average risk tolerance	1 if yes, 0 otherwise
Above average or substantial risk tolerance	1 if yes, 0 otherwise
Planning horizon for saving and investing	
Less than a few years	1 if yes, 0 otherwise
Next few (3 to 5) years	1 if yes, 0 otherwise
Next 5 years	1 if yes, 0 otherwise
More than 10 years	1 if yes, 0 otherwise
Employment	
Retired	1 if yes, 0 otherwise
Health status	
Poor	1 if yes, 0 otherwise
Fair	1 if yes, 0 otherwise
Good	1 if yes, 0 otherwise
Excellent	1 if yes, 0 otherwise
Socioeconomic factors	
Education	Continuous
Race	1 if white; 0 otherwise
Marital status	1 if married; 0 otherwise
Age	Continuous
Age-squared	Continuous
Income (log)	Continuous

Descriptive analyses were conducted to examine the characteristic of older households. A weight variable was used to enable the descriptive statistics to be representative of the US population. The weight variable is provided in the SCF code. Because there were some negative values for net worth and household income, the negative values were changed to zero. Then 1 was added to the zero and the log was taken. This was done for both net worth and household income. This allowed the households to remain in the sample.

Chi-square tests and t-tests were conducted to compare retired households and working older households. Ordinary Least Squares regression was used to examine the factors that were expected to influence the amount of net worth.

Table 2

Descriptive Statistics of Older Households in the 2004 SCF (N = 1,011)

Variable	Mean	Standard Deviation	Frequency (%)
Dependent variables:			-
Net worth	\$ 629,000	\$ 6,015,000,000	-
Independent variables: <i>Risk tolerance</i>			
No risk tolerance	-	-	58.84
Average risk tolerance	-	-	32.53
Above average risk tolerance	-	-	8.63
Planning horizon			
Less than few years	-	-	35.20
Next few years			34.39
Next 5 years	-	-	21.80
More than 10 years	-	-	8.62
Employment			
Retired	-	-	81.65
Working	-	-	18.35
Health status	-	-	
Poor			14.43
Fair			25.85
Good			43.56
Excellent			16.16
Socioeconomic factors			
Education	12.40	543.43	-
White	-	-	83.41
Married	-	-	47.71
Age	74.28	1,226	-
Income	\$35,620	\$12,957,690	

Descriptive Statistics for Older Households

The descriptive statistics are shown in Table 2. On average, older households' net worth was \$629,000 in 2004. Among older households, 59% were not willing to take risk when saving or investing, 32% would take average risk, and 9% would take above average or substantial risk. Among older households, 35% said their planning horizon for

saving and investing was less than a few years, 34% said the next few years, 22% said the next 5 years, and 9% said more than 10 years.

Only 18% of the older household heads were working while 82% were retired. Sixteen percent were in excellent health, 44% were in good health, 26% were in fair health, and 14% were in poor health. On average, a head of household was 74 years old, had 12.4 years of education, and \$35,620 in income. Eighty-three percent were white, and 47% were married.

#### Chi-Square Tests

Chi-square tests were used to compare the characteristics of retired and working older households. Each test was statistically significant at p<0.001. The results are shown in Table 3. Retired households tended to be less risk tolerant than working households. About 50% of the retired households had no tolerance for risk compared to 23% of working households. Retired households were more likely to prefer short-term planning compared to working households were more likely to plan for the next 5 years or more than 10 years.

About 74% of the working household heads were married compared to 55% of the retired household heads. About 87% of retired household heads were white compared to 92% of working household heads. Working household heads were more likely to have excellent health status than retired households.

Table 3

Results of Chi-square Tests for Older Households in the 2004 SCF (N = 1.011)					
-1 $(A)$	Results of Chi-square	Tests for Older	Households in the	2004 SCF (	$(N = 1 \ 011)$

Variable	Retired households	Working households	P-value
Risk tolerance			<0.0001***
No risk tolerance	50.45%	23.21%	
Average risk tolerance	39.12%	46.42%	
Above average risk tolerance	10.42%	30.37%	
Planning horizon for saving and			<0.0001***
investing			~0.0001
Less than few years	30.66%	18.91%	
Next few years	30.82%	27.22%	
Next 5 years	25.53%	36.10%	
More than 10 years	12.99%	17.77%	
Health Status			<0.0001***
Poor	12.69%	2.29%	
Fair	23.41%	13.47%	
Good	45.47%	42.69%	
Excellent	18.43%	41.55%	
Socioeconomic factors			
Marital status			<0.0001***
Married	55.44%	74.21%	
Not married	44.56%	25.79%	
Race			0.0068**
White	86.56%	92.26%	
Non-white	13.44%	7.74%	

\*p < 0.05, \*\*p < 0.01, \*\*\*p < 0.001

#### T-tests

T-tests were used to compare the mean of the continuous variables. The results are shown in Table 4. The mean net worth of retired households was about one-third of the mean of working households. The mean household income for retired households was less than half of the mean of income of working households. Households headed by a working person had more education. Heads of retired households were older than heads of working households. In summary, compared to retired household heads, working household heads were younger, with more education, higher household income, and more net worth.

Weighted Result of 1-tests for Older Household Heads in the 2004 SCF ( $N = 1,011$ )						
Variable	Retired households	Working households	P-value			
Mean for net worth	\$471,850	\$1,328,500	0.0049**			
Mean for education	12.14	13.62	<0.0001***			
Mean for age	75.38	69.39	<0.0001***			
Mean for household income	\$29,147	\$64,427	<0.0001***			

Table 4. Weighted Result of T-tests for Older Household Heads in the 2004 SCE (N = 1.011)

\*p < 0.05, \*\*p<0.01, \*\*\*p<0.001

### **Results of Ordinary Least Squares Regression**

#### Total sample

The results of Ordinary Least Squares regression showed that employment, risk tolerance, planning horizon, health, marital status, education, and household income influenced the amount of net worth. Retired households had less net worth than working households. Compared to household heads with less than a few years as their planning horizon, household heads with longer than 5 years as their planning horizon had more net worth. Households with no tolerance for risk had lower levels of net worth than households who were willing to take an average amount of risk.

Compared to households whose heads said they have poor health, households whose heads said they have good or excellent health had more net worth. As expected, married households had more net worth than single households. As education increased, the amount of net worth increased. As income increased, the amount of net worth increased.

There was no significant difference between white and nonwhite households in the amount of net worth. Age and age-squared were not significantly related to the amount of net worth. All of the hypotheses except the hypotheses for race and age were supported. In summary, working household heads, those who were married, those who were willing to take risk, and those who had a longer than 5 year planning horizon, and those who were in good or excellent health had more net worth compared to those who were retired, single, not willing to take risk, in poor health, and those with a shorter planning horizon

Because there was a statistically significant difference between retired and working households, separate regressions were conducted for each sub-sample. The results for all of the regressions are shown in Table 5.

### Working households

When the OLS regression was conducted for the subsample of working households (n = 349), five variables were significant. They were risk tolerance, planning horizon, marital status, education, and household income. There were no significant differences by age, race, or health in the relationship to net worth. The fact that health was not significant was the most important difference between the results for working households and the total sample.

### Retired households

The results of the regression for retired households showed that risk tolerance, planning horizon for saving and investment, health, marital status, education, and household income influenced the retired households' net worth. The results were similar to the total sample of older households with the exception that planning for the next 5 years was only marginally significant (p = 0.0767). There were no significant differences by age or race in relationship to net worth.

### **Discussion and Implications**

Using data on older households from the 2004 Survey of Consumer Finances, this study attempted to: examine the factors that influence older households' net worth, and compare net worth of working and retired older households. The results of chi-square tests, t-tests, and Ordinary Least Squares regression provided helpful results.

Working households had more net worth than retired households. On average, the heads of retired households were older, less healthy, with less education, and they had less household income. Financial management measured by tolerance for risk and length of the planning horizon were important factors in predicting the amount of net worth. It

was noteworthy that there were no differences in net worth based on race when controlling for other factors such as risk tolerance, planning horizon, marital status, and education.

Table 5.

Results of Ordinary Least S	uares Regression on Net V	Worth for Older Households	in the 2004 SCF
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Variables	Total sample		Working households		Retired households	
variables	(n =	1,011)	(n =	(n = 349)		662)
	Parameter	P-value	Parameter	P-value	Parameter	P-value
	estimate	1 varue	estimate	1 value	estimate	1 Value
Employment						
Working (reference)	-	-	-	-	-	-
Retired	-0.77135	0.0001***	-	-	-	-
Financial Behavior						
<b>Risk tolerance</b>						
Average risk						
tolerance (reference)	-	-	-	-	-	-
No risk tolerance	-1.32234	0.0001***	-1.63993	0.0001***	-1.12600	0.0001***
Above average risk tolerance	0.40354	0.1076	0.26918	0.4171	0.41942	0.2632
Planning horizon						
Less than few years						
(reference)	-	-	-	-	-	-
Next few years	-0.11607	0.5867	0.09878	0.8015	-0.17725	0.4876
Next 5 years	0.65197	0.0038**	1.00718	0.0075**	0.50002	0.0767
More than 10 years	1.10690	0.0001***	1.39077	0.0016**	1.01219	0.0045**
Health status						
Poor (reference)	-	-	-	-	-	-
Fair	0.34717	0.2730	-0.77127	0.4041	0.29454	0.3926
Good	0.89695	0.0030**	-0.35064	0.6921	0.87843	0.0079**
Excellent	1.39541	0.0001***	-0.07505	0.9337	1.48764	0.0001***
Socioeconomic factors						
Race						
White (reference)	-	-	-	_	-	_
Non-white	-0 36494	0 5640	-0 38386	0.6186	-0 49551	0 6430
Marital status						
Not married						
(reference)	-	-	-	-	-	-
Married	1.26525	0.0001***	1.26048	0.0001***	1.09353	0.0001***
Age	0.09930	0.6106	-0.33510	0.4453	0.21462	0.3603
Age-Squared	-0.0002018	0.8762	0.00289	0.3381	-0.000977	0.5257
Education	0.27877	0.0001***	0.39592	0.0001***	0.22768	0.0001***
Income (log)	0.21296	0.0001***	0.12925	0.0143*	0.31037	0.0001***

\* p<0.05, \*\*p<0.01, \*\*\*p<0.001

It was hypothesized that the relationship between age and net worth would be negative. However, the relationship between age and net worth was not significant. The average age of retired and working household heads was 75 and 69 years, respectively. In terms of longevity, these seem to be relatively young ages. Perhaps these households have not reached an age when dissaving occurs. For future research, it would be helpful to have panel data to learn if net

worth decreased over time. For example, when an individual is widowed or when inflation affects the amount of the pension or when the value of assets decline.

Several implications can be drawn from the results. First, individuals should be encouraged to continue working, at least part-time, if they are in good health and enjoy their work. Financial advisors should help clients understand their eligibility for collecting Social Security and pension benefits. If clients can delay these for a few additional years, there could be a positive increase in net worth.

Some clients might need help with understanding risk tolerance. Perhaps a small increase in risk tolerance would improve investment outcomes. Other clients might need help in setting goals and developing plans for an uncertain period of 5, 10, or 20 years. Some clients may have lost a spouse, divorced, or remarried. These situations call for a supportive relationship with a financial advisor.

Financial advisors can work with employers to determine whether the education that is provided to employees makes a difference in the employees' retirement planning. This is important for clients of all ages. Different techniques for delivery of information should be evaluated. Women often prefer to learn in a group setting. Younger employees are likely to prefer online resources instead of seminars.

It is important to maintain good health. Individuals of all ages should be encouraged to practice healthy behavior and get regular checkups. This will enable them to work longer and to enjoy a more satisfying old age.

Improving human capital by obtaining as much education as possible is another implication of the study. Education was positively related to net worth for both working and retired household heads.

Policy makers would probably be interested in knowing more about which older heads of household are working. Policy makers should encourage work at older ages to help consumers increase their pension and Social Security benefits. Another benefit of work at older ages is to maintain or improve the individual's psychological well-being as well as their financial wellness (Joo, 2008).

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## Money Coaching -- A New Paradigm in Working With Clients Around Money Behaviors

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Money Coaching is a step-by-step process for understanding and changing your client's relationship with money so that they live a more purposeful and prosperous life. It is based on the research and work created by Deborah L. Price, author of "Money Magic: Unleashing Your True Potential for Prosperity and Fulfillment" and founder of The Money Coaching Institute in Petaluma, CA. More about the Institute and their work and trainings can be found at their website, the address of which is http://www.Money-Therapy.com.

<u>How the Money Coaching Process Works</u>: Money Coaching combines practical financial guidance with sound psychological principles to help you transform your client's relationship with money. The Initial Four-Step Core Process consists of four one-hour sessions in which you work on understanding your client's "money history" through a Money Biography Exercise, their "inherited models and patterns" through a Mirroring Exercise, their "way of being" through a Money Types Exercise, and their level of "personal and financial self-actuation" through a Skills, Talents & Abilities exercise. This process will help them to see what their underlying core patterns and beliefs are. From there, you move forward to show how those patterns are manifested in their life today, and how they are impacting their life. From this perspective, they determine what self-limiting behaviors are present and how they are influencing their behavior, choices, or perhaps, creating stress or blocks in their financial life.

In the first four sessions, you and your client work together to understand the impact of their family of origin in forming their core money patterns, work with their money archetypes, and assess how these patterns are currently influencing their ability to be fully self-actuated around money.

The Money Coaching Process is highly experiential and during the first four sessions the client will learn how they are "hardwired" around money in ways that are generally not fully conscious. By the end of the fourth session, they will have a clear understanding of their core money patterns and can begin to work on their "Money Coaching Action Plan."

<u>Money Coaching Action Plan</u>: Change of any kind can only take place under certain conditions. In Money Coaching, these conditions are threefold: (1) An understanding and new level of awareness of what the problem or issue is, (2) the willingness to change, which literally involves doing something different than what we've been doing previously, and (3) implement new strategies and actions for change. These next sessions are designed following your initial four sessions with the client's particular needs and issues in mind to help them implement new structures and changes. This can be accomplished in a series of weekly or bi-weekly sessions depending on their needs. In Money Coaching, we have found that people derive greater benefit and changes by continuing to work on a weekly basis. However, Money Coaches are committed to doing what works best for the client's highest good.

In summary, Money Coaching is a process which you can learn and incorporate into your practice to help clients obtain these benefits:

1. Identify and understand their unconscious money patterns and how they are "hard-wired" around money in ways that are not fully conscious.

2. Determine their "core issues" money issues that stem from this patterning.

3. Gain new understanding and awareness of how these patterns impact their life choices.

4. Gain insight relative to how they unconsciously model one or both of their parents or others significant in their lives around money.

5. Learn to understand their key "Money Types" and how they influence their life actively and passively.

6. Learn to proactively shift their money patterns, beliefs and behaviors.

7. Develop peace of mind through new understanding and awareness.

8. Become more balanced, make conscious financial decisions and move beyond previous limitations to experience their full potential, both personally and financially.

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## Is Credit Counseling Via the Telephone as Effective as In-Person Delivery?<sup>1</sup>

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## Abstract

This paper compares the effectiveness of credit counseling delivery channels. Counseling effectiveness is measured using consumer credit report profiles (credit attributes and risk scores) at points two and four years following the original counseling. The analysis utilizes data from a sample of 26,000 clients of five credit counseling agencies who received financial counseling either in-person or via the telephone during 2003. Telephone counseling was associated with credit profile outcomes no worse – and at some margins better – than face-to-face delivery of counseling services, suggesting that, when done well, the two delivery channels can be equally effective.

Key Words: credit counseling; delivery channels

### Introduction

This paper presents research on the comparative effectiveness of credit counseling delivery channels. As recently as the late 1990s, the conventional wisdom was that one-on-one counseling, conducted in-person, was the gold standard and that telephone counseling was a weaker substitute (Loonin and Plunkett, 2003). But, the growing demand from consumers for telephone delivery of credit counseling, and the recent introduction (and popularity) of internet delivery, has triggered an ongoing debate over the relative effectiveness of the delivery channel. Most recently, the credit counseling and debtor education required for bankruptcy petitioners under the Bankruptcy Abuse Prevention and Consumer Protection Act of 2005 was originally framed to be delivered in-person. But consumers have clearly demonstrated an overwhelming preference for technology-assisted delivery (National Foundation for Credit Counseling, 2006).

Because in-person delivery is much more resource-intensive in requiring brick and mortar offices, evidence on the comparative effectiveness of technology-assisted delivery has important implications for public policy that would encourage widespread availability of counseling options for consumers throughout the country. A small body of empirical work has shown that credit counseling (Elliehausen, Lundquist and Staten, 2007) and pre-purchase homeownership counseling (Hirad and Zorn 2002; Hartarska and Gonzalez-Vega 2005) can help to reduce future repayment problems for debtors. At least one study has found that clients who stay on counseling agency-administered debt repayment plans for more than 18 months reported improved financial management behaviors and fewer stressful events (Kim, Garman, and Sorhaindo 2005). In the context of mortgage foreclosure counseling, Collins (2007) examined the impact of the way counseling is delivered (telephone vs. face-to-face) on consumer outcomes. Using a survey of borrowers who participated in mortgage foreclosure counseling, Collins examined the impact of delivery channel and the number of hours spent in counseling on consumer ratings of counseling rose with time spent in counseling and foreclosure frequency fell, but Collins found no clear impact of delivery channel.

The following sections examine the effectiveness of face-to-face vs. telephone counseling across consumer credit counseling clients. Consumers in the study include those who subsequently enroll in a counseling agency Debt Management Plan (DMP) to manage repayment of their unsecured debts, plus those consumers who receive financial counseling only (no DMP) or recommendations for legal and other assistance. Effectiveness of counseling is gauged by using credit bureau data to examine the credit profile of counseled clients at the time of the initial counseling session and at distinct points two and four years following counseling.

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### **Data and Methodology**

In response to a national request for proposals distributed by the Consumer Federation of America to over 600 credit counseling agencies in August 2004, 34 agencies submitted grant proposals to participate in a multi-year study of credit counseling effectiveness. A review committee consisting of representatives from American Express, Consumer Federation of America and Georgetown University evaluated the proposals and selected ten finalists to participate in an empirical study of the effect of credit counseling on long-term borrower behavior. Finalists were those agencies that received high ratings in the subjective areas of evaluation (e.g., data capture ability; description of the quality of their programs; evidence of innovative programs). Site visits were conducted for each of the agency finalists, and included opportunities to listen to ongoing counseling sessions and intake calls, either "live" or pre-recorded in conjunction with each agency's quality assurance program. Among the resulting group of ten agencies, some did telephone counseling exclusively, some specialized in face-to-face counseling, and most offered both delivery channels. However, all the agency finalists demonstrated an emphasis on client education and identification of the cause of underlying financial problems. The ten agencies that emerged from this process as participants in the study were Auriton Solutions (Roseville, MN), ClearPoint Financial Solutions, Inc. (Richmond, VA), Consumer Credit Counseling Service of Greater Atlanta, Inc. (Atlanta, GA), Consumer Credit Counseling Service of Los Angeles (Los Angeles, CA), Consumer Credit Counseling Service of Montana (Great Falls, MN), Consumer Credit Counseling Service of North Central Texas (McKinney, TX), InCharge Debt Solutions (Orlando, FL), LSS Financial Counseling Service (Duluth, MN), Novadebt (Freehold, NJ), and Money Management International (Houston, TX).

The objective of the study was to utilize the experience of agencies that appear to be high-quality providers in order to see if, when done well, counseling makes a difference, and to identify whether effectiveness is influenced by delivery method. Each agency was asked to provide data for all consumers who received their first budget/financial counseling session during March and April of 2003. Counseling sessions under various homeownership and prepurchase counseling programs were not included in the sample. Because, the sampling timeframe preceded the passage of the bankruptcy reform act in 2005, bankruptcy counseling did not yet exist as a distinct counseling product.

All of the agencies in our sample conducted initial client interviews lasting anywhere from 30 to 75 minutes. The interview collected detailed budget information as well as in inventory of assets and debts. Counselors also identified potential causes of the clients' financial problems. Options were discussed. The counselor's recommendation and a written action plan were part of the product delivered to the consumer. One option that was offered to many clients was enrollment in an agency-administered debt repayment program called a Debt Management Plan (DMP). Consumers recommended for a DMP could choose not to enroll, but the DMP recommendation is a signal that the counselor thought that customer was qualified.

Credit bureau information was used to construct several outcome measures of counseling effectiveness. Counseling has at least two objectives. Since clients almost always seek counseling assistance because they sense that they are in financial trouble, a primary goal is to provide advice and assistance to relieve the immediate problem and to lower the burden of debt. But, a second and longer-term goal is to improve borrower awareness, planning, and budgeting skills to prevent overextension in the future. Decision-assistance "triage" and education are intertwined in a good counseling session. An evaluation of progress toward both goals requires some objective measures of credit usage and payment performance over an extended period following counseling. Credit report information provides such a measure.

For this project one of the three major U.S. consumer reporting agencies, Trans Union, LLC (TU), matched the client data provided by the counseling agencies to credit report data on each client drawn from the second quarters of 2002, 2003, 2005 and 2007. This produced for each counseled client a credit bureau snapshot one year prior to counseling, at the time of counseling, and at points two and four years after the initial counseling.

The credit bureau provided a number of credit-usage attributes for each individual. Of particular interest were two types of credit scores. Both scoring products are risk management tools that TU markets to creditors and other firms making credit-related decisions, including accept/reject, pricing and credit line authorization decisions. One product reflects the risk of a serious delinquency on any account (equivalent in concept and roughly equivalent in scaling to the widely-known FICO score product developed by Fair Isaac, Co.), while the second reflects the risk of bankruptcy.

The matching process yielded 59,950 clients for whom a complete set of credit reports and credit risk scores were available through 2005. Each agency sent their files directly to TU; TU then matched based on available personal identifiers and sent the matched data, stripped of all unique personal identifiers, to the authors.

Of the 59,950 clients in the sample, 40,592 were counseled in 2003 by telephone (67.7%), 13,567 were counseled in-person (22.6%) and the remaining 5,791 clients were counseled via the internet (9.7%). Five of the ten participating agencies offered all three delivery channels to consumers. Three agencies were primarily or exclusively telephone counseling operations, and two agencies offered face-to-face counseling almost exclusively. It is important to remember that the sample is not a representative sample of all counseling clients industry-wide. Consequently, the mix of delivery channels in the sample is greatly influenced by the business models of the participating agencies.

Table 1 reports differences across the agencies in the recommendations that arose from the counseling session. Note that some agencies (e.g, Agency E and Agency J) did not capture much detail about the outcome of the counseling session, other than whether a DMP was offered. The table displays large differences in the extent to which counseling resulted in a debt management plan being proposed. However, the far right-hand column in Table 1 shows that when one considers the percent of clients who actually started a DMP, the differences across agencies are much smaller, though still significant.

Table 2 reports the recommendation of the counselor by type of delivery channel, as well as the percent of clients in each delivery channel who actually agreed to and started payments on a DMP. Note that as a percent of all counseling sessions, DMP recommendations were made least frequently for face-to-face counseling clients. Nevertheless, face-to-face sessions display the highest "conversion rate" in terms of percent of clients who start a DMP.

				Referral to			
	Self Manage/		Financial	Other	Referral to		Some DMP
	Client Can	DMP	Counseling	Agency/	Legal	Not	payments
	Handle	recommended	Only	Service	Assistance	Available	made
Agency							
Α	3.7%	26.7%	64.8%	0.6%	4.2%	0.0%	16.9%
В	10.3%	59.6%	12.6%	2.2%	4.3%	11.1%	20.2%
С	14.2%	29.8%	41.4%	6.8%	5.6%	2.2%	31.1%
D	3.9%	51.7%	22.2%	15.6%	4.0%	2.7%	35.9%
Ε	5.3%	64.4%	0.0%	30.1%	0.0%	0.2%	36.3%
F	4.5%	43.2%	26.1%	6.9%	7.8%	11.5%	25.0%
G	5.2%	77.1%	1.1%	7.8%	4.8%	3.9%	27.4%
Н	1.5%	32.8%	61.3%	0.0%	1.1%	3.3%	39.1%
I	0.0%	16.9%	83.1%	0.0%	0.0%	0.0%	16.9%
J	0.0%	34.4%	0.2%	0.0%	0.0%	65.5%	25.6%
Total	5.2%	62.1%	9.9%	13.9%	3.0%	5.9%	29.8%

# Table 1: Counselor Recommendations Across Agencies and Percent of DMPs Started

Total number of observations is 59,950. The "self manage" category includes what various agencies refer to as "client can handle", "choose to self manage", or "self administer". "Not available" can be due to an incomplete session.

### **Counseling Delivery Methods and Outcomes**

This section provides various tests of the effect of counseling channel on the clients' credit profile two and four years after counseling. Because Internet counseling was not consistently defined across agencies in 2003 (e.g., some offered online intake of client financial information but did not classify that as Internet counseling; others offered some form of interactive chat or telephone call-back following online input of information) we limit the following analysis to individuals who had an initial counseling session either over the phone or in person. In addition, the sample was restricted to individuals who had no record of bankruptcy filing in their credit report at the time of counseling.

	Face-to-face	Internet	Telephone	Overall
Counselor Recommendation		memer	reicphone	orerun
Self Manage/Client Can Handle	6.6%	3.3%	5.1%	5.2%
DMP recommended	53.4%	71.9%	63.5%	62.1%
Financial Counseling Only	19.7%	17.8%	5.5%	9.9%
Referal to Other Agency/Service	10.7%	2.6%	16.6%	13.9%
Referral to Legal Assistance	4.9%	2.1%	2.5%	3.0%
Not Available	4.7%	2.3%	6.8%	5.9%
Overall	100.0%	100.0%	100.0%	100.0%
Some DMP payments made	32.9%	21.5%	29.4%	29.4%
Percentages are for 59,950 sample o	f counseling agen	cy clients.		

## Table 2: Delivery Channel By Counselor Recommendation

### Predictors of Choice of Delivery Channel

Counseling delivery is greatly driven by consumer preferences. Since counseling is voluntary and is offered in a competitive market environment, consumers generally choose the delivery option. Because some agencies specialize in a specific delivery channel and others offer a range of delivery methods, most consumers have a meaningful choice of delivery options because they have two or more counseling agencies from which to choose. But, the choice of delivery channel could influence the observed outcomes in the years following counseling. If consumers who pick telephone delivery have different credit usage or risk profiles than consumers who pick inperson delivery, their post-counseling credit experience may look quite different.

This section examines whether such observable variables are associated with counseled clients' choice of delivery channel. For this analysis the sample was restricted to consider only 25,997 clients of the five agencies that provided reasonably large samples of individuals counseled both by telephone and in person. In Table 1, these were agencies A,C,D,G and H. For these clients, their counseling agency offered a choice of delivery channels. Agency brand name, educational philosophy and content would be the same regardless of the delivery channel choice made by the consumer.

Table 3 reports the results of a Probit analysis for clients of these five agencies. The probit model is specified to predict the probability that a client picks face-to-face delivery (with telephone delivery as the alternative). The table displays two columns of estimated coefficients: the first includes only variables from the credit report and the second column includes credit report variables plus three additional variables derived from the counseling interview, including counselor experience (in months). The estimated coefficients on the independent variables indicate that individuals with the highest delinquency scores (i.e., lowest risk) are less likely to seek face-to-face counseling. With regard to other credit bureau variables, individuals with more accounts with positive balances and larger

mortgage balances tend to choose face-to-face counseling, other things equal. Conversely, consumers with more bank cards and more unsecured debt tend to seek telephone counseling. Finally, counselors involved in face-to-face services in this sample tended to be more experienced.

### Delivery Methods and Outcomes

The impact of delivery channel was determined for three distinct client credit outcomes: bankruptcy incidence, and two general measures of creditworthiness in the form of a delinquency risk score and a bankruptcy risk score. The set of three outcomes is measured at two points in time – two years following the counseling and four years following the counseling.

Table 3: Determinants of Face-to-Face Counseling Channel; Alternative is Telephone (Probit Model)				
	Base specification with only bureau variables	Include additional variables obtained during counseling		
Bankruptcy risk score (in 100s)	-0.0047	-0.0052		
	(1.32)	(1.42)		
Bankruptcy score in bottom 10% of combined sample	0.0004	-0.0059		
	(0.03)	(0.44)		
Bankruptcy score in top 10% of combined sample	-0.0103	-0.0141		
	(0.60)	(0.80)		
Delinquency risk score (in 100s)	-0.0225***	-0.0139*		
	(2.93)	(1.77)		
Delinquency score in bottom 10% of combined sample	0.0256*	0.0182		
	(1.83)	(1.28)		
Delinquency score in top 10% of combined sample	0.0276*	0.0152		
	(1.85)	(1.00)		
Total number of trades with balance $> 0$	0.0073***	0.0054***		
	(4.92)	(3.55)		
Total balance, non-mortgage trades (in 10,000s)	-0.0006	0.0019		
	(0.55)	(1.62)		
Total balance, mortgages (in 10,000s)	0.0003	0.0013**		
	(0.64)	(2.55)		
Number of bankcard trades	-0.0055***	-0.0036***		
	(6.21)	(3.92)		
Proportion of bankcard trades with balance over 50% of limit	-0.0344**	-0.0095		
	(2.46)	(0.66)		
Number of non-inst trades over 50 % of limit	0.0031	0.0021		
	(1.48)	(0.94)		
Number of trades 30 or more days past due in last 18 mths	0.0004	-0.0004		
	(0.25)	(0.27)		
Number of currently past due balances	0.0018	0.0015		
	(0.67)	(0.55)		
Number of inquiries in last 6 months	0.0016	0.0014		
	(1.16)	(0.97)		
Highest retail credit limit (in 1,000s)	-0.0008	-0.0007		
	(0.44)	(0.38)		
Counseling Interview: Number of unsecured creditors		0.0037***		
		(4.24)		
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Counseling interview: Total unsecured debt in \$1,000		-0.0010***			
		(7.99)			
Log of counselor experience (in months)		0.2118***			
		(41.31)			
Number of Observations	25997	25997			
Analysis restricted to five agencies that offer significant counseling services by phone and in person and clients matched to credit bureau data two and four years later. Excluded from our analysis are individuals counseled using the internet. Not reported are variables indicating missing values for data obtained during the counseling session as well as agency-identifier variables. Only individuals who had no public record of bankruptcy filings in 2003 are included in the sample. Dummy variables indicating the agency were included.					
Coefficients indicate marginal effects; * significant at 10%; ** signi	ficant at 5%; *** signif	icant at 1%			

Probit models were estimated for the three credit outcomes using two versions of the sample. One sample included clients from all ten participating agencies, including those that specialize in one type of delivery or the other. This approach reflects that fact that most consumers have a meaningful choice of delivery options because they have two or more counseling agencies from which to choose. Consumer selection of an agency that specializes in a single delivery channel may well reveal a preference for that form of delivery. Recall that there are 3 agencies in the sample that offer predominantly telephone counseling, and 2 agencies that essentially offer only face-to-face counseling. However, while telephone counseling is available and advertised nearly everywhere in the U.S., not all communities have face-to-face counseling options locally or within a short driving distance. Consequently, we also estimated the outcome models on a subset of the full sample that included only the five agencies that offered clients a choice of delivery channel. The results of the restricted sample estimates are reported below, but estimates for the full sample were substantially similar.

Table 4 displays the results of Probit models for the restricted sample of 25,997 consumers. The first three columns display estimated coefficients for each of the credit outcomes measured four years after counseling. The three columns furthest to the right display the coefficients for the credit outcomes measured only two years after counseling. Both are displayed in the table because reforms to the federal bankruptcy law in 2005 dramatically affected bankruptcy filing incentives and filing volumes and this may have affected our credit outcome measures by 2007. However, the results from the estimates derived two years after counseling are substantially similar to those at a point four years after counseling.

The estimated models include explanatory variables that capture more than a dozen items from the client's credit report at the time of counseling in 2003 (including risk scores). Also included are variables that reflect information gathered during the counseling interview, including delivery channel, counselor experience and the counselor's recommendation, and whether a DMP was recommended and started.

Many of the variables are significant in the expected direction. For example, a higher client bankruptcy risk score in 2003 is associated with lower bankruptcy incidence during the years following counseling, as well as higher (better) risk scores both two and four years into the post-counseling period, other things equal. The number of revolving credit accounts (labeled "non-installment" in Table 4) with balances greater than 50% of the credit limit is positively associated with bankruptcy incidence and leads to lower credit scores in the years following counseling. A larger number of credit inquiries in the past 6 months (a sign of repeated applications for credit) produces a similar result. A larger number of accounts delinquent at the time of counseling increases the incidence of bankruptcy and reduces the level of the clients risk scores two and four years later.

Additional information on the financial situation of the consumer seeking counseling is likely imbedded in the counselor's outcome recommendation. Insights gained through the counseling interview presumably convey at least some of the client's private information about financial circumstances that is not otherwise observable through credit report data. Presumably, that information would influence the counselor's recommended plan of action.

To see if such information is important, Table 4 includes "evaluation" variables that indicate the recommendation of the counselor. The counselor can recommend a DMP, refer the client to other agencies for legal or other assistance, or suggest that the individual can self-manage the situation. Cases in the excluded recommendation category are those for which a recommendation was missing in the database, sometimes due to an incomplete session We also include two additional variables indicating whether a DMP was actually started. One variable identifies cases where a DMP was recommended and started, and the second variable identified cases in which a DMP was not recommended, but was started anyway (perhaps as a result of a change in the client's situation).

The counselor's recommendation does indeed convey information not otherwise observable through the credit report variables. Perhaps not surprisingly, individuals who are considered capable of self-management fare best in terms of a significantly lower incidence of a bankruptcy filing and higher risk scores (both bankruptcy and delinquency risk scores) in both 2005 and 2007. At the other end of the spectrum, clients who are referred for legal assistance (e.g., bankruptcy) have the highest incidence of bankruptcy within the next two years, and experience significantly lower risk scores two years later, compared to the rest of the sample. Interestingly, clients for whom the counselor recommends a DMP, and who actually start payments on a plan, have a significantly lower incidence of bankruptcy and higher risk scores both two and four years later.

As for the impact of the counseling delivery channel, note that among individuals who otherwise appear identical in terms of credit bureau variables (i.e., controlling for credit bureau characteristics) and counselor recommendations, face-to-face clients have no statistically significant difference in delinquency risk scores four years after counseling, as compared to telephone counseling clients. In terms of bankruptcy incidence and subsequent bankruptcy risk, inperson clients fare worse than those who received telephone counseling (significantly higher bankruptcy incidence and lower bankruptcy risk score). Additional specifications that also included geographic controls (namely, variables indicating the state of residence of the individual) did not alter these findings.

### **Discussion and Conclusions**

Several caveats to these findings should be noted. First and foremost, because the sample of participating agencies was not selected to be representative of industry-wide practices, the results cannot be considered representative of the typical experience of counseled consumers nationwide. Instead, they reflect what is obtainable from a group of agencies that emphasize client education and identification of the underlying cause of financial problems. The fact that telephone counseling generated outcomes no worse – and at some margins better – than face-to-face delivery of counseling services suggests that, when done well, the two delivery channels can be equally effective.

The impact of delivery channel was determined on three separate indicators of post-counseling outcomes for consumers, measured up to four years after the initial counseling visit. Two of these indicators (a commercially available bankruptcy risk score product; a commercially available new account delinquency risk score product) represent general measures of creditworthiness. In addition, the model examines the actual incidence of bankruptcy among the sampled clients during the four year period following counseling. While these indicators offer objective evidence on the consumer's credit experience from a variety of angles, other measures of the impact of the counseling experience would help to provide a more comprehensive picture. In particular, survey evidence on consumer attitudes and perceived financial stress, pre and post-counseling, would augment the objective measures of consumer credit performance and provide a more complete picture of counseling's impact.

Finally, there is some evidence that consumers' credit usage patterns and resulting risk profile is related to their choice of counseling delivery channel. The analysis in this report accounted for these differences to the extent allowed by the available data, mostly credit usage attributes. However, a more detail assessment of borrowers at the time of the initial counseling, either during the interview itself or through supplemental survey work, could provide more precise controls for this self-selection.

The results on the role of Debt Management Plans are particularly intriguing, but self-selection may be partly responsible. Clients who start DMPs outperform all other counseling clients on all of our outcome measures. Admittedly, clients who were recommended for DMPs are in better financial shape than clients who do not qualify. But, the evidence also indicates that between two borrowers who are recommended for a DMP (i.e., borrowers for whom a DMP is both a workable option and the best option), the borrower who actually starts payments in a DMP fares significantly better on all outcome measures at two-year and four-year milestones after counseling. Perhaps there is some residual self-selection effect driving this result (e.g., borrowers who make a commitment to start a

DMP are more motivated to repay than borrowers that do not). Alternatively, perhaps the DMP experience itself (e.g., budgeting to make regular DMP payments; continued interaction with and reinforcement from the counseling agency) generates the improvement in the outcome indicators.

Given the significantly improved credit profiles for clients who do start DMPs, this phenomenon deserves closer study. Moreover, if improvement in client credit profiles increases with the time a client stays on a DMP (not examined in this paper), a more careful assessment of the factors that contribute to a successful DMP, including agency procedures, seems warranted. A more detailed client profile at the outset would support analysis of whether some clients would benefit more from a particular delivery channel, as well as the factors that make a DMP more appropriate treatment for some clients as opposed to others. Both types of analysis would facilitate agency efforts to steer clients toward the most effective treatment.

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Table 4: Impact of Counseling Delivery Channel (Telephone versus In-Person) on Client Credit Outcomes, Two and Four Years After Counseling							
	Effect of	Effect of	Effected	Effect or	Effect of	Effect of	
	Effect on likelihood of bankruptcy filing over next four years (Probit model)	Effect on Bureau bankruptcy risk score four years later (OLS model)	Effect on Bureau delinquency risk score four years later (OLS model)	Effect on likelihood of bankruptcy filing over next two years (Probit	Effect on Bureau bankruptcy risk score two years later (OLS model)	Effect on Bureau delinquency risk score two years later (OLS model)	
				mouel)			
Bankruptcy risk score (in 100s)	-0.0193***	0.2457***	0.0397***	-0.0226***	0.3674***	0.0447***	
	(6.44)	(17.82)	(7.16)	(11.27)	(41.26)	(12.28)	
Bankruptcy score in bottom 10% of combined sample	0.0060	-0.0538	0.0387*	-0.0149**	-0.1221***	0.0146	
	(0.57)	(1.05)	(1.88)	(2.31)	(3.81)	(1.11)	
Bankruptcy score in top 10% of combined sample	-0.0382***	0.0459	0.0291	-0.1336**	1.4094***	0.3772***	
	(2.69)	(0.69)	(1.09)	(2.42)	(9.30)	(6.09)	
Delinquency risk score (in 100s)	0.0381***	0.5828***	0.5667***	0.0364***	0.4834***	0.6060***	
	(5.96)	(19.54)	(47.24)	(7.56)	(21.22)	(65.13)	
Delinquency score in bottom 10% of combined sample	0.0190	0.0308	0.0186	0.0081	-0.0104	-0.0115	
	(1.59)	(0.57)	(0.85)	(0.89)	(0.25)	(0.67)	
Delinquency score in top 10% of combined sample	-0.0156	0.0811	-0.0257	-0.1226***	0.5663***	0.2342***	
	(1.32)	(1.42)	(1.12)	(3.16)	(3.85)	(3.89)	
Total number of trades with balance $> 0$	0.0038***	0.0078	0.0035	0.0034***	-0.0035	0.0017	
	(3.19)	(1.35)	(1.48)	(3.41)	(0.70)	(0.82)	
Total balance, non-mortgage trades (in 10,000s)	0.0068***	0.0068	0.0115***	0.0056***	0.0029	0.0118***	
	(7.77)	(1.55)	(6.51)	(7.85)	(0.78)	(7.65)	
Total balance, mortgages (in 10,000s)	-0.0008**	0.0082***	0.0024***	-0.0004	0.0061***	0.0038***	
	(2.03)	(4.14)	(2.99)	(1.15)	(3.54)	(5.40)	
Number of bankcard trades	-0.0004	-0.0002	0.0197***	-0.0011*	-0.0100***	0.0172***	
	(0.50)	(0.05)	(14.29)	(1.82)	(3.34)	(14.07)	
Proportion of bankcard trades with balance over 50% of limit	0.0362***	-0.2118***	0.0517**	0.0214**	-0.2089***	0.0204	
	(3.06)	(3.90)	(2.37)	(2.13)	(4.45)	(1.06)	
Number of non-inst trades over 50 % of limit	0.0057***	-0.1067***	-0.0217***	0.0041***	-0.0712***	-0.0215***	
	(3.35)	(12.75)	(6.43)	(2.91)	(9.87)	(7.28)	
Number of trades 30 or more days past due in last 18 mths	-0.0041***	0.0360***	0.0108***	-0.0024**	0.0264***	0.0050**	
	(3.30)	(5.98)	(4.47)	(2.23)	(5.09)	(2.35)	

Number of currently past due balances	0.0108***	-0.0297***	-0.0111***	0.0083***	-0.0049	-0.0170***	
	(5.17)	(2.89)	(2.68)	(4.74)	(0.55)	(4.69)	
Number of inquiries in last 6 months	0.0105***	-0.0322***	-0.0082***	0.0059***	-0.0126***	-0.0091***	
	(9.99)	(6.10)	(3.85)	(6.77)	(2.77)	(4.88)	
Highest retail credit limit (in 1,000s)	0.0009	0.0238***	0.0176***	0.0009	0.0080	0.0141***	
	(0.62)	(3.43)	(6.30)	(0.73)	(1.33)	(5.77)	
Counseling in person (alternative is telephone)	0.0229***	-0.0687**	-0.0071	0.0227***	-0.0425*	0.0012	
	(3.64)	(2.33)	(0.60)	(4.24)	(1.67)	(0.12)	
Counseling Interview: Number of unsecured creditors	0.0052***	-0.0267***	-0.0078***	0.0040***	-0.0229***	-0.0103***	
	(7.64)	(7.96)	(5.75)	(7.33)	(8.06)	(8.84)	
Counseling interview: Total unsecured debt in \$1,000	0.0002**	0.0019***	0.0013***	0.0002**	0.0001	0.0007***	
	(2.40)	(4.03)	(7.07)	(2.07)	(0.15)	(4.15)	
Log of counselor experience (in months)	-0.0011	-0.0062	-0.0116*	-0.0027	0.0047	-0.0067	
	(0.33)	(0.40)	(1.88)	(0.95)	(0.36)	(1.23)	
Evaluation: Self-manage/Client can handle	-0.0886***	0.2076**	0.0768**	-0.0669***	0.3375***	0.1177***	
	(5.15)	(2.39)	(2.20)	(4.67)	(4.52)	(3.85)	
Evaluation: DMP recommended by counselor	-0.0042	-0.2308***	-0.0889***	-0.0079	-0.1744***	-0.0676**	
	(0.26)	(3.06)	(2.93)	(0.58)	(2.69)	(2.55)	
DMP payments started with recommendation	-0.0978***	0.3808***	0.1491***	-0.0778***	0.2041***	0.1615***	
	(14.59)	(11.51)	(11.20)	(13.68)	(7.12)	(13.79)	
DMP payments started without recommendation	-0.0904***	0.1682*	0.0326	-0.0739***	0.0585	0.0442	
	(5.53)	(1.94)	(0.93)	(5.57)	(0.78)	(1.44)	
Evaluation: Financial counseling only	0.0060	-0.2481***	-0.0635*	0.0139	-0.1557**	-0.0452	
	(0.33)	(2.96)	(1.88)	(0.91)	(2.17)	(1.54)	
Evaluation: Referral to other agencies	0.0372**	-0.2236***	-0.0548*	0.0327**	-0.1483**	-0.0384	
	(2.07)	(2.73)	(1.66)	(2.13)	(2.10)	(1.33)	
Evaluation: Referral to legal assistance/advice	0.1950***	-0.7725***	-0.1171***	0.1752***	-0.6285***	-0.1499***	
	(9.08)	(8.58)	(3.23)	(9.16)	(8.12)	(4.74)	
Number of Observations	25997	25997	25997	25997	25997	25997	
Analysis restricted to five agencies that offer significant counseling services by phone and in person and clients matched to credit bureau data two and four years							

Analysis restricted to five agencies that offer significant counseling services by phone and in person and clients matched to credit bureau data two and four years later. We exclude from our analysis individuals counseled using the internet. Control variables for the individual agencies as well as variables indicating missing values for data obtained during the counseling session are included in the analysis but not reported.

Coefficients for Probit indicate marginal effects; \* significant at 10%; \*\* significant at 5%; \*\*\* significant at 1%

### **Future 4-H Millionaires Club**

Celia R. Hayhoe, Virginia Polytechnic and State University<sup>1</sup>, Robert H. Flashman, University of Kentucky, Erica Tobe, Michigan State University, Sheila Urban Smith, Michigan State University, F. Neal Smith, University of Tennessee, and Dena K. Wise, University of Tennessee

Key Words: youth, teens, investing, financial education

#### **Target Audience**

The target audience for the presentation is anyone who works with 16-20 year olds on investing or who trains people who work with that age group. The Future 4-H Millionaires Club is geared toward youth ages 16-18.

### **Objective/Purpose**

The objective of this program is to educate teenagers about basic investment principles, as well as to provide practical, hands-on experience through participation in virtual investment clubs. The Future 4-H Millionaires Club can be used by 4-H clubs and faith-based organizations, as well as in the educational system. The program is designed to be used in conjunction with the Future 4-H Millionaires Club Web site found at <u>http://www.ca.uky.edu/fcs</u>. Each unit offers a session plan, curriculum, activities, and quizzes centered on key investment themes that the leader/teacher can draw upon, and is designed to last approximately 45 minutes. Units contain supplemental activities that can be presented when time allows or additional sessions can be arranged. A recommended outline is included for participants that have no previous financial education background. For participants that have participated in the NEFE High School Financial Planning Program<sup>®</sup> or other financial education programs, leaders may choose to begin the curriculum at a different point in the outline. Surveying participants at the outset will indicate the appropriate starting point based on members' knowledge.

### Description

Although designed for senior (high school age) 4-H clubs, this new interactive Web site and curriculum can be used by anyone who works with high school students and young adults on investing. The site is a basic, easy-reading educational program on teaching youth about investing as well as developing self-confidence to invest. The goal is to present less information better; encourage participants to think about, discuss, apply, and generalize the core content; and help them to make the information their own.

In an effort to demonstrate the principles taught in this course and to show how investment goals are interrelated with other aspects of life, we have created five case studies: 1) Darryl, the future plumber, who takes a job as an apprentice; 2) Alex, the future nurse, who takes a job as a nurse's aide and plans to attend community college; 3) Matt, the future math teacher, who will attend a four-year university; 4) Alicia, who begins working in a factory and ends up in the military; and 5) Maria, the first person in her family to go to college, earns a scholarship to the state university and plans to go on to medical school. All five are recent high school graduates. Each has chosen a different path – no college, community college, a four-year degree, the military, and medical school. In addition, each case study has different goals to achieve. The case studies will be integrated into the lesson plans to illustrate how investing choices apply to achievement of life goals and will be useful in instigating discussions about the participants' personal choices and goals.

- Unit 1 The Pay-Off Why Invest
- Unit 2 Investment Basics
- Unit 3 Investment Club Game
- Unit 4 Risk
- Unit 5 Investment Accounts
- Unit 6 Investor Protection
- Unit 7 Putting it All Together

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### Real Money™: A "Tabletop" Financial Simulation for Young Adults

Barbara O'Neill<sup>1</sup>, Rutgers University

Simulations have been used successfully for decades to teach personal finance concepts. With realistic information about hypothetical individuals or households, including salaries, educational attainment, marital status, and the cost of household expenses, they provide an opportunity for students to learn how to prioritize spending on needs versus wants and practice financial management skills such as check-writing and budgeting. In addition, simulations are interactive and require teamwork, which makes learning about personal finance fun. Educators serve as facilitators of the learning process (e.g., posing debriefing questions) rather than in the traditional lecture presentation role.

One frequently used simulation is the Reform Organization of Welfare (ROWEL) poverty simulation, where participants role-play the lives of low-income families and experience their financial challenges. See <a href="http://www.uwex.edu/ces/flp/food/povertysim/index.cfm">http://www.uwex.edu/ces/flp/food/povertysim/index.cfm</a> for details. Another frequently used simulation is *The Stock Market Game*<sup>TM</sup>, where participants "invest" a virtual cash account. There are also a number of financial education simulations where participants walk around to various "storefronts" (e.g., banker, insurance agent, and utility company) to "purchase" goods and services. Many of these simulations are very resource intensive, however, and require a large meeting room and dozens of volunteers to staff the storefronts. In addition, because these simulations require so many resources to implement, they are often difficult for teachers to replicate in the classroom following a training session, due to logistical constraints.

This workshop will describe *Real Money*<sup>TM</sup>... A Financial Simulation for Young Adults, which is a low-maintenance "tabletop" financial simulation. Instead of walking around among various stations, students are assigned to one of five *Real Money*<sup>TM</sup> scenarios and work in pairs or small groups to analyze a case and develop a spending plan for their case study characters at three different ages.

### **Objective/Purpose**

- 1. Participants will learn about an available tabletop simulation product for youth financial education.
- 2. Participants will learn about the unique financial challenges of young adults.
- 3. Participants will learn about the common financial errors of young adults.

### Description

*Real Money*<sup>TM</sup>... A Financial Simulation for Young Adults program materials are contained in nine PDF files available on CD-ROMs. AFCPE workshop participants will receive a free copy of the program. The CD-ROM files include a teacher's guide, a colorful game board, student and teacher evaluations, a resource list, and descriptions of the five scenarios. The simulation provides scenarios about individuals or couples at three ages - 25, 30, and 35- and teaches concepts such as the relative cost of household expenses and the importance of prioritizing spending on needs versus wants. Students also learn the benefits of insurance to cover large financial risks, the importance of saving money for emergencies and future goals, and the economic value of a post-secondary education.

A variety of ethnic backgrounds and income and educational levels are featured in the five case scenarios. *Real*  $Money^{TM}$  also includes life events experienced by many young adults including National Guard service, marriage, the birth of children, divorce, the lack of health insurance, the purchase of life insurance, student loan payments, high credit card debt, starting a small business, and buying a home. Included in the teachers guide are debriefing questions and answers for each scenario. The debriefing helps students discuss what they have learned and transfer their learning to the next round of play (e.g., from age 25 to age 30). Following are some examples of debriefing questions in the simulation: *How does direct deposit help Chase and Caitlin save?*, *What did Brent learn from his skiing accident?*, *What role does education play in financial security?*, *What decisions helped Myra be in a position to start her business?*, and *How did money possibly affect Allison and Daniel's marriage and decision to divorce?* 

Keys to a successful financial education simulation are realistic scenarios (e.g., life events, income, and expenses), inexpensive and easy to replicate curriculum materials for educators, clear instructions for participants, and a thorough debriefing that applies personal finance concepts to case study scenarios. Initial training sessions with youth educators in 2007-2008 indicated that they appreciated the "low-maintenance" features of *Real Money*<sup>TM</sup> and planned to use it with their students as a capstone learning experience in a personal finance class or class segment within other subjects (e.g., math and social studies) or with youth programs (e.g., 4-H and FCCLA clubs).

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# Creating and Facilitating Culturally Sensitive Family Finance Education Programs for Members of the Latino Community

Teresa Hunsaker, B.S., CFCS, Linda Skogrand, Ph.D, Adrie J. Roberts<sup>1</sup>, M.S., CFCS, Amanda Horrocks, Jay Bladen, and Candi Merritt, B.S., Utah State University Extension

Key Words: Latino finance, financial education, family finance

### Target Audience

The target audience consists of adult, Spanish-speaking members of the Latino community in Cache County. Workshops are taught in Spanish, however, bi-lingual families have access to both the English and Spanish translations via curriculum written in both English and Spanish.

### **Objective/Purpose**

With the steadily increasing population of Spanish-speaking Latinos in the United States, we understand the urgent need to develop a culturally consistent financial program that enables this population to understand the United States banking system and how to manage personal finances and investing. "Las Bases De Le Finanzas Familiares e Inversiones" is a successful Latino Finance program offered through Utah State University Extension. Our experience has taught us that working with this unique culture requires a commitment to making educational programming consistent with the values and the beliefs of members of the Latino Community. Because many in the Latino are unfamiliar with the banking system, trust issues and misunderstandings about banking are common. Our experience in teaching family finance to members of the Latino Community in Utah compelled us to share with others what we believe is a formula for success in reaching this audience. Marketing strategies, curriculum development, advisory council formation, identification of a "cultural guide", understanding of the Latino culture, and networking with community leaders within the Latino community are crucial in program planning and facilitation. In our experience, we have learned that marketing our program to members of the Latino community requires much more than simply translating English into Spanish.

### **Description of Content and Method**

A series of four, two-hour workshops were held at a local elementary school. Dinner was provided to participants and their children. Childcare was also provided. Local influential members of the Latino community in Cache Valley were asked to present on a different financial topics according to their specific expertise. Many different types of teaching methods were used including audio, visual, and kinesthetic.

This workshop focuses on assisting participants with understanding the culture of the Latino population in order to facilitate successful finance programs. Ideas and suggestions in program planning as well as curriculum development will be shared.

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### Engaging, Ready-to-Deliver Workshops for a Variety of Audiences

Nicole Chinadle<sup>1</sup>, University of Arizona

Key Words: middle school, high school, curriculum, activity based, workshop

### **Target Audience and Time Required**

The target audience is anyone who provides financial literacy education for our nation's youth and young adults. Workshop guides have been developed to present the materials in 20-45 minute sessions. Multi-day workshops will also be discussed.

### **Objective/Purpose**

The purpose of the presentation will be to explain the work being completed by the University of Arizona's Take Charge America Institute's outreach programs, primarily the Family Economics & Financial Education (FEFE) Project and Credit-Wise Cats (CWC). FEFE provides educators with free curriculum materials and the educational background to effectively teach family finance. CWC focuses on providing peer education at college and high school levels via activity-based workshops.

### **Description of Content and Method**

University of Arizona's Take Charge America Institute's mission is to provide research-based outreach programs to improve personal financial education and ultimately change consumer behavior. Outreach programs include FEFE, CWC, and the Jr. Duel (a case study competition for students) and impact over 500,000 individuals each year.

The FEFE Project began in 2001, using educator input to design a quality, ready-to-teach curriculum and training program. The FEFE curriculum model focuses on materials designed based on multiple intelligences theory and active learning. Each lesson is aligned to national standards and includes background information, implementation methods, activities, handouts, assessment tools, and is available free of charge <u>www.fefe.arizona.edu</u>. Over 100 ready-to-teach lesson plans are designed for middle, high school, and college students.

Although high school students would ideally take a required semester course for graduation, the majority of teenagers and young adults do not have this opportunity. Rather, financial education is taught in a workshop format by guest speakers in a school setting, in youth organizations such as 4-H or the Boys and Girls Club, or peer education workshops conducted on college campuses. Among the over 13,500 FEFE Web site users, the audience and delivery format in which the FEFE curriculum is taught is increasingly diverse. Instead of being delivered only by classroom teachers, the curriculum is modified by educators to meet individual workshop needs. Workshop guides modifying the current multi-day lesson plans into 30-45 minute interactive sessions were developed.

The 19 workshop guides are uniquely designed to include proven educational theory to ensure they are effective with young minds. They are available at both the introductory and advanced levels and proven to be effective for all ages. Delivery techniques include fast-paced facilitation with scenario-based learning. Each workshop begins with an anticipatory set to capture participant interest. No more than 20 minutes of recommended instruction occurs without a new activity to keep participants actively engaged, meet the needs of multiple learning styles, and reflect upon content. Each workshop guide also includes a note-taking guide to assist individuals, identifying what the most important information is. Each 45 minute workshop is ready-to-deliver with several activities, a PowerPoint, and interactive information sheets. Participants are provided with 1-3 page colorful and interactive information sheets which describe the workshop's content. The information sheets are often recommended as take-home documents for further learning and to involve adults in a teenager's learning process.

All workshop guides are designed independently of one another. Therefore, an educator may teach a 10-week course, a unit, or a single workshop. The effectiveness of the workshops may be evaluated with a final applied scenario-based assessment. In addition, multiple choice exams are available for each workshop. In the past academic year, workshops were taught by the CWC to over 1,800 individuals. Thirty-five percent of workshop attendees were in high school and 58% were college students, almost half of whom have at least one credit card. Pre and post-tests conducted at the workshops indicate a 35% average increase in knowledge indicating the activity based model and training program to be highly effective. All information is free of charge and strictly educational in nature with no products being sold.

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### **Financial Smart Start for Newlyweds**

Laura Connerly<sup>1</sup> and James Marshall University of Arkansas Division of Agriculture Cooperative Extension Service

Key Words: finance, marriage

### **Target Audience**

The Financial Smart Start for Newlyweds program targets engaged and newly married couples.

### **Objective/Purpose**

Research shows that financial management is an important component of marital satisfaction (Kerkmann, et.al; 2000). The aim of the Financial Smart Start for Newlyweds program is to give couples the necessary skills for compassionate communication and wise financial management in an effort to increase their marital satisfaction and financial security.

### Description

Financial Smart Start for Newlyweds is an educational series designed to help couples learn important financial management skills. Engaged and newly married couples are provided with fact sheets, newsletters, and other educational materials that feature activities and information designed to help them gain knowledge and skills. The purpose of the program is to increase marital satisfaction and financial security.

The fact sheet series features activities for couples to practice communication, goal setting, budget design, and other important tools. Fact sheet titles include: (1) *Understanding and Sharing Your Financial History*; (2) *Debt in Marriage*; (3) *Realistic Expectations about Expenses and Income*; (4) *Creating and Sticking to a Budget*; (5) *Credit and Overspending*; and (6) *Money, Manipulation, and Power*.

Newlyweds who enroll in the program also receive the monthly newsletters during their first year of marriage. The newsletters contain the latest information about saving, spending, record keeping, credit, insurance, and other financial topics.

The Financial Smart Start for Newlyweds kit includes the fact sheet series, a copy of The Marriage Garden curriculum (principles for a healthy relationship), a household account record book, and two individual expense record books (for tracking cash and debit spending). The "kit" is wrapped as a wedding gift. Program providers may also include promotional items such as pens, calculators, etc. A card attached to each kit invites couples to enroll in the Financial Smart Start program and receive free newsletters via e-mail or text message. The online enrollment software also provides the vehicle for collection of program evaluation data. Kits may be distributed through a variety of methods including county clerk's offices upon registration for a marriage license, during premarital financial management counseling sessions, or at bridal fairs. Additional support materials include an exhibit and a webpage. The exhibit can be used at bridal fairs, bridal shops, or tuxedo stores. The webpage contains financial management information and resources including video and audio podcasts.

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### **Relationship Education: Money Connections**

Bryce Jorgensen<sup>1</sup> and Celia Hayhoe, Ph.D., Virginia Tech

Key Words: financial education, financial management, curriculum, experiential learning

### **Target Audience**

The target audiences for the training are counselors, extension agents, and educators. Although the curriculum is focused on low-income, at-risk couples, the tools, techniques, and worksheets will work for anyone in need of financial counseling or education.

### **Objectives/Purpose**

We will teach and actively involve our audience in ways that engage and empower financial education participants. Specifically, we will discuss, model, and involve our audience in experiential learning activities. We will demonstrate a variety of ways to engage financial education participants as active learners. Learn how to help your participants leave your trainings empowered, motivated, and believing in their own abilities to improve their finances and their financial relationships.

#### Description

The curriculum is a flexible, outcome based couple relationship program for low-income, at-risk couples built around risk and resilience factors. It is designed to address some of the current challenges in marriage education. The financial education module is a key component of this curriculum that can be utilized independently to help individuals, couples, or families better understand and work together on their finances.

While there are a plethora of relationship and marriage education programs available to couples, there are also numerous challenges and barriers to program effectiveness that have yet to be successfully addressed. In a review of marriage education programs, Larson (2004) included suggestions and challenges for programs. They related to the identification of risk and resiliency factors related to marital quality (Halford, 2004), unique needs of and how to reach at-risk couples and other diverse groups (Halford, 2004), program evaluation and evidence of effectiveness (Adler-Baeder, Higginbotham, & Lamke, 2004; Jakubowski, Milne, Brunner, & Miller, 2004), and professional discussion related to marriage education programs (Doherty & Anderson, 2004).

Our curriculum is supported through research on best practices for increasing relationship satisfaction and strength (Halford, Markman, Kline, & Stanley, 2003). Important issues and best practices for couple relationship programs have been identified. One such issue includes couples and individuals who face economic disadvantages. Our workshop will discuss the module that specifically addresses the issue of financial management. The outline of the module includes: Money personality quiz, money history, money myths, money pots, cash logs, family financial goals, spending plans, and financial control sheets. We will discuss tools, techniques, and worksheets that can be used in counseling or educational settings. Information on the full financial management module as well as the other modules in the curriculum can be accessed at www.withlove.clahs.vt.edu.

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### How to Make Special Emphasis "Weeks" Work

Bobbie Shaffett, Susan Cosgrove, Grenell Rogers, Charlestien Harris, Teresa Lyle, Mary Linda Moore, Shretta Varnado, Mississippi State University Extension Service

### Key words

Consumer, Advocacy, National Consumer Protection Week, America Saves Week

### **Target audience**

Extension agents, community agency program coordinators, public agencies

**Objectives/Purpose** Practitioners attending this session:

- 1. Identified special annual emphases weeks or months in which they participate or would like to participate...by months of the year.
- 2. Became familiar with successful partnerships and programs of presenters, for example: National Consumer Protection Week and America Saves Week.
- 3. Discussed strategies that work, sharing success stories about successful partnerships and programs.
- 4. Gained understanding of challenges faced by presenters and participants in coordinating programs.
- 5. Brainstormed ideas for overcoming challenges to make special emphases successful and sustainable, creating a list of recommendations or tips for success.

### Description

National emphases, such as National Consumer Protection Week and America Saves Week, provide opportunities for consumer educators and advocates to form partnerships for sharing resources to reach the public. Although themes and ideas for such emphases may be developed nationally, implementation requires detailed planning and developing relationships at the state and local levels to achieve success.

*National Consumer Protection Week.* The mission of National Consumer Protection Week (NCPW) is to help people learn about their consumer rights and empower them to protect themselves from fraud and abuse in the marketplace. The national steering committee for National Consumer Protection Week includes: AARP, Better Business Bureau, Consumer Federation of America, Federal Citizen Information Center, FDIC, FTC, Federal Communications Commission, National Association of Attorneys General, National Association of Consumer Agency Administrators, Office of the Comptroller of the Currency, U.S. Postal Inspection Service, and U.S. Postal Service. Each year the twelve-member steering committee decides upon a general theme that has enough flexibility to encourage broad participation. At the national level, a website is created with promotional graphics, ideas for implementation, and materials to order for local dissemination. The national coordinator for the event, Alvaro Puig, Consumer Education Specialist at the Federal Trade Commission, may be contacted by phone at (202) 326-3194 or by email: apuig@ftc.gov. In 2008 and 2009, the first full week of March has been designated National Consumer Protection Week.

*America Saves Week.* The third annual America Saves Week is scheduled for February 22-March 1, 2009. Activities are coordinated by the Consumer Federation of America's America Saves campaign and by the American Savings Education Council, who work with a large coalition, including the Cooperative Extension Service, World at Work, and the Department of Defense, to promote the savings message and foster better savings behavior. Visit the AmericaSaves.org website to learn more about how to become involved.

*Mississippi Consumer Education Partnership.* In 2005, an informal group of state agencies and organizations was formed to inform and protect Mississippi consumers and to sponsor Mississippi Consumer Education Month in February of each year. Meetings are held quarterly by interactive video-conferencing technology which is available in every Mississippi State University Extension Service County Office. One face-to-face strategic planning session is held each summer. Members include: MSU Extension Service Family Resource Management Area Agents, the Better Business Bureau, Consumer Credit Counseling Service, Banks, State Credit Union Association, IRS, FDIC, AARP and representatives of state offices of the Attorney General, Secretary of State, State Treasurer, Department of Energy, Department of Human Services, and Council on Aging.

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### You Know Who You Are, Who Else Does Too? Identity Theft, Fraud, and Internet Safety Education for Families

Rebecca J. Travnichek<sup>1</sup>, University of Missouri Extension

Key Words: identity theft, consumer fraud, Internet safety

### **Target Audience**

Target audience for this educational workshop series is diverse. Families in different lifecycle stages will learn specific information helpful at that point in their lives and for the future. Persons of any age will find information on identity theft to be useful in protecting themselves against becoming a future victim of this type of crime. Families with tweens and teens will be especially interested in learning how to protect themselves and their children on the Internet. Fraud encompasses a vast array of specific issues that tend to target selected segments of the population, mainly the elderly.

### **Objective/Purpose**

The objective/purpose of the workshop series is to provide educational information on three (3) pertinent safety and security issues to families. The objective/purpose of the Practitioner's Forum is to share the educational program with colleagues around the world.

### Description

Identity theft occurs when someone uses your personal information, such as your name, Social Security number (SSN), credit card number or other identifying information, without your permission to commit fraud or other crimes. Fraud occurs when someone lies or misrepresents information about a product or service they are attempting to encourage you to purchase. Internet safety is of utmost importance with our children spending more and more of their time on the web. Stealing your identity can occur in a variety of ways. The safety and security of families is of utmost importance.

According to the Federal Trade Commission (FTC), identity theft is the fastest growing white collar crime in the United States. A recent FTC survey found that an estimated 27 million Americans have become victims of identity theft in the past five years--ten million thefts in the past year alone. The survey also found that in the United States an identity is stolen every 22 seconds.

Fraud is prevalent in many different venues, it is almost impossible for educators to keep up-to-date with the newest frauds and scams. Use of the Internet has become a prime source for obtaining information for identity theft, a method for committing fraud and encouraging scams, and threatens the safety of all of us in given situations.

Educational information on identity theft, fraud, and Internet safety is provided through a series of three (3) twohour workshops. Each workshop utilizes a variety of teaching methods, including Microsoft PowerPoint presentations with speaker notes (PPT slides can be transformed into overheads), video clips, hands-on activities, worksheets/handouts, publications, evaluations, and a resource list.

Practitioner's Forum attendees will have the opportunity to act as learners attending short simulations of the three workshops in order to experience the teaching methods, utilize the hands-on activities, and view the materials used. Each participant will leave the session with a list of resources to be used to help families learn to be safe and secure.

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### Inheritance Receipt and Retirement Savings: An Investigation of the Permanent Income Hypothesis

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### Abstract

The present study analyzes the impact of inheritance receipt on retirement savings. Using data from the 2004 Survey of Consumer Finances, the study finds that savings in targeted retirement accounts like IRA or Keogh plans are not affected by receipt of inheritance in the short run. Employee contribution to defined contribution pension plan is also unaffected by inheritance receipt. Furthermore, expectation to receive inheritance in future does not have any impact on retirement savings. The empirical findings of the study provide support for the permanent income hypothesis.

Key Words: inheritance, retirement savings, permanent income hypothesis.

### Introduction

The present study is an attempt to examine the impact of inheritance receipt on retirement savings by the US households. The permanent-income theory of consumption (Friedman, 1957) posits that consumers are forward looking and their consumption-saving decisions are not related to current income, but to a longer-term estimate of income, which is known as the permanent income. A key implication of this permanent income hypothesis (PIH) is that if income rises, the consumer has to decide whether the change in income is permanent or is merely transitory. If addition to the current income is only temporary, it will have no effect on consumption as well as saving. Since receipt of inheritance is only a transitory addition to income, according to the PIH, it is not likely to affect retirement saving at least in the short run. Empirical studies (e.g. Brown and Weisbenner, 2002; Joulfaian, 2006 and Weil, 1993), however, have found an inverse association between inheritance receipt and household savings. In this paper, the permanent income hypothesis has been tested against what have been found in empirical studies using data from the 2004 Survey of Consumer Finances (SCF).

Analyzing the impact of inheritance receipt is important because intergenerational transfer can be a major source of wealth accumulation for the recipient households. The study by Brown and Weisbenner (2002) has shown that on average, intergenerational transfer wealth accounts for half of the current net worth of the recipient households; and for lower wealth households (wealth less than \$75,000), transfer wealth exceeds current wealth. Receipt of inheritance can affect behavioral responses of the agents. When inheritances are received, a typical household may respond by changing consumption, saving and labor supply; while an expectation to receive inheritances in future may affect consumption, saving and labor supply decisions from the very beginning of the economic life of the recipient (Menchik & Jianakoplos, 1998). Understanding such behavioral responses is very important although the effects of inheritances on the recipient's behavior have been the subjects of very little empirical investigation (Joulfaian, 2006).

Analyzing the factors affecting retirement saving is also important because bulk of national capital accumulation comes from life cycle saving, that is, saving to finance retirement. Retirement saving is particularly important in an aging population like the USA. Mitchell and Moore (1998) have shown that Americans do a very poor job in preparing for retirement and in order to retire comfortably, they must engage in substantial saving. The study by Poterba, Venti and Wise (1996) has shown that a large fraction of the US households reach retirement age without adequate preparation: almost 20% of nearing retirement families (with heads 55 to 64 years) have no financial asset at all; and other than social security, pension benefits, and illiquid housing wealth, the typical family have very limited resources to meet unforeseen crises after retirement. In an aging population with a large number of families without adequate preparation for retirement, analysis of the factors explaining retirement saving decisions is crucial for both policy makers and academics.

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Investigation of the relationship between inheritance receipt and retirement savings is interesting because both intergenerational transfer wealth and lifecycle saving have implications for capital accumulation. The debate on the relative importance of intergenerational transfer and life-cycle saving on wealth accumulation is an old one. According to the life-cycle theory (Ando & Modigliani, 1963), life-cycle saving is the most important source of wealth accumulation. But the accounting exercises by Kotlikoff and Summers (1981) showed that life-cycle savings only accounted for a negligible part while intergenerational transfer accounted for most of the US capital accumulation. Subsequently, Modigliani (1988) came up with his own calculation and showed that life-cycle saving was the primary source of capital accumulation in the USA. In a more recent study Brown and Weisbenner (2002) have showed that almost 75% of the household net worth came from life cycle saving. Thus, saving to finance retirement has a much larger role in capital accumulation than was found by Kotlikoff and Summers (1981). Now, if it is found that receipt of inheritance depresses retirement savings, as is found in some of the previous studies, transfer wealth would have an adverse impact on capital accumulation if the findings by Modigliani (1988) were true. If on the other hand, it is found that inheritance receipt encourages retirement saving, intergenerational transfer would increase capital accumulation regardless of the relative importance of saving and transfer wealth in capital accumulation.

In the present study, the relationship between inheritance receipt and retirement saving has been examined using data from the 2004 SCF. We begin by providing descriptive statistics comparing those who received inheritances with those who did not, and those who expect to receive inheritance in future with those who do not. Then, the association between inheritance receipt and retirement saving has been investigated. It has been found that receipt of inheritances has only trivial impacts on retirement savings. In order to better understand the impact of transfer wealth on retirement preparation, the relationship between inheritance receipt and household's contribution in defined contribution pension plans has been tested. This relationship was also found to be insignificant. Finally, the effect of expected inheritance on retirement saving was tested. In every specification, insignificant association was found. Overall, the empirical findings of this paper show trivial effects of transfer wealth on retirement saving in the short run, confirming the arguments of permanent income hypothesis.

### **Literature Review**

A few studies have been undertaken to analyze the impact of inheritances on saving behavior of the US population. Examples include Brown and Weisbenner (2002), Joulfaian (2006) and Weil (1993). Using the 1998 Survey of Consumer Finances, Brown and Weisbenner (2002) showed that receipt of inheritances crowded out life-cycle saving slightly less than dollar-for-dollar in the long run. But in the short run it did not produce such crowd-out effects. The authors regressed life cycle wealth (as in 1998) on transfer wealth after normalizing both variables by income. They estimated life cycle wealth as accumulation of past savings, which is simply household net worth minus transfer wealth. After controlling for financial, demographic and risk-preference factors, they found that transfer received over 1993-1998 did not reduce any life cycle wealth accumulation. A \$1 transfer received between 1978 and 1992 crowded out \$0.55 of life cycle wealth, while \$1 received over 20 years ago crowded out \$0.95 of life cycle wealth. Brown and Weisbenner (2002) then regressed life cycle wealth on anticipation of a future inheritance normalized by income. They found that expectation of a future transfer had no significant effect on saving. This suggests that households reduced saving only after receiving a transfer, but not based on anticipation of a future receipt.

Joulfaian (2006) examined the impact of inheritances by employing data on estate (inheritance) tax returns of donors and income tax returns of the recipients. He observed household wealth of the recipient before and after the receipt of transfer wealth. The multivariate analysis of the study has shown that household wealth increased only by a fraction (79%) of inheritances received. In other words, Joulfaian (2006) found a marginal propensity to consume (mpc) of 0.21. After controlling for demographic factors such as age, marital status and number of dependents, the mpc was found to be 0.23. These mpc values were "significantly higher than that predicted within a perfect foresight

or consumption smoothing frameworks" (p. 4). Based on these findings, Joulfaian (2006) concluded that inheritance receipt depressed savings. The study also showed adverse impact of inheritance on labor supply.

Based on the 1984 Panel Study of Income Dynamics (PSID), Weil (1994) showed that receipt of bequests had significant impact on the saving of young households. Weil (1994) started with observing consumption behavior of the recipient and non-recipient of bequest. As a proxy of total consumption, he used the weighted sum of food consumption at home, food consumption away from home, house value, and rental payment. After controlling for the effects of current and lagged income, education and household demographics, he found that families that expected bequest consumed 4.8% more than families that did not, and that families that received a bequest consumed 10.4% more than those that did not. To predict the effect of bequests. It was found that average consumption per household was substantially lower in the case where the effect of expected bequests was eliminated than when it was present.

Effects of inheritance on household consumption were examined by Joulfaian and Wilhelm (1994) and Brown, Coile and Weisbenner (2004). Using PSID data, Joulfaian and Wilhelm (1994) examined the effects of inheritance on food consumption. They found that a \$10,000 inheritance increased annual food consumption by \$1.80 if further bequests were not expected and by \$14.00 if they were expected. Brown et al. (2004) also used the PSID data but with a longer panel and a broader definition of consumption. Their study found that a \$100,000 of bequest lowered weekly food consumption by \$3.00 if the bequest was expected and by \$4.00 if it was unexpected.

The major difference between the present and past studies is that the present study analyzes the impact of inheritance on retirement saving, while the previous studies analyzed the changes in life cycle wealth or consumption behavior to understand the changes in saving behavior followed by receipt of an inheritance. Use of retirement saving as dependent variable has at least two advantages. First, from such analyses we can directly observe the impact of inheritances on retirement preparation of the recipient households. Second, retirement saving behavior can be used as a proxy of overall saving behavior of the households, since savers tend to save more in all forms. For example, families with IRAs also have more conventional savings than do families without IRAs (Poterba et al. 1996). To better understand how inheritance receipt affects retirement preparation, the present study also examines the household's annual contribution to defined contribution pension plans and it's relation with inheritance receipt. Following the study by Brown and Weisbenner (2002), it also examines whether expected future transfers cause people to save less for their retirement.

### Methodology

### Theory and Hypothesis

The Permanent income hypothesis is used as a theoretical framework for the present study. The basic idea of PIH is that household consumption at period t,  $C_t$ , is a function of permanent income,  $Y_p$ . Permanent income is defined as the weighted average of current and past income. In a two-period model, permanent income is equal to the past income plus a fraction of the change in income from the last period to the current period:

$$C_{t} = cY_{P} = c\{Y_{t-1} + \mu(Y_{t} - Y_{t-1})\}, \qquad (0 \le \mu \le 1)$$
(1)

Here,  $Y_t$  is current income,  $Y_{t-1}$  is past income, c is the marginal propensity to consume and  $\mu$  is the fraction. Saving to finance retirement in period t,  $S_t$ , is defined as the income at time t minus all other consumption expenditures at time t:

$$S_{t} = Y_{t} - C_{t} = Y_{t} - c \{Y_{t-1} + \mu (Y_{t} - Y_{t-1})\}$$
(2)

In a simplified model, it is assumed that receipt of inheritance in period t is the only source of change in income from the last period to this period. In this case,  $Y_t - Y_{t-1}$  would represent the amount of inheritance received in period t.

The key implication of the PIH is that if the change in income is transitory, consumers do not change their consumption-saving decisions based on such changes in income. Consumption-saving decisions are changed only if the change in income is permanent, such as a permanent increase in the salary. Since receipt of inheritance is only a one-time shock to household income, it is taken as a transitory component of income change. Thus, when inheritances are received, consumers do not pay much attention to the change in income and the value of  $\mu$  in equation (2) is very small. When the value of  $\mu$  is very small, there would not be any substantial impact of inheritance receipt on retirement saving. Based on this permanent-income theory of consumption, the following hypothesis is tested in this study:

#### H: Receipt of inheritances does not affect savings for retirement in the short run.

#### Data and Variables

The data were extracted from the 2004 Survey of Consumer Finances. The Federal Reserve Board sponsors the survey on American households every three years to collect information on the distribution of household income, assets, debt, and major financial transactions. In the 2004 SCF, information was collected from 4,519 households. The SCF employs a dual-frame design, including an area-probability and a list component. The list sample is used to oversample the relatively wealthiest households. Since the wealthiest 1% of the US households hold about one third of the total household net worth, it is reasonable to oversample the wealthiest households in order to adequately represent the full distribution of wealth in the U.S (Kennickell, 2007). A weight variable is used to provide descriptive statistics that are representative of the population of the U.S. A multiple imputation technique is used by the SCF to handle missing and incomplete data (Rubin, 1987). This results in five implicates for each observation. This study analyzes data from only the first implicate.

There are two dependent variables in this study: (a) the dollar amount in targeted retirement accounts like IRA, Roth IRA, Rollover IRA and Keogh plans; and (b) yearly household contribution in defined contribution plans. Four independent variables are of main interest: (a) whether or not inheritance is received in the past by the household head or other family members; (b) the value of inheritance when received; (c) whether or not inheritance is expected in the future; and (d) the amount of expected inheritance. The objective of the present study is to examine the short run impact of inheritance receipt. Friedman (1957) defined *horizon*, the length of time period that a typical consumer takes into consideration while making consumption-saving decisions as about three years. But following Brown and Weisbenner (2002), the present study considers five years as short term or horizon. Based on previous studies, the following control factors are included: household income, household net worth, size of the primary economic unit or the household size, household's risk tolerance and planning horizon and respondent's age, education, marital status and ethnicity (a detailed analysis of the determinants of retirement saving behavior can be found in DeVaney & Chiremba, 2005).

Net worth is defined as total assets minus total liability. The 2004 SCF asks the following question regarding the risk tolerance: which of the following statements comes closest to the amount of financial risk that you and your (husband/wife/partner) are willing to take when you save or make investment decisions: take substantial risk; take above average financial risk; take average financial risk and take no financial risk. In this study, risk tolerance is defined as a categorical variable—households with substantial, above average or average tolerance for risk are categorized as risk tolerant households; and households taking no financial risk are non-tolerant for risk. Regarding planning horizon, the following question is asked in the 2004 SCF: in planning (your/your family's) saving and spending, which of the time periods is most important: next few months; next year; next few years; next 5-10 years and longer than 10 years. In this study, households with a planning horizon of 5 to 10 years or longer are defined as planners as opposed to the doers, who have shorter planning horizons. Table 1 shows the coding of the variables.

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Table 1

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Coding of the Variables

Variables	Coding
Dependent variables	
Dollar amount in targeted retirement accounts like IRA, Roth IRA, Roll-over IRA and Keogh plans	Continuous
Personal contribution in defined contribution pension plans	Continuous: yearly contribution by the household
Independent variables	
Inheritance dummy	Categorical: 1 if inheritance is received between 1999 and 2004, 0 otherwise.
Value of inheritance	Continuous: the value of inheritance when received
Expectation of future inheritance receipt	Categorical: 1 if inheritance is expected in future, 0 otherwise.
Amount expected	Continuous: the value of expected inheritance.
Household income	Continuous
Household net worth	Continuous
Size of the primary economic unit	Continuous
Age of the respondent	Continuous
Education of the respondent	Continuous
Marital status of the respondent	Categorical: 1, if married, 0 otherwise
Ethnicity of the respondent	Categorical: 1, if white, 0 otherwise
Risk tolerance of the household	Categorical: 1, if having positive tolerance for risk, 0 otherwise
Planning horizon of the household	Categorical: 1, if having long term planning horizon (5 years or more), 0 otherwise.

#### Analysis

To see the association between inheritance receipt and retirement savings, retirement savings is first defined as the dollar amount in targeted retirement accounts and the following regression is run:

*retirementsaving*<sub>i</sub> = 
$$\alpha_0 + \alpha_1$$
 *inheritance*<sub>i</sub> +  $\alpha_3$  X<sub>i</sub> +  $\varepsilon_i$ 

(3)

Since a large number of households do not have any retirement account or defined contribution pension plans, a Tobit model is applied. In the initial specification, *inheritance<sub>i</sub>* is a dummy variable equal to one if the household received inheritances in the last five years and zero otherwise.  $X_i$  is the vector of household characteristics that

includes income, net worth, household size, risk tolerance and planning horizon of the household, and age, education, ethnicity and marital status of the respondent. It should be mentioned here that the dollar amount of targeted retirement accounts is deducted from household net worth for the regression purpose. Natural logarithm of the adjusted net worth and household income has been taken. Negative values of household income and household net worth were treated as zero. In the second specification, the inheritance dummy is replaced by the dollar value of inheritance. This enables us to test whether retirement saving is affected by the size of the inheritance received in the last five years. In specification 3, the dollar amount of inheritance received is normalized by household income. In specification 4, inheritance dummy is introduced, while in specification 5, dollar value of inheritance received is used as an independent variable. In specification 6, the dollar amount of inheritance received is normalized by household income. When household contribution to the defined contribution plan is taken as the dependent variable, the amount of yearly contribution is deducted from household net worth for the regression purpose. Next, the impact of expected inheritance on retirement saving is examined in specifications 7 through 12 following the same procedure.

### Results

#### **Descriptive Statistics**

Table 2 shows that almost 10% of the households received inheritances in the last five years and 14% expect to receive it in future. About 29% of the households have at least one retirement account and 34% contribute to employer provided defined contribution plans. Average amount in targeted retirement accounts is \$29,340 and average annual contribution is \$880. Average value of inheritance received between 1999 and 2004 is \$12,632 and the average expected amount to be received in future is \$61,892. A comparison between households that received inheritances with those that did not reveals that those who received inheritances have higher household income and household net worth. More of the recipient households have higher amounts in retirement accounts and they contribute more to the defined contribution plans. Those who received inheritance in the last five years expect more to receive infuture. In general, recipient households have longer planning horizons. A comparison between household net worth. More of the expecting households have longer planning horizons. A comparison between households expect to receive inheritances in future and those who do not shows that those who expect have higher income and household net worth. More of the expecting households have retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and defined contribution plans. Expecting-households have higher amounts in targeted retirement accounts and def

### Regression Results

Table 3 shows regression results for specifications 1 through 3, while Table 4 shows the results for specifications 4 through 6. It is evident from the first column of Table 3 that receipt of inheritance has no significant impact on retirement savings. Factors like household income, and age and education of the respondent are significantly positively associated with retirement savings. Household size has an inverse association with retirement saving, and the relation is significant at 5% level. Column 2 and 3 show that the dollar amount of inheritance does not have any significant relations with retirement savings. Table 4 shows that neither the inheritance dummy nor the amount of inheritance received has any significant association with the amount contributed to the defined contribution plans. In all three specifications of table 4, we can see that household income is positively related with contribution. Households with longer planning horizons are more likely to contribute to employer sponsored defined contribution plans.

Weighted descriptive statistics (N = 4,519)

	Whole	Received	Did not	Expect to	Do not expect to
	sample	inheritanc	receive	receive	receive
		e in the	inheritance in	inheritance in	inheritance in
		last five	the last five	future	future
		years	years		
Variables	Mean/	Mean/	Mean/	Mean/	Mean/ frequency
	frequency	frequency	frequency	frequency	
Households having at	28.84%	41.92%	27.42%	41.89%	26.74%
least one retirement					
account					
Dollar amount in	29,340	47,30	27,446	33,363	28,761
retirement accounts					
Households contribute	33.79%	42.89%	32.79%	47.41%	31.59%
to defined contribution					
plans					
Dollar amount	880.12	1,545	808	1,218	826
contributed					
Households received	9.84%			18.72%	8.41%
inheritances in the last					
five years					
Amount of inheritance	12,633	128,391		30,457	9,762
received					
Households expect to	13.87%	26.39%	12.50%		
receive inheritance in					
future					
Dollar amount expected	61,893	205,313	46,241	446,209	
Household income	67,805	85,406	65,884	95,539	63,338
Household net worth	439,282	701,275	410,690	595,447	414,132
Household size	2.4	2.3	2.4	2.5	2.4
Age of respondent	49.54	51	49.38	41.06	50.90
Education of the	13.26	14.14	13.17	14.50	13.06
respondent					
If the respondent is	50.67%	55.16%	50.18%	53.23%	50.25%
married					
If the respondent is	73.55%	90.20%	71.74%	88.67%	71.12%
white					
Households with	96.64%	97.85%	96.51%	95.58%	96.81%
positive risk tolerance					
Households with long	38.89%	50.44%	37.63%	48.10%	37.41%
term planning horizon					
Source: 2004 Survey of C	Consumer Fina	nces.			

### *Regression of actual inheritance receipt* (N = 4,519)

Specification 1	Specification 2	Specification 3
-55,476		
	-0.01	
		-328.6
140,606***	142,936***	142,255***
947.4	416.6	-122.6
-30,517*	-29,803*	-30,242*
4,080**	4,131**	4,118**
2609	2,040	2,220
-19,299	-22,970	-20,243
-24,943	-27,921	-28,080
-84,278	-83,199	-85,384
-23,251	-25,474	-24,291
	Specification 1 -55,476 140,606*** 947.4 -30,517* 4,080** 2609 -19,299 -24,943 -84,278 -23,251	Specification 1       Specification 2         -55,476       -0.01         140,606***       142,936***         947.4       416.6         -30,517*       -29,803*         4,080**       4,131**         2609       2,040         -19,299       -22,970         -24,943       -27,921         -84,278       -83,199         -23,251       -25,474

Dependent variable: dollar amount in targeted retirement accounts

Source: 2004 Survey of Consumer Finances

### Regression of actual inheritance receipt (N = 4,519)

Dependent variable: annual contribution by the household in defined contribution plans

Independent variables	Specification 4	Specification 5	Specification 6
Inheritance dummy	520.2		
Amount of inheritance received		-0.002	
Amount of inheritance normalized by household income			-9.1
Household income	4,159***	4,152***	4,138***
Household net worth	-484.1	-460.4	-469.8
Household size	-149.5	-142.3	-150.2
Age of the respondent	-58.1	-58.3	-58.6
Education of the respondent	-89.7	-89.6	-86.2
Marital status of the respondent (reference group: married)	-218.6	-268.5	-218.4
Respondent's race (reference group: white)	30.6	65.3	63.1
Risk tolerance (reference group: positive tolerance for risk)	2,056	2,111	2,070
Planning horizon (reference group: planners)	1,736*	1,720*	1,742*

Tables 5 and 6 report the regression results of expected inheritance receipt. Specifications 7 through 9 in table 5 show that neither expectation of future inheritance receipt nor its size has any significant impact on retirement saving. Like specifications 1 through 3, household income, household head's age and household size have significant associations with retirement savings. Specifications 10 through 12 in table 6 show that receipt of inheritance does not affect contribution to the defined contribution pension plans. Contribution to defined contribution plans are only affected by household income and household head's planning horizon.

### *Regression results of expected inheritance receipt* (N = 4,519)

Independent variables	Specification 7	Specification 8	Specification 9
Expectation dummy	20,558		
Dollar amount expected		-0.001	
Dollar amount expected normalized by household income			294.5
Household income	1,42,775***	1,42,552***	1,42,725***
Household net worth	-654.6	-136.3	-415.1
Household size	-30,261*	-30,170*	-30,192*
Age of the respondent	4,245**	4,108**	4,151**
Education of the respondent	2,029	2,199	2,201
Marital status of respondent (reference group: married)	-20,019	-20,292	-20,224
Respondent's race (reference group: white)	-30,445	-28,069	-28,479
Risk tolerance (reference group: positive tolerance for risk)	-85,352.5	-85,067	-85,385
Planning horizon (reference group: planners)	-24,539	-24,157	-24329
* significant at 5% level, ** significant at 1%	6 level, *** significar	nt at p < 0.0001 level.	

Dependent variable: dollar amount in targeted retirement accounts

Source: 2004 Survey of Consumer Finances

### *Regression results of expected inheritance receipt* (N = 4,519)

Independent variables	Specification 10	Specification 11	Specification 12				
Expectation dummy	106.9						
Dollar amount expected		0.00					
Dollar amount expected normalized by household income			-3.9				
Household income	4,144***	4,146***	4,137***				
Household net worth	-475.1	-470.1	-470.5				
Household size	-151.4	-148.1	-153.1				
Age of the respondent	-57.8	-58.9	-58.9				
Education of the respondent	-87.1	-86.8	-85.8				
Marital status of the respondent (reference group: married)	-212.1	-219.7	-209.1				
Respondent's race (reference group: white)	48.8	63.2	65.4				
Risk tolerance (reference group: positive tolerance for risk)	2,068	2,079	2,066				
Planning horizon (reference group: planners)	1,743*	1,746*	1,747*				
* significant at 5% level, ** significant at	* significant at 5% level, ** significant at 1% level, *** significant at p < 0.0001 level.						

Dependent variable: annual contribution by the household in defined contribution plans

Source: 2004 Survey of Consumer Finances

### **Conclusions and Implications**

This study has examined the impact of inheritance receipt on retirement saving of the US households. The empirical findings of the paper suggests that receipt of inheritances within the last five years does not affect the dollar amount held in targeted retirement accounts like IRA, Roth IRA, Roll-over IRA or Keogh plans. To better understand the impact of inherited property on retirement preparation, the impacts on annual contribution to employer sponsored defined contribution pension plans by the households have been investigated. It has been found that inheritance receipt has no significant association with contribution. These findings provide support for the permanent income hypothesis: if addition to income is transitory, households do not change their saving decisions. Furthermore, expectation to receive inheritance in future does not have any impact on retirement preparation.

There is a common perception that intergenerational transfers of wealth spoils the recipients—those who received inheritances work less, consume more and save less (Menchik & Jianakopolos, 1998). The present study provides contradictory evidences against this common belief. The study shows no adverse impact of inheritance receipt on retirement preparation. Some studies have argued that baby boomers should not worry about their retirement preparation because they are going to receive substantial inheritances (Gokhale and Kotlikoff, 2000). The present study, on the contrary, shows that household's retirement saving is actually independent of inheritance receipt.

The present study has implications for the personal financial service providers dealing with retirement preparation of older households. Although the present study does not show any significant effect of inheritance receipt on retirement preparation, it does not mean that counselors should ignore the topic. Rather, they have to take all of a client's current and potential future financial resources into account. Financial educators should discourage their clients to rely on possible inheritances because it is uncertain that an inheritance will come through, for example, if the relative remarries or decides to donate in charitable funds. Furthermore, if the relative lives longer than expected, inheritance might arrive after the recipient retires. Thus, financial educators should help their clients to prepare for retirement without counting on inheritance. They should inform their clients that the US households, in general, do not rely on inherited property to finance their retired life.

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### What Factors Affect Income From Wages And Salaries?

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### Abstract

The purpose of this study was to explore the effect of various factors on income from wages and salaries and to offer recommendations to educators, financial advisors, and policy makers. A conceptual framework was developed based on human capital theory. Data were drawn from the 2004 Survey of Consumer Finances (SCF). To conduct the analysis, it was necessary to divide the sample by marital status and number of earners (married with two earners, married with one earner, and single household). Results of Ordinary Least Squares regression revealed that those with higher income had household heads with more education, excellent health, and they worked full time.

Key Words: human capital, earned income

### Introduction

How to promote household's well-being is an important question. Bernstein (2004) declared that overall well-being could be predicted by four factors: health, employment, economic status, and family relationships. Joo (2008) shared a similar idea but she suggested well-being consisted of six interrelated domains, which included health, finances, work, home, leisure, and environmental satisfaction. Because earned income is a primary component of an individual or family's well-being, the purpose of this study is to examine the effect of various factors on earned income. The theory of human capital provides the conceptual framework for the study.

Becker (1964) argued that income reflects an investment in human capital, primarily in the form of education. Along with education, investing in health can be viewed as an investment in human capital (Becker, 1993). For example, Campolieti and Krashinsky (2006) showed that there was a relationship between poor health and lower earnings. Work status (full or part-time work) is also assumed to affect income. Race will be included in the study as a control variable.

DeNavas-Walt, Proctor and Smith (2007) suggested that respondents tend to underreport their income in household surveys. Because the Census Bureau stated that respondents report income from wages and salaries more accurately than other sources of income, this study will use income from wages and salaries as the focus of the research.

### **Review of Literature**

### Conceptual Framework

Frazis and Spletzer (2005) pointed out that human capital research originated in the late 1950s through the work of Theodore Schultz, Jacob Mincer, and Gary Becker. The basic idea of human capital theory was that workers invest in their own skills as a stock over their lifetime in order to earn higher earnings. Becker (1962) believed that intangible capital would affect earnings. Schultz (1963), Becker (1993) and Schultz (1997) declared that there could be many forms of investing in human capital, such as obtaining education, sustaining and promoting health, and acquiring on-the-job training and vocationally relevant experience. Hence, this study will utilize human capital theory as the conceptual framework. The study will examine relevant variables using data on households in the 2004 Survey of Consumer Finances (SCF) which is representative of all households in the U.S.

### Education and Income

Finis (1975) asserted that the positive relationship between schooling and income is well-known. Katz and Autor (1998) examined changes in the U.S. wage structure and found differences by education level. Card (1999) declared that better-educated people would earn higher wages, experience less unemployment, and work in more prestigious occupations than their less-educated counterparts. Vincent and DeVaney (2003) suggested that individuals invest in education to increase income. Based on previous research, the relationship between education and earned income is hypothesized as follows.

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H1: Compared to those with less than a high school degree, those with a high school degree, some college education or a college or graduate degree will be more likely to have higher earned income.

#### Health and Income

Dooley, Fielding and Levi (1996) suggested that poor physical or mental health could lead to job loss through poor work performance. Once an individual is unemployed, he will lose wages or salaries which are the major part of an individual's income (Fronczek, 2005). It is intuitive that those with poor health might have fewer job opportunities and less income than those with good health. Contoyannis and Rice (2001) suggested that good health is likely to give rise to more productivity which would result in an increase in wage rates. Using human capital as a framework, Charles (2003) found that the greater the severity of a disability, the greater the damage to the individual's health capital. Consequently, the existence of more chronic conditions was associated with larger wage losses. Implications from these studies lead to the following hypothesis about the relationship between health and earned income.

H2: Compared to those who rate themselves as having poor or fair health, those who rate themselves as having excellent or good health will be more likely to have higher earned income.

#### Employment and Income

Frazis and Spletzer (2005) stated that wages paid to workers can reflect their productivity according to models of competitive labor markets. Thus, it can be assumed that a more productive worker will earn higher income than a less productive worker. A subsequent question would be how should a person store their productivity? Using the life-cycle distribution of human-capital investments, Mincer and Polachek (1974) asserted that the shorter the expected and actual duration of work experience, the weaker the incentives to augment job skills over the life cycle. Schultz (1997) suggested that human capital is also accumulated in the form of experience related to a person's vocation. To assess the effect of full-time versus part-time work on earned income, the following hypothesis is developed. The assumption is made that most workers would prefer full-time work to part-time work.

H3: Compared to those have part-time work, those who have full-time work will be more likely to have higher earned income.

#### Race and Income

Sharpe and Abdel-Ghany (2006) showed that income differentials exist among people of different races using data drawn from the Public Use Microdata Sample (PUMS) of the 2000 Census. They found that White individuals, on average, earned more than those who were Black, Korean or Vietnamese but less than those who were Asian Indian, Chinese, Japanese, or Filipino. In addition, DeNavas-Walt, Proctor and Smith (2007) found that Black households had the lowest median income and Asian households had the highest median income using data from the Annual Social and Economic Supplement (ASEC) to the 2007 Current Population Survey (CPS). Based on these studies, the following hypothesis states the expected relationship between race and earned income.

H4: Compared to those who are non-white, White heads of households will be more likely to have higher earned income.

The conceptual framework for the study is shown in Figure 1. It is based on Becker's work (1993) which includes education, health, and work experience as components of human capital. Race is included as a control variable.



Figure 1. Conceptual framework is based on Becker (1993).

### Methodology

### Data and Sample

The data were drawn from the 2004 Survey of Consumer Finances (SCF), a cross-sectional survey sponsored by the Board of Governors of the Federal Reserve System in cooperation with the Statistics of Income Division of the Internal Revenue Service (Kennickell, 2005). The SCF is conducted every three years to provide detailed information on the finances of U.S. households. Data for the 2004 SCF were collected by a national organization for research and computing at the University of Chicago (NORC), using computer-assisted personal interviewing (CAPI).

The SCF is intended to represent the financial characteristics of the primary economic unit (PEU). The PEU consists of an economically dominant single individual or couple (married or living as partners) in a household and all other individuals in the household who are financially interdependent with that individual or couple. The SCF sample is obtained by using a dual-sample design by which households are drawn from all economic strata in the United States. One set of the survey cases is selected from a standard multi-stage area-probability design. In 2004, 3,007 cases were selected. The other set of 1,515 cases was selected as a list sample from the Individual Tax Files from tax data by the Statistics of Income Division of the Internal Revenue Service.

This second sample is designed to disproportionately select households likely to be relatively wealthy. For confidentiality, the SCF excludes those who are included in the Forbes magazine of the 400 wealthiest people in the U.S. There were 4,519 cases in the 2004 SCF because 3 cases had net worth at least equal to the minimum level needed to qualify for the Forbes list. To generalize the results of analysis to the U.S. population, a weight variable provided by the SCF is utilized.

This study focused only on households where the head of the household had income from wages or a salary. Hence, the sample consisted of 3,127 households. The sample was divided into three groups: married with two-earners, married with one earner, and single households.

### Dependent Variable

The dependent variable was based on the question: "In total, what was your (family's) annual income from wages and salaries in 2003, before deductions for taxes and anything else?" (Kennickell, 2005). The log of income was used to overcome the skewness that was a result of some households having either extremely high or extremely low earned income.

### Independent Variables

The independent variables included measures of human capital (education, health, and work status) and race. Education was based on this question: "What is the highest grade of school or year of college you completed?" Education was coded as a categorical variable. There were four categories: less than a high school degree, high school degree, some college, and bachelor's degree or graduate degree.

Health status was based on this question in the 2004 SCF (Kennickell, 2005): "Would you say your health is excellent, good, fair, or poor?" Those with fair or poor health were grouped together because the number in each category was relatively small. After recoding, there were three categories: excellent, good, and fair or poor. Although some question the use of "self-reported health" as a valid measure, Gonzalez, Chapman and Leventhal (2002) stated that answers to this simple question have proven to be a consistent predictor of mortality. McGee, Liao, Cao and Cooper (1999) found that self-reported health status was a powerful indicator for subsequent mortality using data from the 1986–1994 National Health Interview Survey.

Work status was coded as full-time or part-time. Race was coded as White or non-white. See Table 1 for the coding of variables.

### Methods of Analysis

Descriptive analyses were conducted to investigate the characteristics of the sample. ANOVA was used to examine whether there were differences in earned income by education and health status. T-tests were used to learn whether there were differences in earned income by race and work status. Ordinary Least Squares regression was conducted to examine the simultaneous influence of the independent variables on earned income. The Chi-square tests are not shown here but they are available from the authors. \

Table 1	
Coding of Variables	
Variables	Coding
Dependent variable:	
Annual income from wages and salaries	Continuous
Independent variables:	
Education	
College or graduate degree	1 = yes, 0 = otherwise
Some college	1 = yes, $0 = $ otherwise
High school degree	1 = yes, 0 = otherwise
Less than a high school degree (reference group)	1 = yes, 0 = otherwise
Self-reported health	
Excellent	1 = yes, 0 = otherwise
Good	1 = yes, 0 = otherwise
Fair or poor (reference group)	1 = yes, $0 = $ otherwise
Work status	
Full-time	1 = yes, 0 = otherwise
Race:	
White	1 = yes, 0 = otherwise

### Results

### Descriptive Statistics

For married households with two earners, the average earned income from wages and salaries was \$84,643. About 39% of household heads in this group had earned a BS or graduate degree, 23% had attended some college, 30% had a high school diploma, and the remainder had less than a high school education. Of the household heads in this group, 33% had excellent health, 539% had good health, and 142% had fair or poor health. More than ninety percent of the heads in this group (94%) worked full-time. Over 75% of the heads in this group were White.

For married couples with one earner, the average earned income from wages and salaries was \$78,340. About 37% of household heads in this group had earned a BS or graduate degree, 19% had attended some college, 28% had a high school diploma, and the remainder had less than a high school education. Of the heads in this group, 37% had excellent health, 47% had good health, and 16% had fair or poor health. Nearly 90% of the heads in this group worked full-time. Over 70% of the heads in this group were White.

For single households, the average earned income from wages or salaries was \$34,607. About 31% had earned a BS or graduate degree, 30% had attended some college, 27% had a high school diploma, and the remainder had less than a high school education. In this group of single heads of household, 32% had excellent health, 50% had good health, and 18% had fair or poor health. Over 80% of these heads worked full-time. About 67% of these heads were White.

See Table 2 for the descriptive statistics for each group.

Variables	Mean (SD) or Frequency (%)				
	Married with 2 earners	Married with 1 earner	Single head of household		
	(N = 1,318)	(N = 887)	(N = 922)		
Dependent variable:					
Annual income from wages and salaries	\$84,643	\$78,340	\$34,607		
	(\$16,804,060)	(\$25,591,170)	(\$11,593,117)		
The log of annual income from wages and salaries	11.10	10.66	10.09		
	(112.06)	(144.32)	(163.53)		
Independent variables:					
Less than high school degree	8.18	15.39	11.11		
High school degree	30.05	27.78	27.21		
Some college	23.26	19.41	30.29		
College or graduate degree	38.51	37.42	31.39		
Self-reported health status					
Excellent	33.29	37.37	31.83		
Good	52.89	46.87	49.63		
Fair or poor	13.82	15.76	18.54		
Work status					
Full-time	93.35	89.96	82.80		
Part-time	6.65	10.04	17.20		
Race:					
White	78.08	71.43	66.61		
Non-white	21.92	28.57	33.39		

Weighted Descriptive Statistics for Households With Earned Income in the 2004 SCF (N = 3, 127)

### ANOVA

Results from Analysis of Variance (ANOVA) showed that there were significant differences in earned income by health status and education. For couples with two earners, household heads in excellent health earned 1.46 times as much as those in fair or poor health (\$95,078.compared to \$65,040). Household heads with a BS or graduate degree earned 2.79 times as much as those with less than a high school degree (\$118,780 compared to \$42,572).

For couples with one earner, household heads in excellent health earned 2.93 times as much as those in fair or poor health (\$99,122 compared to \$33,846). Household heads with a BS or graduate degree earned almost 5 times as much as those with less than a high school degree (\$141,123.compared to \$27,278).

For single household heads, income was not significantly different based on health status. However, there were significant differences in income based on education level. Household heads with a BS or graduate degree earned almost 2.5 times as much as those with less than a high school degree (\$49,869 compared to \$20,163). See Table 3 for the results of ANOVA.

Household Categories	Married Couples With Two Earners (N = 1,318)		Married Couples With One Earners (N = 887)		Single Heads of Households (N = 922)	
Variables	Mean	P-value	Mean	P-value	Mean	P-value
Self-Reported Health Status	(ac)	0.0058**	(ac, bc)	0.0024**		0.1118
Excellent (a)	\$95,078.02		\$99,122.80		\$40,479.68	
Good (b)	\$83,198.45		\$76,727.95		\$33,568.89	
Fair and poor (c)	\$65,040.19		\$33,846.93		\$27,303.62	
Education	(ab, ac, ad, bd)	<.0001***	(ab, ac, ad)	<.0001***	(ab, ac, ad)	<.0001***
Less than a high school degree (a)	\$42,572.21		\$27,278.80		\$20,163.78	
High school degree (b)	\$60,479.63		\$36,354.54		\$28,212.07	
Some college (c)	\$74,147.04		\$57,873.09		\$29,834.96	
College or graduate degree (d)	\$118,780.87		\$141,123.03		\$49,869.30	

Table 3 Results of ANOVA Comparing the Mean of Income by Health and Education of Household Heads With Earned Income in the 2004 SCF (N = 3, 127)

Note: (a) \*\*\* P<0.001; \*\* P<0.01; \* P<0.05

### T-tests

Results from T-tests showed that there were significant differences in earned income by race and work status.

For couples with two earners, households headed by a White person earned 1.29 times as much as those headed by a non-white person (\$89,020 compared to \$69,056). Households headed by a full-time worker earned 1.43 times as much as a household headed by a part-time worker (\$86,370 compared to \$60,409).

For couples with two earners, households headed by a White person earned 2.11 times as much as those headed by a non-white person (\$92,169 compared to \$43,762). Households headed by a full-time worker earned 3.89 times as much as a household headed by a part-time worker (\$84,653 compared to \$21,752).

For single household heads, income was not significantly different based on race. Households headed by a full-time worker earned 2.64 times as much as a household headed by a part-time worker (\$38,745 compared to \$14,691). See Table 4.

Table 4

Results of T-tests Comparing the Means of Income by Race and Work Status of Household Heads With Earned	l
<i>Income in the 2004 SCF (N = 3,127)</i>	

Household Categories	Married Cou Two Earners	ples With (N = 1,318)	Married Couples With One Earners (N = 887)		Single Heads of Households (N = 922)	
Variables	Mean	P-value	Mean	P-value	Mean	P-value
Races		0.0054**		0.0005***		0.1123
White	\$89,020		\$92,169		\$37,092	
Non-white	\$69,056		\$43,762		\$29,650	
Work status		0.0293*		0.0026**		<.0001***
Full-time	\$86,370		\$84,653		\$38,745	
Part-time	\$60,409		\$21,752		\$14,691	

Note: \*\*\* P<0.001; \*\* P<0.01; \* P<0.05

<sup>(</sup>b) A pair of letters is used to show that the means are significantly different from each other at the 0.05 confidence level.

### **Results from Ordinary Least Squares Regression**

The Ordinary Least Squares regression examined the simultaneous influence of education, health, work status, and race on earned income. It was hypothesized that those with more education, excellent or good health, and those who worked full-time would have more earned income. Race was included as a control factor. Because there were three groups, the regression analysis was conducted for each group.

The regressions revealed support for all of the hypotheses for each of the three groups. However, the effect for education was somewhat different than hypothesized. For married couples with two earners, the effect for education was as hypothesized. There was a significant difference between in earned income between each level of education and the reference group (less than a high school education). However, in the other two groups that had only one earner, there was no significant difference in the amount of earned income between those with less than a high school education. There was a significant difference in each group between some college and less than a high school education and a college degree and less than a high school education.

In each group, household heads with excellent health (compared to those with fair or poor health) were more likely to have higher earned income. However, in each group, there was no significant difference in the amount of earned income between those with good health and fair or poor health.

As expected, full-time workers had higher income compared to part-time workers. Households with a White head had higher earned income compared to those with a non-white head. See Tables 5, 6, and 7.

Results of OLS for Married Couples With Two Earners in	the 2004 SCF ( $N =$	1,318)		
Variables	Parameter estimate	Standard error	P-value	
Education:				
Less than a high school degree (reference)	-	-	-	
High school degree	0.26344	0.11330	0.0202*	
Some college	0.53775	0.11648	<0.0001***	
College or graduate degree	1.14612	0.10928	<0.0001***	
Self-reported health status:				
Excellent	0.27779	0.08544	0.0012**	
Good	0.12604	0.08163	0.1228	
Fair and poor (reference)	-	-	-	
Work status:				
Full-time	0.52221	0.09483	<0.0001***	
Part-time (reference)	-	-	-	
Race:				
White	0.24982	0.06630	0.0002***	
Non-white (reference)	-	-	-	
Intercept	9.76912	0.14029	<0.0001***	

Table 5

Note: (a)  $R^2 = 0.230$ ,  $Adj - R^2 = 0.226$ 

(b) \*\*\* P<0.001; \*\* P<0.01; \* P<0.05

Results of	f OLS	for Married	Couples Wi	th One	Earner in	the.	2004 SCF	N = 1	887)
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Variables	Parameter estimate	Standard error	P-value	
Education:				
Less than a high school degree (reference)	-	-	-	
High school degree	0.21873	0.17185	0.2034	
Some college	0.49089	0.18412	0.0078**	
College or graduate degree	1.67288	0.16075	<0.0001***	
Self-reported health status:				
Excellent	0.45492	0.14417	0.0017**	
Good	0.14049	0.14212	0.3232	
Fair and poor (reference)	-	-	-	
Work status:				
Full-time	1.23072	0.12741	<0.0001***	
Part-time (reference)	-	-	-	
Race:				
White	0.43796	0.11451	0.0001***	
Non-white (reference)	-	-	-	
Intercept	8.60115	0.19810	<0.0001***	
Note: (a) $R^2 = 0.365$ Adi- $R^2 = 0.360$				

(b) \*\*\* P<0.001; \*\* P<0.01; \* P<0.05

#### Table 7

*Results of OLS for Single Heads of Households in the 2004 SCF* (N = 922)

Variables	Parameter estimate	Standard error	P-value	
Education:				
Less than a high school degree (reference)	-	-	-	
High school degree	0.21808	0.11877	0.0666	
Some college	0.23800	0.11804	0.0441***	
College or graduate degree	0.84561	0.11890	<0.0001***	
Self-reported health status:				
Excellent	0.25532	0.09842	0.0096**	
Good	0.09136	0.09059	0.3135	
Fair and poor (reference)	-	-	-	
Work status:				
Full-time	1.13138	0.08895	<0.0001***	
Part-time (reference)	-	-	-	
Race:				
White	0.14727	0.07147	0.0396***	
Non-white (reference)	-	-	-	
Intercept	8.62251	0.13158	<0.0001***	

Note: (a)  $R^2 = 0.264$ ,  $Adj - R^2 = 0.258$ 

(b) \*\*\* P<0.001; \*\* P<0.01; \* P<0.05

### **Discussion and Implications**

The results provided robust support for the importance of investing in human capital to increase earned income. Thus, providing encouragement and support for investing in human capital is important for educators, financial advisors, and policy makers. Also, the results of the regressions suggest implications related to education, health, employment, and race. First, the importance of obtaining a college education is supported in this study. Using data from the Cooperative Institutional Research Program's (CIRP) entering Freshman Survey which has been conducted for the past 38 years, Satin and Saguaro (2004) suggested that American higher education has become more socioeconomically stratified. This means that obtaining an education is related to the socioeconomic status of one's parents. This leads to several questions. Will it continue to be possible for children from low and middle income families to attend college and earn a degree? As college and universities increase tuition, are they making substantive efforts to support financial aid to less-advantaged students? Are elementary, middle and high schools preparing students for college? Are policy makers supporting education at all levels: elementary, middle and high schools and colleges and universities?

Along with these concerns, are all students at every educational level being prepared to function in a society that is increasingly dependent on technology? Are there opportunities in every community for adults to increase their technological skills?

Second, the effect of health on earned income was supported. The economic model of health proposed by Grossman (1972) states that an individual's level of health at any point in time depends on medical care, diet, physical activities, and psychological and other health behaviors. Since health is a stock, it is more beneficial to invest in health beginning at birth and throughout childhood. Also, adults should be encouraged to maintain their health through diet and exercise.

For example, Wahlqvist (2004) recommends a varied diet will predict better health. Yi, Shin, and Shin (2005) suggested that sleep is essential for maintaining energy and sleep quality. Sleep affects health and daytime function (Alapin et al., 2000; Chesson et al., 2000) and quality of life. Cotman (2007) asserted that exercise will contribute to learning and memory. Also, exercise could reduce the likelihood of disease such as diabetes, hypertension, and cardiovascular disease. Therefore, educators, community leaders, and policymakers should continue to promote good health behaviors.

Third, employers should promote job training to increase the skills and productivity of employees. Policy makers should be aware that some industries may need incentives to promote job training for workers. The effect of race is expected to diminish as quality education is available to all students. However, community leaders and policy makers should be aware of needs which are likely to vary among communities and states.

### **Future Research**

Although self-reported health status is believed to be an effective measure of health, additional questions about health behavior would be useful. For example, are those who exercise on a regular basis more productive (as measured by earned income) than those who do not exercise?

The effect of on-the-job training or interest in training could be measured by questions such as: "How much training have you had within the last year that increased your technological skills?" or "What kinds of training would you like to have to increase your skills?"

Educators and financial advisors could be surveyed to learn what behaviors they think would be most beneficial to their clients. For example, should clients seek more education, change their health behavior, or acquire different work experience? Finally, educators and financial advisors can become involved in local and national efforts to promote financial literacy.

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### Advising and Counseling the Unbanked

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Key Words: unbanked, financial service, unbanked and financial service

### **Description of Content and Method**

This proposed practitioner's forum will present information about the current state of the unbanked, and strategies used to reach them with traditional financial services. For purposes of this presentation the "unbanked" is defined as individuals who do not have a checking or savings account at a bank or credit union. The primary focus of the presentation is to increase financial counselors' and agencies' understanding of the unbanked population so that they will be better prepared to more effectively work with the unbanked on managing personal finances. Topics include:

- What does it mean to be unbanked?
- What are the reasons people are unbanked?
- What are the common characteristics of the unbanked?
- What makes it important to be banked?
- What can be done to bank the unbanked?

### **Objective/Purpose**

Individuals and families who are unbanked are not able to take part in the local or national economies and are

- more vulnerable to higher cost for check cashing services and bill paying services;
- susceptible to theft due to keeping large amounts of cash at home or on their person;
- facing challenges in building a good credit history and are less likely qualify for affordable credit; and
- likely to find it difficult to save for emergencies, or to build financial assets (Desmond & Sprenger, 2007).

Banks are focusing on developing effective products and marketing in order to reach new personal and business customers who are presently unbanked. As a result new customers develop a level of financial literacy and sophistication and more willing to use a full range of banking services (Carr & Kolluri, 2001). The previously unbanked will pay less for financial services, have greater security of their funds, qualify for more favorable interest rates, and have safer vehicles for saving for the future, for emergencies, or to build financial assets (Carr & Schuetz, 2001). It is anticipated that from their experiences with banks, clients will realize improved financial literacy, save money on financial services, realize safer methods of storing money, understand savings vehicles, build a positive credit history and qualify for lower interest rates on loans.

### **Target Audience**

An understanding of the unbanked and how banks work to provide products to meet the needs of the unbanked will help counselors and agencies steer clients toward appropriate financial services. The content will be of particular interest to counselors and/or agencies working with low income individuals and families, families headed by young adults who are typically under-educated, single parents, and/or immigrants.

## Minimum and maximum time required when program is presented to target audience 35 minutes

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# Helping Households Organize Important Financial Paperwork: A Workshop Incorporating Financial Management, Emergency Preparedness, and Consumer Education

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Key Words: financial paperwork, disaster preparedness, financial information binder

## **Target Audience**

Adults of all ages. Young adults and older adults tend to appreciate this workshop the most.

## **Objective/Purpose**

The purpose of this workshop is to educate consumers about the importance of gathering and organizing financial paperwork for easy and convenient accessibility.

# **Description of Content and Method**

This workshop is about organizing financial paperwork in an accessible manner for everyday use, as well as for convenience in case one may need to evacuate their home in a hurry. The use of a "Financial Information Binder" is emphasized. The workshop discusses what kind of paperwork should be stored and where it should be stored. It also discusses the advantages and disadvantages of using a safety deposit box, a fire and/or flood proof box or safe at home, and placing important paperwork in the hands of attorneys, relatives or friends. The workshop offers the opportunity to discuss important financial topics such as: emergency savings, budgeting, identity theft, credit and credit reports, home/renters insurance, and preparing for potential emergencies when someone else may be in charge of your finances or when a person may have to take over responsibility for another family's finances. The use of real-life scenarios helps the audience to realize the importance of organizing such paperwork and communicating with family members about pertinent financial affairs.

Disasters across the country have added to the need for such education, and have shown the need to cover as many bases as possible when it comes to organizing and storing financial paperwork.

This workshop is an effective introduction to financial management workshops, an essential addition to emergency preparedness education, and a useful supplement to retirement and estate planning education.

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# Medical Care Financing: A Solution or A Problem?

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# Abstract

The emerging field of medical care financing provides new opportunities for consumers to finance their health related expenses, not made available by other payment mechanisms in the past. Recently, however these networks have come under greater scrutiny because of the various fees and costs that are associated with this form of lending. This paper provides a detailed analysis of the various business practices of prominent medical credit lenders. The costs and benefits of medical care credit to network participants are discussed. The implications of this new form of credit for financial planners, researchers and consumers are explored.

Key Words: medical credit, healthcare expenses, sub-prime borrowers, personal finance

## Introduction

National spending on health care in the U.S. is increasing by nearly 7 percent on an annual basis (Poisal et al., 2007). Concomitantly, the number of uninsured and underinsured households also has increased rapidly over the past several years. A recent study found that approximately sixteen million people between the ages of 19 and 64 were *under*insured in 2003 (Schoen, Doty, Collins, & Holmgren, 2005). Elimination of health disparities across age, gender, race, income, education, disabilities, geographical location, and sexual orientation by the year 2010 form the central theme of the goals set by the U.S. Department of Health and Human Services (Neumark-Sztainer et al., 2002). However, rising health care costs have only made it more difficult for low-income households to access quality health care in a timely manner (Ayanian et al., 2000).

As health care costs continue to climb, recent developments in the area of privatized medical care financing offer a new approach for moderate- and lower-income households to pay for their medical care. A privatized medical care financing market increases competition among financial institutions, thus opening up more choices for consumers to finance their medical expenses. The emergence of a medical care credit market also takes away from hospitals and medical care providers the burden of denying service and the responsibility to explore creative financing options for their patients. On the other hand, in a privatized medical care financing market, patients incur debt, often at a high rate of interest, to pay for their medical care. And, since medical credit financing is still relatively new and unregulated, lenders face few constraints in setting up their loan contracts.

From a financial planning standpoint, privatized medical care financing may provide a new tool for financial planners and counselors to improve their clients' financial well being. More research is needed, however, on whether this new form of medical care financing can actually help to make health care more affordable and accessible to consumers or whether it merely adds another high interest loan to the debt burden of consumers. This paper discusses the various aspects of privatized medical care financing and identifies circumstances under which it can be beneficial or predatory.

## **Review of Literature**

This section provides a review of past research focused on the different participants in the medical care financing system. These participants are consumers, medical care providers, and medical care credit issuers. These participants are involved in a series of exchanges that result in interrelated transactions among them. The section ends with a discussion of a relatively new practice in medical care financing – the computation of a medical credit score.

## Consumers

There is mounting evidence that cost of health care and the resulting medical debt for those who cannot pay for it creates a barrier to obtaining necessary care for consumers. Several previous research studies have indicated that medical debt was a major cause for households becoming insolvent or declaring bankruptcy (Himmelstein, Warren, Thorne & Woolhandler, 2005; Domowitz & Sartain, 1999). Jacoby, Sullivan, and Warren (2001) found that inability

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to finance their medical expenses caused more than a million families to declare bankruptcy in 1999. Thus, offering families and households a manageable and affordable way to finance medical debt is important. Who are these households and families? A current estimate is that there are approximately 29 million Americans in debt due to medical reasons (Zeldin & Rukavina, 2007). These households are likely either uninsured or underinsured<sup>2</sup>. A recent study showed that nearly two-thirds of Americans who needed to borrow for their medical expenses were in fact insured (Zeldin & Rukavina, 2007). In another study, households that had private coverage as opposed to those covered under government programs were more likely to carry medical debt, primarily because privately insured households were more likely to have lapses in insurance (Himmelstein et al., 2005). Past studies have found that the consumers less likely to be insured are younger adults, low-income wage earners, those with lower educational attainment, and those who were not married (Fronstin, 2000; Markowitz, Gold, & Rice, 1991). Adler and Newman (2002) concluded in their study that socioeconomic factors such as income, educational attainment, and employment accounted for most of the disparity in insurance status among households. According to another study, most of the uninsured were households headed by an individual younger than age of sixty five and those with incomes just above the eligibility levels for welfare assistance and Medicaid (Davis & Rowland, 1983).

Who are the underinsured? Zeldin and Rukavina (2007) reported that underinsured families used their credit cards to finance the short fall in medical coverage. Underinsured consumers include those consumers who carry high deductible plans and must eventually pay for medical expenses out of pocket (Davis, Doty, & Ho, 2005). The underinsured may not, however, have sufficient income to cover the gap between their coverage and the actual medical expense.

Thus, previous research indicates that the households most likely to use privatized medical financing are minorities, low-income groups and households with low educational attainment. These groups also are those considered the most vulnerable in the credit market.

## The Medical Care Providers

Traditionally, lower-income households in the U.S. have had access to free or lower-cost health care through a system of public and private hospitals, free clinics, and academic health centers. Lower-income families generally relied on subsidized costs and charity care to reduce their medical expenses. The providers were accustomed to the financial situation of their patients and worked with them to finance the medical care debt they incurred. They usually accepted payments over time and often discounted the debt or made it interest-free, accepting less than the full amount owed.

However, the past few years have witnessed a substantial reduction in the availability of charity care and subsidized medical care providers (Collins, 2006). In addition, insured and underinsured households, which are more likely to be moderate income, typically are not eligible for subsidized or charity care nor would they likely seek such care if they consider it to be substandard. When coupled with increasing health care costs, it is therefore not surprising that many low- and moderate-income families are unable to pay for their medical care in full when payment is due.

To deal with this situation, medical service providers have resorted to turning the debt over to collection agencies (Collins, 2006). Using a collection agency does not, of course, ensure that the health care provider will receive payment nor that the payment will be made promptly. Using a collection agency also adds to the health care providers' costs and may affect the provider's relationship with the patient.

The new market of private medical care credit can compensate health care providers more quickly. Providers do not have to deny care to their patients because of inability to pay nor must they deal with attempting to collect unpaid bills. On the other hand, health care providers often accept a portion of the debt from the medical care financing company in exchange for prompt payment.

## The Medical Care Credit Issuers

Privatized medical care financing provides a new market-driven intervention in the health care market. For consumers, the medical financing issuers close the gap between medical expenses and insurance coverage by financing out-of-pocket medical expenditures. The credit issuers convert medical bills into consumer debt by

<sup>&</sup>lt;sup>2</sup> Consumers who have Medicaid, the health insurance program for those who meet an income and asset test, are considered insured.

lending to the patients at rates based on the patients' credit scores. These medical care financing options offer incentives to consumers for quick loan payment and therefore are beneficial for consumers who can pay off their debt early. The patients can charge their co-payments, prescription drug costs, and other health-related expenses at interest rates that are sometimes as low as zero percent. However, the low rate is contingent on complete repayment of the debt within a limited period of time. Some medical credit providers also offer products that can be linked to the Health Savings Accounts of employees (Zeldin & Rukavina, 2007).

## Table 1

*Comparison of Health Plans (Source: Creditcards.com research and interviews)* 

I	Payment	Loan	Internet Date	Faar	Maximum Curdit Limit
Issuer	Terms	Гуре	1 0% to 22 00%	Fees	Credit Limit
	18 60		1.9% 10 23.99% based on gradit		
Capital One	nonths	Fixed	scores	Late fee \$20	\$25,000
Capital Olic	montilis	TIXCu	Interest free if 3%		\$25,000
			minimum		
	3-18		navment each		
	months or		month or fixed for	Late fee \$15-	
GE Money	60 months	Fixed	60 months	\$39	\$4,000
			0% to 11.99%		
	6-24		based on credit		
Chase Health	months	Variable	scores		\$20,000
	• • • •			T . 0	
	3-18	<b>D</b> ' 1	0% to 21.98%	Late fee \$29-	<b>T</b> 7 ·
Citi Health	months	Fixed	based on plan	\$35	Varies
				Annual fee:	
				\$96 paid	
			0% through pay	through	\$500- \$5000
Humana	6 months	Fixed	roll deduction	employer	based on salary
				\$4.95 fee +	
				\$1.25	
				shipping,	
				Dormancy fee	
				\$1.50 per	Denominations
Highmark	Pre paid	None		month	of \$25 to \$5000

Table 1 is a comparison of some of the major medical care credit lenders. The lenders are primarily those known in the credit market (i.e., Capital One) although Humana and Highmark are health insurers. Most of the lenders charge interest rates based on the patient's credit history. They offer very low initial interest rates (0 to 1.99%) for debts that are paid off within 6 to 18 months. If the debt is not repaid by then, interest rates are higher (up to 23.99%). Most of the issuers earn a substantial income from the various fees that they charge, including late fees of up to 39%. Some services that may not be otherwise covered through a regular insurance plan, such as cosmetic, vision, dental or veterinary care, also can be financed using this alternative source of medical financing. However, there is a credit limit. While the credit limit is adequate for minor health care procedures, even the \$20,000 and \$25,000 plans would not cover a significant medical debt.

The medical debt financing plans offered by the issuers have a number of different features. Humana's plan is tied to employment, offering a 0% interest rate if repayment is through payroll deduction. The credit line is based on salary. Highpoint's plan is a prepaid plan with fees. Medical care financing therefore offers an attractive option to consumers who need a few months to repay a medical debt. The providers are largely known as credit card providers and the applications are available in medical providers' offices and are relatively simple to complete.

However, opponents of medical care financing argue that low-income patients, who are also more likely to have lower credit scores, obtain these loans at significantly higher interest rates. While consumers with lower credit scores pay higher interest rates for other debts, opponents argue that medical debt is different in that it is involuntary. There also is concern that privatized medical care financing is largely unregulated and that medical financing providers may exploit the situation by setting unreasonable interest rates for patients with low credit scores. If true, a consequence would be that low-income patients would end up receiving their medical treatment at a very high cost (Grow & Berner, 2007). Consumers in a vulnerable situation, i.e., needing emergency medical care, may make choices about medical care financing that they would not make in a different situation.

## Medical Credit Scoring

At present the credit industry uses a credit score, known as the FICO score, developed by Fair Isaac Corporation, to determine the creditworthiness of their customers. While the availability of privatized medical credit continues to grow, the credit industry is preparing to launch another type of credit score known as the MedFICO, or medical FICO, to accurate predict the medical creditworthiness of the patients. The proponents of MedFICO argue that while the FICO score can determine the voluntary financial behavior of an individual, it cannot accurately determine the ability to pay for medical treatment costs, which are primarily not voluntary costs (Roberson, 2007).

Consumer advocacy groups fear that the implementation of the MedFICO score may result in further denial of adequate medical care to the poor, in addition to causing further financial distress for borrowers (Roberson, 2007). Prater (2008) reported that after taking into account public criticism, Fair Isaac, which had planned to launch the MedFICO in 2008, is reworking this scoring system and the launch of MedFICO may be delayed.

## Discussion

Lenders can either reward or penalize borrowers, based on their perceived risk of borrowers' ability to pay back the loan. Table 1 shows that many of the medical credit lenders charge zero percent interest for loans repaid within 6 to 18 months. Consumers who have the ability to pay back their loans early and have a good credit history can actually benefit by taking advantage of this interest-free period. This feature might be of particular interest to wealth managers and financial planners, who can advise their clients to take advantage of the interest-free period and essentially pay less than the actual amount if the saving in opportunity cost pertaining to the interest free period is taken into account. In addition, some medical financing plans also cover cosmetic and veterinary care related expenses, which typically are not covered through traditional health insurance. Hence, one could use medical credit financing for these expenses as well.

Conversely, this business model puts consumers with lower incomes and weak credit scores at a relative disadvantage by charging a high rate of interest. It is still an open question, however, whether the interest rate is competitive with the rate available to consumers in other financing options. In addition, there appears to be some adverse selection by the consumer, since most users of medical credit are likely lower income or sub prime borrowers who finance their out-of-pocket medical expense, perhaps knowing they cannot likely repay the debt in the interest-free period. A recent study shows that the number of low-income privately insured individuals facing out-of-pocket expenses that are greater than 5% of their income jumped by 50% between 2001 and 2003 (Zeldin & Rukavina, 2007). Therefore, during periods of illness, low-income households that borrow money to cover their insurance gap often face financial trouble and stress in the future (Gurewich, Prottas, Seifert & Seager, 2004).

From a policy standpoint, more can be done to ensure that the medical credit market operates fairly and efficiently. Past studies have shown that the related fees and charges on medical credit are not always explained well to consumers (Zeldin & Rukavina, 2007). In the future, better transparency in the disclosure of the costs of the financing arrangement is needed to protect consumers from potentially unscrupulous lending practices. Grow and Berner (2007), in their expose of the medical care financing market, described several situations that warrant examination. They described one situation in which the consumer thought she was signing up for an installment plan directly with the clinic. In fact, she signed an application for credit with a medical care financing provider. According to Grow and Berner (2007), the contract was labeled as such, but in small print. In another situation, the patient signed a hospital admission-consent form that included a small-print section authorizing the hospital to turn over her account to a medical care financing company. Public policy decision makers should determine what information should be communicated and when it should be communicated in these situations.

Grow and Berner (2007) also reported a situation in which a medical clinic pressured a patient into using a specific medical care financing company. In addition, the medical care provider typically receives a fraction of the medical debt while the patient is expected to repay the full amount. Patients who self-pay may receive a discount from the health care provider for prompt payment but those who finance the debt are expected to pay in full. Public policy decision makers should examine these situations to determine whether consumer protections are needed. In addition, interest charges on other preferred expenses such as home mortgages and student loans are tax deductible. The atypical nature of medical credit makes a good case for it to be treated in a similar manner, so as to mitigate the cost of credit on medical expenses for consumers.

## **Conclusions and Implications**

An examination of medical debt and medical credit financing seems to indicate that medical debt financing performs two distinct functions: payment of medical debt and financing of out-of-pocket expenses. This paper shows that medical debt financing can help some consumers to time their payments and effectively reduce their medical expenses by taking advantage of interest-free offers. We also find that medical credit is detrimental for consumers with low incomes or poor credit histories. Use of medical credit can increase overall costs for these consumers. In addition, there are few consumer protections in medical care financing. In the future, consumer education needs to be directed toward developing an understanding of medical credit, including the risks and costs involved with its use as a financing tool.

This paper also has important implications for policy makers. The profile of at-risk medical credit users and the prevalent ambiguity in the interest and fee structure as well as the relatively easy accessibility of these plans for consumers indicate that policy makers need to cautiously examine and address the state of the current medical credit financing market. As the credit market tightens and health care costs continue to rise, regulation of this market may become necessary to protect high-risk consumers (Ellis, 1998).

In the future, research will be needed to empirically test the determinants of medical credit usage, the profile of consumers who are able to use medical credit to their advantage, and the profile of consumers who are adversely effect by borrowing from medical credit lenders. Also, as the market grows, competition likely will increase. It will be interesting to study whether increased competition leads to lower fees and interest rates that consumers can use to their advantage.

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# Money Aspirations about Living Well: Development of Adolescent Aspirations from Middle School to High School

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# Abstract

High school student aspirations about living well (N=190) were compared to those of middle school respondents (N=187). Building on the concepts of intrinsic and extrinsic aspirations, the middle school Variable Concept Indicator Model was expanded to reflect high school aspirations. Gender differences and developmental changes in adolescent aspirations from middle school to high school were evident at the concept and indicator levels of the model. Both intrinsically and extrinsically oriented adolescents voiced expectations that their respective lifestyles would make them "happy." Implications for financial educators are discussed.

Key Words: economic socialization, money attitudes, intrinsic, extrinsic

In a recent paper the authors used qualitative measures to examine the "living well" aspirations of middle school students (Beutler, Beutler, & McCoy, 2008). The intent of this approach was to better understand financial values adopted by early adolescents. In that study, aspirations were classified and a conceptual framework for labeling the pattern of responses was developed using the juxtaposed intrinsic and extrinsic value orientations identified by Kasser and Ryan (1996). Early adolescents whose responses were classified as extrinsic demonstrated greater concern for the socially acceptable external self and greater trust in money, trusting that money could buy not only things, but also that having the right things would bring happiness. Intrinsic aspirations, expressed by middle school students, revealed greater concern for development of the inner self, development of character attributes, and aspirations for the use of resources to care for and be with family and friends. Slightly over half of the middle school students expressed extrinsic aspirations; less than half expressed intrinsic aspirations. The intrinsic and extrinsic themes evidenced in the middle school study represent central early adolescent money aspirations.

As a preliminary study, this research begins work on questions about the developmental and possibly malleable nature of money aspirations. The research reported here examines high school adolescent perceptions about themselves and their aspirations as they look ahead to a time when they may be living well and contrasts their aspirations with those of middle school students (Beutler et al., 2008). Very little is known about the emergence of money attitudes and the factors that influence the development of financial values during adolescent years. Clearly, extrinsic and intrinsic living-well aspirations exist in early adolescent populations (Beutler et al., 2008); however, many questions remain unaddressed. Do patterns of intrinsic and extrinsic aspirations continue to be evident among high school students? If so, do they differ from those of middle school students? Do these aspirations, like work aspirations (Johnson, 2005) mature and become more intrinsic as teens mature, or does the egocentrism of adolescence promote even more extrinsic aspirations in high school students? Are intrinsic and extrinsic gender differences apparent in money aspirations? These questions are opened and addressed in preliminary fashion in this paper.

# Literature Review

Aspirations, relatively high-level future goals (Emmons, 1989), are an avenue that can inform the process of economic socialization among youth. They guide future decisions and behaviors and establish values about money (Rokeach, 1973). Although the roots of intrinsic-extrinsic distinctions can be traced back to the first cognitive theorists, it was not until the 1950s that the intrinsic concept was connected with higher-order needs and cognitions such as autonomy, self-actualization, or achievement. Prior to this time it was theorized that all goals had extrinsic motivation (Broedling, 1977). As the definitions of *extrinsic* and *intrinsic* have become more concise the meaning behind the variables has changed. One definition relevant to this inquiry explains that extrinsic goals are in most cases dependent on the reaction of others and are usually classified as a means to an end, while intrinsic goals seem to reflect a sense of being inherently satisfying to the individual (Kasser & Ryan, 1996).

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## Egocentrism During Adolescence

During adolescence, teens experience a number of cognitive changes that are likely to make them: (1) more susceptible to the opinions of others, and (2) more accepting of the perception that personal worth is defined by extrinsic factors, such as what clothes they wear, what mode of transportation they use, and the status of activities in which they participate. An adolescent's unwarranted beliefs about other people's preoccupation with the adolescent's own appearance and behaviors constitutes what Elkind (1967) referred to as the egocentrism of adolescence. This egocentrism is evidenced in adolescents' responses to two different mental constructions, the imaginary audience and the personal fable (Elkind, 1967).

An adolescent's imaginary audience is likely to manifest itself as a result of his or her responses to a generalized audience that is based on perceptions not founded in actual experiences with others. Although not real, this generalized audience becomes real in its consequences because adolescents perceive it to be as admiring or as critical of them as they are of themselves. When the imaginary audience is at its developmental peak (typically during mid-teen years), adolescents are likely to become excessively self-conscious about the judgments of others and about the criteria upon which those judgments are made.

In addition, because an adolescent believes he is of importance to so many people (the imaginary audience); he regards himself and his feelings as special and unique and of universal significance and importance. Elkind (1967) defined this sense of uniqueness as being an adolescent's personal fable. As a result of this perceived uniqueness, teens often come to believe that they are the only ones who have suffered with such agonized intensity, or experienced such exquisite joy. This uniqueness is also likely to result in adolescents developing a sense of immunity about the anticipated outcomes of the choices they make. Even when teens have been educated about the negative consequences of various choices, they often have difficulty associating those consequences as likely outcomes of their own actions. This has been found to have significant implications for adolescent involvement in a number of risk-taking behaviors (Greene, Krcmar, Walters, Rubin, & Hale, 2000).

During this period of immature abstract cognitive reasoning, both imaginary audience and personal fable can potentially inform an understanding of adolescents' financial decisions. First, adolescents who develop a high sense of imaginary audience may establish a personal identity that is inappropriately defined by the perceived judgments of others and by the external trappings upon which that identity is likely to be based. Monetary attitudes established when an excessively high sense of self-consciousness is present may persist into young adulthood. In addition, adolescents who experience a high degree of personal fable while growing up may experience unrealistic expectations about what they are able to afford. They may assume that warnings regarding excessive debt or spending, do not apply to them and their financial future.

## Identity Formation and Self Definition

Another area of development that is likely to be important to adolescents' financial attitudes and behavior is their efforts to answer the question, "Who am I?" Erikson (1968) stated long ago that this attempt to establish a personal identity is the fundamental task during adolescence. Damon and Hart (1982) identified how youth proceed through a series of stages as they move toward a more comprehensive sense of self-understanding (see Table 1). A central aspect of adolescents' identity formation is the search for beliefs and values of greatest importance. As adolescents identify these, they establish a sense of commitment and begin to define the course of their lives (Waterman, 1992).

By understanding the beliefs that adolescents become committed to, we can better understand the decisions they are likely to make as they move into young adulthood. By exploring adolescents' perceptions about themselves in the future we can better understand those beliefs that are most likely to define their decisions about what will be most important to determining the success of their future lives. Our purpose in exploring adolescents' responses in this study about themselves in the future was to establish a point of reference for adolescent financial aspirations and to observe the extent to which they become more intrinsic or extrinsic in their financial goals as they mature.

	Physical Self	Active Self	Social Self	Psychological Self
Early Adolescence (age 12-13)	Physical attributes that influence social appeal & social interaction	Active attributes that influence social appeal & social interactions	Social personality characteristics	Social sensitivity, communicative competence & other psychologically related social skills
Late Adolescence (age 16-17)	Reflect volitional choices, personal & moral standards	Active attributes that reflect choices, personal or moral standards	Moral or personal choices concerning social relations or social personality characteristics	Belief system, personal philosophy, own thought processes

 Table 1

 Development of the Self From Early to Late Adolescence<sup>1</sup>

<sup>1</sup>Taken from Livesly & Bromley (1973).

## Work Values Research

Little has been written about the intrinsic and extrinsic nature of money aspirations, especially among middle school and high school teens. A small body of research on family roles examined extrinsic and intrinsic work values in adolescents. Work values are beliefs about the desirability of various types and features of work rewards. Intrinsic work aspirations focus on rewards of the job itself, responsibility, interest, and challenge of the work experience. Extrinsic work rewards are external to the job such as rewards of pay, prestige, and security (Johnson, 2005). Research findings report that adolescents in the United States hold very high aspirations for education, occupation, and work rewards (Johnson, 2002; Marini, Fan, Finely, & Beutel, 1996). Through time and experience work values and occupational aspirations mature; young adults become more realistic in valuing work rewards (Johnson, 2001, Shu & Marini, 1997). The malleable natures of work values have also been reported by Marini et al. (2006) and Johnson & Mortimer (2000). They observed that during transition from adolescence to emerging adulthood, work and educational experiences influenced changes in work values, as did gender, race, and socioeconomic background. Historically, during adolescence and emerging adulthood, females attached greater importance to intrinsic rewards than males. However, in recent cohorts, females caught up with males in valuing extrinsic rewards (Johnson & Mortimer al., 1996; Mortimer, Pimentel, Ryu, Nash, & Lee, 1996).

## Present Study

This paper begins work on questions about the developmental and possibly malleable nature of adolescent money aspirations and specifically examines: (1) patterns of intrinsic and extrinsic aspirations in high school adolescent responses, (2) the similarity of later adolescent aspirations to those of middle schoolers, (3) the effect of adolescent maturation on the strength of intrinsic and extrinsic perceptions, and (4) gender differences in the pattern of intrinsic and extrinsic aspirations.

## Methodology

Because so little is known about adolescent financial aspirations, a qualitative approach was used in this study, thus allowing students' actual words to become data and generating a rich conceptual understanding of their perceptions and ambitions.

## Living Well Feedback Form

In this study of high school adolescents, a methodology was used that mirrored the middle school study (Beutler et al., 2008). A "Living Well Feedback Form" was used to elicit responses about money aspirations. The form was developed from a series of high school focus groups where students were asked about their financial aspirations; the form was shaped to be concise, understandable, and open-ended, encouraging students to interpret "living well" independently. The form asks respondents to envision themselves "living well" in the future and to describe themselves, their home, their car, and their activities (see Table 2).

Table 2Living Well Feedback Form

When you look ahead and see yourself "Living Well," what do you see?

In the space below, describe:

- Yourself
- Your home
- Your car
- Your activities

## Sample and Procedure

Previously the questionnaire had been administered to Utah middle-school students, ages 11-13. That sample consisted of 96 females and 91 males (N = 187). The questionnaire was then administered to Utah high school students, ages 16-17, for comparison. This high school sample consisted of 84 females and 106 males (N = 190). Students responded to the form at the beginning of a financial literacy class before being exposed to any concepts taught in the course. The teacher provided no discussion of what "living well" might mean. When the surveys were completed, they were mailed to the research team. Institutional Review Board guidelines and school policy did not allow the research team to have personal contact with the students. No follow-up questions were asked. However, the sample size was large enough that this was not an obstacle.

## Coding

Student responses to the "Living Well" questions were coded using Grounded Theory Methodology (LaRossa, 2004) and evaluated using N-Vivo 2. Consistent with LaRossa's (2005) method of open coding, the research team examined each word, sometimes singly and sometimes within a phrase, to ascertain content and meaning. A total of 876 words and phrases were coded. High school data were evaluated according to the middle school model created by Beutler et al. (2008). For a detailed description of the development of the Variable Concept Indicator model illustrated in figure 1, see Beutler et al. (2008).

When responses did not fit indicators in the middle school model, new indicators were added, creating a model for high school money aspirations. Not all student responses were extrinsic or intrinsic in tone; responses that did not fall under extrinsic or intrinsic indicators were coded as descriptive. Descriptive responses included students' explanations of their future homes as "in the country surrounded by trees" and of their future cars as "blue, late model, six-cylinder engine." Descriptive words and phrases were not included under any of the concepts or indicators and were not further analyzed.

## The High School Model

In the process of open coding, small themes were identified and labeled as indicators. Indicators were then grouped together under larger themes, labeled as concepts (LaRossa, 2005). Similar to the original middle school analysis it became evident that broad intrinsic and extrinsic themes were emerging as well as some passages that were simply descriptive. These themes were labeled as variables in the model, and reflected in the Variable, Concept, and Indicator High School Model shown in figure 1. Based on the total sample of 190 respondents, a total of 870 words and phrases were coded at the indicator level of the model and then grouped into concepts and variables. At the variable level, 44% of the words and phrases were coded as extrinsic (based on all 870 words and phrases coded in the sample); 42.1% were coded as intrinsic and 13.9% were merely descriptive. Using a different base to facilitate gender analysis, 49.7% of male words and phrases were coded as extrinsic (based on the 485 male words and phrases coded in the sample); 36.5% of female words and phrases were coded as extrinsic at the variable level.

Note that there are four concepts that underlie extrinsic variable aspirations: social status (28.6%), appealing appearance preoccupation (9.9%), visible financial success (2.9%), and self indulgence (2.6%). Underlying each concept are the indicators; for example, the concept of *social* has four indicators: status activity, status career, status home, and status vehicle. Similarly, the intrinsic variable has four concepts: growth, health, relatedness, and community service. The growth concept had the largest number of indicators and highest percentage of intrinsic coded words and phrases (23.6%). This 23.6% is equal to the sum of the underlying indicators: actualizing activities (8.6%), personal qualities (2.7%), realistic (5.2%), autonomy (7.5%), and provident living (1.4%). Description of

these indicators is elaborated in the paragraphs below.

	4 49.7 m	$\frac{4.0\%^{1}}{2^{36.5}_{\text{f}}}$		13.9% 4.0 15.1 m f	42 36. m	2.1% 3 48.4 f	
	Extrinsic Vari	able A	Sta	tements	Var	iable B	
28.6%	9.9%	2.9%	2.6%	23.6%	1.3%	14.7%	2.5%
32.1 23.8 m f	9.6 10.1 m f	3.9 1.5 m f	4.0 0.9 m f	21.1 26.3 m f	1.3 1.2 m f	11.8 17.9 m f	2.1 3.0 m f
Social Status	Appealing Appearance Preoccupation	Visible Financial 1 Success	Self Indulgence	Growth	Health	Relatedness	Community Feeling
(Concepi)	(Concepi)	(Concepi)	(Concepi)	(Concepi)	(Concepi)	(Concepi) 🗘	(Conceps) 🗘
7.6%	0.7%	2.9%	2.0%	6.8%	1.3%	13.9%	1.6%
8.4 6.5 m f	0.4 1.1 m f	3.9 1.5 m f	3.1 0.7 m f	5.8 7.9 m f	1.3 1.2 m f	10.9 17.2 m f	0.9 2.5 m f
Status	Self-	I'll be	Self-	Actualizing	Healthy	Family	Community
Activity	Decoration	Rich	Gratification	Activities	Body		Service
1.7%	1.5%		0.6%	2.7%		0.8%	0.0%
2.5 0.7 m f	1.4 1.5 m f		0.9 0.2 m f	2.9 2.4 m f		0.9 0.7 m f	0.0 0.0 m f
Status Career	Body Image		Easy Living	Personal Qualit	ies	Friends C	haritable Giving
8.6%	7.7%			5.2%			0.9%
8.9 8.1 m f	7.8 7.5 m f			4.4 6.2 M f			1.2 0.5 m f
Status Home	Social Image			Realistic			Neighborhood
10.% 12.3 8.5 m f				7.5% 6.7 8.3 m f			
Status vehicle	e			Autonomy			
				1.4% 1.3 1.5 m f Provident Living			
(Indicators)	(indicators)	(Indicator)	(Indicator)	(Indicators)	(Indicator)	(Indicators)	(Indicators)

# Figure 1. Variable, Concept, and Indicator Model (High School)

<sup>1</sup>Percent of words and phrases coded as *extrinsic* based on all 870 words and phases coded in the sample. <sup>2</sup>Percent of male words and phrases coded as *extrinsic* of all 432 male words and phases coded in the sample.

The high school model (Figure 1) varies from the middle school model with the addition of two indicators and the virtual elimination of one. High school responses coded under *appealing appearance preoccupation* were qualitatively different than those from the middle school sample. High school students still talked about body image and self-decoration. However, they did so with a new awareness of how these aspects of their appearance would

influence their larger social image. While middle school students aspired to high-end clothing and accessories as well as being "skinny, thin, and hot," these were only part of the image to which high school students aspired. Thus, the indicator *social image* was added to the model.

A small but interesting new theme also emerged under the intrinsic concept *Growth*. Students began to describe aspirations to live a lifestyle characterized by providing for the future, being frugal, and making good use of the resources they had. These aspirations were seen as a more mature form of *realistic* and were coded under a new indicator, *provident living*.

None of the high school respondents expressed the goal of giving of their means to charitable causes. Thus, the intrinsic indicator *charitable giving*, which had a very small response in middle school (0.2%), is empty in the high school model. This indicator remains in the model for comparison with future studies among college students.

# Results

Adolescents showed some significant developmental changes in their aspirations from the middle school to the high school sample, as well as gender differences. Middle school females are more intrinsic than middle school males (Figure 2—variable level), as well as more responsive to appealing appearance (Figure 3—extrinsic concept level), and more responsive to growth, health, and relatedness (Figure 4—intrinsic concept level).



Figure 2. Percent of Coded Words and Phases by Variable Type—Middle School Males versus Females.



Figure 3. Percent of Coded Words and Phases by Extrinsic Concepts-Middle School Males versus Females.



Figure 4. Percent of Coded Words and Phases by Intrinsic Concepts-Middle School Males versus Females.

High school females are less extrinsic and more intrinsic than their male counterparts (Figure 5—variable level), less responsive to social status, visible financial success and self indulgence than males (Figure 6—extrinsic concept level), and more responsive to growth and relatedness than males (Figure 7—intrinsic concept level).



Figure 5. Percent of Coded Words and Phases by Variable Type—High School Males versus Females.



Figure 6. Percent of Coded Words and Phrases by Extrinsic Concepts-High School Males versus Females.



Figure 7. Percent of Coded Words and Phases by Intrinsic Concepts-High School Males versus Females.

Compared to middle school males, high school male responses were more extrinsic, slightly more intrinsic, and less descriptive than middle school male responses (Figure 8—variable level), slightly more responsive to social status, appealing appearance, visible financial success, and self indulgence (Figure 9—extrinsic concept level), and more responsive to growth (Figure 10—intrinsic concept level).



Figure 8. Percent of Coded Words Variable Types-Middle School versus High School Males.



Figure 9. Percent of Coded Words and Phrases by Extrinsic Concepts-Middle School versus High School Males.



Figure 10. Percent of Coded Words and Phrases by Intrinsic Concepts-Middle School versus High School Males.

Compared to middle school females, high school females were less extrinsic and more intrinsic (Figure 11—variable level), slightly less responsive to social status and appealing appearance (Figure 12—extrinsic concept level), and much more responsive to growth (Figure 13—intrinsic concept level). These overview observations mask much of the more interesting qualitative insights. The remainder of this results section will focus on the most significant developmental changes that were observed on the concept and indicator levels in the high school data.







Figure 12. Percent of Coded Words and Phrases by Extrinsic Concepts—Middle versus High School Females.



*Figure 13*. Percent of Coded Words and Phrases by Intrinsic Concepts—Middle School versus High School Females.

## Social status

In the middle school data, the social status indicators (status activities, status car, status home, and status career) represented 27.3% of responses (28.1% of all male responses and 26.5% of all female responses). These numbers slightly increased in the high school data to represent 28.6% of the responses (32.1% of all male responses and 23.8% of female). Although the total percent rose only slightly, the male responses increased by 3 percentage points while the female responses decreased by 4.3 percentage points. The percentages did not change that much but the responses under these indicators demonstrated that high school students, particularly males, were concerned with having social status that was highly recognized by other individuals. High school students, more than the middle school students, knew what high end, prestigious possessions looked like and they aspired to have these possessions for social status.

## Appealing appearance preoccupation

Both middle school and high school students were concerned with expressing themselves through body shape, clothing, and fashion. These responses were coded under the concept *appealing appearance preoccupation*. Although it might be expected that high school adolescents would give more responses relating to body image and self-decoration than their middle school counterparts, this was not the case. Middle school females were much more responsive to appealing appearance (13.3%) than their counterpart males (7.7%). But in high school both genders responded at a similar level (about 10%).

In high school the emphasis shifted to *social image*, a new indicator that was added to the model (see figure 1). Responses coded under *social image* showed a new awareness that self-decoration, body image, and the indicators in the social status concept (status activities, status car, status home, and status career) were each elements of a desirable social image. *Social image* responses often included lists of status symbols that together equated to an extrinsically oriented image: "Working at dental office, getting a lot of money, nice well dressed." "Well groomed, sophisticated, have a business suit, suitcase, well fit, have short hair, richer and more noticeable." Interestingly, a small percentage of responses mimicked the culture popularized in the media today. One student's aspirations were "In my 20s, single, happy, learned to cook Thai food, good friends. Big apartment in San Fransisco, all wood floors. Chevy impalla, red out side, cream interior. writing, running marathons, well established carrer, own small dog, painting."

Notably, many of the activities and attributes mentioned in *social image* responses were close to ones coded under *autonomy*. In deciding whether a response was coded as social image or autonomy, the research team consulted the remainder of the questions in the response. When the adolescent displayed a pattern of extrinsic responses that demonstrated a desire to be seen favorably by others, the response was coded as social image. Thus, "out of college with a degree and with a high paying job and a nice home and a nice car" might be considered an autonomous statement, but upon considering the other statements in the passage it becomes a response about social image: "a big house with at least five bedroom and two baths it would be built and decorated to my specifications and would have a really big back yard with a deck and a jacuzzi. It would have a workshop and a guest house, and a 3 car garage. manual 69 camero with black leather interior and a midnight blue paint job. Hopefully a pro snowboarder and a vetrinarian as a part time job."

# Growth

The intrinsic concept of growth increased from middle school to high school in males (7.7%) and females (8.2%). Under this concept, three major indicator themes stood out. First, high school students displayed a greater focus on autonomy, characterized by independence and self-sufficiency. Males and females alike expressed aspirations to have "my own small business," be "Finical secure," or "successful career," be able to work their own hours, live on their own, and be well established before having children. Second, high school students, males and females were more realistic about what they would be able to afford and what they needed to meet their needs. Respondents expressed their realistic aspirations mostly in describing their home and vehicle; they indicated the desire to have a home and/or vehicle that were sufficient for their needs, that functioned properly, and were affordable. Several students indicated that although they would like to have certain possessions, they would probably not be able to afford them. A male student expressed his aspirations for a future home: "Well I want a castle but until I am living great I think my home will be a nice little place maybe 5 bedrooms nice little land nothing to big yet. Something that wont take me to long to pay." Some aspirations for a future home were "Moderate size, but not huge, big enough for my needs," "I would imagine a medium sized house. A two car garage would be handy later down the future," "big enough for my family and not having to worry too much about making payments." Realistic expectations regarding a vehicle were expressed as "affordable," "good gas mileage," "runs well and gets me were i need to go," and "something that can fit all of my kids in it."

The third theme was the emergence of a new indicator, *provident living*, which was characterized by responses showing the desire to pay bills, provide for the future, and have a financial future by being frugal and thrifty. Equal numbers of males and females responded with aspirations such as having a job that would allow them to provide for their family, and a home that is "not too much to pay for, enough for my budget." One female respondent aspired to receive a college degree "so if my husband dies or is a failure I will be able to support my family."

Another interesting trend from middle school to high school was a hefty reduction in responses coded as *actualizing activities* (12.3 % in middle school to 6.8 % in high school). While actualizing activities were the largest growth indicator for middle school students, this was not the case for high school students. Perhaps high school students responded less about actualizing activities because their aspirations for growth shifted to areas of autonomy, practical realism, and provident living. This is consistent with the concept of emerging adulthood expressed by Arnett (2000). High school students did express some actualizing aspirations, such as be "married," be a "mom/dad," participate in educational pursuits, be "graduated from college," and have a "good job."

The growth indicator *personal qualities* was also slightly less prominent in high school than in middle school. Personal qualities were expressed as a desire to be "organized," "clean," "happy," "Fun, hardworking," "someone that people can count on, stable," "outgoing," "energetic," and "have a better temper." Interestingly, in the high school responses there was no indication of the aspirations to be "kind," "nice," "smart," or "friendly" that were so common in the middle school responses. Rather, high school students appeared to be more focused on overcoming weaknesses and achieving order and control in their lives.

## Relatedness

None of the "Living Well" questions asked students specifically about future relationships. Yet relatedness emerged as the second strongest intrinsic concept theme.

Middle school and high school student aspirations to share life with family and friends were of interest to the research team. In both samples, aspirations for family associations were a major theme. Of interest was the minor theme of friends. Among these adolescents, aspirations to continue close associations with friends were voiced by only a few of them.

## **Discussion and Implications**

The purpose of this study was to examine high school students' perceptions of living well and to compare these responses with those of a middle school sample (Beutler et al., 2008). Building on the Kasser and Ryan (1996) concepts of extrinsic and intrinsic aspirations, the middle school Variable Concept Indicator Model (Beutler et al., 2008) was expanded based on high school responses. The expanded model included two new indicators: an intrinsic theme (provident living) and an extrinsic theme (social image) heretofore not identified in the literature. Extrinsic

and intrinsic overarching themes emerged at the variable level. At this general level the adolescent respondents were nearly evenly and similarly split within both middle school and high school.

Of the high school students, 44% suggested that having social status, an appealing appearance, financial success, and the freedom to do whatever one desires is what "living *well*" is about, compared to 41.9% of middle school students. In contrast, 42.1% of high school students versus 36.3% of middle school students named health, growth-related experiences, relationships with others, and involvement in the community as aspects of "living well." Extrinsic and intrinsic adolescents from high school and middle school voiced expectations that their chosen lifestyle would make them "happy."

The middle school findings indicated clear extrinsic, intrinsic and descriptive living well aspirations. The effect of adolescent maturation on the strength of intrinsic and extrinsic perceptions was observed among older adolescents. High school males were more decisive and clear than middle school males in expressing either extrinsic or intrinsic aspirations. In the middle school sample 30% of male aspirations were indecisive and simply descriptive. In the high school sample only 14% of male responses were descriptive. Middle school females (13.3%) and high school females (15.1%) were about the same, perhaps an evidence or earlier female maturation. Not only were high school males more decisive and clear in expressing extrinsic aspirations, they were also decidedly more extrinsic than their female counterparts. Generally speaking, at the variable level 49.7% or essentially half of the male coded responses were extrinsic compared to 36.5% or just over a third of the female aspirations. At this same level the percent of male/female responses among high school students are essentially reversed with 36.3% of the males and 48.4 % of the females expressing intrinsic aspirations.

Of all the concepts and indicators in the model, social status aspirations among both middle and high school students were the most prominent, and were expressed with the greatest frequency. Social Status responses were essentially comparable between the two samples: 27.3% in middle school and 28.6% in high school. However, gender differences between the two samples were quite pronounced. In middle school, 28.1% of all male responses and 26.5% of all female responses expressed aspirations for activities and possessions related to social status. The frequency of male and female social status responses among middle school students were nearly equal, but high school males dominated their female counterparts by nearly ten percentage points (males 32.1% and females 23.8%), reminiscent of Johnson and Mortimer's (2000) report on work value maturation among high school teens. Later maturation among adolescent males and lingering egocentrism, worth defined by external factors and elevated acceptance of the opinion of others (Elkind, 1967), may play a part in the high levels of extrinsic aspirations among high school males.

For extrinsically motivated high school teens, social status and social image were themes that expressed their desire to dress, drive, live and work in ways that elicit the commendation and attention of others. At the indicator level high school students, more than middle schoolers, knew what prestigious possessions looked like and made finer distinctions regarding amenities with respect to status cars, homes, activities, and careers. In this way extrinsically oriented later adolescents were more accepting of a perception of personal worth defined by extrinsic factors.

For intrinsically oriented high school students, growth emerged as the dominant living well objective. At the concept and indicator level growth increased from 15.9% in middle school to 23.6% in high school. It was the second most prominent and frequently expressed intrinsic aspiration. These high school adolescents were more realistic in their aspirations regarding what they would need and be able to afford. Their expressions more frequently included a desire for autonomy, to own their own business, work their own hours, live on their own and become established. Provident living (1.4%) was added to the model as an intrinsic indicator in response to small theme that expressed aspirations to live on a budget, pay bills, provide for a family and become financially secure. This theme was entirely absent among early adolescents and but it did barely emerge among later adolescents. Relatedness (14.7%) was a smaller theme than growth (23.6%); nevertheless, it was a major part of intrinsic students' responses, and males began to catch up to females in their comments about spending time with family and friends.

Evocative of early adolescents (Beutler et al., 2008), high school teens are still basically unaware of the financial resources it would take to realize the expensive social image they desire. This is evident in the few *status career* responses and the even smaller number of *I'll be rich* responses. Only about 3% of high school and middle school students expressed aspirations of financial wealth, while close to 50% of them desire to own high status possessions and to participate in exclusive and expensive activities. Though most of them plan to have a good job and work, they

underestimate the type of high end career it would take to provide the luxuries they have their sights on. Additionally they have little understanding of how much effort, financial outlay, and cost to family relationships and possibly to personal health it would take to obtain the expensive material possessions they aspire to own. This shortfall between cash and expectations of living well will make them vulnerable to financing their life aspirations through expensive credit (Roberts & Jones, 2001). Middle school (Beutler et al., 2008) and high school youth need exposure to financial curricula that help them recognize: (1) the true cost of expensive personal possessions (Poduska, B. E., 1995), and (2) the effects of financial strain on close relationships when excessive purchases are financed out of sequence with income (Gudmunson, Beutler, Hill, McCoy, & Israelsen, 2007).

## Limitations

Clearly, this survey was a preliminary attempt at understanding how adolescents view "living well" and how these perceptions change over time. Thus, the results cannot be generalized into a statement on national adolescent culture. However, this survey has helped to inform, expand, and validate information from the initial middle school survey. Through this comparison of middle school and high school adolescents, the intrinsic and extrinsic statements begin to reveal a developmental trajectory. With further research expanding the analysis into the years of young adulthood, and by studying a more diverse sample longitudinally, these initial findings could be solidified and expanded to better inform the developmental and malleable nature of money aspirations.

## Implications for Financial Educators

In this study, high school teens, especially males, compared to middle school adolescents showed an increased understanding of and desire for an extrinsically based social image. An identity based on status possessions, leaves them open to a host of psychological and behavioral problems that stem from a central life aspiration for money and the things it will buy (Rokeach, 1973; Buss, 2000; Luthar & Latendresse, 2005). There is a need to help students recognize and construct a central life aspiration that is more intrinsic. When, in an effort to self aggrandize, they place higher value on material objects than on the people in their lives, it trivializes the value of those around them and unwittingly undermines their own sense of worth. Increased attention is needed by financial professionals, parents and community leaders to help validate the importance of money used to promote and facilitate intrinsic ends such as human growth, health, positive relationships and strong communities. These intrinsic ends support the development of human and social capital that exceed the transient value of material things purchased or pursued for the sake of status, appearance, or self indulgence. Not to discount the importance of financial and material means in reaching valued intrinsic ends; the concern is with "getting the cart before the horse" and giving greater priority to material and financial means than to intrinsic ends.

Addressing financial concepts like budgeting and saving is important, but adolescents will be more successful in living sound financial practices if they are not extrinsically focused (Beutler et al., 2008). Who cares about a balanced budget, wise use of credit or investing toward a financial future when personal image is perceived to be at stake? Using money and material objects to give a sense of worth will take priority over the instrumental practices. Indeed choosing to act upon extrinsic central life aspirations for social status and social image are necessarily in competition with intrinsic aspirations because they are inconsistent with each other. This is not a call for telling people what they should value, instead what is needed in our curriculums and interventions is the development of forums in which students and clients of all ages can begin and keep open a conversation that helps them confront and examine the opportunity costs associated with spending decisions, in regards to growing the inner self, affirmative affiliations, and securing a financial future. It is important that this is a process in which the counselor, planner or educator is a facilitator and not just a purveyor of information.

Based on the narratives reported here, it is apparent that the financial challenges and opportunities before contemporary adolescents are many. High school teen's value having the things that money will buy, yet keenly look ahead to personal growth and positive relationships; they want to be autonomous and make a place for themselves in the world in which they live. As financial professionals will we help them see the fine distinctions?

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# Slashing Household Costs and Boosting Savings: A Series of Fact Sheets for Financial Counseling and Education

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Key Words: savings, cutting household expenses.

## **Target Audience**

The fact sheets can be adapted to many audiences including individuals or households that would like ideas on cutting back expenses in order to reach financial goals such as staying out of debt, getting out of debt, or building savings and retirement funds.

## **Objective/Purpose**

The Utah State University Cooperative Extension Bankruptcy Prevention Team created an award-winning series of fact sheets to help mediate the rising costs of fuel, food, and health care, as well as the low savings rates and high debt levels. The focus of these fact sheets is to educate households on ways to cut back spending to meet the demands of increasing fuel costs as well as to build savings and decrease debt.

# **Description of Content**

With the increasing cost of heating and cooling homes, the rising cost of fuel for automobiles, the increasing levels of debt, and the continued low savings levels, many households are in need of information to help make ends meet and build assets. The hundreds of ideas found in the fact sheets "Slashing Household Costs and Expenses and Boosting Savings" can easily make a perfect topic for any "Money-Saving Ideas" workshop. They can be used to enhance other workshop topics such as budgeting, meal planning, debt management, retirement planning, insurance, and Individual Development Account (IDA) classes. They are also a great resource to use for money-saving ideas in newsletters, for radio and TV spots, and newspaper articles.

In addition to money-saving and savings-building ideas, the fact sheets offer ample opportunity for incorporating related financial and consumer education topics such as the time value of money, the real cost of credit, wise consumer decision making, and energy efficient appliances. Focusing not only on reducing costs, but on actually redirecting the money saved toward financial goals is key to helping clientele avoid financial crisis by staying out of debt, building savings, and paying off debt.

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# Computer-Assisted Financial Coaching Techniques Forum

Dean Brassington<sup>1</sup>, Phil Lawson, and Mary Spear, AFC

Key Words: Computer-assisted financial coaching techniques, spherical counseling, solution-focused, financial coaching, electronic financial planning worksheet, reflectments

## Target Audience

Military financial counselors, innovative practitioners and researchers

## **Objective/Purpose**

Stimulate discussion by demonstrating alternative computer assisted counseling techniques/strategies to appeal to the "Game Boy Generation" clients, currently the bulk of the military population, and share lessons learned with interested practitioners and academics.

# **Description of Content and Method of Delivery**

A brief demonstration and ensuing guided discussion of a computer assisted (CA) strategic approach to enhance conventional financial counseling/coaching. CA techniques are often used piecemeal in the field. This approach, as a coordinated strategy is geared to bridge the technology gap to engage the "Game Boy" Generation. The application of three simple and very effective financial counseling techniques, the spherical financial counseling program, the "Household Financial Sphere", to quickly determine and display core concerns for the visual learner; the Solution Focused Financial Coaching (c) approach to develop solutions for the issues for the aural learner; and finally, capturing the data gathered using the Navy's Financial Planning Worksheet (FPW) for the kinesthetic client, is a unique collaborative process for consideration. The practical considerations and underlying theory behind the techniques demonstrated will be discussed. Computer assisted counseling sessions, as currently practiced in some military settings, can accelerate and improve chances for success. The session will also include recent field experiences and lessons learned in over 15 years of CA trial and error. Time: 45 minutes

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# An Online Chat: A New Way to Communicate Financial Information

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Key Words: online chats, technology, delivery method, eXtension, financial education

# **Target audience**

Personal finance practitioners who teach or counsel adults in community, worksite, or military family support programs are the target audience for this presentation.

# **Objectives/Purpose**

-Understand the advantages and disadvantages of online chats

- -Understand essential preparations for good quality chats
- -Become aware of ways to engage an audience both intellectually and technologically
- -Engage participants in an online chat simulation experience
- -Learn effective uses of surveys and evaluations

# Description

An online chat is defined as "any system that allows any number of logged-in users to have a typed, real-time, online conversation via a network." The eXtension *Financial Security for All* Community of Practice has started engaging educators and the public in quarterly online chats. Chat systems combine the immediacy of talking with a recording in a written language. A past participant of a chat or any website user can easily review conversations held on the internet. Transcripts of the first two chats on subjects of "Recordkeeping for Tax Purposes" and "Mutual Funds" can be found on the eXtension Website at http://www.extension.org/pages/Personal Finance Chats.

Plans for a chat are formed when someone feels they would like to provide information on a topic that would interest a targeted audience. Others may be called upon – a technician, a moderator, an evaluator, and other experts for assistance. The potential audience for the chat is expanded by the inclusion of team members. It is helpful to prepare experts and the audience for a chat by suggesting one or more basic resources about the chosen topic. A bank of FAQs (Frequently-Asked-Questions) can be very helpful – such as the one found at <a href="http://www.extension.org/pages/How">http://www.extension.org/pages/How</a> to Use Frequently Asked Questions.

Become a part of a simulated Web-based eXtension-sponsored chat as a panel member or participant by contacting Michael Gutter, the designated leader for online chats, at 352-273-3529 or email him at msgutter@ufl.edu. Discuss with him the strengths and weaknesses of the online chat as a delivery method. He will share tips for participation in and presentation of an effective online chat.

Evaluations are used to determine the effectiveness of the chat and improve future chats. Usefulness of the chat was rated by participants of the Mutual Funds chat as "useful" by 54% and "very useful" by 23% of the respondents; information in the chat session helped respondents learn "a bit more information" (62%) and "quite a bit more information" (23%) about the topic; and 48% "definitely plan to put the information to use."

A transcript is published online after the chat's completion to share its essence with all who visit the Website. Finally, the chat is mined for questions and answers to add to eXtension's FAQs bank.

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# A Marketing and Audience Analysis for an Online Investment Education for Farm Households Project

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Key Words: distance education, investment education, audience analysis, farm households

## **Target Audience**

Professionals who design, update, and/or maintain financial education web sites.

# **Objective/Purpose**

To provide an overview of a marketing and audience analysis conducted as part of a two-year project designed to reach farm households with online investment education. The analysis, conducted by Bob Steen of Fleishman-Hillard Research, will guide the redesign and enhancement of the Investing for Your Future (IFYF) program to educate learners in rural settings via eXtension. IFYF, an award-winning, 11-unit basic investing home study course will be expanded and repurposed to become more interactive and attractive to farm households and others in rural settings who want to learn about investments to increase financial security. The project is guided by a team of 14 members from 10 states and USDA/CSREES (http://collaborate.extension.org/wiki/OIE\_Team) and is funded by the FINRA Investor Education Foundation (http://www.finrafoundation.org).

# **Description of Content and Method**

The first of six phases in the project is to collect baseline information on the target population related to investment concerns, learning preferences, and barriers to changing financial management behaviors. This marketing and audience analysis includes a situation analysis, consumer analysis, competitor analysis, an IFYF self-assessment, and specific performance objectives which are key to the successful redesign and enhancements of IFYF that are closely matched to the target audience.

A questionnaire was developed, reviewed by the team, and pilot tested. Additional revisions were made before the research was conducted in August 2008 via computer-assisted telephone interviewing (CATI) with 300 farm and ranch families from 43 states. Quotas were set resulting in representative sampling by geographic regions and age. Two focus groups were conducted via telephone after the survey and secondary research was completed to discuss and elaborate on findings.

Only farm and ranch households with Internet access were surveyed and respondents were self-declared as "involved in making decisions about household's personal finances." Results reveal that interviewed households' Internet service was provided by dial-up, 31%; DSL, 30%; wireless/satellite, 31%; and cable 5%.

Preliminary findings include:

- A significant minority of farm families do not have good personal investment plans in place, including retirement plans.
- Even those with good investment programs recognize a need for some further education on the basics of investing.
- Among farm families with Internet access online experience levels are high enough to not provide a major barrier to eXtension self-learning programs.
- Farm owner/operators express a willingness to use online investment education sponsored by the Cooperative Extension Service.
- Farm households see themselves as continuing to work in later life.

Utilizing an outside research group for this project has allowed the team to maintain a tight project schedule and has provided a wealth of insights into the target audience. At the end of this project, farm households will have a basic investment education program designed for them, available via eXtension, for learning anytime, anywhere.

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# Making the Most of Your 403(b) Plan: A Workshop for Educators and Non-Profit Employees

## Barbara O'Neill<sup>1</sup>, Rutgers University

403(b) plans are established under a section of the Internal Revenue Service (IRS) tax code as a voluntary defined contribution retirement savings plan for employees of educational, charitable, and non-profit organizations such as public schools, colleges and universities, churches, and hospitals. Money is set aside pre-tax in investments selected by participating employees and earnings grow tax-deferred until withdrawal, typically in retirement. A third advantage of 403(b) plans is that employee contributions, like those for 401(k) plans in the private sector, are made via payroll deduction. For both types of savings plans, the maximum contribution that participants can make is \$15,500 in 2008. In addition, employees age 50 and over can make an additional catch-up contribution of up to \$5,000 (\$20,500 total). Catch-up contributions are indexed for inflation and increase in \$500 increments. Unlike 401(k)s, 403(b) plans uniquely offer another catch-up opportunity called the "15-Year Rule" for eligible workers with 15 years of service with the same employer. This is on top of the general retirement savings catch-up contribution available to all older workers. Employees who are eligible for the 15-Year Rule may be able to contribute up to \$3,000 more per year, up to a \$15,000 lifetime maximum (Otter and Dauenhauer, 2002). Thus, an employee age 50 and over who is also eligible for the 15-Year Rule, and can afford it, may be able to contribute as much as \$23,500 to a 403(b) plan in 2008. Financial education is sorely needed about 403(b) plans. While generous contribution limits, noted above, provide a wonderful opportunity to save for retirement, the reality is that many eligible workers don't participate in 403(b) plans and most of those who do don't contribute anywhere near the maximum limits allowed. Of eligible employees for 403(b) plans, the overall national participation rate is about 35%, compared to about 70% for 401(k)s (Waddell, 2004). One reason is that many nonprofit sector workers earn relatively modest salaries. New 403(b) plan rules also go into effect January 1, 2009 that dictate clear disclosure of investment options (Buggs, 2007). Another area that requires thorough explanation is plan expense ratios. Historically, 403(b) plans have been dominated by high-cost insurance company annuities, which account for more than 70% of investments (Mincer, 2007).

# **Objective/Purpose**

- 1. Participants will learn about characteristics of 403(b) plans and ways to maximize plan benefits.
- 2. Participants will learn about important investment principles related to 403(b) plan investments.
- 3. Participants will learn about factors to consider when selecting specific 403(b) plan investments.
- 4. Participants will learn about available resources with information about 403(b) plans.

# Description

*Making the Most of Your 403(b) Plan: A Workshop for Educators and Non-Profit Employees* was developed as a workshop presentation for professional conferences attended by educators. It was designed to increase participants' knowledge of 403(b) plans and motivate them to participate in 403(b) plans to save for retirement. The program has several components including an 18-slide PowerPoint presentation designed for a one-hour time period as well as a BINGO game and an interactive *Jeopardy!* style game with 25 answers and questions. The games can be used in longer presentations to introduce or summarize the PowerPoint presentation content. An evaluation form was also developed to assess knowledge gained and planned behavioral changes. Among the topics covered in the PowerPoint presentation are the following: characteristics of 403(b) plans, 403(b) plan investment options, ways to maximize plan contributions, retirement savings phases (i.e., accumulation and distribution), 403(b) plan investment principles, 403(b) plan action steps, recent changes in IRS 403(b) plan regulations, 403(b) plan resources, and options for workers with poor 403(b) plan investment choices. Early evaluation results indicated knowledge gains and plans to review 403(b) plan documents and investment options.

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## Determinants of the Percentage of Income Spent on Food Eaten at Home and Away From Home

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## Abstract

Over time the most dramatic decline in household spending has been the percentage of income spent on food and clothing. However, this research focused only on the amount spent for food, specifically on the percentage of income spent for food eaten at home (FAH) or food eaten away from home (FAFH). Analysis using the 2004 Survey of Consumer Finances showed that, on average, 15.6% of income was spent on FAH and 5.6% of income was spent on FAFH. Ordinary Least Squares regressions showed that as household size increased, households spent more on FAFH.

Key Words: food expenses, income, Engel's law, household production theory

## Introduction and Purpose

One of the most notable changes in the food habits of Americans has been the dramatic decline in the family budget for the share of food eaten at home (Katz, 1997) and also the shift away from home-prepared food (Bowers, 2000). Individuals and families are eating less food at home and consuming more food from restaurants (U.S. Department of Agriculture, 2007). It is important to understand the determinants of these changing trends in food expenditures relative to income.

The shift in the share of income allocated to food and the likelihood of eating away from home have been influenced by social changes. For example, individuals and families are willing to spend more on time-saving services (e.g. processed food and restaurant meals) when their basic needs are fulfilled (Katz, 1997). Researchers have utilized several data sets to attempt to understand the determinants of spending on food eaten at home (FAH) and food eaten away from home (FAFH). Byrne, Capps and Saha (1996) used the National Panel Diary household data and found that the location and urbanization of households, marital status, race, and education level of the household head affected FAFH expenditure. Ham, Hiemstra and Yang (1998) learned that people with higher income, more education, and those who were single parents were more likely to purchase FAFH. French, Harnack and Jeffery (2000) found that frequent fast food restaurant use was associated with individuals who were male, younger, unmarried, with a lower income, and those who were minorities.

However, there has been less research on expenditures for food eaten at home (FAH) and food eaten away from home (FAFH) and how those amounts compare to household income. Therefore, this study will examine the share of income spent on each of FAH and FAFH using data from the 2004 Survey of Consumer Finances (SCF). The SCF is a national survey that collects detailed information on household demographics, income, assets, and liabilities. The study can help consumers, educators, financial advisers, and others to better understand the factors related to the percentage of income spent for food at home and away from home.

## **Review of Literature**

## Theoretical Framework

The theoretical framework of the study is based on two theories: Engel's law and household production theory. Engel (1985) proposed that the share of expenditure for food while controlling for household size and composition was an indicator of how well households lived. Engel stated that households with higher food shares were disadvantaged and those with lower food shares experienced greater well-being. Deaton and Paxson (1998) are recent researchers who have shown support for Engel's theory. They found that the share of spending for food declined as income increased and this produced an increase in welfare.

Household production theory (Becker, 1965; Deaton & Muellbauer, 1980; Michael & Becker, 1973; Mincer, 1962) assumes that households are like business firms. Households will use human capital, goods, and time to produce utility. Households have many functions, and they make decisions about the use of resources. They consider the role of time when making consumption decisions. In terms of FAH and FAFH, the theory views the household as a production and consumption unit. The optimal decision depends on many factors, such as the household's financial status, time constraints, and cooking skills of the household head or other members (Stewart & Yen, 2004).

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The theory suggests that the value of time is an important factor when households decide whether to prepare and consume food at home or spend more and consume food away from home (Lancaster, 1966, 1971; Prochaska & Schrimper, 1973). Household production theory has been applied to research on spending on food at home and away from home (e.g., Cai, 1998; Ham et al., 1998; Ham, Yoon & Leong, 2003; Hiemstra & Kim, 1995; McCracken & Brandt, 1987; Soberon-Ferrer & Dardis, 1991).

## Food at Home (FAH) and Food away from Home (FAFH)

The shift away from food preparation at home has resulted from social changes. For example: the increased number of women in the labor force may be related to changes in spending on food at home and away from home. In 1996, 62% of women with young children were in the labor force (Hayge, 1997). In 2002, 72% of young women with children were employed (Bureau of Labor Statistics, 2002). This trend is consistent with household production theory. As time constraints have increased, it has become more convenient to consume food away from home. At the same time, the increase in household income has made it more affordable to consume more food away from home (Bowers, 2000; Chern & Lee, 1994).

#### Family Type

Married couples have increased their spending on both FAH and FAFH after controlling for household size (Chung, Popkin, Domino & Stearns, 2007). Jang, Ham, and Hong (2007) found that married couples consumed more FAFH. However, when married couples became singles as a result of a divorce, or especially death, the individual (or household) was more likely to decrease spending on food at home as well as decreasing their individual expenditure for food away from home (Jang et al., 2007).

However, the effect of marital status on FAFH expenditure has produced conflicting results (Cai, 1998; Mihalopoulos & Demoussis, 2001). Fan, Brown, Kowaleski-Jones, Smith and Zick (2007) analyzed household food expenditure patterns using the Consumer Expenditure Survey. They found that households headed by single men were more likely to consume FAFH. The difference in consuming FAFH between households headed by single women and married couples was smaller. One explanation for this difference was that women had more food preparation skills than men. Therefore, households with an adult woman present were more likely to cook and consume food at home.

Ham, Hwang and Kim (2004) concluded that households headed by single women were less likely to spend on FAFH compared to households headed by men. Ziol-guest, Deleire, and Kalil (2006) suggested that single parents, compared to married couples with children, spent a greater percentage of their food budget on both alcohol and FAFH. In contrast, they spent a smaller percentage of their food budget on vegetables and fruits. Single fathers spent more on alcohol and FAFH, and less on vegetables, fruits, meat and beans, desserts and snacks, and prepared foods. Single mothers spent a greater percentage on grains and nonalcoholic beverages and less on vegetables and alcohol.

It was believed that single parents had less economic resources, and they faced greater time demands than married parents (Sandberg & Hofferth, 2001). French et al. (2000) found that more frequent fast food restaurant use was significantly associated with being unmarried. In summary, compared to married couples with no children, those who are married with children, single male parents, single female parents, and single individuals are expected to spend a greater percentage of income on food at home (FAH) and food away from home (FAFH).

#### Age

There could be a positive relationship between age and cooking skills and as a result older individuals who have more experience with cooking might spend more on food at home. In contrast, younger individuals might purchase more convenience items such as fast food (Stewart & Yen, 2004). However, households appear to substantially reduce their consumption expenditures around the age of retirement. These age-related patterns were similar to results from Mariger (1987), and Bernheim, Skinner and Weinberg (2001).

Chung et al. (2007) found that retirement decreased consumption of FAFH but there was no reduction in spending on FAH at retirement. However, the results for age were mixed. As individuals aged, they might reduce household work and eat out more frequently, but spend less due to less need for food, weaker digestion, or less income. From another perspective, it was thought that older individuals were less likely to eat out due to declining health and reduced mobility. Also, older individuals might spend less for health or financial reasons (Jang et al., 2007).

Nielsen, Siega-Riz and Popkin (2002) found that adults aged 19 to 39 consumed about 30% of their energy from restaurant and fast-food while middle-aged and older adults consumed much less. Other researchers have reported similar age shifts in regard to food consumption in restaurants and fast-food restaurants (Bandini, Schoeller, Cyr & Dietz, 1990; Bjorntorp, Bergman, Varnauskas, & Lindholm, 1969; Brown & Konner, 1987; French et al., 2000). In summary, compared to household heads that are less than 45 years old, middle-aged and older household heads are expected to spend less of their income on both FAH and FAFH.

### Race

Stewart and Yen (2004) stated that race was related to food expenditure. Fan et al. (2007) found that Black and Hispanic individuals or families were less likely to consume FAFH, compared to White individuals and families. Other research has reported that households headed by White individuals and families spent more on eating out (Ham et al., 2003; Jensen & Yen, 1996; McCracken & Brandt, 1987; Yen, 1993).

Some researchers have produced different results in regard to race and spending on food. Lanfranco, Ames and Huang (2002) found that Hispanic families allocated more of their budgets to total spending on FAH and FAFH than non-Hispanic families. French et al. (2000) found that more frequent fast food restaurant use was significantly associated with minorities. Although research has shown conflicting results in regard to race and spending on food, it is expected that compared to minority households, White households will spend a smaller percentage of their income on both FAH and FAFH.

#### Education

Ham et al. (2004) stated that education of the head of household was positively related to FAFH expenditure. In addition, Stewart and Yen (2004) found that having a college-educated household head had a positive effect on the probability of spending on FAFH. Previous research suggests that education increases the likelihood of eating away from home (Ham et al., 1998) and also the amount spent on food away from home (Ham et al., 2004; Ham et al., 2003; Mihalopoulos & Demoussis, 2001; Soberon-Ferrer & Dardis, 1991).

Fan et al. (2007) discovered that household heads with a college education were less likely to consume fast-food meals compared to those headed by an individual with only a high school diploma or less formal education. Paeratakul, Ferdinand, Champagne, Ryan and Bray (2003) suggested that fast-food use might decline at the highest levels of education. People with 4 or more years of college education reported lower fast-food consumption compared with those with high school or some college education. Therefore, compared to household heads with less than a high school education, household heads with a high school education, some college, and those with a college or graduate degree are expected to spend a smaller percentage of their income on FAH and FAFH.

## Household Size

American households are becoming smaller. In 1980, the average household size was 2.8 persons. In 2000, it was 2.5 persons and average household size is projected to decline to 2.4 persons by 2020 (Cromartie, 2002). In previous studies, household size has been positively related to the level of expenditure for food (Deaton & Paxson, 1998; Hiemstra & Kim, 1995; Nayga & Capps, 1992; Yen, 1993). Also, Stewart and Yen (2004) found that household size was positively related to FAFH. Households with several adults and no children spent more per person per week at restaurants. Also, French et al. (2000) mentioned that household size was positively associated with fast-food consumption. In summary, the relationship between household size and the percentage of income spent on both FAH and FAFH is expected to be positive.

#### Work Hours

Based on the household production theory (Becker, 1965; Deaton & Muellbauer, 1980; Michael & Becker, 1973; Mincer, 1962), time is an important factor when people decide to consume food at home or away from home. Longer hours worked each day or week increase time constraints, and decrease the possibility that families will enjoy eating at home because of food preparation. Fan et al. (2007) found that household heads who worked more than 35 hours per week were more likely to spend on FAFH, compared with household heads who worked less than 35 hours per week. Stewart and Yen (2004) stated that households might be more likely to eat food away from home if the household heads worked longer hours outside the home. Fast food might be a convenient option for these households. In fact, the likelihood that a household consumes some fast food has been shown to increase with the number of hours worked and the percentage of income spent on FAFH is expected to be negative while the relationship between hours worked and the percentage of income spent on FAFH is expected to be positive.

### Health Status

As more food is consumed away from home, there is increased concern about the health of American consumers. Research has indicated that FAFH is generally less healthy than FAH (e.g., Guthrie, 2002; Lin and Frazao, 1999). Pert and Bhuyan (2007) stated that the growing demand for FAFH has resulted in a challenge to health because most restaurant meals contain excessive amounts of fat and sodium and insufficient amounts of fruits and vegetables. In general, FAH is believed to be more healthful than food away from home.

Chung et al. (2007) researched the relationship between spending on FAFH and Body Mass Index (BMI). Spending on eating out was negatively associated with BMI. Also, a reduction in spending on FAFH led to weight loss, although the magnitude was very small. Hurd and Rohwedder (2004) stated that those who rated their health as poor spent less on food. In summary, compared to household heads with poor health, households with heads with fair, good, or excellent health are expected to spend a larger percentage of income on FAH, and they are expected to spend a smaller percentage of income on FAFH.

#### Work Status

Household heads who work full-time tend to earn more than part-time workers, students, or retirees. Cai (1998, p.351) suggested that households who allocate more time to work will spend more on food. Not surprisingly, it was found that full-time workers spent substantially more on food than non-workers. Similar results were found by McCracken and Brandt (1987) and Soberon-Ferrer and Dardis (1991). In summary, compared to household heads with a part-time job or other work status are expected to spend a larger percentage of income on FAH, but they are expected to spend a smaller percentage of income on FAFH.

#### Methodology

## Sample

The data were drawn from the 2004 Survey of Consumer Finances (SCF), which was sponsored by the Board of Governors of the Federal Reserve System. The 2004 SCF was collected by the National Organization for Research and Computing at the University of Chicago (NORC). The sample of the SCF is based on a dual-frame sample design. The first set was selected from a standard multi-stage area-probability design. The goal of this set is to provide a comprehensive coverage of characteristics of the population. This set included 3,007 cases of interviews. However, in order to disproportionately select families which were likely to be wealthier, a second set of data was needed. It was selected from tax data from the statistical records provided by the Statistics of Income Division of the Internal Revenue Service (SOI). The second set contributed 1,515 cases to final interviews. The total number of households in the data set is 4,522. In the current study, only households with positive income were included. Thus, the total number of households in the study was 4,080.

#### Dependent Variables

There were two dependent variables in the study. The variables were: the percentage of income spent on food eaten at home, and the percentage of income spent on food eaten away from home. The variables were developed by dividing the amount spent for food at home and food away from home by household income.

#### Independent Variables

The independent variables for the study included family type, age, race or ethnicity, education, household size, the number of hours the household head worked, health status, and work status. Family type was a combination of gender, marital status, and the presence of children. There were five categories for family type: married with children, married without children, single male parents, single female parents, and singles (either men or women). The singles category was the reference group.

Age was categorized as: 45 or younger, 46 to 65 and older than 65. Households headed by a younger individual were the reference group. Race was coded as White or non-white. The latter was the reference group. Education was coded as less than high school, high school, some college, and college degree or a graduate degree. The first group was the reference group.

Household size and work hours were continuous variables. Work status was coded as full-time, part-time, and others (retirees, students or homemakers). The reference group was having a full-time job. Health status was measured by the question in the SCF that asks "Would you say your health is excellent, good, fair, or poor?" Poor health status was the reference group. Table 1 shows the coding of dependent and independent variables.

#### Method of Analysis

Ordinary Least Squares (OLS) regression was conducted to examine the factors that influenced the percentage of income spent on food eaten at home (FAH) or food eaten away from home (FAFH). OLS is an appropriate

tool to predict and explain a continuous dependent variable (Hair, Black, Babin, Anderson & Tatham, 2006). Two OLS regressions were conducted.

Coding of Variables		
Variables	Coding	
<u>Dependent Variable</u>		
Percentage of income spent on FAH	Continuous	
Percentage of income spent on FAFH	Continuous	
Independent Variables		
Family type		
Married with no children (reference group)	1 if yes, 0 otherwise	
Married with children	1 if yes, 0 otherwise	
Single rathers	1 if yes, 0 otherwise	
Single motners	1 if yes, 0 otherwise	
Singles	1 II yes, 0 otherwise	
Age of household head		
45 or younger (reference group)	1 if yes 0 otherwise	
Between 46 and 65	1 if yes, 0 otherwise	
Older than 65	1 if yes, 0 otherwise	
Race of household head		
White	1 if yes, 0 otherwise	
Education of household head		
Less than high school (reference group)	1 if yes, 0 otherwise	
High school	1 if yes, 0 otherwise	
Some college	1 if yes, 0 otherwise	
College and graduates	1 if yes, 0 otherwise	
Household size	Continuous	
Work hours (per week)	Continuous	
Health status of household head		
Excellent	1 if yes, 0 otherwise	
	1 if yes, 0 otherwise	
Fair	1 if yes, 0 otherwise	
Poor (reference group)	1 if yes, 0 otherwise	
Work status of household head		
Full-time (reference group)	1 if yes, 0 otherwise	
Part-time	1 if yes, 0 otherwise	
Others	1 if yes, 0 otherwise	

## **Descriptive Statistics**

Table 1

On average, the percentage of household income spent on food at home (FAH) was 15.56%, and the average percentage of household income spent on food away from home (FAFH) was 5.59%. There was wide variation in both variables.

About 27% of the sample was married with children, 33% were married without children, 2% were single fathers, 10% were single mothers, and 28% were single individuals. About 46% of the household heads were 45 or younger, 33% were between 46 and 65, and 19% were older than 65. Seventy-eight percent of household heads were white. About 14% of household heads had education less than high school, 29% had a high school degree, 23% had some college, and 34% had a college degree or advanced degree.

The typical household consisted of either 2 or 3 persons. On average, household heads worked about 32 hours per week. The majority reported good health (29% had excellent health, 49% had good health, 17% had fair

health, and 5% reported poor health). Two-thirds of household heads had full-time jobs, 9% worked part-time, and about 25% were retired, students or homemakers. Table 2 shows the descriptive information.

Table 2

Weighted Statistics of Households with Positive Income in the 2004 Survey of Consumer Finances (N = 4,080)

Variables	Mean	Median	Standard Deviation	Frequency (percent)
Dependent Variable				<b>a</b> ,
Percentage of income spent on FAH	15.56	9.00	35.21	-
Percentage of income spent on FAFH	5.59	3.12	12.25	-
Independent Variables				
Family type				
Married with children	-	-	-	27.42
Married with no children	-	-	-	33.31
Single fathers	-	-	-	2.19
Single mothers	-	-	-	9.45
Singles	-	-	-	27.64
Age of household head				
45 or younger (reference group)	-	-	-	45.57
Between 46 and 65	-	-	-	33.40
Older than 65	-	-	-	19.03
Race of household head				
White	-	-	-	78.00
Non-white	-	-	-	22.00
Education of household head				
Less than high school	-	-	-	14.14
High school	-	-	-	28.97
Some college	-	-	-	23.20
College degree or graduate degree	-	-	-	33.70
Household size	2.43	2.00	1.36	-
Work hours (per week)	31.97	40.00	21.63	-
Health status of household head				
Excellent	-	-	-	28.81
Good	-	-	-	48.50
Fair	-	-	-	17.46
Poor	-	-	-	5.24
Work status of household head				
Full-time	-	-	-	66.02
Part-time	-	-	-	9.35
Others	-	-	-	24.63
NOTE: dashes indicate "not applicable "				

## **Results of Ordinary Least Squares Regression**

The results of the Ordinary Least Squares regressions showed that hypotheses for family type, age, ethnicity, education, and work status were supported. The hypotheses for household size and hours of work were partially supported. The hypotheses for health were not supported. See Table 3.

### Food at Home (FAH) Results

In regard to the percentage of income spent on food at home (FAH), the results provided support for Engel's law. Compared to married household heads without children, household heads who were married with children, single male parents, single female parents, and singles spend a larger percentage of income on food eaten at home (FAH). Among all family types, the effect for single female parents was the largest. The results suggest that single mothers had the least welfare compared to other types of families.

Compared to household heads whose age was 45 or younger, household heads who were middle-aged and older than 65 spent a smaller percentage of their income on FAH. This suggests that households headed by a person older than 45 have greater welfare (e.g. well-being) than those headed by a younger person.

Compared with non-white household heads, White household heads spent a smaller percentage of income on

FAH. This indicates that household with White heads have greater welfare (e.g. well-being) than households with a head who is a minority.

Compared to household heads with less than a high school education, household heads with all other levels of education spent less of their income on FAH. Those with a high school degree and some college education spent about 9.5% less of their income on FAH. Heads with a college or graduate degree spent about 15% less of their income on FAH. In summary, having more education helped the household have greater welfare because a smaller share of income was spent on food.

Household size was positively related to the percentage of income spent on FAH. For each additional person in the household, the percentage of income spent on FAH increased about 2%.

Compared to household heads with a full-time job, household heads with part-time jobs spent about 11.6% more and those with other work status spent about 9% more of income on FAH. In summary, household heads with a full-time job had greater welfare that those with part-time jobs or those who were not working based on the percentage spent on FAH. Finally, the number of hours worked and health status were not significantly related to the percentage of income spent on FAH. See Table 3.

#### Food away from Home (FAFH) Results

With regard to the percentage of income spent on food away from home (FAFH), several hypotheses were supported. Heads who were married with children, single female parents, and singles spent a larger percentage of income on food away from home (FAFH) than couples without children. There was no difference between single male parents and couples without children (the reference group). Among all family types, single individuals spent a larger percentage of income on FAFH. The family type that spent the 2<sup>nd</sup> highest percentage of income on FAFH was single mothers.

Compared to households with a head 45 or younger, households with heads that were 46 to 65 and 65 and over spent a smaller percentage of income on FAFH. The results show that heads in each of the two older age categories spent 2-3% less of their income on FAFH.

Compared to non-white household heads, White household heads spent less of their income on FAFH. Household heads with a high school degree and a college or advanced degree spent less of their income on FAFH compared to heads with less than a high school degree. This provides partial support for the hypothesis on education and FAFH.

Hours of work were positively associated with the percentage of income spent on FAFH. For each additional hour worked per week, the share of spending on FAFH increased by .03%. This is consistent with household production theory.

The relationship between work status and spending on FAFH was significant. Compared to household heads with a full-time job, household heads with a part-time job will spend 3.7% more on FAFH while others (retirees, students or homemakers) will spend about 2% more on FAFH.

Finally, two variables were not significantly related to the percentage of income spent on FAFH. The two variables were health status and household size. See Table 3 for results.

#### Implications, Limitations and Future Research

The results provided empirical evidence for both Engel's law and household production theory. In summary, household heads who were married with no children, older, white, with more education, and working full-time had greater welfare than their counterparts. The results showed that household heads with these characteristics spend a smaller percentage of income on FAH and FAFH. There were some interesting differences in the results. As household size increased, the percentage spent on food at home (FAH) increased but this was not true for food away from home (FAFH). These results support Engel's law. When household heads worked longer hours per week, those households spent a larger percentage on food away from home (FAFH), but this was not true for food at home (FAH). These results support household production theory.

The results also provide information for consumers, educators, financial advisors, and others such as those in the food industry. The share of income spent on food is associated with the welfare of households. Educators and financial advisors should help clients determine the percentage of income they are spending for each type of food. If the share spent on food seems to be too high relative to other expenses, educators and financial advisors

should help clients learn how to cut costs, if possible. For example, consumers may not be aware of how much they are spending on food away from home.

Table 3

Results of Ordinary Least Squares	Regression for Percentage of	of Income Spent on	Food at Home and Away from
Home for Households in the 2004	SCF(N = 4,080)		

	Percentage of income spent on		Percentage of income spent on	
	FAH		FAFH	
Independent Variables	Parameter estimate	p-value	Parameter estimate	p-value
Family Type (reference group: Married with	-	-	-	-
no children)				
Married with children	0.0414	0.0103*	0.0170	0.0040**
Single fathers	0.0710	0.0390*	0.0227	0.0714
Single mothers	0.1631	<0.0001***	0.0306	<0.0001***
Singles	0.0926	<0.0001***	0.0427	<0.0001***
Age (reference group: 45 and under)	-	-	-	-
Between 46 and 65	-0.0541	<.0001***	-0.0248	<.0001***
Older than 65	-0.0971	<.0001***	-0.0358	<.0001***
Race (reference group: Non-white)	-	-	-	-
White	-0.0338	0.0049**	-0.0122	0.0054**
<i>Education</i> (reference group: Less than high school)	-	-	-	-
High school	-0.0945	<.0001***	-0.0131	0.0389*
Some college	-0.0969	<.0001***	-0.0072	0.2729
College and graduates	-0.1523	<.0001***	-0.0233	0.0002**
Household size	0.0205	0.0007**	0.0001	0.9494
Work hours (per week)	0.0007	0.1306	0.0003	0.0369*
Health status (reference group: Poor)	-	-	-	-
Excellent	-0.0189	0.4696	0.0059	0.5316
Good	-0.0094	0.7108	-0.0022	0.8170
Fair	0.0281	0.2912	0.0114	0.2437
Work Status (reference group: Full-time)	-	-	-	-
Part-time	0.1157	<.0001***	0.0371	<.0001***
Others	0.0905	0.0002**	0.0209	0.0162*
$R^2$	0.0976		0.064	
Adjusted R <sup>2</sup>	0.0939		0.060	
NOTE: * p < .05; ** p < .01; *** p < .0001; d	lashes indicate	"not applicable."		

Single mothers were the most vulnerable family group. They had the least welfare of all types of families. This was shown by the larger percentage of income spent on both food at home and food away from home compared to other family types. Single mothers may be faced with both time and income constraints. The second most vulnerable group was single individuals. They might have more time for preparing food than single mothers but they might have income constraints. Advice and training from educators could be very helpful for these two groups, in particular.

In addition to providing help with evaluating the amount spent on food, financial advisors have an opportunity to provide information about setting goals, establishing emergency funds, managing credit, and beginning to save. They are likely to meet with clients of all ages and education levels. They might be able to share information gained from client meetings with community leaders. The information could be used to consider how the needs of vulnerable consumers are being met by community services.

Other people who can benefit from the results are supermarket managers and food service industry operators. Although they are already aware of the tendency for consumers to purchase food away from home, supermarket managers and food-service personnel can increase their efforts to provide consumers with healthful choices and to provide information about nutritional content. It is important that individuals and families are knowledgeable about the healthful qualities of food that they purchase.

One limitation of the study is the lack of information on where FAFH is purchased. Food eaten away from home could be from either full-service restaurants or fast food restaurants. There may be two very different groups of people who purchase these types of food. It is suggested that future research should investigate expenditure on these two types of FAFH.

The results supported the concept that welfare increased as the share spent on food decreased. It would be interesting to examine the effect on other expenditures when households spent more or less on food.

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# Characteristics of Households Who Contribute Both Money and Time to Charitable Organizations

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### Abstract

Some experts believe that those who volunteer their time are more likely to give money and that these individuals will give more than contributors who do not volunteer time. The purpose of this study was to investigate the characteristics of households that contribute both money and time to charitable organizations. Logistic regression using data on 4,519 households from the 2004 Survey of Consumer Finances showed that household heads who were 35 and older, married, with more education, more income, and larger families, homeowners, and had received inheritances were more likely to contribute both money and time to charitable organizations compared to other households.

Key Words: charitable contribution, social exchange theory, spending behavior, Survey of Consumer Finances

# Introduction and Purpose

The impulse to be philanthropic is described as a person's dedication and regard for others and the exhibition of a behavior that is the opposite of "egoism" (Kidd, 1996, p. 181) and "selfishness" (Kidd, 1996, p. 181). Philanthropy is also defined as an expression of generosity to charitable societies (Kidd, 1996). Brown and Ferris (2007) define philanthropy as an individual's act for civic good while identifying society's ability to identify public tribulations and successfully address them.

Rockefeller (1978, p. 26) called philanthropic givers "do-gooders." He defined philanthropy as the act of giving of oneself and one's resources. He justified the need to give by stating that it betters society by helping solve social crises. In the United States, monetary contributions amount to over \$241 billion each year, while volunteering amounts to an equivalent of \$272 billion annually (Reed, Aquino & Levy, 2007). From September 2004 to September 2005, Americans spent 134 hours, on average, volunteering. This volunteer activity would be the equivalent of donating \$18.04 per hour (Bain, 2006).

Compared to the 1960s, the rate of individual giving has decreased drastically along with a 1% decrease in corporate giving (Rockefeller, 1978). The decrease can be blamed on a decline in government funding and an increase in competition by nonprofit organizations (Bendapudi, Singh, & Bendapudi, 1996). Another reason for the decrease is the shortage of funds from individual contributors and a lack of volunteers. This has become very evident over the last five years with the closing of over 150 schools and colleges (Rockefeller, 1978). Thus, the need for charitable giving has become even more important than it was in the past (Financial Planning Association, 2004). One of the biggest crises currently facing non-profit organizations is financial maintenance (Ryan, 2001; Morino & Shore, 2004). Reed et al. (2007) state that nonprofit organizations need to seek help in order to survive.

Van Slyke and Johnson (2006) quoted the philanthropic axiom which states that people who volunteer time are more likely to give and that these volunteers give more than contributors that do not volunteer. However, little, if any, empirical research exists that explores the likelihood of households contributing both money and time. Also, there is no comparison of households that give money and time from households who do not give. Understanding the characteristics of households who give both money and time will benefit nonprofit organizations that want to increase both revenue and volunteer support.

The purpose of the study is to investigate the characteristics of households that contribute both money and time compared to other households. A second focus is to learn about the spending behavior of households that contribute money and time compared to other households.

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### **Conceptual Framework**

Although theories from economics and public administration explain charitable donations, three theories from psychology are also important in understanding the socioeconomic characteristics of charitable givers. These theories include the social exchange theory, the social norms theory, and the evolutionary theory.

The social exchange theory proposes that social behavior is based on the exchange of both material and non-material goods. During such exchanges, people endeavor to maximize benefits and minimize cost (Myers, 2006). Homans (1958) explains that people want to make a profit and to do that, the rewards must exceed the cost. Such rewards are either external in the form of money or internal in the form of an "emotional state" (Myers, 2005, p. 479). Myers explains that social exchange theory determines people's decision to help. For example, many individuals will donate to a particular charity if they know that a product or service is offered in return.

Social norm theory acts as the prescription of societal expectations. This theory states that people help because helping is a norm. There are two social norms that encourage giving: the reciprocity norm and the social responsibility norm (Myers, 2005). Gouldner explains reciprocity "as a mutually contingent exchange of benefits between two or more units" (1960, p. 164). The reciprocity norm is based on the expectation that people help because they have been helped in the past. The social responsibility norm states that people help others without the expectation of potential benefits. This norm also states that people are inclined to help those who are dependent on them (Myers, 2005).

Another theory, the evolutionary theory, is derived from evolutionary psychology. Evolutionary psychology asserts that natural selection explains biological traits and also psychological personality and social behavior (Myers, 2005). This theory contends that biological genes motivate people to give of themselves for the well being of others. There are two types of selfless helping based on the evolutionary theory: kin protection and reciprocity (Myers, 2005).

Kin protection theory contends that genes motivate people to care for their relatives (Myers, 2005). Kin protection theory is observable through kin selection. Kin selection states that people are more altruistic towards those who share their genes. This level of altruism is most evident with the care parents provide to their children. "Parents who put their children's welfare ahead of their own are more likely to pass their genes on than parents who neglect their children" (p. 487). Genes are shared by members of the same family and they are also shared by strangers. This is obvious through physical resemblances. An example is: "blue-eyed people share particular genes with other blue-eyed people" (p. 487). In general, people are more likely to be help people who are more like themselves (Myers, 2005).

The notion of reciprocity in the evolutionary theory is similar to the social norm theory. The main difference is that reciprocity in the evolutionary theory is based on the expectation of genetic self-interest. For example, people help each other because they expect something in return (Myers, 2005). These theories might explain charitable contributions but research should be designed to determine if they apply to contribution of both money and time.

Many studies have examined the behavioral motives behind giving. These studies have found various social, psychological, religious, and economic determinants as to why people donate money (Ribar & Wilhelm, 2002; Smith, 1980; Sojka, 1986). Researchers have examined donors and the agencies involved (McClelland & Brooks, 2004; O'Neil, 2001). Researchers have also explored the economics behind giving. For example, federal tax policies and tax exemptions regarding giving are likely to encourage giving (Brooks, 2000; Clotfelter, 1985; Wolff, 1999). However, there is little, if any, empirical research that examines giving both money and time.

### **Review of Literature**

Wilson and Musick (1998) explained that resources such as human and social capital can be used to study why households volunteer or donate money (Bryant, Jeon-Slaughter, Kang, & Tax, 2003). Social capital is the shared set of connections that enable people to access social networks (Mesch, Rooney, Steinberg & Denton, 2006). These networks "may be used not only to gain information about the volunteer and donations markets but also to ease access to these markets" (Bryant, Jeon-Slaughter, Kang, & Tax, 2003, p. 45). According to Mesch et al. (2006), human capital includes education, skills and experience. In this study, education is expected to be positively related to giving money and time to charitable organizations.

Age

Booth (1972) and Fischer (1982) were early researchers who examined how age relates to helping. Booth (1972) argued that as individuals advance in age, there is a decrease in volunteering. However, Fischer (1982) found that older people help more than younger people. According to Fischer, older people, compared to younger people, communicated more with friends. Therefore, helping took place in an interactive environment (1982). Gallagher (1994) compared individuals based on age (older, middle-aged and younger) and showed that older individuals, compared to middle-aged individuals, were less likely to help someone they know. However, older individuals, compared to younger individuals, were more likely to volunteer. She found that younger individuals, compared to older individuals, spent considerably less time volunteering in organizations that assisted the needy.

Barnett, King and Howard (1979) found a linear relationship between altruistic behavior and age. They noted that as a person aged, he was more likely to be altruistic. Midlarsky and Hannah (1989) found that older people donated more often than younger people. Although older individuals donated more often, the total amount they contributed was less than the total contributed by younger and middle aged individuals. Midlarsky and Hannah pointed out that the reason older individuals gave less could be attributed to their limited financial resources.

The Independent Sector is an organization within and outside of the United States that supports and promotes philanthropic messages through research and public policy (Independent Sector, 2008). They also collect data on philanthropy. Based on the 2001 Independent Sector report, Mesch et al. (2006) stated that 44% of adults over the age of 21 volunteered and 69% of them volunteered on a consistent basis.

Mesch et al. (2006) found that the likelihood of contributing increased as age increased. Mesch et al. (2006) said, "people gave \$21 more with each additional year of age," (p. 576) but age had no impact on volunteering. The Independent Sector (1999) reported that 43% of adults 75 years and older volunteered; this represented an 8% increase from 1995. Therefore, the following hypothesis was proposed.

H1: Older heads of households will be more likely than younger and middle aged heads of households to contribute both money and time to charitable organizations.

### Race

Previous research suggests that little interest has been placed on racial differences in volunteering (Wilson, 2000). With the increase in minorities in the workforce, the relationship between race and charitable donations should be explored (Carson, 1993). Race is a significant predictor of giving (Hodgkinson, Weitzman, Noga, Gorski, & Kirsch, 1996). Whites volunteered more than Mexican and African Americans (Bryant, Jeon-Slaughter, Kang, & Tax, 2003; Wilson, 2000), but this finding declines once variables like education, income and occupation are controlled for (O'Neil, 2001).

Mesch et al. (2006) found that race was not significant in predicting donations but produced significant results for volunteering. The findings showed that Blacks were 26% more likely than Whites to volunteer while other minority groups were 30% less likely to volunteer than Whites (Mesch et al. 2006). The Independent Sector (1999) reported that 46% of Hispanics and 47% of Blacks volunteered. This represented a 6% and 12% increase from 1995 for both ethnic groups, respectively. Therefore, the following hypothesis was proposed.

H2: Non-White heads of households will be more likely than White heads of households to contribute both money and time to charitable organizations.

#### Marital Status and Size of Family

Mesch et al. (2006) noted that researchers have begun conducting studies to determine how marital status influences charitable donations or volunteering. Mesch et al. (2006) found that married couples gave more than single men and women. They concluded that married individuals had a tendency to donate twice as much as a single woman and three times as much as a single man. Their findings show that compared to married couples, single people, especially single women, volunteered more hours.

Vincent and DeVaney (2003) found that household size positively influenced the likelihood of household donations to charitable organizations. Andreoni, Gale and Scholz (1996) learned that households with children under the age of three were less likely to volunteer. Using data from the 1898 Consumer Expenditure Survey, Dinkins (1991) found that married couples with children gave charitable contributions more often than single household heads.

Therefore, the following hypotheses are proposed.

H3: Households with married heads will be more likely than households headed by a single person to contribute both money and time to charitable organizations.

H4: As the size of a family increases, the likelihood of contributing both money and time to charitable organizations will increase.

#### Education

Education is often used to predict the amount of charitable contributions (Smith 1994; Hodgkinson, Weitzman, Noga, Gorski, & Kirsch, 1996). Wilson and Musick (1998) reported that volunteering increased with higher education. Dinkins (1991) found a positive relationship between education and charitable donations. Mesch et al. (2006) found that the likelihood of contributing money increased as education increased. Also, individuals with a higher education volunteered more often and contributed more hours as a volunteer. Therefore, the following hypothesis was proposed.

H5: As education increases, the likelihood of contributing both money and time to charitable organizations will increase.

#### Income and Spending Behavior

Researchers have found that income positively affects volunteering (Freeman, 1997; Smith, 1994). Mesch et al. (2006) found that the likelihood of contributing money increased with higher income. Specifically, donations increased by \$21 for an additional \$1,000 increase in income. "Income increased the probability of being a volunteer ... but did not affect the hours volunteered" (Mesch et al. 2006, p. 579). Brown and Ferris (2007) suggested that giving will increase as income increases. They measured income by categorizing households into two groups: low income families that earned less than \$30,000 and middle income families that earned from \$30,000 and \$75,000. Their study did not include high income families.

The Independent Sector (1999) reported that contributions were positively influenced by income. The Independent Sector found that households whose incomes were the lowest and highest gave a larger percentage of their total household income. Households whose income was less than \$10,000 a year and greater than \$100,000 a year donated 2.5% and 1.9%, respectively, of their total household income.

Little is known about how a person's saving (or spending) behavior impacts donating and volunteering. Savings in the nonprofit sector is usually viewed from a tax perspective. It is assumed that individuals contribute to realize tax savings from charitable contributions (Gittell & Tebaldi, 2006; Leimberg, 1974). With the 1986 tax reform act, the advantages of tax saving using charitable contributions diminished (Louderbach & Cash, 1990). However, it is assumed that many individuals contribute to realize tax savings.

The Independent Sector (1999) reported that giving and volunteering is affected by a household's future perception of money. They found that people who were not concerned about having enough money in the future donated a higher proportion of their income. Therefore, the following hypotheses are proposed. The relationship between spending and income is used as a proxy for saving behavior.

H6: As household income increases, the likelihood of contributing both money and time to charitable organizations will increase.

H7: Households who spend less than their income will be more likely to contribute both time and money to charitable organizations than households who spend more or equal to their income.

### Homeownership

While measuring lifecycle, financial, and attitudinal characteristics of charitable donors, Drollinger and Johnson (1995) found that homeowners were more likely than renters to donate to charitable organizations. Vincent and DeVaney (2003) found that homeowners were 79% more likely to give money than renters. Therefore, the following hypothesis was proposed.

H8: Homeowners will be more likely than renters to contribute both money and time to charitable organizations.

### Inheritance

A public awareness campaign organized in the United Kingdom revealed that contributions from wills amounted to the largest source of revenue for charitable organizations (Wise, 2005). Weiss (2003, p.32) noted that within the next

decade, parents will leave bequests of at least \$1 trillion to their children and charities are ready "to help them spend it." Therefore, the following hypothesis was proposed.

H9: Households who receive an inheritance compared to those who did not receive an inheritance will be more likely to give both money and time to charitable organizations.

# Methodology

# Data and Sample

The data were extracted from the 2004 Survey of Consumer Finances (SCF). The SCF is a cross sectional survey collected through the aid of computer-assisted personal interviewing. It is a survey collected every three years by the National Organization for Research at the University of Chicago (Kennickell, 2003). It is sponsored by the Board of Governors of the Federal Reserve System, in conjunction with the Statistics of Income Division of the Internal Revenue Service. Data from this survey is representative of the financial characteristics of the primary economic unit. The SCF contains data regarding households' credit attitudes, financial behavior, debt, demographics and employment background. A weight variable in the data set was utilized to make the results representative of US families.

The 2004 SCF included 4,519 households. There were 1,203 households who contributed both money and time to charitable organizations and 3,316 households who did not contribute both money and time to charitable organizations.

### Dependent Variable

Two questions were used to develop the dependent variable. The first question was "During 2003, did you make charitable contributions of money or property totaling \$500 or more excluding political contributions?" The second question was "During 2003, did you volunteer an average of one hour or more a week to any charitable organizations?" The responses from households that contributed both money and time were coded as 1 and 0 otherwise. Since the dependent variable was dichotomous, logistic regression was applied (Hair, Black, Babin, Anderson & Tatham, 2005).

### Independent Variables

The independent variables included: age, education, income, family size, race, homeownership, marital status, spending behavior, and receipt of an inheritance. Age was coded as three categories: household heads age 35 and younger, heads age 35 to 55, and heads 55 and older. Education and income were continuous variables. Income was divided by \$10,000 for ease in interpreting the regression coefficients. Family size was a continuous variable.

Race was coded as White and non-White. The non-White category included African American, Hispanic or Latino, Asian, American Indian, Alaskan native, Native Hawaiian, Pacific Islanders, and others. Marital status of the household head was coded as: married or single. Single households heads included divorced, widowed, never married and separated individuals. Spending behavior was measured by the question in the SCF that asked about spending compared to income during the past year. The responses were: spending exceeded income, spending equaled income or spending was less than income.

Inheritance was categorized as households that had or had not received an inheritance. Homeownership was coded as: homeowners and renters. The reference groups for the categorical variables were: older adults, non-Whites, renters, single households, spending less than income, and households that had received an inheritance. See Table 1.

### Results

#### **Descriptive Statistics**

About 17% of household heads in the total sample made charitable contributions of both money and time. The remaining households contributed either money or time or they did not contribute at all. Household heads had an average of 13.97 years of education. About one-quarter of household heads (24%) were 35 or younger, 41% of household heads were between 35 and 55 years of age, and 35% of household heads were older than 55. About 19%

Dependent Variable	Coding
Charitable Contribution of Money and Time	1 if yes, 0 otherwise
Independent Variables	Coding
Age	
Less than or equal to 35	1 if yes, 0 otherwise
Between 35 and 55	1 if yes, 0 otherwise
Older than 55 (reference group)	1 if yes, 0 otherwise
Education	continuous
Household income	continuous
Tousehold income	continuous
Family size	continuous
White	1 if yes, 0 otherwise
Homeowner	1 if yes, 0 otherwise
Married	1 if yes, 0 otherwise
Soon ding Dahanian	
Spending overeded income	1 if was 0 otherwise
Spending equaled income	1 if yes, 0 otherwise
Spending is loss than income (reference group)	1 if yes, 0 otherwise
spending is less than income (reference group)	1 II yes, 0 olieiwise
Received inheritance	1 if yes 0 otherwise

Table 1. Coding of Variables

of household spent more than their income, 39% spent equal to their income, and 42% spent less than their income. About 61% percent of the households owned their own homes.

The average household income was \$76,870. Three-quarters (74%) of household heads were White. One-half of household heads were married. The average number of people in a household was between two and three people. Twenty percent had received some form of inheritance. See Table 2.

### Descriptive Statistics by Type of Contribution

Table 3 shows the characteristics of four groups: a) contributors of only money, b)contributors of only time, c) contributors of both money and time, and d) non-contributors. Contributors of both money and time were more likely to be older than 35. Also, these contributors had, on average, more education and income and larger households. About 82% were homeowners and 31% had received inheritance. A majority was White and married. About half spent less than their income.

For those who contributed only money, 45% were between 35 and 55. The majority of these heads of households were White. They had an average of 14.81 years of education, household income of \$85,400, and a household size of 2.5 people. About 82% were homeowners and 55% spent less than their income. They were the 2<sup>nd</sup> most likely to receive an inheritance.

For those households who were volunteers, 43% were between 35 and 55 years old. The majority were Whites. On average, they had 13.52 years of education and household income of \$69,180. About 54% were homeowners. Fifteen percent received some form of inheritance. The average household size was between two and three people.

Variables	Mean	Median	SD	Frequency
Dependent Variable				
Contributes both money and time	-	-	-	17.24
Independent Variables				
Age less than or equal to 35	-	-	-	23.85
Age between 35 and 55				41.42
Age older than 55	-	-	-	34.73
Education	13.97	14.00	2.88	-
Income/\$10,000	\$76.87	\$6.00	\$381.05	-
Family size	2.49	2.00	1.36	-
White	-	-	-	73.55
Homeowner	-	-	-	61.19
Married	-	-	-	50.67
Spending exceeded income	-	-	-	19.09
Spending equaled income	-	-	-	38.94
Spending less than income	-	-	-	41.97
Received inheritance	-	-	-	20.19
NOTE: Dash means "not applicable"				

Table 2	Waightad Decominting	Statistics for	Households in	the 2004	SCE A	I = 4510
1 able 2.	weighted Descriptive	statistics for	nousenoius in	the 2004	зсг (г	N – 4,319)

Household heads that did not contribute both money and time had the lowest level of education, income and household size. They were more likely to be renters. About 45% said their spending equaled their income, 21% spent more than income and 34% spent less than income. About 59% of the household heads were single. About 67% of household heads were White.

### Chi-Square Tests

Chi-square tests were used to understand the relationships between the categorical variables and contribution of both money and time versus those who did not contribute both. In summary, household heads age 55 and over, Whites, homeowners, married household heads, and households who spent less than income, and those who had received an inheritance were more likely to contribute both money and time to charitable organizations. See Table 4.

### **Results of Logistic Regression**

Nine hypotheses were tested and six of them were fully supported, while two of them were partly supported. The results of the logistic regression showed that age, homeownership, marital status, household income, education, family size, spending behavior, and inheritance affected the likelihood of contributing both money and time to charitable organizations. The hypothesis for race was not supported. See Table 5.

Households with a younger head (age 35 or less) were 54% less likely than older heads (age 55 and older) to contribute both money and time. There was no difference in the likelihood of contributing both money and time between heads aged 35 to 55 and those older than 55.

As education of the head, household income, and family size increase, the likelihood of contributing both money and time to charitable organizations increased. For each additional year of education of the household head, the likelihood of contributing both money and time increased by 26%. As household income increased by \$10,000, the likelihood of contributing time and money increased by 10%. As family size increased by one additional person, the likelihood of contributing both money and time increased by 10%.

Compared to renters, homeowners were 98% more likely to contribute both money and time to charitable organizations. Married household heads were 82% more likely than single household heads to contribute both money and time to charitable organization.

	Money		Time		Money a	nd Time	Neither	
	(n = 1,14	3)	(n = 315)		(n = 1,203)		(n = 1,858)	
Variables	%	Mean	%	Mean	%	Mean	%	Mean
Age less than and equal to 35	15.38		28.51		13.47		29.87	
Age between 35 and 55	44.94		43.24		45.56		38.34	
Age older than 55	39.68		28.25		40.97		31.78	
White	83.69		72.23		81.18		67.21	
Married	65.27		44.96		65.44		40.27	
Spending equaled income	31.39		37.69		29.89		45.15	
Spending exceeded income	14.01		21.86		18.73		20.79	
Spending less than income	54.6		40.45		51.39		34.06	
Homeowner	82.21		54.92		82.67		46.76	
Received inheritance	25.69		15.06		30.91		15.34	
Education		14.81		13.52		15.51		12.53
Income		85.40		6.91		76.87		5.16
Family size		2.50		2.42		2.76		2.33

Table 3. Weighted Statistics for Households Who Contribute Money, Time, Both or Neither in the 2004 SCF (N = 4,519)

Compared to households who spent less than income, those whose spending equaled income were 23% less likely to contribute both money and time. There was no statistical difference in the likelihood of contributing money and time between households whose spending exceeded income and those who spent less than income.

Household heads that did not receive an inheritance were 35% less likely than those who did receive an inheritance to donate both money and time. Finally, there was no significant difference between White and non-White heads of households in the likelihood of contributing both money and time. This is consistent with previous research in which some studies have shown differences by race and other studies have not.

# Discussion

The result for age is consistent with previous research. An explanation for older adults' likelihood to contribute money and time to charitable organizations can be linked to the social norm and social responsibility theory. Goss (1999) calls older adults "civic torchbearers" (p. 379). Older adults identify charitable giving as their civic duty and social responsibility. They see charitable giving of money and time as a necessity on their part. During World War II, today's oldest generation worked in areas classified as charitable work as support for the war (Goss, 1999). From here, they developed a sense of serving the good of their fellow citizens. Their children and grandchildren may be following their example. Also, with older adults living longer (Weiss, 2003), they have more time to volunteer at churches, schools and hospitals after retirement.

	Contribute both	Did not contribute both	
Variable	(n=1,203) %	(n=3,316) %	Significance
Age			<.0001***
Less than or equal to 35	9.84	90.16	
Between 35 and 55	28.36	71.64	
Older than 55	32.70	67.30	
Race			<.0001***
White	30.16	69.84	
Non-white	14.13	85.87	
Homeownership			<.0001***
Homeowner	35.29	64.71	
Renter	10.19	89.81	
Marital Status			<.0001***
Married	36.21	63.79	
Single	12.34	87.66	
Spending Behavior			<.0001***
Spending exceeded income	19.67	80.33	
Spending equaled income	16.53	83.47	
Spending is less than income	35.07	64.93	
Inheritance			<.0001***
Received inheritance	38.74	61.26	
No inheritance	23.10	76.90	

Table 4. Chi-Square tests for Households Who Contribute Both Money and Time and Non-contributors in the 2004 SCF (N = 4,519)

\* p < 0.05, \*\* p < 0.01, \*\*\* p < 0.001.

Table 5. Results of Logistic Regression to Predict Contributions of Both Money and Time in the 2004 SCF (N = 4,519)

Variable	Parameter Estimate	Pr>chi Square	Odds Ratio
Age less than or equal to 35	-0.7684	<.0001***	0.464
Age between 35 and 55	-0.1617	0.0739	0.851
Age older than 55 (reference group)	-	-	-
Education	0.2617	<.0001***	1.299
Income	0.000966	<.0001***	1.001
Family size	0.0973	0.0076**	1.102
White	0.1061	0.3466	1.112
Non-white (reference group)	-	-	-
Homeowners	0.6828	<.0001***	1.979
Renter (reference group)	-	-	-
Married	0.5966	<.0001***	1.816
Single (reference group)	-	-	-
Spending exceeded income	-0.0458	0.6954	0.955
Spending equaled income	-0.2641	0.0051**	0.768
Spending is less than income (reference group)	-	-	-
No inheritance	-0.4292	<.0001***	0.651
Received inheritance (Reference group)	-	-	-
* p < 0.05, ** p < 0.01, *** p < 0.001.			

The likelihood of donating money and time was positively related to education. This might be attributed to university degrees and courses in public relations, public administration, social works, health administration, and health care.

The social exchange theory offers evidence for why homeowners may be more charitable than renters. Garay suggested that tax benefits promoted both homeownership and charitable donations (Block, 2004).

The social exchange and evolutionary theories provide support for understanding why married households, compared to single households, give both time and money. This could be related to children in the household. Married households especially those with young children may be involved in activities that benefit their children. For example, a bill introduced in the Ohio State legislature requires parents to volunteer 13 hour at their child's school or pay a \$100 fine (127th Ohio General Assembly, 2007-2008).

There was no difference in contributing between households who spent more than their income compared to households who spent less than their income. A possible explanation is the possibility that the household may be repaying education loans, consumer loans, or saving for a down payment on a home. Households whose spending was equal to income were less likely than households whose spending was less than income to contribute money and time. Households that spend less than their income are in a better financial situation to donate money and time.

The social exchange theory also provides justification as to why households who receive inheritances are more likely to contribute money and time. Weiss (2003) reports that some baby boomers who receive inheritances create their own foundations instead of simply giving to charity. The establishment of non-profit organizations serves to help society and to provide tax benefits for the benefactors.

The reciprocity norm also provides justification for those who contribute money and time to charitable organizations. The reciprocity norm states that people who have been helped in the past are more likely to help others in the future. Since people who received inheritance were helped financially, they may feel a greater obligation to help others than those who have not received inheritances.

### Implications

Charitable organizations should solicit assistance from the public especially from individuals and families who are interested in the type of charity. Schools and churches should promote activities that instill the spirit of giving in children and young adults. Junior high, high school, and college students should be encouraged to participate in service learning in their communities. Local businesses and governments can support charitable organizations in their communities. Examples are United Way, the Red Cross, literacy programs, and Big Brother Big Sister activities.

Financial advisors can also play a role in increasing charitable contribution of money and time. First, many are probably involved with charitable activities in their communities. In this way, financial advisors serve as role models for others. Second, they can advise clients to include charitable contributions when developing spending plans. Third, they can explain to clients the benefit of tax deductions for contributing to charity. Fourth, financial advisors can encourage clients to plan for bequests to their families and charitable organizations (Dynan, Skinner and Zeldes, 2002).

### **Limitations and Future Research**

There are some limitations that are related to the availability of data. First, research has shown that charitable giving is highly endorsed by observers and practitioners of various religions (Bryant, Jeon-Slaughter, Kang, & Tax, 2003; Ronsvalle and Ronsvalle, 2000). Unfortunately, the SCF does not ask questions about household religious preferences so it is not possible to examine the relationship between religion and charitable contributions or volunteering.

Second, the SCF is a cross sectional data set. This means that it is not possible to analyze the frequency of charitable giving over time. Third, the data set does not include questions about which charities receive the contributions. In the future, it would be helpful to have questions about the charities. Perhaps that would make it possible to explore the motivation for making donations of time and money.

In the future, researchers are encouraged to conduct qualitative studies to understand how cultural differences promote charitable donations of money and time in both urban and rural America. Finally, this research showed that

households that receive inheritances are more likely to contribute money and time to charitable organizations. It would be interesting to learn whether the type of inheritance (trust, transfer, gifts) influences the amount of the charitable donation.

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# Fiscal Fitness from the Inside Out

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# **Target Audience**

Financial and credit counselors, planners and educators

### **Objectives/Purpose**

Provide a 3-step, non-threatening process to help clients modify habits of thought and actions so needed financial behavior is made and maintained. When client's unique history is examined even briefly using the GEM steps, they learn to restructure their goals and belief systems to maintain healthier money habits.

# Description

Often clients who come for financial counseling make short term modifications in their behavior, but the underlying psychology driving it isn't addressed. The GEM process is a way to provide brief, but deeper coaching to bring drivers of those behaviors into conscious awareness. It helps prevent relapse into financially destructive behavior.

Step 1 of GEM is Gather Essential Memories. Clients are asked about money environment when growing up. Concept of vivid memories being the creators of conclusions reached while at young ages is introduced. Essential means if memories are vivid, they carry interpretations that became guides to decisions. Such thoughts often have distortions typical of children's interpretation process, which include all-or-nothing thinking.

Step 2 of GEM is Gain Enlightened Meanings. This is a dialog about what conclusions were reached as a result of a memory, and in what ways it drove decisions that negatively impacted financial outcomes. Restructuring outdated or inaccurate conclusions becomes a MAP for managing financial decisions in more productive ways.

Step 3 of GEM is Generate Empowered Movement. Action plans that align with the new meanings are created, to begin generating new behaviors that support attainment of financial goals. A time table for implementing new strategies is part of the 3<sup>rd</sup> GEM step.

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# Why Don't the Rich Just Buy More Happiness?

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# Abstract

Using the title question, this paper presents the development of a theoretical framework for examining the moneyhappiness relationship. The concepts of time, efficiency, and happiness-producing behaviors were incorporated with basic economic principles regarding preferences, diminishing marginal utility, and budget constraints to construct the Money-Happiness Model. The model not only provides a framework to aid future research, but also provides educators and counselors the conceptual relationships necessary to design more effective financial programs and interventions.

Key Words: money and happiness, happiness-producing behaviors, money-happiness model

# Introduction

For years I have espoused as truth to my personal finance students and workshop participants the oft-quoted maxim that "money doesn't buy happiness." The idea that money is not the solution to life's problems, indeed, that the pursuit of money is sinful, has been around for many years. For example, the Christian Bible (King James Version), identifies the love of money as the primary source of all evil (1 Timothy 6:10), and states that a rich man has little chance of getting into heaven (Luke 18:25). Student comments during in-class discussions about money and happiness suggested that these old money values are still a major influence on our collective consciousness. For example, over the years I have noted, especially within academia, the reluctance of most people to admit that they "love" money and that they do their job, in large part, "for the money." I can still recall being told by an administrator during a faculty meeting early in my career that teachers should quit worrying about their salaries and teach "for the love of teaching." I've also observed that while many people will publicly support the money-doesn't-buy-happiness adage, few seem to believe that it applies to them; instead, they "spend" much of their lives trying to prove it wrong.

The purpose of this paper is to present the development of a practical theoretical model that explains some of the relationships between money and happiness. Several assumptions guided the construction of the model:

1. People prefer more happiness to less happiness.

2. Happiness is not experienced directly through an individual's behaviors; that is, there is a lag between the happiness-producing behavior and the happiness experienced.

3. Satisfaction (utility) or dissatisfaction is the immediate experience of all behaviors.

4. Some behaviors may provide high satisfaction, but little happiness. "For example, addictive drugs can produce immediate psychic highs, but their long-term effects are often extremely unhappy" (Parducci, 1995, p. 16).

5. Because individuals often misperceive which behaviors will produce happiness (Nettle, 2005), they seek to maximize happiness by maximizing total utility.

### **Constructing the Model**

The model was constructed based on two types of people: (a) those who experience higher levels of satisfaction from just having more money, and (b) those who experience higher levels of satisfaction from consuming more of the goods and services that money will purchase. If happiness were a direct function of income only, H = f(\$), then additional income would increase the level of happiness for both types of people, and the happiest people would always be those with the highest incomes.

Some studies have provided empirical evidence that rich people may be happier than other people (see Bruni & Porta, 2005). This relationship appears to be strongest when comparing the rich to the very poor (Argyle, 2001). However, when comparing the rich to individuals with at-or-above-basic-needs incomes (i.e., the less rich), the relationship between income and happiness, as illustrated in Figure 1, is not as pronounced. Some evidence suggests that the slightly greater happiness of the rich is based on relative, not absolute, income. That is, happiness is relative to what everyone else has; if everyone's income were to increase (or decrease) by the same amount, there

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would be no change in happiness (see Frank, 2005). At some point, though, having more income apparently brings little or no additional happiness (Myers, 1992).



*Figure 1.* Relationship between happiness and income. The level of income necessary to meet basic needs (*B*) distinguishes the very poor (I < B) from the rich  $(I \gg B)$  and the less rich  $(I \ge B)$ .

Utility theory (see Samuelson & Nordhaus, 1992) suggests that those who derive happiness from having relatively higher incomes have a set of preferences similar to those illustrated by the utility curves in Figure 2. The popular expression, "I'm happy so long as I make more income than my wife's sister's husband," succinctly states the relative-income position of the rich. Why, then, are the rich, who experience this presumed happiness-producing behavior of income comparison, not substantially happier than the less rich? Three possible explanations follow. [Ins



Reference Income  $(I_R)$ 

Figure 2. Utility curves illustrating an individual's preference for relatively-more income. The  $U_0$  curve (no utility) represents the condition when personal income is identical to the reference income. As personal income exceeds the reference income, higher levels of utility ( $U_{11}, U_{1}(2, \dots), U_{\downarrow}3$ ) are experienced until maximum utility ( $U_{MAX}$ ) is achieved. When maximum utility is achieved, additional income provides no additional utility.

First, the behavior of acquiring relatively more income is simply not a happiness-producing behavior; there is no relationship between money and happiness. Studies that find a positive relationship must in some way be flawed.

Second, individuals do not (or cannot) practice only happiness-producing behaviors. That is, based on personal needs or desires, individuals prefer a combination of both happiness-producing behaviors and other behaviors (see Figure 3). However, because more happiness is preferred to less, and the much greater incomes of the rich would always allow them the ability to "purchase" greater quantities of all behaviors (moving them higher on their behavior-preference curves), behavior preferences alone do not explain why the rich appear to be only slightly happier than the less rich.



*Figure 3*. The behavior-preference curve. Each point on the curve represents the preferred (or optimal) combination of happiness-producing behaviors and other behaviors for a given level of happiness; greater levels of happiness are achieved at points on the curve farther from the origin.

The third explanation is rooted in the law of diminishing marginal utility, which suggests that marginal utility declines with each additional unit of relative income, resulting in total utility growing at increasingly slower rates (see Samuelson & Nordhaus, 1992). In an effort to maximize total utility, individuals at point M (see Figure 4) will switch to other behaviors whose marginal utilities are still greater than zero.



*Figure 4*. Changes in marginal utility (MU) and total utility (TU) as relative income increases. Maximum total utility is achieved at point *M*, where TU > 0 and MU = 0.

Thus, happiness-producing behaviors and other behaviors mutually influence each other through behavior preferences and diminishing marginal utilities, which interact to both constrain and facilitate each type of behavior (see Figure 5). The rich who gain happiness through the status of having relatively-more income are quickly limited by their preferences for other behaviors, and by the low marginal utility of additional income.



*Figure 5*. The interactions of preferences and diminishing marginal utility with happiness-producing behaviors and other behaviors. Preferences for one type of behavior results in more of those behaviors until diminishing marginal utility makes the other type of behavior preferred, resulting in increases in the newly-preferred behaviors. The process continues until an optimal combination of both types of behaviors (i.e., maximum combined utility) is achieved.

Economists often use indifference curves to examine questions of consumer choice between two goods (or services). Each curve represents all combinations of goods and/or services that provide the same level of utility. Curves farther from the origin represent higher levels of utility. Based on the assumption that consumers always prefer more to less, the best choice for the consumer is that combination of goods and/or services that lies on the curve farthest from the origin. However, consumers generally are prevented from making their desired choice by market prices and their income, which comprises their budget line/constraint (see Figure 6).



*Figure 6.* Indifference map for all goods and services. Line *AB* indicates the budget constraint imposed by prices and income. Point *D* is the desired choice. However, Point *O* represents the optimal combination of goods and services (i.e., the point of maximum attainable utility given the constraints), and is the point where the budget line is tangent to the highest indifference curve.

Assuming similar preferences and stable prices, the budget line for an individual with a higher income will always be tangent to an indifference curve of higher utility (i.e., budget lines for the rich are farther from the origin). Why, then, are the rich, whose incomes allow substantially more consumption, not much happier than the less rich? Again, three possible explanations follow.

First, the presumed happiness-producing behavior of additional consumption is, in reality, not a happiness-producing behavior.

Second, like the status-driven rich, the consumption-driven rich are also constrained by preferences and diminishing marginal utilities. Indeed, the interactions depicted in Figure 5 are applicable to all behaviors, by all people. However, this explanation only provides a partial answer for the constraining effects of prices and income on the rich, who can afford substantially greater consumption associated with both happiness-producing behaviors and other behaviors.

The third explanation is that other constraints, not depicted in the typical indifference-curve analysis, prevent the consumption-driven rich from achieving higher levels of happiness. Those constraints are related to time and efficiency. It is plausible that the rich simply run out of time to consume or to enjoy their consumption.

When the budget constraint is defined more broadly to include all resources and behaviors, then the effects of time and efficiency can be included.

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If: T = \text{Time} (\text{constant constraint})
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R = \text{Resources other than time (variable constraints)},

t = \text{average amount of time expended per behavior (efficiency variable)},

r = \text{average amount of resources required per behavior (efficiency variable)},

and

T, t, R, r > 0, then

is constrained by R, r, T, t such that
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The resulting behavior constraints are depicted in Figure 7, and are applicable to individuals of all income levels.

Example of Calculating Behavior Constraints

Suppose that within a 24 hour period (T = 24) an individual has total resources of \$100 (R = 100), and that on average it requires 1 hour for each behavior (t = 1) with an average expenditure of \$10 per behavior (r = 10), the total number of behaviors that can be accomplished is:

$$\min\left\{\frac{R}{r}, \frac{T}{t}\right\} = \min\left\{\frac{100}{10}, \frac{24}{1}\right\} = \min\{10, 24\} = 10$$

Given his/her current levels of efficiency, this individual has sufficient time to complete 24 behaviors, but is constrained by resources to only 10 behaviors. To increase the number of behaviors possible this individual would have to lower the expenditure per behavior (i.e., increase resource efficiency) and/or increase total resources. If, all else being the same, this individual's total resources were to increase to \$500, resources would allow 50 behaviors, but time would constrain her/him to only 24 behaviors. In this situation only an increase in time efficiency would increase the number of behaviors possible.



*Figure* 7. Time and other resources as constraining factors on happiness-producing behaviors and other behaviors. Time is a universal, constant constraint unaffected by any behavior. Other resources are variable constraints that not only limit behaviors, but also decrease or increase in quantity as a result of behaviors. For example, income constrains spending, but employment increases income.

The complete model (see Figure 8) was achieved by combining the elements from Figures 5 and 7. Although developed from the question as to why the rich are not substantially happier than the less rich, the Money-Happiness Model is applicable to individuals of all income levels.



*Figure 8*. The Money-Happiness Model. Happiness experienced is a direct function of happiness-producing behaviors. Behavior choices are affected by the presence or absence of past happy experiences, preferences, and diminishing marginal utilities. Additionally, all behaviors are constrained by time, other resources, and the efficiency with which all resources are employed.

# Applying the Model

The Money-Happiness Model identifies key concepts and relationships that educators and counselors can use to help students and clients pursue a happier life. A first step in applying the model is to assess current preferences, resources, behavior patterns (including time use), and overall happiness. Educators and counselors can employ formal tools such as having students and clients complete income and expense statements, time diaries, and written goals, or they may use informal conversational questions such as "When are you the happiest?" and "What is most important in life?" to make assessments.

Next, educators and counselors should help students and clients identify current behavior patterns that are likely to produce happiness (and those that will probably not). For example, some may be unhappy with their bodyweight, but not realize that their daily behavior of consuming soft drinks, which produces immediate utility, is a contributing factor in their weight gain (i.e., consuming soft drinks is not a happiness-producing behavior for them).

Finally, educators and counselors should help students and clients identify ways to increase resources and/or efficiency in the use of time and resources (possibly through education, job training, or saving and investing). For example, the model indicates that the poor—those who have more time than money—should concentrate on acquiring more resources to raise their level of happiness (in this case money does buy happiness). For the rich and the less rich, those who have more than sufficient resources, the model indicates that to increase happiness they will have to improve efficiency in the use of their time and/or pursue different types of behaviors. For example, they may be counseled to consider hiring someone to do housekeeping, or to devote more of their time and resources to charitable pursuits instead of personal consumption.

### Conclusion

The Money-Happiness Model is not without limitations. While the comparative efficiency for two different behaviors can usually be determined (i.e., mowing one's own lawn v. hiring someone else to mow it), it is difficult to measure an individual's overall time- and resource-use efficiency. Additionally, except for the implied influence that past experiences have on preferences and behavior choices (see Figure 8 caption), the model does not explicitly account for the role that perception plays in experiencing happiness. Finally, the model needs further testing and validation through empirical research and program evaluation.

Even with its limitations, the Money-Happiness Model provides a practical, conceptual framework for researchers, educators, and counselors who work to help individuals and families, especially the poor and less rich, to more effectively manage their financial lives in connection with their pursuit of happiness.

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