2025 SYMPOSIUM
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Putting it Into Practice

Financial Interdependence: A Framework for More Inclusive Practice

Jeffrey Anvari-Clark, University of North Dakota, Miguel Quiñones, University of Minnesota, & Axton Betz-Hamilton, South Dakota State University

Keywords: behavioral economics, cross-cultural comparisons, family finance, financial behavior

Target Audience
The session is for financial professionals and educators who work with diverse client populations. While the framework provides valuable insights for working with clients from collectivist cultures, immigrant communities, and multigenerational households, it is equally relevant for mainstream American clients, including White Americans, who also navigate complex financial relationships with spouses, children, aging parents, and extended family. The session is designed at a beginner level, providing foundational understanding while delivering practical tools that can be immediately integrated into professional practice.

Objectives/Purpose
This session aims to equip financial professionals with an understanding of financial interdependence (FI) and practical tools to integrate the framework into client interactions. Participants will gain strategies to help clients navigate the balance between individual financial responsibility and interdependent relationships, leading to more effective financial guidance that resonates across cultural backgrounds.

Description
Financial professionals are trained to help clients build financial independence, but this approach overlooks the reality that most individuals' financial lives operate through complex webs of interdependent relationships. This session introduces financial interdependence (FI) as both a cognitive framework and practical reality that significantly impacts client financial behaviors and outcomes. Understanding FI enables practitioners to develop approaches that acknowledge the universal human experience of financial interconnectedness while being particularly responsive to diverse cultural practices.

The session will begin by defining FI through two complementary lenses (Anvari-Clark & Miller, 2023): a state of being in which financial decisions are made in consideration of both a financial goal and the impact on one's social relationship(s), and as the practice of sharing money, material goods, trades, etc. as an expression of mutuality. It will establish that this framework applies universally—from the suburban couple navigating joint finances, to adult children helping aging parents, to immigrant families sending remittances abroad. Through guided small group discussions, participants will explore their own experiences with FI, both functional and dysfunctional, creating a foundation for understanding similar dynamics in their clients' lives.

Drawing from interdependence (Rusbult & Van Lange, 2008) and complexity theories (Turner & Baker, 2019), participants will explore how financial decisions emerge from complex interactions within social networks. This understanding helps practitioners move beyond viewing financial behaviors as purely individual to recognizing the social contexts that shape these behaviors; that interventions require practitioners to engage with clients' entire financial ecosystem rather than isolating individual behaviors from their social context. New and existing tools, such as the CFPB's Money Circle Tool Kit (2019), will be leveraged to identify FI related values and behavior patterns and map influential relationships in clients' financial lives. This will provide participants with a structured approach to engage their clients in conversations about sensitive financial relationships. By incorporating the FI framework, practitioners can achieve more sustainable client outcomes by addressing the full complexity of financial behaviors within their social context, transforming potentially constraining and undermining relationships into resources for positive financial change. The FI perspective represents a significant advancement in making financial practice more inclusive and effective.

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Housing Education as a Vehicle for Financial Literacy Education

Giovanna Benitez, Terri Keith, Lisa Hamilton, Halie Corbitt, & Cyndi Longley, University of Florida Extension

Keywords: counselors, financial education, financial literacy, housing

Target Audience

The target audience for this presentation is intended for financial counselors, credit counselors, housing counselors, and other professionals who work in the financial counseling sector. Representing an opportunity for housing counselors to landscape the financial literacy concepts that can alleviate the financial burden families face.

Objectives/Purpose

This presentation will showcase how financial counselors can reach clients through housing education, while addressing the complex, intertwined nature of their financial and housing concerns. By offering targeted instruction on housing costs, ownership options, and maintenance responsibilities, participants will see whether such guidance can enhance overall financial knowledge, improve decision-making, and support long-term economic stability. The session introduces critical housing education concepts—including budgeting, affordability, homeownership, and the broader implications of housing-related financial decisions—highlighting how understanding topics such as renting, homebuying, mortgages, and tenant rights can shape an individual's financial skills, behaviors, and well-being.

After the presentation, professional financial counselors will have the opportunity to introduce critical housing education concepts, including budgeting, affordability, homeownership, and the implications of financial decision-making. In addition, understanding housing-related topics, such as renting, homebuying, mortgages, and tenant rights, can influence a person's overall financial skills, behaviors, and well-being. This session will showcase how equipping financial counselors with strategies can reach clients through housing education, addressing how housing education integrates into financial counseling practice, while addressing the complexity of clients' needs, and designing using tools that result in better financial and housing outcomes for individuals and families.

Description

A housing counselor acts as both educator and guide, translating the concrete costs of renting, buying, and maintaining a home into actionable financial lessons. By first mapping a client's income, debt, and savings, the counselor can highlight how housing decisions affect cash flow, credit, and long-term wealth. They then break down budgeting for rent or mortgage payments, demonstrate how to calculate affordability, and model the impact of interest rates and amortization schedules. Through real-world examples—such as comparing lease terms, reviewing mortgage statements, or assessing utility bills- the counselor shows how responsible housing choices build financial habits, improve credit health, and create a stable foundation for other financial goals. When clients internalize these connections, they often move beyond merely meeting housing needs to actively control their broader financial futures, increasing savings, improving credit, and achieving long-term stability. In this way, housing counseling becomes a practical gateway to broader financial literacy.

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Empowering Financial Literacy: Merging Spreadsheet Flexibility, AI Intelligence, and Shareable Insights

Shawn Cao, Fina Labs, Inc.

Keywords: financial literacy, spreadsheet, AI, insights

Target Audience

This presentation is designed for finance professionals who play a key role in guiding, educating, and influencing financial decision-making. The target audience includes financial advisors, coaches, writers, influencers, and service providers who seek innovative tools and strategies to strengthen financial literacy among their clients and communities.

Objectives/Purpose

The purpose of this presentation is to highlight how modern technology, especially artificial intelligence, flexible spreadsheet frameworks, and community-driven analytics, can significantly enhance financial literacy. The goal is to equip professionals with insights into how these innovations can simplify complex data, generate faster and more actionable insights, and foster collaborative financial learning and decision-making across broader communities.

Description

Financial literacy is a foundational skill for individual and societal well-being, yet it remains a persistent challenge globally. Traditional methods of financial education often fall short due to complexity, accessibility barriers, and limited engagement. This presentation will explore how advanced technologies are reshaping the landscape.
We will begin by examining the importance of financial literacy and its impact on financial independence, resilience, and long-term wealth building. Next, we will discuss how modern tools including AI-driven analysis, the versatility of spreadsheets, and intuitive data visualization can empower individuals and professionals to obtain insights more quickly and with less technical burden. Finally, the session will highlight the transformative potential of combining flexible spreadsheet-like interfaces with AI intelligence and shareable, community-oriented data insights. By merging these capabilities, finance professionals can create a ripple effect, making financial knowledge not only more accessible and practical, but also more collaborative and impactful for society at large.

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Beyond the Book: Building Financial Resilience and Connection Through Book Clubs

Amanda H. Christensen, AFC®, Andrea Schmutz, Melanie D. Jewkes, Vincenza Vicari-Bentley, ChFC®, AFC®, & Lendel K. Narine, Utah State University Extension

Keywords: book club, financial education, financial well-being

Introduction
A significant portion of Americans remain financially vulnerable according to the Federal Reserve's 2024 report on the economic well-being of U.S. households. Developing robust financial skills is increasingly vital for individuals to navigate these challenges effectively and plan for future goals and priorities. Financial education doesn't have to be formal or overwhelming - it can start with a good book and a meaningful conversation. Joining a personal finance book club can enrich the learning experience by combining structured reading with collaborative discussion, leading to improved comprehension and practical application of financial concepts.

Description
For the past five years, a team of Accredited Financial Counselors and personal finance educators from Utah State University Extension have hosted a spring financial book club. Staff were invited to join three to four virtual lunchtime sessions. The goal was to build financial knowledge and community through discussions on topics like goal-setting, emergency savings, investing, behavioral finance, and values-based spending.

The book club focused on a different personal finance book each year, encompassing a variety of narrative styles, approaches and formats. Examples include: The Latte Factor by David Bach, The 30-day Money Cleanse by Ashley Feinstein Gerstley, and Die with Zero by Bill Perkins. Participants received a reading schedule with assigned chapters for each week, followed by post-session emails that included discussion notes. A facilitation team of at least three educators per session provided diverse insights and personal stories that grounded financial concepts in real-life experiences. The sessions included open-ended questions, Zoom polls, flexible outlines, and a call to action that encouraged participant-led conversations.

Evaluation
An evaluation process following the Targeting Outcomes of Programs (TOP) framework (Rockwell & Bennett, 2004) implemented immediately post-workshop evaluated understanding of personal finance best practices, measuring short-term outcomes (i.e. knowledge gain and confidence gain) and intention to implement change.

Evaluation results (N = 76) showed knowledge gained included the following:
- 95% of participants (n = 72) stated they had a better understanding of personal finance management (N = 76).
- 96% (n = 73) agreed to make positive changes to their personal finance management practices (N = 76).
- 100% (n = 44) stated they felt more confident in their ability to manage their finances (2023 – 2026, N = 44).

Qualitative data on intention to change showed participants intended to take action in savings and spending habits, shifting from scarcity to abundance mindset, balancing time and value choices through life, goal setting and financial planning, collaboration and sharing with loved ones, and continued desire to learn more about personal finance.

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Reverse Mortgages Fact and Fiction: The Overlooked, Underappreciated, and Often Maligned and Misunderstood Retirement Stability Tool

Todd R. Christensen, Money Fit by DRS (Debt Reduction Services, Inc.) & Peter Morris, Revolution Mortgage

Keywords: counseling, estate planning, HECM, housing, loan, retirement, reverse mortgages, seniors

Target audience

This session is designed for Accredited Financial Counselors, housing counselors, financial educators, and students preparing to enter the counseling profession who serve or intend to serve older homeowners. It also offers value to academics and researchers seeking updated information on reverse mortgage products. The content will be accessible to both newcomers and experienced practitioners.

Objectives/Purpose

Despite more than a million Home Equity Conversion Mortgages (HECMs) issued since the 1990s, reverse mortgages remain shrouded in myths and misinformation. Many financial professionals continue to view these tools as overly risky or too costly. This presentation aims to dismantle outdated assumptions and replace them with clear, evidence-based knowledge of when reverse mortgages can responsibly support retirement stability.

Co-presented by a HECM-certified HUD housing counselor and a licensed reverse mortgage lender, the session provides both counseling and lending perspectives. By combining regulatory knowledge with practical client scenarios, presenters will help attendees learn:
1. When reverse mortgages are relevant and responsible options for clients 55+
2. How to distinguish HECM from proprietary products, including HECM for Purchase
3. Decision frameworks and scenario-based case examples to guide counseling discussions
4. How the federally required counseling process works, including borrower protections
5. Interactive discussion, myth-busting segments, and real-world case studies
6. Gain the tools to confidently introduce reverse mortgages into financial counseling sessions, balancing short-term stability with long-term planning and estate goals.

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Case Studies on AI in Tax Planning: Insights, Limitations and Professional Financial Expertise

Ruth Cummings, MBA, AFC, EA & Brigid Cummings

Keywords: artificial intelligence (AI), financial planning, taxes

Target audience

The intended audience includes financial counselors and planners, tax advisors, and individuals who want to know their own or their clients' tax liabilities before filing returns, for purposes such as adjusting withholdings to avoid underpayment penalties, or planning for Roth IRA conversions. Given that the AFCPE symposium takes place close to the year-end and prior to tax filing, it could be a timely opportunity for counselors to explore AI's capabilities and limitations.

The presentation covers subjects of AI and taxes. This session is best suited for attendees with working knowledge of AI and a fundamental understanding of U.S. income tax systems. Participants should be familiar with key tax terms such as tax liability vs refund, standard vs itemized deductions, adjusted gross income (AGI) vs taxable income, IRS Form 1040 and etc.

Objectives/Purpose

1. Attendees will gain insight on what the selected AI Large Language Model (LLM) can and cannot do in estimating federal tax liability through real-world case studies.
2. Attendees will learn how to apply their professional expertise to craft queries and recognize and correct common errors in AI-generated estimates of tax liabilities.
3. Attendees will be encouraged to join the discussion on employing AI in tax planning and brainstorm about future research on this subject.

Description

This presentation shares the findings from preliminary research which explored the potential role of AI, specifically Large Language Models (LLMs), in estimating federal income tax liability. Through a series of simple tax return case studies, the research experimented with AI's accuracy and limitations by comparing its estimates against results from commercial tax software. Targeted at financial counselors and planners, the session emphasizes that the tested LLM is not at a stage where it can replace professional judgment or tax software but may be a supplementary tool when employed properly. Attendees will learn how to leverage AI while identifying and correcting common errors when they occur. The interactive presentation includes hands-on experience in querying AI with sample tax scenarios. This session underscores the importance of professional oversight in examining and interpreting AI outputs, highlights the risks and benefits, and aims to stimulate discussion on involving AI in counseling.

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What is 'hyperbolic discounting', the bias that makes you make bad decisions - and how to avoid it? 10 Practices for Financial Professionals

Lucy Delgadillo, PhD., Utah State University

Keywords: biases, financial coaching, financial counseling, hyperbolic discounting.

Target Audience: all financial professionals who want to enhance their understanding of financial biases when counseling and coaching clients – or even when they want to apply it to themselves by refining their emotional intelligence skills in financial and social settings. All levels of expertise are welcome.

Objective and purpose of the session: The goal of this session is to equip financial professionals with a better understanding of hyperbolic discounting and its profound impact on financial coaching and counseling interactions. The topic is critical to successfully serving clients and/or advancing a practitioners' impact/success. The session provides significantly valuable information and mitigating tools that will expand attendee knowledge, skills, and way of thinking in managing the emotional aspects of money. To accomplish this purpose, this session will provide hands-on guidance and tips for helping overcome or avoid hyperbolic discounting.

Description: This is a fantastic and relevant topic for financial counselors! Hyperbolic discounting can be a real eye-opener for understanding client behavior — especially when clients struggle with saving, debt repayment, or long-term planning. In simple terms, hyperbolic discounting is our tendency to choose immediate rewards over future ones, even when the short-term rewards are smaller.

In simple terms, hyperbolic discounting is a cognitive bias that can lead people to make poor decisions because it encourages impulsiveness rather than long-term thinking, explaining experts who have studied the topic in the fields of Behavioral Economics and Psychology. If the most important factor in decision-making is getting an immediate benefit, even if that benefit is smaller, then the discount (the reduction in value) becomes hyperbolic — that is, exaggerated. This presentation assumes that all humans will face biases in their financial decision-making process. Such an assumption is supported by behavioral economic theory (BE) which claims that humans do not behave in rational ways – but that is not to say that they are irrational. In any decision-making process, humans have limited time and brainpower (bounded rationality) to process information (Thaler, 2015). Furthermore, BE and cognitive psychology theories assume that errors and biases are wired into our brain, and that much, if not all, of our behavior can be explained by its appeal to internal psychological mechanisms (Evans, 2010). Furthermore, some scholars in evolutionary psychology even claim that biases are necessary for survival (Haselton, et al., 2009). My point being, can we use these biases to our benefit?

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From Crisis to Confidence: Empowering Aspiring Homeowners with Trauma-Informed Financial Education

Deneka Desroches, CFEI®, People's Housing+

Keywords: financial trauma, financial coaching, homeownership, housing equity, trauma-informed

Target Audience
The primary audience for this program is aspiring homeowners from low- to moderate-income (LMI) backgrounds who have historically faced systemic barriers to wealth-building and stable housing. Many of these individuals are navigating the lingering effects of financial trauma, including eviction, foreclosure, debt collections, predatory lending, and intergenerational cycles of housing instability. Secondary audiences include financial coaches, housing counselors, community-based nonprofit staff, and policy advocates who seek to strengthen their practice by embedding trauma-informed approaches into financial education.

Objectives/Purpose Description
The purpose of this initiative is to reimagine financial education for aspiring homeowners by centering trauma-informed practices that address both the financial and emotional barriers clients face when preparing for homeownership. Traditional financial education often emphasizes budgeting, credit repair, and mortgage readiness without acknowledging the psychological and behavioral impacts of financial trauma. This gap can lead to disengagement, stalled progress, and clients abandoning their homeownership journey altogether.

Program Implementation:
At People's Housing+, trauma-informed financial education was integrated into homebuyer readiness workshops, one-on-one coaching, and group financial literacy classes. Core practices included:

- Building Safety and Trust: Sessions begin with grounding exercises, learning money habitudes, transparency about the process, and setting expectations that prioritize client agency.
- Normalizing Financial Trauma: Coaches introduce financial trauma as a concept to reduce shame, validate lived experiences, and spark resilience-focused dialogue.
- Strength-Based Goal Setting: Clients are encouraged to identify strengths, not just deficits, and set SMART goals that account for their emotional triggers around money.
- Practical Tools with Emotional Check-Ins: While addressing credit reports, debt reduction strategies, and savings plans, coaches integrate reflective questions about stress responses, past financial harms, and support networks.
- Breaking the Cycle: The program helps clients envision their role in creating generational stability through homeownership, reframing the process from one of fear and scarcity to empowerment and legacy-building.

Outcomes and Lessons Learned:
Early outcomes demonstrate that trauma-informed practices increase client engagement and retention in homebuyer programs. Participants report feeling more understood and supported, less ashamed about their financial past, and more motivated to complete action steps. Coaches also report improved rapport and the ability to tailor interventions that meet clients where they are emotionally as well as financially.

This approach has the potential to reshape financial coaching and homeownership preparation by moving beyond transactional teaching to transformational coaching. By addressing both the financial and psychological dimensions of readiness, programs can more effectively help families break cycles of instability and achieve sustainable homeownership.

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Empowering Gen Z Through Experiential Financial Learning

Bernice Dodor, PhD., AFC, East Carolina University

Background
Financial literacy is a critical life skill, yet many Generation Z college students lack the foundational knowledge and tools necessary to manage their finances effectively (Blake, 2025; The Economic Times, 2025). Generation Z currently holds the highest average personal debt among generational cohorts, a burden largely attributed to student loans, credit card usage, and escalating living expenses. Growing up in a digital economy, Gen Z is uniquely vulnerable to impulsive spending behaviors and social media-driven lifestyle expectations that promote immediate gratification over long-term financial planning (Kumar, 2025; Civic Science, 2025). Studies show that even financially literate Gen Zers struggle with consistent saving and budgeting due to behavioral factors such as emotional spending and lack of financial discipline (Kumar, 2024). Although many are engaging in saving, investing, and exploring digital financial tools to improve financial well-being (Cole, 2025), research reveals a disconnect between financial knowledge and behavior (Rodriguez et al., 2024; Kumar, 2024). These findings underscore the urgent need to integrate technology-driven, experiential learning into financial education to bridge the gap between financial knowledge and behavior and empower Gen Z to build lasting financial resilience.

Purpose
The purpose of this study was to explore the effectiveness of experiential learning in teaching financial literacy to Generation Z college students. Specifically, the study aimed to equip students with practical tools to track spending, identify financial leaks, make informed investment decisions, and promote long-term financial well-being through behavior change and digital engagement.

Research Questions
This study addressed the following research questions: (1) What are the most prevalent spending leaks among Gen Z college students? (2) What is the future value of redirected spending? and (3) What strategies do Gen Z students identified to manage spending leaks?

Methodology
Generation Z college students enrolled in personal finance course in 2025 participated in this study. They completed budgeting assignments involving spending tracking, identification of spending leaks, future value calculations, and proposed behavioral strategies for financial improvement. A qualitative descriptive design with content analysis was used to identify themes and ensure data validity (Creswell & Creswell, 2022).

Results
Key themes included common spending leaks, increased awareness of overspending, and the impact of small lifestyle changes. Students recognized that minor daily cuts—like making coffee at home or meal prepping—could lead to substantial annual savings. Many were surprised by how quickly small expenses added up and emphasized the long-term benefits of starting investments early and maintaining consistency.

Discussion
Tracking spending and assessing financial leaks provided Gen Z college students practical insight into their financial habits. Many were surprised by the cumulative cost of small purchases like coffee and snacks. Categorizing expenses highlighted how daily choices affect long-term financial health. Students recognized that modest lifestyle changes could lead to substantial savings and investment opportunities. The exercise empowered them to shift from short-term gratification to long-term planning, fostering greater financial awareness, self-efficacy, and ownership of their financial futures.

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Beyond the Budget: Leveraging Multimedia Tools for Holistic Financial Well-being

Luke Erickson & Lance Hansen, University of Idaho

Keywords: behavior change, financial well-being, holistic health, media tools, well-being dimensions

Target audience

This session is designed for financial educators, Extension professionals, counselors, coaches, and practitioners who recognize that money decisions rarely hinge on knowledge alone. It will also resonate with mental health professionals and wellness educators seeking to bridge financial literacy with broader dimensions of well-being. The material is suitable for both beginner and intermediate professionals: those new to holistic models will gain foundational insight, while seasoned practitioners will deepen their understanding of behavior-driven financial health.

Objectives/purpose description

The goal of this session is to move beyond formulas and rules of thumb toward practices that foster sustainable financial well-being. Participants will explore a holistic model that accounts for the "messiness" of real life, where financial decisions are shaped by emotions, physical health, environments, and relationships (Netemeyer, et al., 2018). The session introduces practical, research-backed strategies for integrating eight dimensions of well-being—emotional, physical, social, environmental, spiritual, intellectual, occupational, and financial—into financial education and counseling.

By leveraging podcasts, videos, and peer-reviewed Extension bulletins, the session provides ready-to-use tools for practitioners. Attendees will leave with both theory and tangible resources they can immediately implement with clients, applying holistic well-being to financial behavior.

Traditional personal finance education emphasizes knowledge and skills: spend less than you earn, avoid debt, invest early. While mathematically sound, this framework assumes that information alone drives behavior. Practitioners know otherwise. Financial struggles are often rooted not in ignorance but in complex human realities like stress, poor sleep, disorganized paperwork, social pressure, or even cluttered garages (Ryu, & Fan, 2023). This session reframes financial well-being through a holistic lens. Each of the eight interconnected dimensions contributes to or detracts from financial health:

- Emotional well-being influences impulse spending, saving habits, and destructive money scripts.
- Physical well-being impacts both earning potential and costly health expenses.
- Social well-being shapes boundaries around lending, giving, and lifestyle expectations.
- Environmental well-being affects organization, clutter, and the systems that prevent missed bills or financial chaos.
- Occupational well-being often drive career choices, and income stability.
- Intellectual well-being supports lifelong learning and adaptability in a changing financial landscape.
- Spiritual well-being impacts personal fulfillment, values, and alignment of short and long-term financial decisions.

Through humor, relatable stories, and multimedia engagement, the presentation will demonstrate how these dimensions interconnect. Attendees will experience short podcast clips and videos that illustrate well-being principles, along with peer-reviewed Extension bulletins that translate research into accessible, client-friendly tools. By situating financial literacy within the broader context of human well-being, practitioners can better understand client barriers and identify sustainable pathways to change. The aim is not only to inform but to transform how educators and counselors frame money behavior—making financial well-being less about rigid rules for success and more about building resilience across key dimensions of well-being (García-Santillán, et al., 2025).

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Why Financial Counselors Often Aren't Good Business Owners

Joshua Escalante Troesh, CFP® and Tenured Professor

Keywords: business debt, business growth, entrepreneurship, getting clients, owning a practice, strategic spending

Target audience

Counselors looking to start their own business should have an understanding of the risks and successes associated with starting their own business. This session will also be useful for counselors who work with business owners, providing them with tools to have better discussions and give more informed advice on managing their finances in light of their business.

Objective & Purpose

According to a Gallup survey, 62% of Americans say they would prefer to own their own company rather than work as an employee. It is highly likely that a majority of financial counselors will be interested in starting their own business and that a majority will encounter clients who are interested in starting a business.

Description

Starting a business can feel daunting, and financial counselors often run their business the same way they run their personal finances. This presentation will provide a summary of the key gotchas that often prevent business owners from being successful, including:

- Don't be cheap: increasing strategic spending
- Don't be debt free: adjusting perspectives on debt and its role in a business
- Don't be perfect: avoiding analysis paralysis and learning to just do it
- Don't just do it: formalizing your business

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Navigating Client Financial Shame and Self-Doubt

Cynthia Hudson, AFC Candidate, Vivacious Finance

Keywords: financial trauma and shame, reframing beliefs, scaling questions, emotional regulation, self-efficacy

Target Audience
Financial educators and practitioners

Objectives
Attendees will learn to support their clients who are dealing with shame and feelings of self-doubt by learning:
- The effects of shame, embarrassment and self-doubt on client outcomes
- How to identify these feelings in clients
- How to use scaling questions and affirmations to help clients reframe those beliefs
- Skills and techniques to help clients regulate their emotions while dealing with intense feelings about their financial abilities

Description
Financial shame and trauma impact many of our clients. A recent survey by Experian found that 70% of U.S. adults reported that they have suffered or are currently suffering from financial trauma (Roman, 2023). Financial shame can derail constructive financial behaviors, increase financial avoidance (Archer, 2024) and create a self-perpetuating cycle of economic hardship (Gladstone et al., 2021). It can bleed into other areas of the client's life, causing mental and physical health concerns and straining relationships (Archer, 2024).

Client financial shame and self-doubt present in many ways:
1) Early money memories and family history
2) Money scripts
3) Self-Talk
4) Physical Expressions
5) Financial Behaviors

The core of the presentation will be on the supportive tools and behaviors that financial practitioners can use to support their clients. Shame-free language, carefully curated onboarding questionnaires and empathic curiosity build safe relationships. Infusing autonomy into the counseling relationship allows the client to hold power when they may have often felt powerless (Trauma-Informed Care, Building a Culture of Strength, n.d.).

Affirmations disrupt negative self-beliefs and help the client learn to see their own internal goodness. Reframing beliefs (Gladstone et al., 2021), using scaling questions and creating meaningful narratives (Oberle et al., 2021) can be used to shift negative self-beliefs to kinder, healthier beliefs. Promoting mindfulness (Palmer et al., 2021), pre-emptively preparing for crises (Trauma-Informed Care, Building a Culture of Strength, n.d.) and visualizing goals (Fortin et al., 2020) can help bring clients out of embarrassment and shame and into self-compassion and emotional regulation.

Through these practices, we can support our clients as they work through their shame, develop positive mindsets and beliefs about their financial situation, and build their financial self-efficacy.

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A Novel Idea: Using a Book Club as a Financial Literacy Educational Tool

Nichole Huff & Kelly May, University of Kentucky

Keywords: financial education; financial literacy; identity theft; poverty; retirement planning

Target Audience

The target audience for this Putting It into Practice session includes financial practitioners, educators, researchers, and students. The session will equip financial professionals with useful ideas, information, and tools for more successfully serving clients, as well as highlight ways that financial education can be offered through or in collaboration with Cooperative Extension.

Objective/Purpose

Finding novel ways to engage clients can be challenging. The presenters will discuss practical ways to utilize book clubs as conduits for financial literacy education. The session will showcase three successful statewide programs offered by the University of Kentucky Cooperative Extension Service. Three distinct virtual book clubs were held between 2021-2024 on a variety of financial literacy topics including retirement planning; identity theft and consumer protection; and the systemic impacts of poverty. Results suggest online book clubs can be an engaging, effective tool to promote financial literacy.

Presenters will: (1) introduce the financial topics and literary titles selected for the book clubs; (2) review facilitation and instructional strategies used across programming; (3) present evaluation data that suggests impact; and (4) offer strategies for promoting participant engagement in online and face-to-face settings.

Description

Book clubs have been used as learning tools in a variety of fields to improve critical thinking and reasoning skills, empathy, and the practical application of knowledge. The University of Kentucky's Big Blue Book Club began as an online statewide Extension program during the COVID-19 pandemic. The "novel" program – now in its fifth year – offers engaging, educational programming to address topics that are responsive to community needs. To date, three separate selections have addressed financial literacy education. This conference session will overview the components of these Big Blue Book Club installments held in 2021, 2022, and 2024. Practical considerations will be offered to adapt the program for use with different audiences/clientele.

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Empowering Financial Professionals through the Military Family Readiness Academy

Nichole Huff & Kristen Jowers, University of Kentucky, Amy Smith, Auburn University, & Jennifer Rea, University of Arizona

Keywords: military, continuing education, Cooperative Extension, professional development

Target Audience

The target audience includes family service providers who work directly or indirectly with military audiences. This includes financial counselors, educators, and military transition professionals. The presenters will discuss no-cost resources for financial counselors to deepen their understanding of military financial well-being, and the pivotal role financial counselors have in strengthening military family readiness and resilience.

Objective/Purpose

This Putting It into Practice session will showcase OneOp, a virtual professional development platform supported by the Department of Defense (DoD) and its flagship initiative – the Military Family Readiness Academy (MFRA). Each year, the MFRA equips financial professionals to address the evolving needs of the military community by fostering interdisciplinary education on the complex challenges military families face. The session highlights the 2024 MFRA, Economic Readiness and Military Family Well-Being, a virtual series offering 4.5 free continuing education (CE) credits for Accredited Financial Counselors and other military family service providers.

Participants will be able to: (1) recognize their role in the Military Family Readiness System; (2) engage with a hypothetical military family case study; and (3) identify professional development learning opportunities to enhance service provider capacity to support military families.

Description

Presenters will highlight the 2024 MFRA, Economic Readiness and Military Family Well-Being. This free virtual series includes a 1.5-hour foundational course and three on-demand webinars (4.5 CE credits total) that frame economic security through the lenses of emotional, physical, social, and financial well-being. Content areas explore the intersection of finances and nutrition, military spouse employment challenges and opportunities, the ecological and social drivers of economic security, and state and federal programs and policies that support the economic readiness of military families.

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Preparing Practitioners: Teaching Financial Stress Through Real-World Scenarios

Portia L. Johnson, PhD., Auburn University, Suzanne Bartholomae, PhD, Iowa State University, & Jenny Abel, M.S., AFC, University of Wisconsin-Madison Division of Extension

Keywords: personal finance, financial stress, financial well-being, case studies, real-world scenario, pedagogy, experiential learning, professional development

Target Audience

This session offers an interactive and engaging hands-on experience for financial professionals. Intended for personal finance coaches, financial counselors, financial educators, and family and consumer sciences extension and community education professionals, attendees participate in real-world case study refinement and small group discussions. New and seasoned professionals alike will benefit from attending this session.

Objective/Purpose

This session is designed to equip financial professionals—including personal finance coaches, counselors, educators, and extension specialists—with practical tools to better understand and address financial stress in their work with individuals and families. Through experiential learning and peer exchange, attendees will help shape a resource that supports financial professionals in addressing financial stress with greater empathy, accuracy, and effectiveness. By the end of this session, participants will critically evaluate financial stress case studies rooted in real-world experiences, contribute professional insights to enhance their relevance and applicability to diverse clients in communities, and explore practical uses for these scenarios in both instructional and counseling settings.

Practical Insights & Impacts

Participants in this session will engage with a curated set of financial stress case studies designed to reflect financial stressors commonly faced by today's families. Through collaborative review and discussion, attendees will contribute practical insights from their professional experience that inform the final collection of case studies, ensuring its relevance to both instructional and counseling contexts. In this way, session participants are contributing to literature about financial stress and pedagogy and will be given an opportunity to be a named contributor to the resulting publication. This experiential format offers attendees early access to refined scenarios that can be immediately applied in professional practice, while also fostering peer-to-peer exchange among educators, coaches, and counselors working to address financial stress. The session emphasizes the value of shared expertise in developing tools that strengthen practitioner readiness and client support.

Description

Financial stress significantly impacts financial health and influences behaviors, attitudes, and overall well-being. The financial professionals who work with individuals and families experiencing acute and chronic financial stressors may benefit from case studies, real-world scenarios commonly experienced by clients. Dr. Barbara O'Neil, Rutgers University, conducted similar case study work in 2010. Our present research follows a similar approach, offering scenarios relevant to common demographics and stress-related life events of today's typical family. This session presents a collection of real-world financial stress case studies developed by personal finance educators to support practitioners and students in understanding and addressing these challenges with clients. Participants will engage in a guided review of case studies, contribute insights for refinement, and discuss applications for classroom use and professional development. By collaborating on this experiential learning session, attendees will help shape resources that prepare financial coaches, counselors, and educators to effectively support clients facing financial stress.

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Emotional Relationships with Money: It's Not Always About the Budget

Lisa Karam, Wealth Coach, AFC Candidate & Patrick Nickoletti, Ph.D., LMSW

Keywords: AFC®, financial trauma, money habits, money behaviors

Target Audience
All symposium attendees can benefit who work with individuals or groups, are coaches, counselors, or educators.

Objectives/Purpose
- Recognize early influences on money behaviors
- Learn how to connect early or lifelong experiences with money to current money habits
- Understand the research that studies the impact of childhood influences on mental health and money behaviors
- Identify new behaviors or habits that are not helpful or can be damaging
- Reflect on how this work can be incorporated into the financial counselor's practice

Description
Many people don't realize that our money habits and behaviors are often shaped by experiences we have throughout our lives – starting in childhood. Perhaps we were taught how to manage our finances, or maybe someone showed us how to handle our paychecks, spend wisely, save, and other essential money skills. However, this isn't always the case. Moreover, instead of making thoughtful, informed decisions, many people may act impulsively, driven by emotions and a sense of urgency – wanting things right away and unable to wait.

Grounded in research and real-world practice, this session uncovers how financial trauma, family messages, and formative events shape the way clients think, feel, and act around money. You'll walk away with clear, actionable tools to help clients reframe their money stories and build healthier financial lives — starting from the inside out.

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Fixing More Than the Numbers: Counseling Strategies When Budgets Don't Do the Trick

Jayne Larson AFC®, Your Money Line; Alicia Lawrence AFC®, Your Money Line

Keywords: behavior change, budgeting, cognitive dissonance, counseling strategies, emotional spending, financial coaching, financial self-efficacy, financial stress, motivational interviewing, systemic barriers

Target audience:
This session is designed for financial counselors, coaches, and educators who work directly with clients experiencing budgeting setbacks, especially those who face challenges beyond the numbers. Whether in nonprofit settings, military support services, or workplace financial wellness programs, professionals supporting individuals navigating financial stress will benefit from the strategies discussed.

Objectives/Purpose Description:
Even the most meticulously crafted budgets often fail when they don't address the emotional, psychological, and systemic barriers that clients face. This session shifts the focus from budget creation to behavior transformation. Attendees will explore the deeper "why" behind budget failures—including emotional spending triggers, financial shame, scarcity fatigue, and systemic challenges like income volatility and housing instability. The session introduces counseling strategies rooted in motivational interviewing and the transtheoretical model of change to help clients move from inaction to meaningful progress. Research from Lee, Rabbani, and Heo emphasizes that financial self-efficacy, confidence in one's ability to act, has a stronger influence on outcomes than financial knowledge alone. By equipping professionals with techniques that increase client self-efficacy, we support longer-term financial well-being.

Attendees will also explore the My Money Vibe tool, developed by Your Money Line, which helps clients identify how they think, feel, and behave around money. This tool personalizes financial guidance by addressing the emotional relationship with money rather than just transactional advice.
Using real-life scenarios, group discussions, and guided reflection, this session provides practical, research-backed strategies for engaging clients when budgets fall short. Rather than fixing numbers on a spreadsheet, professionals will learn to help clients build sustainable financial habits rooted in their values—even in times of uncertainty.

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Dollars and Sense: Teaching Financial Literacy in the Prison Population

Wonder F. Lowe, Greater Second Care Center and Shorter College

Keywords: financial education, financial literacy, justice-impacted, just-in-time teaching, prison population

Target Audience

The intended audience is financial educators and practitioners who seek to develop or deliver financial literacy courses tailored for incarcerated individuals. The approach utilizes scenarios and culturally relevant prompts to equip students with practical financial knowledge applicable during re-entry preparation.

Objective/Purpose

Dollars and Sense: Teaching Financial Literacy in the Prison Population emphasizes the importance of financial literacy for incarcerated students. These students face unique barriers, including limited access to financial resources, their economic background, a lack of practical application, educational gaps, and re-entry challenges. Given these barriers, a comprehensive financial literacy program is crucial to their success. Employing scenario-based learning, just-in-time teaching methods, and culturally relevant prompts leads to improvements in financial knowledge and practical skills. Expected outcomes will be assessed by measuring students' ability to create a personal budget, correctly answer financial literacy questions on post-course assessments, and recidivism rates, which will provide clear, measurable indicators of success. Key takeaways are:

- Participants will learn how to effectively incorporate financial literacy into classes by designing lesson plans that address the unique needs of incarcerated individuals.
- Participants will utilize just-in-time teaching methods, scenario-based, and cultural prompts to address students' immediate financial challenges, thereby increasing engagement and retention of economic concepts.
- Participants will analyze relevant data, such as pre- and post-course assessments, budgeting assignments, and recidivism rates, to evaluate the impact of instruction.

Individuals who lack financial knowledge and ability are underprepared for retirement and make poorer financial choices (Lusardi & Mitchell, 2014; Lusardi & Tufano, 2015). Releasing former prisoners back into society who have little or no background in personal finance sets them up for failure from the very start, and this, of course, can affect the recidivism rate. (Galchus, K. (2014). Providing financial education before release from incarceration is a Just-in-Time teaching opportunity—providing timely instruction on a subject with which the soon-to-be-released offender has at least introductory experience (Braunstein & Welch, 2002; Novak, 2011). The point of just-in-time education is to provide more than just an explanation of a product's features and benefits, and/or "educational disclosure" in the fine print about how it works. (Kitces, M., 2016) The impact of teaching financial literacy to incarcerated individuals can be seen when using results from a 43-question financial capability survey filled out by 299 male inmates in Arkansas' correctional facilities and comparing them to results for 211 Arkansas' males interviewed as part of the recent Financial Institute Regulatory Authority's (FINRA) 2012 National Financial Capability Study, shows that the financial capability of inmates is even lower than that of males in the general population (which is already low). The conclusion is that more financial education is needed in pre-release programs.

Just-in-Time Teaching Method: The Just-in-Time Teaching method is particularly effective for overcoming the challenges incarcerated students encounter with financial literacy. This approach allows instructors to adapt lessons to address students' current needs and knowledge gaps, thereby making financial concepts more accessible despite resource constraints. By providing targeted instruction based on pre-class assignments (such as managing commissary, time management, behavioral modifications, and self-reflection) and ongoing feedback, educators can focus on the most pressing challenges students face, including budgeting for re-entry and understanding debt management. Studies have shown that Just-in-Time Teaching increases engagement and retention among adult learners in correctional settings, demonstrating its effectiveness in improving financial knowledge and practical skills for this population.

Financial Barriers of Incarcerated Students: Incarcerated students encounter distinct challenges in financial literacy: (1) Limited Access to Financial Resources: Incarcerated individuals often have restricted access to financial resources and information, making it difficult for them to learn and practice financial skills; (2) Economic Background: Many incarcerated individuals come from economically disadvantaged backgrounds, which can impact

their financial knowledge and skills; (3) Lack of Practical Application: The prison environment does not provide many opportunities for practical application of financial knowledge, which can hinder the learning process; (4) Re-entry Challenges: Upon release, formerly incarcerated individuals face significant challenges in managing their finances, including finding employment, housing, and dealing with any debts or financial obligations they may have; and (5) Educational Gaps: There may be gaps in their education, including basic financial concepts, which need to be addressed through tailored financial literacy programs.

Resources:

The following programs help incarcerated students develop financial literacy skills. (1) Prison Education Foundation: This non-profit organization focuses on providing higher education opportunities to incarcerated individuals. Their programs include a range of educational courses, including financial literacy, aimed at preparing inmates for life after release. (2) Ascendium Education Philanthropy: Ascendium funds initiatives that address financial literacy, academic readiness, and employment connections for incarcerated learners. Their "Beyond Savvy Consumers" model partners with postsecondary institutions to embed financial literacy instruction into prison education programs. (3) National Credit Union Foundation (NCUF): In partnership with Royal Credit Union, the NCUF has developed a guide for credit unions to start financial wellness and education programs in prisons, jails, and correctional facilities. Their program focuses on core financial topics of cash flow, credit, and budgeting. (4) Alliance for Higher Education in Prison: This organization works to ensure that all people, regardless of their incarceration status, have access to high-quality and free higher education. They support financial literacy as part of their broader educational initiatives. (5) NASFAA Prison Education Program Web Center: The National Association of Student Financial Aid Administrators (NASFAA) provides resources and support for implementing financial aid in carceral settings. They offer information on approved Prison Education Programs (PEPs) and other financial education resources.

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Trauma-Informed Financial Education

Dung Mao, Ph.D. & Sara Croymans, MEd, AFC, University of Minnesota Extension

Keywords: financial education, financial well-being, trauma-informed finance, survivor-informed practices, trauma-informed financial education

This session is designed for financial educators, counselors, coaches, therapists, and human service providers who work with individuals and communities that have experienced trauma, such as domestic violence survivors or low-income job seekers.

This session will provide an overview of how trauma impacts financial well-being and financial decision-making. Drawing on principles from trauma-informed care frameworks, attendees will learn to recognize the signs and effects of trauma and understand how to respond in educational settings. We will explore practical strategies for recognizing, responding to, and resisting re-traumatization within financial education delivery, including:

- Understanding the specific effects of trauma on learning, trust (including in financial institutions), emotional regulation, and financial risk-taking behaviors.
- Implementing trauma-informed principles in curriculum design and delivery, emphasizing empowerment, choice, and dignity.
- Strategies for incorporating survivors into program designs to make it truly survivor-informed.
- Developing flexible implementation approaches, including considering individual versus group formats and tailoring content (e.g., budgeting, credit, debt) and timing to participant needs.
- Techniques for building trust and rapport, creating psychological safety, and using clear communication styles and avoiding jargon.
- Discussion of promising interventions, such as integrating peer support and financial education, and evidence suggesting positive outcomes on perceived economic self-sufficiency from trauma-informed financial literacy curricula.

Description
Trauma significantly impacts financial well-being and the capacity for learning, often rendering traditional financial education insufficient for those who have experienced adversity. This session offers practical, research-informed strategies for delivering financial education in a trauma-informed manner, equipping you to recognize, respond, and resist re-traumatization, address trauma's specific effects on finance and learning, and implement concrete strategies for curriculum design and delivery that empower participants through voice, choice, and tailored approaches.

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The Ethical Blind Spot in Divorce: What Every Financial Counselor Needs to Know

Gabriella E. Martinelli, CDFA®, CDS®, NCPM®, Ever After Wealth®

Keywords: behavioral finance, divorce, ethics, financial counseling, trauma-informed

Target Audience
This session is designed for Accredited Financial Counselors®, financial educators, and professionals who support clients navigating major life transitions, particularly divorce. It is especially relevant for practitioners in private practice, nonprofit organizations, military support programs, higher education, and other settings where clients may be emotionally vulnerable and financially uncertain. The content serves both experienced counselors seeking to expand their expertise in complex ethical situations and newer professionals looking to establish best practices early in their careers. Professionals beginning to encounter more divorce-related cases or wishing to deepen their understanding of ethical boundaries in high-stakes client situations will find this session particularly valuable.

Objectives/Purpose Description
Divorce is not merely a legal process—it is a financial crisis wrapped in emotional upheaval. Clients facing divorce often do so in a fog of fear, grief, and destabilization, and in that fog, they are expected to make decisions that will impact their financial future for decades. Unfortunately, not all the guidance they receive is neutral. Clients often receive guidance from professionals whose roles overlap—financial advisors who double as investment managers, insurance agents, or product-driven sales reps. The divorce financial services landscape is fragmented. While many professionals act with integrity, inherent conflicts arise when compensation is tied to asset management, annuity placement, or insurance commissions—especially during divorce, when clients are emotionally vulnerable and ill-equipped to question recommendations.

While attorneys appropriately focus on legal protection and procedural requirements, they are not trained to provide comprehensive financial planning or address the behavioral aspects of financial decision-making during emotional crisis. This leaves clients with legal representation but without the strategic financial guidance and emotional support necessary for sound long-term decisions.

The primary objective is to equip financial counselors with the ethical awareness, emotional insight, and strategic tools needed to serve divorcing clients with integrity. AFCs are uniquely positioned to shift this dynamic through their commitment to the AFCPE® Code of Ethics, which emphasizes integrity, competence, and client welfare. Their non-product, fee-based compensation structure allows them to serve clients' best interests, especially when clients are overwhelmed, confused, or emotionally dysregulated.

Research confirms that trauma impairs cognitive processing, narrows decision-making, and increases impulsive, fear-based choices. The desire to "just get it over with" or to "make them pay" can override long-term financial reasoning. AFCs trained in behavioral finance and trauma-informed care are equipped to intervene before damage is done by pacing the process, providing regulation through structure and education, and helping clients reclaim agency without stepping into unauthorized legal advice.

Practical Applications and Ethical Framework
The session emphasizes not just what to do—but what to avoid. Key practices for maintaining ethical boundaries include staying within scope by supporting, educating, and clarifying without giving legal advice or drafting settlement proposals; prioritizing process over outcome to help clients understand financial implications rather than "winning"; avoiding the urge to "solve" the case—clients need support, not saviors; and collaborating wisely with CDFA® professionals, financial therapists, and attorneys when roles are clearly defined and ethically aligned.

AFCs can use specific tools to maintain neutrality and support long-term thinking. Behavioral red flags to watch for include urgency, black-and-white thinking, emotional asset attachment, and deference to third parties. Empowering language swaps "You should..." with "Let's explore what this might mean for your future." Decision pacing introduces time buffers for high-stakes choices, with counselors offering "You don't have to decide this today."

Attendees will learn to recognize when divorce financial guidance crosses ethical lines through real case examples showing ethical breakdowns in traditional divorce financial planning. The session provides discussion of the AFCPE® Code of Ethics as a framework for navigating complex divorce dynamics, behavioral finance principles applied to high-conflict situations, and tools to support neutrality while advocating for clarity and client empowerment.

For ethical collaboration, AFCs should feel confident asking potential CDFA® partners about their compensation model, whether they receive commission or assets under management fees, and how they handle disagreements between financial fairness and legal leverage. Many CDFA® practitioners operate in a dual-role capacity as both financial strategist and investment manager, while some focus solely on strategy. Ethical collaboration means putting the client's clarity and stability first—above all else.

This comprehensive approach provides strategies for helping clients move from crisis to clarity using long-term thinking, even when fear drives short-term decisions, leaving attendees better equipped to protect clients during one of life's most financially vulnerable transitions—without crossing ethical lines or stepping outside their scope.

Divorce presents unique complexity because traditional financial rules often do not apply—divorce law frequently supersedes standard financial planning principles. Helping clients make sound financial decisions during divorce requires more than financial knowledge and behavioral expertise; it demands specialized understanding of how family law intersects with financial strategy. Given this complexity—particularly in high-conflict or high-asset cases—counselors may benefit from continuing education through organizations such as the Institute for Divorce Financial Analysts, the Association of Divorce Financial Planners, or the Financial Therapy Association. The author, with 21 years of experience in complex divorce financial strategy, is available for case consultation and collaborative partnership with AFCs seeking to serve divorcing clients ethically and effectively.

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Teaching, Coaching, and Tracking Change: Evaluating What Makes Financial Capability Training Work

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Keywords: financial education, financial coaching, culture, evaluation

Target Audience
This session is designed for researchers and evaluators, nonprofit leaders, funders, and program staff working in financial capability, economic mobility, and related human services. It will be especially valuable for organizations seeking to balance accountability demands with actionable, staff-driven evaluation processes.

Objective/ Purpose
Financial capability training is a cornerstone of economic mobility programs, yet the field continues to wrestle with a central question: What makes training "work" for participants? Attendance figures and pre/post surveys tell only part of the story. To truly understand program effectiveness, evaluators and practitioners must examine how teaching, individualized coaching, and progress tracking interact to support lasting financial behavior change.

Today's economic realities highlight the urgency of this work. Communities continue to grapple with widening wealth gaps, rising housing costs, and lingering financial effects of the COVID-19 pandemic. At the same time, funders increasingly expect evidence not just of reach but of impact—evidence that programs shift financial knowledge, confidence, and behaviors in measurable ways.

In this environment, evaluations that are disconnected from staff and participant realities risk producing findings that go unused. This session responds to the sector's need for evaluation approaches that are both rigorous and relevant—demonstrating how collaborative, mixed-methods design can illuminate what truly drives impact in financial capability programming.

This proceedings paper shares lessons from a recent evaluation partnership that explored these questions. By centering staff expertise, participant perspectives, and organizational learning needs, the evaluation identified which program elements contributed most to meaningful outcomes—and how evaluation itself can become a tool for growth.

Description
The evaluation examined three interconnected pillars of financial capability programming:
- Teaching – Group-based workshops that introduced participants to financial tools, strategies, and concepts.
- Coaching – Personalized one-on-one support that contextualized training content, addressed individual barriers, and fostered accountability.
- Tracking Change – Ongoing data collection and outcome monitoring systems that documented participant progress and informed program adjustments.

    Through a mixed-methods approach—combining surveys and test scores, participant data, focus groups, interviews, and staff-led reflection sessions—the evaluation generated insights into the distinct role each pillar plays and how they reinforce one another.

    Key findings from the evaluation included:
- Culturally relevant programming is essential. The majority of Build Wealth staff represent the communities they serve, and their lived expertise is vital to both program design and success. Participants consistently highlighted the value of staff insight in identifying and addressing common challenges, as well as the compassion and cultural understanding staff bring to their work. Instruction grounded in cultural relevance and know-how ensured that content was not only accessible but also meaningful.
- Relationship-based coaching sustains progress. Build Wealth coaches are committed for the long haul, and participants recognize that commitment. Coaching is rooted in trust and vulnerability, cultivated over time. Staff support participants in setting realistic timelines for goals—such as homeownership—that often extend well

beyond a six-month window. When life interruptions occur, coaches are ready to "pick the ball back up," reinforcing that the relationship itself is a key driver of participant success.

- Integration of relationships, culture, and evaluation drives results. By grounding programs in cultural relevance and long-term coaching relationships, Build Wealth created conditions where evaluation data reflected genuine participant experiences. Co-designed outcome tracking systems further strengthened both learning and credibility, enabling the organization to refine programming in real time.

  Together, these findings demonstrate that effective financial capability programming requires more than technical content: it thrives at the intersection of cultural relevance, relationship-based coaching, and collaborative evaluation.

Learning Objectives

As a result of attending this session, participants will be able to:

- Identify the unique contributions of teaching, coaching, and outcome tracking to financial capability programming.
- Recognize common challenges in evaluating financial capability programs and practical strategies for addressing them.
- Apply lessons from this case study to design and implement evaluations that both strengthen program delivery and amplify the use of findings.

Conclusion

Evaluating financial capability training requires moving beyond surface-level indicators to understand how teaching, coaching, and participant outcomes intersect over time. When evaluation is embedded within these processes, it not only measures impact but also strengthens an organization's capacity for learning and adaptation.

The findings from this partnership demonstrate that collaborative, mixed-methods evaluation can reveal what makes financial capability training work—and, just as importantly, ensure that findings are used to improve programs and expand opportunities for financial stability.

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Scroll, Like, Regret: Vetting Financial Advice on TikTok, Instagram, and YouTube

Lynn McHann, AFC — Inked Education/Mommanomics

Abstract
Short-form video platforms have become primary sources of financial information for young adults; yet, the speed, virality, and creator incentives can reward confidence over accuracy. This 'putting it into practice' paper distills a 50-minute, humor-forward workshop delivered to financial literacy professionals, providing a repeatable classroom framework for helping students and clients vet online money advice. The session combines live myth-busting with a lightweight evaluation rubric, risk-communication scripts, and take-home tools. Outcomes include increased confidence in distinguishing credible guidance, the ability to translate red-flag checks into plain-language coaching, and ready-to-use materials aligned with classroom and community settings.

Background and Rationale
Gen Z and Gen Alpha increasingly encounter complex topics—such as credit building, debt payoff strategies, investing, and student-aid decisions—through short videos and creator threads. While social media can democratize access and engagement, it also normalizes anecdote-driven strategies (e.g., 'debt hacks,' 'manifesting money,' or speculative trading) that omit risk, context, or legal/regulatory boundaries. Financial educators need a simple, teachable vetting model that fits a 45–60 minute session, is platform-agnostic, and respects students' lived experiences without being dismissive of the media they value.

Session Purpose and Audience
The workshop equips financial literacy teachers, counselors, and community educators to help young people (and their families) critically evaluate financial content, compare it to trustworthy sources, and make safer, value-aligned decisions. It emphasizes humor, hands-on analysis, and participant discussion to foster psychological safety while addressing misinformation.

Design of the Workshop
Interactive arc
1) Warm-up poll: Where do you get money advice? What's the best/worst tip you've seen? 2) Live 'Dupe or Legit?' The facilitator plays 3–4 short clips or captions, and the room scores them using a one-page rubric. 3) Debrief: Small-group share-outs on what felt persuasive versus what was actually supported. 4) Build-your-own checklist: Participants adapt the rubric to their classroom or client context and identify one quick-win integration for the next week.

Vetting rubric (classroom-ready)
The rubric is intentionally lightweight and memorable so students can use it in the moment: Source & Transparency (Who is this person? Are credentials relevant and verifiable? Any disclosures?); Evidence & Math (Is there data, a method, or a demonstration you can replicate? Are absolute numbers and timelines shown?); Risk & Fit (What could go wrong? What are the costs, minimum time horizons, liquidity needs, and who is this NOT for?); Consensus & Alternatives (How does this align with reputable sources? Are standard options mentioned and compared fairly?); Behavioral Triggers (Is urgency, FOMO, or shame being used to pressure action?).

Risk-communication scripts
Participants practice short scripts to de-escalate hype while honoring curiosity: "That strategy sounds exciting. Let's map the best-case, base-case, and worst-case over 12 months—what would each look like for your budget?" and "Before we decide, let's check one neutral source and one regulator or nonprofit to see how this is usually handled."

Equity, access, and tone
The workshop acknowledges why viral tips resonate—speed, relatability, and perceived gatekeeping in traditional finance—and frames educators as coaches, not scolds. Materials include asset-based language, inclusive examples (banked/unbanked, rural/urban, caregivers and teens), and practical alternatives when an appealing but risky tactic fails vetting.

Implementation in Classrooms and Community Settings
Educators can run the 'Dupe or Legit?' activity using screenshots instead of videos, particularly when bandwidth or filters limit access. The rubric doubles as a family conversation guide: parents and teens can rate posts together, then

choose a safer alternative (e.g., high-yield savings for short-term goals instead of speculative trading). For counseling sessions, the facilitator can ask clients to bring 2–3 recent posts that influenced them; together, they apply the rubric and translate insights into one concrete action aligned with the client's goals.

Practical Tools Provided
- One-page Vetting Rubric (student-friendly) with five checks: Source, Evidence, Risk, Consensus, and Behavioral Triggers.
- Red-Flag Quick List (e.g., guaranteed returns, income claims without taxes or timelines, 'secret' programs, pay-to-play courses).
- Plain-Language Conversion Guide that rewrites hypey claims into realistic options (e.g., 'double your money fast' → 'automate 10% to an IRA; compare diversified target-date funds; understand volatility and time horizon').
- Take-Home Family Checklist for parents/guardians to discuss posts with teens using non-judgmental prompts.
- Slide snippets and facilitation notes for a 45–60 minute delivery.

Limitations and Ethics
The workshop focuses on evaluation skills rather than platform policing; it cannot eliminate exposure to persuasive misinformation. Examples are rotated to avoid targeting individual creators and to minimize the 'Streisand Effect.' Educators are encouraged to disclose potential conflicts, use inclusive language, and refrain from shaming students' sources of information.

Implications for Practice
Financial educators can embed the rubric into existing units (budgeting, credit, investing) and repeatedly model it across the term. Counselors can treat social-media posts as a window into clients' beliefs and design corrective experiences—small, safe trials with clear feedback (e.g., comparing a 3-month emergency savings build to a risky trade's drawdown). Programs serving families can extend the checklist to parent nights, creating a shared language that travels from the classroom to the kitchen table.

Conclusion
Short-form platforms are here to stay; dismissing them cedes the field to louder voices. By pairing humor with a simple evaluation framework and practical scripts, educators can meet young people where they already are—helping them move from 'scroll and react' to 'pause, vet, and choose.' The workshop package—comprising a rubric, red-flag list, scripts, and facilitation notes—offers a ready path for classrooms, counseling sessions, and family workshops to turn curiosity into informed action.

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Mary O'Neill Mini Grant: Financial Empowerment Program

Pilar Pangelinan, AFC, Guam Community College

Keywords: empower; financial counseling, coaching, and education; low-income; public housing

Target Audience
The target audience are financial counselors and coaches who want to assist low- to moderate-income communities. Academics who want to engage students to volunteer in the community.

Objectives/Purpose Description
The Financial Empowerment Project was to provide accredited financial counseling and coaching services for U.S.-assisted families living in public housing on the island of Guam.

Guam is a U.S. territory in Micronesia, located in the Pacific Ocean. It is known as the gateway to Micronesia, "Where America's Day Begins," and has a large U.S. military installation. As it is an island, imported goods cause an excessive cost of living.

From the Guam Chamber of Commerce website:
Approximate monthly expenses for a two-person household (as of August 2024):
- Monthly Rent for 800 SF furnished: $2,200.
- Monthly Rent for 800 SF unfurnished: $1,500
- Basic Utilities (Power and Water) for two people in an 800 SF apartment: $350
- Cable Internet Service: $110
- Average sit-down for Lunch: $40
- Average sit-down for dinner: $80
- Gas (unleaded): $4.89 per gallon (as of June 27, 2025)
- Approximate monthly expenses for a two-person household: $900

This project was a partnership with the Guam Housing Urban Renewal Authority (GHURA), which owns and operates 750 Public Housing units consisting of four Asset Management Properties (AMP). Families living within these AMPs were the intended clients. As a full-time professor at the Guam Community College, teaching Personal Finance, I wanted to get the assistance of previous students who were interested in becoming an AFC to assist in the program. The grant would help fund a scholarship for the AFC certification exam. There was no success in this endeavor.

The Financial Empowerment Program provided accredited financial counseling and coaching services to families living in the Asset Management Properties (AMP), as follows:
- Learn about the dynamics of the Financial Empowerment Program,
- See the impact of the program,
- Access to the program,
- Suggestions for replication programs in other states, and
- Encourage AFCs to partner with other providers to help those in the community become financially literate and empower these individuals to take control of their finances.

November 2024 the first training was held and the program extended until July 2026. Of the families that attended the training and counseling, pre- and post-assessments were conducted to gauge their dispositions. For the pre-assessment, there were more respondents, and for the post-assessment, only 53% replied.

Ms. Philly San Nicolas, Property Site Manager for AMP4, required her residents to attend this training as she noted residents with high delinquency in rent payments. Before terminating any family with unpaid rent, Ms. San Nicolas informs the residents that counseling and training are required so they can understand more about their finances, their financial situation, and budgeting.

After attending one live session and follow-up discussions via phone or messaging, residents had improved their knowledge and understanding of goal setting, budgeting, borrowing, credit scores, and saving. They were able to work out a payment plan with the AMP4 office and keep their units.

Residents stated their concerns about finding work, extended unemployment, fluctuations with pay, medical and other emergencies, excessive cost of living, groceries, utilities, transportation, no childcare available when children are sick, debt, and losing their residence.

GHURA hired three Program Coordinators to collaborate with residents in building up their self-sufficiency. These Program Coordinators have provided residents with the opportunity to attend this training. Ms. San Nicolas has informed the Program Coordinators to include new residents who have moved into the developments.

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Shifts in Student Loan Education Over 5+ Years for 1 Program

Andrea Pellegrini, University of Illinois System

Keywords: communication, financial education, student loans

Target Audience

Financial educators, counselors, and program administrators who design and implement financial education initiatives, particularly those working with college students or focusing on student loan management.

Objectives and Purpose

This "Putting It Into Practice" summary shares practical insights from adapting student loan education during a period of significant uncertainty for borrowers. Between 2020-2025, the University of Illinois System's Student Money Management Center implemented a diversified approach to educational outreach during dramatic policy changes affecting student loan borrowers.

Description

Four primary strategies for education student loan borrowers were employed: (1) semiannual, asynchronous, self-paced educational interventions for in-school borrowers called "Know What You Owe" (KWYO), which evolved into "Fact Check Your Debt"; (2) monthly webinars focused on student loans in preparation for return to repayment after the COVID-19 pandemic repayment pause, plus annual live webinars on student loan management as part of the Get Savvy: Grow Your Green Stuff webinar series; (3) coordinated communications with financial aid offices; and (4) ad-hoc podcast episodes addressing critical repayment updates with state-level student loan regulators.

Participation patterns revealed insights about borrower engagement during policy uncertainty. A two-sample t-test compared pre-repayment pause participation (M = 0.66%, SD = 0.28%, n = 5 semesters) with post-repayment pause participation (M = 0.97%, SD = 0.50%, n = 10 semesters) in semiannual student loan education campaigns (KWYO & Fact Check Your Debt). The difference of 0.31 percentage points was not statistically significant, $t(13) = 1.26$, $p > .05$, indicating that the initial repayment pause period did not significantly alter participation patterns.

However, the most substantial change occurred when comparing early post-repayment pause participation (Fall 2020-Spring 2024: M = 0.75%, SD = 0.14%, n = 8 semesters) with higher participation in the last academic year (Fall 2024-Spring 2025: M = 1.83%, SD = 0.52%, n = 2 semesters). The recent campaign period showed a 144% increase, with both recent semester participation rates (1.46% and 2.20%) exceeding the maximum rate observed in the early post-repayment pause period (0.95%). This significant increase coincided with the close of the On-Ramp to Repayment period in October 2024, when consequences for non-payment were reinstated for the first time since March 2020.

The transition from "Know What You Owe" to "Fact Check Your Debt" in Spring 2025 represented a necessary content refocus to address viral misinformation about student loan management and forgiveness following administrative shifts at the federal level. A chi-square test of independence examined continued growth from Fall 2024 to Spring 2025. Fall 2024 participation was 1.46% (429 participants from 29,453 invited), while Spring 2025 participation was 2.20% (627 participants from 28,452 invited), representing a 50.7% relative increase that was statistically significant, $\chi^2(1) = 45.12$, $p < .001$. This increased participation likely resulted from the structural content shift: KWYO historically encouraged students to look up loan amounts (procedural knowledge) and complete a survey, while "Fact Check Your Debt" quizzed students on critical declarative knowledge about student loans and addressed myths, potentially lowering the perceived completion barrier.

Webinars and podcast episodes provided crucial flexibility in response to external factors like repayment pause extensions and program deadlines. Between 2020-2025, annual student loan management webinar attendance had an average of 36 attendees. Monthly "Student Loan Update" webinars between July 2023-February 2024 had lower live attendance (ranging from 2-19 participants) but enabled rapid content adaptation to frequent policy changes. Webinar recordings distributed through YouTube and email provided scalable reach beyond live attendance, with recordings referenced frequently as additional resources during subsequent annual webinars. The low live attendance likely reflected borrower fatigue during the extended pause period, but the recordings proved valuable for just-in-time information delivery when borrowers needed specific information.

Ten audio-only podcast episodes were produced over five years in partnership with the Illinois Department of Financial and Professional Regulation. Episodes covered topics ranging from general student loan information to specific policy updates including the On-Ramp to Repayment and impacts of administrative forbearance due to SAVE litigation. This cross-sector partnership enabled broader reach and provided authoritative information combining university expertise with regulatory oversight.

Strategic communications included targeted emails to student loan borrowers affiliated with the University of Illinois System, coordinated with financial aid administrators to increase awareness of resources for student loan borrowers, warn of misinformation and student loan scams, and comply with Department of Education directives.

Key takeaways for financial educators include:
1. Self-paced educational interventions can be rapidly redesigned to address emerging policy changes and misinformation
2. Shifting from procedural tasks (looking up loan amounts) to declarative knowledge assessment (quiz format addressing myths) can increase participation but may be less transferable to debt management behaviors
3. Borrower engagement in self-paced education increases substantially when consequences of delinquency and default are in place
4. Diversifying delivery methods (self-paced modules, live webinars, recorded content, targeted communications) allows educators to adapt quickly to changing information needs and policy environments

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Nudging: The Importance of a Holistic Financial Counseling/Coaching Practice

Joshua Escalante Troesh, CFP® and Tenured Professor, Amelie Riendl, AFC® | PMP®

Keywords: behavior change, behavioral finance, behavioral interventions, client success, nudging, operating system

Target audience
Financial counselors who are interested in learning more about tools and resources available to help create consistent coaching practices and improve client outcomes.

Objective & Purpose
Financial counseling clients often don't have the outcomes counselors and coaches would like. This seminar looks at key elements of a standard counseling practice that encourage clients to actually take action on the amazing recommendations and plans offered by financial counselors. In addition, it will identify methods of incorporating nudging and other behavioral economic concepts into financial counseling.

Description
Behavioral economics and nudges have been in the popular media for years, but how do financial counselors implement them in their practices? In order for financial counselors to truly implement these ideas to lead to lasting change for their clients, they need to incorporate tools, software, and partnerships that are not commonly found in typical financial counseling engagements. This seminar will explore these tools and how financial counselors can incorporate them into their work with clients to improve client outcomes.

This presentation will focus on the following key concepts based in behavioral economics:
- Make things simple:
- Financial coaching software to make it easier for clients/counselors to track expenses and review progress
- Technology to improve client outcomes and coach efficiency
- Make things relevant:
- Importance of simple, easy-to-read reports to access information
- Social pressure
- Access to what other people are doing (benchmarking)
- Automation
- Partnering with RIAs to automate savings/investments
- Automated communication
- Workflows/checklists/reminders

The tools and resources explored in this presentation include:
- Coaching Operating System: drive client (& coach) action
- Standard coaching program: the foundation
- Systematic tasks and follow up: automations
- Financial action automation: tools & partnerships
- Coaching Management System: automated spending tracking
- Facilitated client transitions: "What do I do next?"
- Meeting preparation assistance: simplified for client and counselor

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Trends in Financial Counseling/Coaching: Annual Survey Results

Amelie Riendl, AFC® | PMP® and Joshua Escalante Troesh, CFP® and Tenured Professor

Keywords: benchmarking, best practices, career, competitive analysis, counseling programs, employment, income, pricing, research

Target audience
Financial coaches and counselors who want to understand the financial coaching industry, benchmark their practices against others, and understand best practices to implement.

Objective & Purpose
Have you ever wanted to benchmark yourself against other financial counselors/coaches in our emerging industry?

The profession of financial counseling or coaching has a lot of flexibility when working with clients. This variability leads to a lot of confusion for new and experienced coaches/counselors as they navigate their personal careers. The purpose of this session is to help financial counselors/coaches learn about what other professionals are doing to help them improve their efficiency and effectiveness.

Description
FCN's Annual State of Financial Counseling/Coaching Survey analyzes benchmarks and successful practices in the industry. This presentation summarizes the key findings from the State of Financial Coaching/Counseling Benchmarking Survey and trends between the 2024 and 2025 survey, including the following analyses.

Characteristics of High Growth Businesses
- Revenue Growth Based on Training Program Completed
- Revenue Growth Based on Credentials
- How Prospects Found Them: By Revenue Growth
- Programs Offered by Coaches with High Growth Revenue
- Programs Offered by Coaches with Declining Revenue
- High Growth Coaches' Annual Expenses, Excluding Salary & Staff
- Declining Growth Coaches' Annual Expenses, Excluding Salary & Staff
  Niche-Focused Practices
- Total Average Number of Clients Coached: With vs. Without a Niche
- Average Pricing by Service Type: Niche vs. No Niche
- Revenue Growth for Counselors With and Without a Niche
- Annual Revenue Over Time – Niche vs. No Niche
  Building a Successful Business Timeline
- Average Years in Practice by Phase of the Business
- Revenue Based on Years in Business

  While only the key takeaways are highlighted in this presentation, the full survey included identifying trends in the following areas of financial counseling:
- Salary and Income
- Trainings and Certifications
- Business / Career Setup
- Working with Clients
- Coaching/Counseling Programs
- Business Goals
- Business Profitability and Expenses
- Technology

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Game of Loans: Helping Clients Navigate Debt Relief Options

Rebecca Eve Selkowe, JD, AFC®, Entertainment Community Fund & Private Practice

Keywords: credit & debt; debt management; debt relief; financial counseling; professional development

Target Audience
This is an intermediate/advanced level session, although practitioners/educators at all stages of their careers who work with adult clients will benefit. We will focus mainly on credit card debt but will also touch briefly on other types of debt including student loans, mortgages, tax debt, and medical debt.

Objectives / Purpose
This session will empower you to find the best debt management strategy for each of your clients and objectively consider and assess multiple forms of debt relief – even the ones you may now think are a "last resort"! – to find the right fit. You will have an opportunity to learn, share, and discuss best practices and real-life debt management scenarios, and leave with the knowledge and confidence to guide clients through the various alternatives to full debt repayment.

Description
Debt is more than just numbers on a spreadsheet: it's a source of stress, uncertainty, and profound shame for many of the clients we serve. What happens when a client is willing to try anything, but the math simply doesn't math? How can we help someone who doesn't have a realistic pathway to fully repaying their debt?

Many financial counselors shy away from working with clients who have massive amounts of debt because they are not sure how to answer these questions. In an ideal world, we would help every client devise and implement a plan to pay off all their debt, but in reality, the debt burdens of some clients are so heavy that full repayment is neither advisable nor possible. As more and more clients saddled with debt seek the help of financial counselors, we need to be prepared to navigate this complicated landscape with them, and provide sound guidance, information, and referrals.

This dynamic, hands-on session aims to build a solid foundation in debt relief options, so that practitioners – and by extension their clients – can make decisions that are well-informed, carefully considered, and best suited to their unique needs. We will explore the landscape of alternatives to full debt repayment, from negotiation to consolidation to bankruptcy. Each option will be clearly explained and discussed in detail, including pros and cons, common myths, misinformation and red flags, and trusted resources.

We'll break down complex choices into practical guidance, using real-world client scenarios as examples, and walk through a simple debt management decision tree to help you support clients with all levels and types of debt. You will increase your technical knowledge of debt relief and be better equipped to integrate that knowledge with the personal goals, values, and experiences of each of your clients.

Whether you're brand new to debt relief or looking to level up your approach, this session will boost your ability to help your clients win their own Game of Loans.

Presenter Rebecca Eve Selkowe is an AFC®, an attorney with experience counseling individuals through their legal options with respect to debt, author of Dominate Your Debt: A Work & Play Book, and the director of a national nonprofit financial wellness program that empowers thousands of clients annually through original, interactive live workshops and personalized support.

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The Hedonic River: Helping Clients Navigate Lifestyle Changes

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Keywords: behavioral finance, communication, financial coaching, financial counseling, lifestyle spending

Target Audience: Beginner to advanced financial professionals

Objective

The goal of this session is to provide financial professionals with both insight and strategies to help clients recognize lifestyle inflation, especially in the context of shrinking resources and resistance to change. Participants will learn the skills and approaches needed to coach clients through intentional and sustainable adjustments. Participants will learn how to help clients manage difficult emotional barriers to "living with less," reframe spending choices around personal values, and approach change as a positive action to foster dignity, control, and long-term satisfaction.

Description

Lifestyle creep happens when people gradually increase their spending in response to higher income or social cues, often without realizing it. This phenomenon is commonly referred to as being on the hedonic treadmill. The hedonic treadmill explains why even as spending increases, satisfaction plateaus.

In today's economy, the challenge has shifted and has grown exponentially. Many clients must now make difficult choices about cutting back. Not because they are living extravagantly, but because the financial ground beneath them has changed once again. The rising cost of basic needs, combined with cultural pressure to maintain a certain standard of living, makes it emotionally difficult to downsize or simplify. Given the financial pressures on households from student loans and other consumer debt, increased housing and healthcare costs, and rising every-day costs in utilities and food, financial professionals need to feel comfortable exploring the concept of spending related to lifestyle goals.

This session will examine the psychological and behavioral challenges clients face when their spending habits no longer match their financial realities or financial goal attainment. Drawing on the concept of hedonic adaptation, participants will explore how clients often maintain or increase spending despite inflation, stagnant wages, or decreased income. Attendees will gain insight into how social comparison, shifting baselines, and emotional attachment to lifestyle patterns make it difficult to let go of past spending habits, even when doing so is financially necessary.

The hedonic river approach offers an alternative path: a path that focuses on direction, flow, and purpose over accumulation. This metaphor that helps clients view their financial decisions rooted in personal values rather than in fixed or externally driven standards. Unlike the hedonic treadmill, which implies a futile cycle of spending to maintain satisfaction, the river metaphor encourages clients to navigate change and prioritize meaningful direction over material accumulation.

Participants will be introduced to several tools that can be immediately applied in client sessions, including (a) a values clarification discussion to connect spending to important goals, (b) hedonic river prompts to shift the conversation from restriction to purpose, and (c) client-centered coaching questions to explore emotional resistance to scaling back. Participants will leave with an evidence-based perspective and actionable strategies for helping clients adapt to new or ongoing financial circumstances with dignity, intention, and clarity.

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Rethinking the Budget: The Zero-Based Revolution Your Clients Need

Zach Whelchel, MyBudgetCoach and Emily Blain, Dream Big Financial Coaching

Keywords: behavioral finance, financial counseling and coaching, fintech

Target audience:
This presentation was created for coaches and counselors who want to support their clients in making financial behavior changes, specifically around aligning spending with values. It could also be useful for financial advisors who want to learn more about supporting clients with cashflow challenges.

Objectives/Purpose:
Zero-based budgeting has become somewhat of a buzzword recently. Our goal is to demonstrate how real-time zero-based budgeting is the best budgeting method to help clients understand the impact of their spending and the trade-offs that are available to them.

Zero-based budgeting (as used in YNAB and MyBudgetCoach) can evoke strong emotions in practitioners. Some are raving fans; others declare it's overly complicated and unsustainable. As two individuals who have used zero-based budgeting personally and with clients for 6 years, Zach and Emily will present three separate client scenarios, evaluate how the clients' current budgeting practices support (or don't support) them, and demonstrate how zero-based budgeting could help each of them.

Zach and Emily will also demonstrate how zero-based budgeting does not HAVE to be overcomplicated and how it can work with a wide variety of budgeting styles.

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Exit Strategy: Putting Your Final Plans into Place
Saundra Whitaker-Bryant, Ph.D., AFC®, CEO & Owner, Bryant Management Consulting, LLC

Keywords: end-of-life planning, estate planning, exit strategy, legacy planning, and probate wills & trusts

Target Audience

This training will assist financial coaches and planners from all areas including military and veteran, non-profit and community based, those who work with older communities and those who have clients that are multi-generational families. Educators and collaborators will also benefit from this session as it offers insight into initiating difficult conversations and building relationships with professionals outside of their specific discipline. This training is also beneficial for practitioners and organizations wishing to expand their practice or services to include estate planning.

Objective/Purpose Description

This session offers practical tools to integrate end-of-life planning into financial counseling with clarity and compassion, meeting clients where they are, providing a judgment free safe space for decision making and guidance. End of life planning is often avoided, yet it can be one of the most meaningful ways a financial professional can support a client's legacy and peace of mind. Financial professionals will leave equipped to guide clients in securing a lasting legacy of order.

The objective of this session is to provide clear guidance on the various components of end-of-life planning-so participants can confidently guide clients through what is often an overwhelming and sensitive process. After this session, the participants will be able to:

- Identify key financial, legal, and medical documents that should be a part of an end-of-life record keeping system.
- Identify how to organize and manage digital assets—including online accounts and social media.
- Understand the legal and ethical considerations around digital legacy, access, and account closure.
- Integrate legacy planning into financial counseling conversations with sensitivity and cultural awareness.

This session equips financial counselors and educators with tools to demystify an often-neglected area of planning—helping clients finish well and leave a legacy of clarity, not confusion.

This presentation addresses a critical gap in financial literacy: estate and end-of-life planning. It moves the conversation beyond income, debt, and savings to highlight one of the best gifts a person can give their loved ones—the gift of clear guidance and instructions for handling their affairs. End-of-life planning impacts multiple areas of well-being, including mental health. A well-prepared financial legacy allows loved ones to grieve without the burden of financial stress and confusion. This session guides financial professionals in delivering that gift to the families they serve.

End-of-life planning is often avoided but essential—and it goes far beyond wills and funeral arrangements. This presentation introduces financial professionals to a holistic approach for helping clients create a thoughtful, well-organized exit strategy-turning a typically avoided topic into an opportunity for meaningful impact. Participants will learn how to guide clients in gathering vital documents, managing digital assets, and understanding key legal and ethical considerations. The session emphasizes creating a safe, judgment-free space for sensitive conversations and explores how legacy planning supports financial well-being, family stability, and intergenerational wealth transfer. By the end, attendees will be equipped with practical tools and compassionate frameworks to support clients in finishing well with dignity, clarity, and peace of mind.

Additionally, this presentation:

- Promotes equity and access by empowering diverse communities to engage in legacy planning and intergenerational wealth transfer.
- Improves family stability by equipping clients to leave behind organized instruction, reduce emotional stress, and minimize financial hardship for their loved ones.
- Supports professional development for practitioners by providing tools and frameworks to lead sensitive conversations with confidence.

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Navigating Special Needs Planning: A Military Family's Journey, Professional Guidance, and What I Wish I Had Known Sooner

Jennifer Witkowski, AFC®

Keywords: caregivers, special needs, estate planning, financial planning, government benefits

Target Audience

The target audience is financial counselors, educators and planners who work with clients who have special needs, are caregivers for someone with special needs or have a special needs family member.

Objective/Purpose

This session blends special needs planning with lived experience to help financial counselors, planners, and educators better support families navigating the lifelong responsibilities of caregiving. The presenter is a financial counselor and the parent of an adult child with special needs. Using examples from her own family's experience, the session will offer insights into the importance of special needs financial planning and the importance of understanding each client's unique situation. Attendees will gain a better understanding of the importance of considering each clients unique situation and needs. Beyond the technical tools, this session will emphasize the importance of providing compassionate, personalized support and building strong, collaborative relationships with families. Attendess will strengthen their ability to support caregivers and families with greater confidence and compassion.

Learning Objectives/Key Takeaways

- Attendees will gain a better understanding of the importance of special needs estate planning and its role in maintaining eligibility for government benefits.
- Attendees will gain a better understanding of the challenges families may face when establishing and maintaining services.
- Attendees will gain a better understanding of the emotional aspect of special needs planning.

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The Role of Financial Socialization and Financial Capability in Financial Independence among College Students

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Keywords: college students, financial capability, financial independence, financial socialization

Abstract
College students are often learning how to be financially independent, and research examining this independence is limited. Two factors that may contribute to financial independence are financial capability and financial socialization. This study used data collected from two universities in 2023 to examine the effect of financial capability and financial socialization on financial independence among undergraduates. Family financial socialization theory was used to guide this study. Findings reveal financial capability may be more influential on financial independence than financial socialization. Other findings, including implications for practitioners, Cooperative Extension, and university educators, will be shared in the poster presentation.

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Social Media for Investment Advice and Financial Satisfaction: Does Generation Matter?

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Abstract
This study analyzes how social media use for investment advice relates to financial satisfaction across generations using 2021 NFCS data. Gen X and Millennials report lower satisfaction than Baby Boomers. While general social media use shows no significant link, platform-specific patterns emerge: Instagram and TikTok users report higher satisfaction, YouTube users lower. Among Millennials, those using social media for advice are more satisfied. Instagram, TikTok, and Twitter positively impact satisfaction for Gen Z, Millennials, and Gen X, with generational differences seen for Facebook, LinkedIn, and Reddit. These insights suggest platform- and generation-specific strategies for improving financial well-being.

Background
One specific domain of overall life fulfillment is financial satisfaction (Vera-Toscano et al., 2006), an indicator of subjective financial well-being (Diener and Biswas-Diener 2002). According to the report from the Federal Reserve (2023), the financial well-being of American adults dropped by five percentage points between 2021 and 2023, reaching one of its lowest levels since 2016. Additionally, the 2021 TIAA Institute-GFLEC Personal Finance Index survey, which examined financial well-being across generations, shows that baby boomers, millennials, and Generation Z have varying degrees of financial satisfaction, with Gen X being the generation with the worst financial challenges. Money management is one of the challenges that each generation faces with their finances. The framework of Joo and Grable (2004) shows financial management behavior, or how one manages money in terms of savings, debt, cash flow, and others, is one of the determinants of financial satisfaction.

Individual investment behavior is a fundamental aspect of financial management behavior. Every investor is unique, and so are their financial situations and obstacles. Because of this, earlier research has attempted to learn more about investors' investing behavior and to delve even further into their behavior based on their generation; research has divided them into distinct generations, such as baby boomers, Gen X, Millennials, and Gen Z (Ilyas et al. 2021; Schooley and Worden, 2003). As per the 2024 Barron's study, Generation Z is beginning to invest earlier than Boomers. Additionally, the study shows that 51% of the respondents expressed confidence in their investments due to easy access to financial advice and knowledge. Technological advancements and the internet have made financial advice widely available, with social media now emerging as a major information source.

According to Datareportal (2024), 239 million Americans use social media actively. The most widely used internet platforms are Facebook and YouTube, with over 50% of American adults using Instagram. TikTok, LinkedIn, X (formerly known as Twitter), and Reddit are used by smaller numbers, primarily younger generations (Pew Research Center 2024). Yeo's research (2014) shows that individuals use social media not just for networking purposes but also to acquire additional information. Many studies demonstrate individuals rely on social media to obtain information for decision-making (Cooley and Parks-Yancy, 2019; Gupta 2019). Also, research indicates that social media increasingly influences individuals' financial decisions (Florendo and Estelami, 2019; Jha 2019). Remarkably, social media has been a source of financial advice for 79% of Americans in the millennial or Gen Z age groups (Forbes 2023).

Social media influences investment decisions, among other financial decisions. The cryptocurrency bubble and the "meme stock" frenzy are recent examples of social media's impact on investment decision-making (Pandey and Guillemette 2024; Tandon et al. 2021). According to a Forbes Advisor survey (2023), YouTube, Reddit, TikTok, Instagram, X (formerly known as Twitter), Facebook, and LinkedIn are the most popular social media platforms for financial information. The survey asked what kinds of advice young adults most frequently see on social media. Fifty-seven percent of millennials and Gen Z ranked advice on stock and bond investing as the most encountered topic. While it is undeniable that social media can offer helpful information, users should be aware that not all of it is accurate. User awareness of information available on social media is crucial for younger users, as research indicates that they rely more on social media for information (Reiter et al. 2023; Rue 2018).

Using social media excessively influences not just one's decision to invest but also their financial satisfaction. According to a 2022 Bankrate Social Media Survey, 47% of Gen Z, 46% of Millennials, 31% of Gen X, and 22% of

Baby Boomers expressed adverse feelings about their financial status after reading other people's posts related to finances on social media. The influence on each generation was varied, with Baby Boomers experiencing the least amount of this. Thus, this exemplifies how social media can intensify a sense of financial insecurity, perhaps resulting in a decline in financial satisfaction.

Purpose
Research on how generation classification is associated with using social media as a source of investment advice is lacking, even though social media adoption is increasing among these generations. Additionally, although an increasing number of individual investors are turning to social media for investment guidance, little is known about the relationship between this dependence and overall financial satisfaction. The current study offers a valuable contribution to the literature. Using the 2021 National Financial capability study (NFCS), this study, first thoroughly examines financial satisfaction across different generations, which has not been studied before. Second, it explores the association between reliance on social media for investment advice and financial satisfaction. Finally, the study examines how the association varies across different generations. Financial educators, counselors and planners would benefit from the findings of this study.

Conceptual Background
In exploring the relationship between the reliance on social media for investment information and financial satisfaction, this study is motivated by the social influence theory, as explained by Deutsch and Gerard (1955). According to Deutsch and Gerard (1955), individuals' thoughts, emotions, and behaviors are impacted by other individuals around them and their social networks in two different ways: normative social influence and informational social influence. With normative social influence, individuals' behaviors are influenced by others in a bid to be liked and to seek social approval. These individuals then alter their behavior to fit into what is popular and what is the norm, even if these changes do not accurately reflect their personal beliefs. Informational social influence, on the other hand, explains a situation where others influence individuals' behaviors because they don't want to make mistakes and believe their social network knows better than they do, especially in uncertain situations. So, when they are confused or uncertain about a choice, decision, or topic, they seek validation from their social network to make informed decisions. Since this study focuses on the reliance on social media for information and advice, informational social influence will be the focus.

With the advent of social media, individuals of all ages can learn, collaborate, and share ideas and information about various topics ranging from culture to politics to business and even personal finance topics like savings, investing, and debt (Cao et al. 2020). Regarding personal finance and specifically investing, social media provides a plethora of information from different sources like peers, financial experts, and "finfluencers" (Place 2022), which might help individuals make investing decisions. Finfluencers are financial influencers or social media influencers who provide personal finance advice on social media (Place 2022).

On the one hand, because this information shared on social media by these financial experts and finfluencers can be compelling, individuals trust the accuracy of the information, and follow this information and advice, leading to greater confidence in their financial decisions and increased financial satisfaction. On the other hand, relying on just information on social media could lead to "FOMO," the fear of missing out, causing these individuals to make hasty and impulsive decisions driven by social media trends, which is not always optimal and can lead to stress and financial dissatisfaction.

Hypotheses
Based on the social influence theory of Deutsch and Gerard (1955) and the existing literature review, that has shown that financial satisfaction differs across generations, the reliance on social media for investing information influences financial satisfaction, and that financial satisfaction is different across different ages, this present study also hypothesizes the following:
H1: Financial satisfaction will differ across the different generations
H2: Relying on social media for investment information and advice will be related to financial satisfaction
H3: The relationship between reliance on social media for investment advice and financial satisfaction will differ across generations

Methodology
Data and Sample
The 2021 National Financial Capability Study (NFCS) provided by the Financial Institution Regulatory Authority (FINRA) is used The NFCS State-by-State survey is merged with the NFCS Investor survey. Although both surveys are commissioned by the Financial Institution Regulatory Authority (FINRA) Investor Education Foundation, and are self-administered surveys collected every three years, the Investor survey is a follow-up to the State-by-State. While the State-by-State survey provides a general view of the financial capability indicators and their variation with demographic, attitudinal, and knowledge factors, the Investor survey builds on the State-by-State Survey by focusing on factors that affect investors who own non-retirement investment assets. The NFCS State-by-State surveys over 25,000 American adults aged 18 and older from the 50 states in the Unites States including Puerto Rico, and the Investor survey is completed by 2,824 individuals who have non-retirement investment assets. These two surveys were merged because the dependent variable and other control variables are present in the State-by-State, while the main explanatory variable and moderators are in the Investor survey. Responses such as "I don't know" and "prefer not to say" were mostly treated as missing data, causing the final analysis sample to be 2,111 respondents made up of 546 respondents who used social media for investment information and 1,565 respondents who did not.

Outcome Variable
The outcome variable in this analysis is financial satisfaction. Respondents were asked the following question: "Overall, thinking of your assets, debts, and savings, how satisfied are you with your current financial condition?" Possible responses ranged from 1 (not at all satisfied) to 10 (extremely satisfied). Based on this, this present study measures financial satisfaction as an ordered variable in this study with not at all satisfied as the reference category.

Explanatory Variable
The use of social media for investment information is the main explanatory variable in this analysis. This variable was operationalized based on responses to the question, "Which, if any, of the following do you use for information about investing?" There were 11 options of social media platforms the respondents could select, namely YouTube, Instagram, Facebook, TikTok, X (formerly known as Twitter), LinkedIn, Reddit, Stocktwits, Discord, Twitch, and Clubhouse. Respondents who reported using any of the social media platforms outlined were coded as "1", while those who reported not using any were coded as "0". Furthermore, based on the findings of Forbes (2023) and (Reiter et al. 2023) that found that YouTube, Facebook, X (formerly known as Twitter), Instagram, TikTok, LinkedIn, and Reddit were the most popular social media platforms used for investment information and advice, each of these social media platforms were examined separately to see if this relationship between specific social media platforms and financial satisfaction was different for the full sample, and across generations.

Moderator
Generation classification serves as the moderator. According to Dimock (2018), Baby boomers are people born between 1946 and 1964, Gen X are people born between 1965 and 1980, Millennials are born between 1981 and 1996, and Gen Z are born after 1997. Given this premise and based on the response to the age question in the survey, generation classifications are created. Since the NFCS data set was collected in 2021, respondents aged 18-24 years are classified as Gen Z, those aged 25-44 years are classified as millennials, Gen X are defined as those aged 45-54 years old, and baby boomers are defined as those aged 55 and older. Given that social media use is more prevalent among younger generations (Watson 2024), the Baby boomer generation is the reference category.

Covariates
The covariates included in the model are objective investment knowledge, subjective investment knowledge (7-point Likert-scale), willingness to take risks (4 categories), income (9 categories), portfolio account balance (9 categories), race/ethnicity (white, nonwhite), marital status (5 categories), and gender (men, women).

Data Analysis
This study estimates ten ordered logit models based on the ordinal nature of the outcome variable financial satisfaction. Odds ratios are calculated to determine the magnitude of the effects. The first two models answer the first two research questions asked in this study – does financial satisfaction differ across generations, and does reliance on social media for investment information and advice relate to financial satisfaction? In model 1, the use of any of the eleven social platforms captured in the 2021 NFCS and generation classification are the main explanatory variables while controlling for objective investment knowledge, subjective investment knowledge, willingness to

take risks, income, portfolio account balance, race/ethnicity, marital status, and gender. In model 2, each of the seven most common social media platforms for investment advice (YouTube, Facebook, X (formerly known as Twitter), Instagram, TikTok, LinkedIn, and Reddit), are the main explanatory variables, alongside generation classification, while controlling for the same covariates in model 1.

The last eight models are the interaction models answering the third research question –whether the relationship between reliance on social media for investment advice and financial satisfaction will differ across generations. The interaction of generation classification and the use of any social media platform is added as an explanatory variable to the first model to form model 3. Models 4 to 10 examine each of the seven social media platforms alongside their interactions with generation classification as the main explanatory variables in separate models. In all eight of the interaction models, objective investment knowledge, subjective investment knowledge, willingness to take risks, income, portfolio account balance, race/ethnicity, marital status, and gender are the covariates.

Sample Characteristics:
Table 1 provides the descriptive statistics for the entire analytic sample and subsets of the sample –those who use any form of social media for investment information (column 2) and those who do not (column 3). Of the total sample, 25.89% report using social media for investment information. As reported in Table 1, a larger percentage of the full sample are men (66.28%), white (71.65%), married (67.28%), and baby boomers (63.26%). Furthermore, more than 50% of the sample report having incomes over $75,000, non-retirement account values of at least $100,000, and willingness to take average financial risks with a willingness to earn average returns. Concerning objective investment knowledge, the average score was 5.63 out of 10 questions, with perceived financial knowledge having an average of 4.95 on a 7-point scale. Overall, the majority of the full sample report was somewhat financially satisfied, with an average rating of 7.73 on a 10-point scale.

When comparing those who use social media for investment advice to those who do not, large differences are observed. For instance, while the most social media users for investment advice are Millennials (49.93%), the most non-social media users are Baby Boomers (76.51%). Interestingly, while social media users had a lower average score (4.71/10) on objective investment knowledge in comparison to non-social media users, more of these social media users ranked their perceived investment knowledge to be high (average score of 5.3 on a 7-point scale), hinting at possible overconfidence amongst social media users. Similarly, while a higher proportion of non-social media users report having portfolio values of $100,000 or more (63.64%) relative to social media users (39.53%), a lower proportion of these non-social media users are willing to take above-average to substantial financial risks (30.14%), relative to social media users (62.14%). More non-social media users report being financially satisfied (7.80/10). Finally, YouTube and Facebook are the two most used social media platforms for investment information among social media users.

The descriptive statistics for the social media user sample across the generations examined (Baby boomers, Gen X, Millennials, and Gen Z) are also reported in Table 2. Among social media users, YouTube is the most used form of social media for investment information across all generations, with a higher percentage of usage observed for Millennials (68.41%) and Gen Z (82.24%). However, while Instagram and TikTok have the second and third highest percentages of usage for Gen Z social media users, Facebook and X (formerly known as Twitter) are the next highest for millennials, and Facebook and Reddit for Gen X social media users. In contrast, LinkedIn and Facebook had the subsequent highest use for investment information for baby boomer social media users. The average score among social media users on the objective investment knowledge questions declined with the generations, with baby boomers having the highest (5.58/10). However, while Gen Z had the lowest average objective investment knowledge score (3.92/10), they had the second highest average ranking of their perceived investment knowledge (5.48/10). The value of investments in non-retirement accounts increased across generations, and risk tolerance mostly decreased across generations. Specifically, a higher proportion (63.24%) of baby boomers who use social media for investment information report portfolio values in non-retirement accounts of above $100,000 (compared to about 15% of Gen Z. 33% of millennials, and 34% of Gen X), and a lower proportion of baby boomers were willing to take substantial financial risks with their investment (10.84%), compared to about 32% of Gen Z's and 35% of Millennial social media users. This statistic is not surprising as most baby boomers are pre-retirees or retirees and have accumulated over their lifetime assets that would be decumulated. Also, given their life stage, these baby boomers are less willing to take risks since they are (or very close to) decumulating their assets. Regarding financial satisfaction, baby boomers report the highest social media users who report being financially satisfied on average (7.9/10), with Gen X having the lowest (6.74/10).

Model Results

Is reliance on social media for investment information and generation classification related to financial satisfaction?

A total of ten models were examined in this study. Table 3 shows the odd ratios from two (out of the total 10) ordered logistic models analyzed in this study that answer the question of whether or not the reliance on social media for investment advice or information and generation classification is related to financial satisfaction. For the first model, the explanatory variable is using any of the eleven social media platforms outlined in the survey – YouTube, Instagram, Facebook, TikTok, X (formerly known as Twitter), Reddit, LinkedIn, Stocktwits, Discord, Twitch, and Clubhouse. Subsequently, the following second model answers these questions by focusing on each of the seven most commonly used social media platforms for investment information as highlighted by Lin et al. (2022) and (Reiter et al., 2023) – YouTube, Facebook, X (formerly known as Twitter), Instagram, TikTok, LinkedIn, and Reddit.

The results showed that using at least one of the social media platforms for investment advice or information is not statistically associated with financial satisfaction. However, different results are found when specific social media platforms are modeled. For instance, while respondents who use Instagram (OR = 1.78) or TikTok (OR = 2.17) for investment information have higher odds of being financially satisfied compared to those who do not, respondents who used YouTube (OR = 0.64) for investment advice had lower odds of being financially satisfied. While no statistically significant association was found for Facebook, X (formerly known as Twitter), LinkedIn, and Reddit. For the association between generation classification and financial satisfaction, a similar result observed across all eight models is that Gen X and millennials have lower odds of being financially satisfied compared to Baby Boomers, while no statistically significant result was found for the relationship between being Gen Z and financial satisfaction.

Regarding the covariates, respondents with higher incomes, higher values in their non-retirement accounts, and widowed were more likely to be financially satisfied across all two models. While respondents who report being separated from their spouses, and those who are more willing to take above average financial risks are less likely to be financially satisfied. Interestingly, while objective investment knowledge was largely not statistically significant, perceived investment knowledge was positively associated with financial satisfaction.

Does the relationship between use of social media for investment information change with generation classification?

The last eight models depicted in Tables 4 and 5 analyzed the moderating role of generation classification in the relationship between the use of social media for investment advice and information and financial satisfaction. This analysis first looks at the use of any form of social media highlighted in the survey and then looks specifically at seven highlighted social media platforms as previously mentioned (YouTube, Facebook, X, Instagram, TikTok, LinkedIn, and Reddit).

Examining whether this relationship between reliance on social media platforms in general for investment information and financial satisfaction varies across generations, this current study finds a statistically significant relationship only for millennials. Specifically, this study finds that millennials who use social media for investment information are more likely to be financially satisfied compared to their counterparts who do not (OR = 2.77).

Conclusions, Implications and Limitations

The findings show that Gen X and Millennials are less likely to be financially satisfied than Baby Boomers. Regarding social media usage, the study finds no association between financial satisfaction and using any social media platform. However, some intriguing findings were discovered after a more thorough investigation using the most popular social media site. Individuals who use Instagram and TikTok for investment advice are more likely to be financially satisfied than those who do not, but individuals who use YouTube are less likely to be financially satisfied than those who do not. When examining the level of financial satisfaction among social media users across generations, the study discovers that only Millennials who utilize social media platforms to get investment advice are more likely to be financially satisfied than their peers.

Upon conducting more in-depth research with each of the seven commonly used social media platforms, distinct outcomes were observed. Based on the study of frequently used social media, Gen Z, Millennials, and Gen X who use Instagram, TikTok, and X (formerly known as Twitter) for investment advice are more likely than their peers to be financially satisfied. The results were noteworthy for Millennials in terms of Facebook and LinkedIn use, showing that those who used these sites were more likely than non-users to be financially. Remarkably, among Reddit users, Gen X is the only generation that is more likely than non-users to be financially satisfied. The study

also revealed another interesting finding that there was no significant correlation discovered for any generation between the use of YouTube for investment advice and financial satisfaction.

The study findings could benefit financial counsellors, educators, planners, and policy makers. Financial professionals highly value clients' involvement and satisfaction. By using this social media platform's widespread popularity, they may produce material that appeals to different generations and expand their audience reach. While Millennials were found to have a favorable relationship with using most platforms covered in this study except YouTube, other generations showed somewhat different findings. Thus, financial professionals should exercise caution while using the platforms for each generation. Nonetheless, the current research discovered that Instagram, TikTok, and X (formerly known as Twitter) are favored by users of any generation, suggesting that financial professionals can benefit from these platforms. To gain a deeper understanding of the long-term impacts of various social media platforms, researchers may benefit from longitudinal datasets to better examine changes in investment behavior and financial satisfaction over time.

The study underscores the importance of targeting the appropriate social media platforms for different population groups, as not all information on social media is high quality and some can create issues similar to those seen with cryptocurrency bubbles and meme stock frenzies (Pandey & Guillemette, 2024). Additionally, despite the increasing trend of individual investors seeking investment advice through social media, there is limited understanding of the regulations governing these financial posts, which is becoming an emerging concern.

The present study demonstrates how different social media platforms influence individuals' financial satisfaction differently depending on their generation. Because using social media platforms for investment advice is linked to financial satisfaction, the accuracy and reliability of the information shared on these networks are crucial when making financial decisions. Hence, the results of this study support the policy regulating investment advice on social media platforms (Arrowood 2024). Research from the past indicates that social media may promote financial literacy (Heri et al. 2021). As this study's findings demonstrate, policymakers should consider suitable social media platforms for integrating these websites into national financial literacy campaigns.

A limitation of the study is that due to the secondary nature of the data set is the demographic composition of the sample. The majority of the sample are baby boomers and white respondents, and a small percentage of the sample are Gen Z and non-white. Future research may benefit from gathering inclusive primary data with a more balanced and diverse sample that includes a more significant proportion of Gen Z and non-white respondents.

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Tables and Figures

Figure 1. Proposed Research Framework
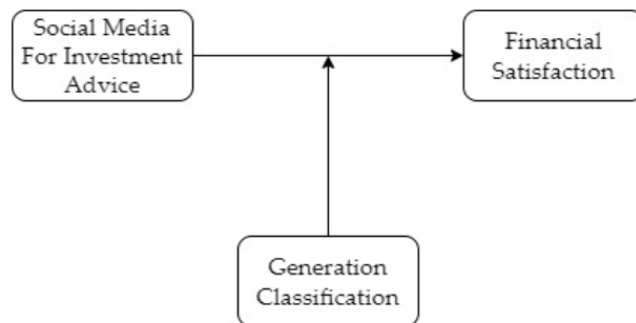
Table 1. Descriptive Statistics: Full Sample, Social Media Users vs Non-Social Media Users

Variables	Full Sample (N= 2,111)	Social Media Users (N= 546)	Non-Social Media Users (1,565)
Outcome Variable: Financial Satisfaction (On a scale of 1- 10)	**7.7306**	**7.5296**	**7.8027**
Explanatory Variables:			
Generation			
Baby boomers	0.6326	0.2538	0.7652
Gen X	0.1213	0.1305	0.1180
Millennials	0.2074	0.4994	0.1053
Gen Z	0.0387	0.1164	0.0115
Social Media			
Users	0.2590		
Non-users	0.7410		
Instagram			
Users	0.1002	0.3868	
Non-users	0.8998	0.6132	
TikTok			
Users	0.0690	0.2664	
Non-users	0.9310	0.7336	
YouTube			
Users	0.2103	0.6326	
Non-users	0.7897	0.3674	
Facebook			
Users	0.1335	0.5156	
Non-users	0.8664	0.4844	
Twitter			
Users	0.1098	0.4238	
Non-users	0.8902	0.5762	
Reddit			
Users	0.1123	0.4348	
Non-users	0.8874	0.5652	
LinkedIn			
Users	0.1089	0.4205	
Non-users	0.8911	0.5795	
Risk Attitude			
No risk	0.0907	0.0471	0.1058
Average risk	0.5247	0.3314	0.5926
Above-average risk	0.2824	0.3643	0.2536
Substantial risk	0.1021	0.2571	0.0479
Objective Investment Knowledge	5.6385	4.7122	5.9622
Subjective Investment Literacy On a scale of 1- 7)	4.9508	5.3455	4.8130
Portfolio Account Balance			
Less than $2,000	0.0544	0.0898	0.0420
$2,000-$5,000	0.0494	0.0910	0.0348
$5,000-$10,000	0.0464	0.0897	0.0313
$10,000-$25,000	0.0679	0.0905	0.0599
$25,000-$50,000	0.0684	0.0722	0.0670
$50,000-$100,000	0.1397	0.1714	0.1286
$100,000-$250,000	0.1755	0.1540	0.1838
$250,000-$500,000	0.1544	0.1249	0.1645

$500,000 and above	0.2438	0.1164	0.2880	

Note: All the other covariates were included, but excluded due to space limitations. Their means and standard errors are available upon request.

Table 2. Descriptive Statistics: Social Media Users by Generation Classification

Variables	Baby boomers (N = 139)	Gen X (N = 72)	Millennials (N = 272)	Gen Z (N = 63)
Outcome Variable: Financial Satisfaction On a scale of 1- 10)	7.7955	6.7465	7.7603	6.8372
Explanatory Variables:				
Instagram				
Users	0.1566	0.2690	0.4847	0.6008
Non-users	0.8434	0.7310	0.5152	0.3991
TikTok				
Users	0.0561	0.1326	0.3390	0.5633
Non-users	0.9438	0.8674	0.6609	0.4367
YouTube				
Users	0.4578	0.6066	0.6841 (	0.8224
Non-users	0.5422	0.3933	0.3159	0.1776
Facebook				
Users	0.4068	0.4489	0.5924	0.4975
Non-users	0.5932	0.5511	0.4076	0.5024
Twitter				
Users	0.1713	0.4162	0.5388	0.4894
Non-users	0.8287	0.5838	0.4612	0.5106
Reddit				
Users	0.2926	0.4514	0.4916	0.4836
Non-users	0.7074	0.5485	0.5084	0.5174
LinkedIn				
Users	0.4194	0.4321	0.4393	0.3293
Non-users	0.5806	0.5679	0.5607	0.6707
Risk Attitude				
No risk	0.0494	0.0478	0.0475	0.0399
Average risk	0.5198	0.3901	0.2146	0.3556
Above- average risk	0.3223	0.4386	0.3852	0.2828
Substantial risk	0.1084	0.1234	0.3526	0.3216
Objective Investment Knowledge	5.5871	4.8283	4.4218	3.9206
Subjective Investment Knowledge On a scale of 1- 7)	5.0910	4.9319	5.5512	5.4814
Portfolio Account Balance				

Less than $2,000	0.0223	0.1555	0.0885	0.1684
$2,000-$5,000	0.0452	0.0203	0.1074	0.1997
$5,000-$10,000	0.0501	0.1088	0.0909	0.1491
$10,000-$25,000	0.0828	0.1192	0.0741	0.1455
$25,000-$50,000	0.0703	0.0590	0.0837	0.0419
$50,000-$100,000	0.0964	0.1619	0.2177	0.1468
$100,000-$250,000	0.1828	0.1977	0.1466	0.0740
$250,000-$500,000	0.2210	0.1361	0.0939	0.0363
$500,000 and above	0.2288	0.0414	0.0971	0.0383

Note: Data is from the 2021 wave of the National Financial Capability Study (NFCS). All the other covariates were included, but excluded due to space limitations. Their means and standard errors are available upon request.

Table 3. Ordered Logistic Regression of Financial Satisfaction, General Social Media Use, and Specific Social Media Use Without Interactions

Explanatory Variables	Model 1	Model 2
Social media users	0.8587 (0.0971)	
Generation (Reference: Baby boomers)		
Gen Z	0.9863 (0.2715)	0.7798(0.2194)
Millennials	0.6247***(0.0810)	0.5553***(0.0721)
Gen X	0.3672***(0.0464)	0.3682***(0.0469)
Instagram users		1.7827*(0.4078)
Tik Tok users		2.1727**(0.5216)
YouTube users		0.6414**(0.0845)
Facebook users		1.2825(0.2336)
Twitter users		1.1049(0.2063)
LinkedIn users		0.9243(0.1547)
Reddit users		0.8196(0.1290)

Note: Data is from the 2021 wave of the National Financial Capability Study (NFCS). Full sample size = 2,111. Standard errors are in parentheses. *** $p < 0.001$; ** $p < 0.01$;* $p < 0.05$. All the other covariates were included in the models, but excluded due to space limitations. Their odd ratios and standard errors are available upon request.

Table 4. Ordered Logistic Regression of Financial Satisfaction, General Social Media, Instagram, Tik Tok, YouTube, and Generation Classification

Explanatory Variables	Model 3	Model 4	Model 5	Model 6
Gen Z and Social media user	1.5700 (0.8720)			
Millennial and Social media user	2.8050*** (0.7026)			

Explanatory Variables				
Gen X and social media user	1.4467 (0.4265)			
Gen Z and Instagram user		4.4081* (2.8317)		
Millennial and Instagram user		12.7551*** (5.7768)		
Gen X and Instagram user		3.3261*** (1.9686)		
Gen Z and Tik Tok user			12.6718** (11.2309)	
Millennial and Tik Tok user			36.2090*** (27.9677)	
Gen X and Tik Tok user			11.2214*** (10.1189)	
Gen Z and YouTube user				0.9397 (0.5092)
Millennial and YouTube user				1.6329 (0.4381)
Gen X and YouTube user				1.0163 (0.3213)

Note: Data is from the 2021 wave of the National Financial Capability Study (NFCS). Full sample size = 2,111. Standard errors are in parentheses. *** p < 0.001; ** p < 0.01;* p < 0.05. All the other variables and covariates were included in the models, but excluded due to space limitations. Their odd ratios and standard errors are available upon request.

Table 5. Ordered Logistic Regression of Financial Satisfaction, Facebook, Twitter, LinkedIn, Reddit, and Generation Classification

Explanatory Variables	Model 7	Model 8	Model 9	Model 10
Gen Z and Facebook user	1.2115 (0.7370)			
Millennial and Facebook user	2.2069* (0.7770)			
Gen X and Facebook user	0.9456 (0.4397)			
Gen Z and Twitter user		3.8178* (2.4005)		
Millennial and Twitter user		7.9628*** (3.2491)		
Gen X and Twitter user		7.2032*** (3.6324)		
Gen Z and LinkedIn user			3.0328 (1.8786)	
Millennial and LinkedIn user			3.9006*** (1.3253)	
Gen X and LinkedIn user			2.0206 (0.8827)	
Gen Z and Reddit user				1.9011 (1.0930)
Millennial and Reddit user				1.9484 (0.7099)
Gen X and Reddit user				2.4676* (1.0965)

Note: Data is from the 2021 wave of the National Financial Capability Study (NFCS). Full sample size = 2,111. Standard errors are in parentheses. *** p < 0.001; ** p < 0.01;* p < 0.05. All the other variables and covariates were

included in the models, but excluded due to space limitations. Their odd ratios and standard errors are available upon request.

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Digital Tool Use and Retirement Behavior Among Non-Retired Adults: Planning More or Just Tracking?

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Abstract

This paper examines whether the use of digital financial tools is associated with key retirement behaviors, such as owning retirement accounts, contributing to them, and setting retirement savings goals, among non-retired U.S. adults. Using the 2021 National Financial Capability Study, we looked at whether there is an association with how often participants use websites or apps to help with financial tasks, such as budgeting, saving, or credit management, and these retirement behaviors. Results show that frequent engagement with digital tools is associated with a higher likelihood of taking proactive steps toward retirement readiness.

Keywords: fintech, retirement planning, digital tools, financial literacy

Introduction

In recent years, personal financial apps have transformed how people manage their financial needs and goals. These tools (e.g., Mint, Credit Karma, etc.) offer features that help individuals to budget, save, and monitor their credit. However, there is limited research on whether these digital tools help particularly in long-term planning, like saving for retirement.

Digital tools are considered a form of light-touch financial advising (CFPB, 2017). This refers to a minimal or less-involved approach to providing financial guidance, often focused on basic advice, simple tools, or self-service support rather than deep, personalized planning. This study investigates whether and how app usage is associated with four retirement behaviors among non-retired U.S. adults: retirement account ownership (employer-based and individual), regular contributions, and goal-setting.

Methodology

The 2021 National Financial Capability Study (NFCS) reports a nationally representative sample, about 500 respondents from each of the states across the U.S. The sample included approximately 20,483 individuals. Since 2009, the FINRA Investor Education Foundation has released the public use dataset every three years. For logistic regression analysis, the sample size was reduced to 5963, as we only restricted the analysis to non-retired adults. The main explanatory variable used was "B43. How often do you use websites or apps to help with financial tasks such as budgeting, saving, or credit management (e.g., GoodBudget, Mint, Credit Karma, etc.)". This App usage frequency variable was categorized as Never, Sometimes, or Frequent. The dependent variables were:

- Ownership of employer-sponsored retirement accounts (C1_2012)
- Ownership of non-employer retirement accounts (C4_2012)
- Regular contributions to retirement accounts (C5_2012)
- Retirement savings goal-setting behavior (J8)

Binary indicator variables were created to indicate respondents' answers for each dependent variable. Respondents who answered "Don't know" and "Prefer not to say" were excluded from the analysis.

Other control variables include age, gender, income, education, financial education, subjective and objective financial literacy, insurance, and access to credit/banking.

Empirical specification

Four models have binary outcomes, and we employ the logistic regression model as shown as follows:

$$\log\left(\frac{p_i}{1 - p_i}\right) = \gamma + \beta1\, \text{AppUsage} + \beta2\, X_i + \beta3\, \delta_i + u_{it}$$

where the dependent variables are binaries: (1) employer retirement account, (2) non-employer retirement account, (3) regular contributions, (4) retirement goal-setting.

We only focus specifically on how digital financial tool use influences retirement-related behaviors. Because these behaviors are only relevant or at least active prior to retirement, it is methodologically necessary to limit the analysis to non-retired households (A10A = 1).

Results

Frequent users of digital financial tools were significantly more likely than non-users to engage in all four retirement behaviors. Specifically, they had 38% greater odds of owning an employer account, 53% greater odds of owning a non-employer account, 79% greater odds of contributing regularly, and more than twice the odds of setting retirement goals (all p < .001). Sometimes users were only significantly more likely to engage in goal-setting (OR = 1.40, p < .001) and were less likely than non-users to own non-employer accounts (OR = 0.83, p < .01).

Other explanatory variables show significance. Financial education, subjective and objective financial literacy were positively associated with all four retirement behaviors (p < .001). Checking account ownership, homeownership, and health insurance were strong positive predictors across outcomes. Gender and minority status were generally not significant, with the exception of gender in the contribution model (p < .05), where men were slightly more likely to contribute.

Conclusions

These results suggest that frequent engagement with digital tools is associated with a higher likelihood of taking proactive steps toward retirement readiness. The findings reinforce the role of financial capability, access, and education in shaping long-term financial behaviors.

Financial counselors and educators may find value in recommending digital financial tools, especially for clients without access to professional advising. These apps may function as accessible and scalable tools to support goal setting, budgeting, and retirement readiness.

One key limitation of this analysis is that it reflects associations rather than causal relationships. While digital financial tool use is positively related to retirement engagement, the direction of influence cannot be determined from cross-sectional data. Individuals who are already retirement-minded may be more likely to adopt digital tools. Future research using longitudinal data or experimental designs could help clarify whether and how digital engagement causally supports retirement planning behaviors.

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Classes or Peer Counseling: What's Best for College Students Financial Well-Being, Knowledge, and Behaviors?

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Abstract

This study examines the relative effectiveness of financial education classes and peer financial counseling on college students' financial management behaviors, self-efficacy, strain, optimism, and knowledge. Data were analyzed using regression and inverse probability weighted regression adjustment models. Students who had both financial education classes and peer counseling reported the highest levels of positive financial management behaviors and self-efficacy. Classes alone were most strongly associated with increased financial knowledge and reduced financial strain. In contrast, peer counseling alone was associated with increased financial strain and decreased financial optimism and knowledge. The results indicate that peer counseling can complement formal financial education.

Background

Financial well-being is a critical aspect of college students' overall success and mental health, yet many students find it challenging to manage their finances effectively (White, 2020). As student debt levels continue to grow and many Americans question the return on investment of a college education, the financial well-being of college students remains an important issue. Numerous factors shape how students behave and navigate their financial lives, which influences their well-being (Sabri et al., 2021). Positive financial behaviors such as budgeting, saving, and avoiding debt are correlated with better financial outcomes (Fan & Henager, 2022). Financial struggles and the corresponding stress and worry associated with money management can negatively impact students' academic performance and mental health (White, 2020). Financial self-efficacy, or an individual's belief in their ability to manage financial tasks, has also been linked to improved financial outcomes and reduced financial stress (Shim et al., 2019). Additionally, financial optimism, the belief that one's financial situation will improve, plays a role in maintaining positive financial behaviors and coping with financial challenges (Strömbäck et al., 2017).

Many college students enter adulthood with limited financial knowledge, which can result in poor financial decisions, such as accumulating high-interest debt or underestimating the necessity of saving for future goals (Lusardi & Mitchell, 2011; Robb & Woodyard, 2011). In response to these concerns, high schools and universities have increasingly incorporated financial education into their curricula. According to the 2024 Council for Economic Education's biennial Survey of the States report, 35 states require high school students to take a personal finance course to graduate, a 92% increase since 2022 (Council for Economic Education, 2024). Identifying the number of institutions of higher education that offer some form of financial education, graduation requirement or not, is considerably more difficult. No compilation of colleges and universities that offer these courses could be identified; however, surveys and news articles have suggested an uptick in collegiate-level financial education courses (National Association of College and University Business Officers, 2017; Carrns, 2025). The goal at each level is to improve students' preparation and ability to navigate their current and future financial lives. Financial education programs, however, vary in scope and effectiveness, often leaving significant gaps in students' knowledge and preparedness for their financial responsibilities as they embark on life after college (White et al., 2024).

Purpose

Much of the existing research focuses primarily on the impact of formal financial education or parents as agents of learning, less emphasis has been placed on the role of peer influence as a learning process in shaping the factors that impact financial well-being (Kim et al., 2021; LeBaron-Black et al., 2023). Although some evidence suggests that peers are a negative influence on responsible financial behaviors (LeBaron-Black et al., 2023), the influence that peers have on one another is undeniable. In peer education and counseling programs, where peers are trained to provide valid and reliable information, there have been positive results on health-related behaviors (Topping, 2022), and improving financial knowledge (Gallardo et al., 2022). Understanding the factors that contribute to the financial success or failure of college students can help policymakers, educators, and financial counselors develop more effective interventions that support students' financial security and long-term financial health. This article aims to compare the efficacy of financial education, formal and peer-to-peer financial counseling, to factors influencing college students' financial well-being. The primary research question for this study is: Which intervention—financial education classes, peer counseling, or their combination—is most effective in enhancing the overall financial well-

being of college students, considering financial management behaviors, self-efficacy, strain, optimism, and knowledge?

Theoretical Framework

Just-in-time teaching (JiTT) is a pedagogical approach involving education within the classroom and informal educational opportunities outside the classroom, such as peer counseling (Brame, n.d.; Novak, 2011; Novak, 2014). While traditional use of JiTT is purposeful with assignments designed to prepare students for discussion of forthcoming classroom learning, inadvertent and non-purposeful learning also occurs in opportunities individuals seek out to address personal needs, such as opting in for personal finance counseling or coaching. JiTT has been used to address relevant education that is provided at a specific time based on one's life stage or situation (Killi & Morrison, 2015; Mielitz et al., 2018).

Post-secondary educators frequently lament student motivation and preparation for class (Collaço, 2017). JiTT is often used to engage students in active learning which helps students better understand the connection of the content being taught in the classroom to the real world (Novak et al., 1998). Educators in personal finance strive to make materials relevant. Regardless of relevance though, research has determined that students still need programs and services that meet individual needs (Collaço, 2017; Davtyan, 2010). Post-secondary institutions that provide peer-mentoring financial counseling services help educators meet the relevancy test, as well as providing active learning opportunities for students.

The use of JiTT to frame this research study is appropriate due to the interactive nature of learning in peer counseling sessions, when available. JiTT suggests that participating in both financial education courses (internal) as well as peer counseling (external) would result in higher financial management scores. Recognizing the need for financial education and opting into a class, as well as taking advantage of financial counseling outside of the classroom, suggests students recognize the need for specific education at specific times in their lives. Also, seeking out interactive ways to engage in material means that the offerings of financial education and financial counseling at the college level are appropriate. Students who are more active in their learning, such as purposefully participating in learning inside and outside the classroom, should score higher on knowledge and capability tests due to increased exposure in various modalities. Furthermore, in personal finance, JiTT has been promoted as a successful strategy to increase personal finance knowledge and capability. (NEFE, 2006).

Literature Review

Brüggen et al. (2017) define financial well-being as "the perception of being able to sustain current and anticipated desired living standards and financial freedom," a formulation that emphasizes its subjective and dynamic nature (p. 229). Their framework identifies key components—including financial knowledge, financial management behaviors, financial self-efficacy, financial strain, and financial optimism—that collectively shape individuals' assessments of their financial health. This literature review examines empirical and theoretical studies related to these components to clarify how targeted interventions, such as financial education and financial peer counseling, may influence financial well-being.

Financial Knowledge

Research consistently shows that the average U.S. adult and college student struggle with financial literacy, often lacking the skills to answer basic questions about personal finance (Lusardi & Mitchell, 2011; SCFW, 2017). This is disappointing as financial knowledge can contribute to greater financial well-being and increased satisfaction (Sabri et al., 2021). Financial education plays a critical role in enhancing financial knowledge, defined here as objective financial knowledge (e.g., the understanding of key terms and concepts within finances; White et al., 2021). Research has suggested that high-quality financial education, characterized by comprehensive curricula and well-trained instructors, is particularly effective in fostering financial knowledge (Kim & Xiao, 2021; Walstad et al., 2010). However, the benefits of financial education can depend on the quality and quantity of education provided (White et al., 2024). High-quality financial education appears to improve knowledge but may impact financial anxiety. The quantity of financial education—measured by hours of exposure—is associated with reductions in financial anxiety. This is possibly due to providing repeated opportunities for learning and creating a sense of financial preparedness (White et al., 2024). Long-term and frequent financial education, delivered through multiple life stages, has been shown to sustain knowledge gains and foster better financial behaviors (Gibson et al., 2022). Despite evidence of the positive effects of financial education on knowledge, some studies report mixed results (White et al., 2024). For example, while formal courses in high school and college are correlated with increased

financial knowledge, other research finds limited or no impact on long-term financial outcomes, such as savings and investment behaviors (Peng et al., 2007; Fernandes et al., 2014). These inconsistencies may stem from differences in program quality, the demographic characteristics of participants, or the metrics used to evaluate outcomes. Additionally, the "decay effect," where the benefits of financial education diminish over time, underscores the importance of sustained and repeated interventions (Fernandes et al., 2014).

Higher education institutions have also started financial education by providing peer financial coaching (also known as peer financial education programs or peer mentoring programs; Durband & Britt, 2012). In these programs, trained college students (usually financial planning majors) provide relatable financial education and coaching (Kayser et al., 2023). Peer mentoring models are used in postsecondary programs due to their affordability, and the trust students often develop with their peers, which may be harder to establish with professionals (Collier, 2017). Peer counseling programs have proven to be especially effective in increasing subjective financial knowledge but limited impact on objective financial knowledge (Britt et al., 2015; Moore et al., 2022). Regardless, these programs leverage the benefits of peer support, where participants learn not only from instructors but also from each other's experiences (Peeters et al., 2018). Such settings foster a sense of shared purpose and reduce the stigma often associated with financial education. This approach also encourages participants to apply new knowledge through collaborative activities, which strengthens retention and practical application (Newton et al., 2010) and is aligned with the theory of JiTT (Brame, n.d.; Novak, 2011; Novak, 2014).

Financial Management Behavior
Effective financial management behaviors, including budgeting, saving, and managing credit, are critical to achieving financial stability. Despite this, many individuals, particularly young adults, struggle in these areas. Research has shown that college students frequently rely on credit cards but fail to manage their balances effectively, leading to significant debt accumulation (Limbu, 2017). Fernades et al. (2014) also examined the impact of financial education on downstream financial behaviors and their findings highlighted the decay effect previously mentioned. They found that changes in financial management behaviors derived from financial education tend to decay quickly over time, with negligible effects observed after about 20 months. As a result, the paper recommends more targeted JiTT financial education. Similarly, Wagner and Walstad (2019) found that financial education does not have an impact on short-term financial behaviors, but on a more positive note, did find that financial education did have a positive and strong effect on long-term financial behaviors. They surmise that the benefits of financial education may not be immediately realized.
There has been very little research on peer financial counseling's impact on financial behaviors, however, Britt et al. (2015) is a notable exception. They found that peer financial counseling did have an impact (though a small effect) on financial behaviors two months after the session(s). They argued that the reason the impact was relatively small is that it is difficult to measure any change of behavior in such a small window of time. Broadening from peer financial counseling to the larger umbrella of any type of financial counseling, there is more support that shows a link between financial counseling and financial behaviors (e.g., Britt et al., 2011; Collins, 2010).

Financial Self-Efficacy
Financial self-efficacy, or the belief in one's ability to manage financial resources effectively, is another crucial determinant of financial behavior (Bandura, 1977; Farrell et al., 2016). Unlike financial literacy, which focuses on knowledge, self-efficacy emphasizes confidence and the ability to act in the face of financial challenges (Farrell et al., 2016). This confidence has been linked to a range of positive outcomes, including lower financial stress, higher savings rates, and improved decision-making (Heckman, et al., 2014). Individuals who believe in their ability to manage financial challenges are better equipped to navigate difficult circumstances and are less likely to experience debilitating stress. Educational programs that foster self-efficacy, through skill-building and small successes, provide participants with a sense of control and confidence, reducing financial strain (Heckman et al., 2014). Peer counseling in theory should enhance self-efficacy by providing relatable role models and fostering a supportive learning environment (Newton et al., 2010). Research by Peeters et al. (2018) suggests that educational strategies including peers often increases self-efficacy. However, to the authors' knowledge there has not yet been a study that measures the impact of financial peer counseling has on financial self-efficacy.

Financial Strain
Financial strain, defined as the inability to meet financial obligations, significantly contributes to overall stress and negatively affects mental, physical, and relational well-being (Britt et al., 2015). Many college students experience financial stress because of substantial debt, limited income, and insufficient financial knowledge. This stress can

lead to adverse outcomes, including poor academic performance and lower retention rates (Robb, 2017). Financial education programs such as credit counseling, debt management, and financial therapy have been shown to lower financial stressor events and alleviate financial strain among participants (Bagwell, 2000; Kim et al., 2003, 2011). For instance, workplace studies have demonstrated decreased strain and improved financial wellness among employees (Prawitz & Cohart, 2014). Among young adults, financial education was found to correlate negatively with worries related to student loans (Fan & Chatterjee, 2019). Indirectly, studies on financial behaviors and knowledge have suggested a conceptual link between financial education and reduced financial strain (Joo & Grable, 2004; Xiao et al., 2006). For example, Joo and Grable (2004) argued that individuals with better financial behaviors experience less strain, and financial education aimed at improving these behaviors likely reduces strain and enhances satisfaction (p. 46).

Peer counseling further enhances the efficacy of these interventions. Peer counselors can provide relatable advice and support, helping participants feel understood and less isolated. This approach has been particularly effective in university settings, where shared experiences foster a sense of community and encourage openness (Newton et al., 2010; Britt et al., 2015). Additionally, group-based interventions create opportunities for participants to share strategies and experiences, reinforcing positive behaviors and reducing the stigma associated with financial difficulties (Peeters et al., 2018). Research has found that individuals who seek financial counseling are more likely to have high levels of financial strain (Peeters et al., 2018). Britt et al. (2015) found there was no reduction in financial stress reported by students two months after their peer financial counseling session.

Financial Optimism
Financial optimism, the belief in a positive financial future, is a critical component of financial well-being. Optimistic individuals are more likely to engage in proactive financial planning, save for the future, and avoid risky financial behaviors. Conversely, low financial optimism can lead to financial avoidance and increased stress, perpetuating a cycle of negative outcomes (Strömbäck et al., 2017). Educational programs play a pivotal role in fostering financial optimism. These interventions provide participants with the knowledge and tools needed to envision and work toward a secure financial future. Goal-setting exercises help participants articulate their aspirations and develop actionable plans, which enhances their sense of control and optimism (Peeters et al., 2018). Programs that include practical activities, such as creating savings plans or reducing debt, reinforce the connection between financial actions and positive outcomes, which further boosts optimism (Shockey & Seiling, 2004). Peer counseling could also contribute to increased financial optimism by offering relatable role models and fostering a sense of community. Participants who see their peers successfully managing financial challenges were more likely to believe in their own ability to do the same. This shared experience should normalize financial struggles and provide a support system that encourages positive thinking (Britt et al., 2015). However, there is no definitive research on the direct relationship between financial peer counseling and financial optimism.

Methods
Data and Sample
This study used data from the 2020 Study on Collegiate Financial Wellness (SCFW), which was administered by The Ohio State University in February 2020 to undergraduate students from 60 two-year and four-year public and private colleges and universities across the United States (US). Per the inverse-probability weighted regression adjustment estimator as described in more detail below, missing cases were handled using listwise deletion. The final sample size for each model is reported in Tables 2 and 3. A variety of demographics were controlled for, including gender, age, parent's education, race, marital status, and employment.

Variables
    Dependent variables
There were five dependent variables in this study. The first four were measured on a Likert-style scale. First, positive financial management behaviors asked respondents whether they track their spending, planned for major purchases, and monitored their account balances ($\alpha = .67$). Second, financial self-efficacy measured respondent's confidence in managing their finances, whether they feel in control of their finances, whether they feel confident in their ability to plan for their financial future, and whether they can figure out a solution when faced with a financial challenge ($\alpha = .87$). Third, financial strain included whether they have enough money to participate in the same activities as their peers (reverse coded), whether they feel stressed about their personal finances, whether they worry about being able to pay their monthly expenses, and whether they worry about having enough to pay for school. The fourth dependent variable was financial optimism, which included the average score for three items that asked

respondents whether they are optimistic when they think about their financial future, whether they will be able to support themselves financially after graduating, and whether they think the cost of college is a good investment in their financial future. Finally, the financial knowledge score was the sum of the number of correct responses to six financial knowledge questions regarding inflation, interest, repayment of a loan, taxes, investment return, and credit score ($\alpha = .58$).

Treatments
The three treatment groups were: (1) students who had only financial education classes and not peer counseling, (2) students who had only peer counseling and not classes, and (3) students who had peer counseling and financial education classes. Students may have met with a peer counselor or taken a financial education class before or during college. Those who never had a class or peer counseling were the comparison group.

Data Analysis
First, ordinary least squares regression models were used to examine the relationship between financial education, peer counseling, and the dependent variables of interest. Following the regression analysis, propensity score matching was used to estimate the average treatment effect of peer counseling and/or financial education on the five dependent variables. Without experimental data and randomly assigned groups, propensity score matching with the inverse-probability weighted regression adjustment (IPWRA) was used to provide unbiased effects conditioning on the previously described covariates. This also helps address concerns of bias in the complete case analysis used in the regression models (Seaman & White, 2013). IPWRA starts by regressing the treatment and covariates on the outcome and then predicts the conditional probability of the treatment (having financial education/peer counseling) for each student. Then, inverse probability weights are calculated and applied, creating a pseudo-population (Chesnaye et al., 2022). IPWRA was also used as it is doubly robust, due to its ability to produce unbiased estimates with only one correct model specification of either the treatment or outcome (Zheng & Ma, 2023).

To ensure that the covariates are balanced amongst the treatment and control groups, the standardized differences and variance ratios were first examined for each model. A standardized difference of 0 and a variance ratio of 1 is commonly said to be perfectly balanced (Austin, 2009). The covariates appeared to be balanced after using the quadratic function of age, as the standardized differences were all close to 0 and the variance ratios were close to 1. The average treatment effect (ATE) and the average treatment effect for the treated (ATET) are reported in Table 3. The ATE estimates the treatment effect for the entire population, whereas the ATET illustrates the effect of the treatment for the subsample of students who have had financial education and/or peer counseling.

Results
Descriptive Statistics
Table 1 provides the descriptive statistics for the variables of interest in this study. In general, respondents reported positive financial management behaviors with a mean score of 3.51 (SD = .57). Respondents' financial self-efficacy scores were a bit lower with an average score of 2.90 (SD = .64). Students, on average, reported lower levels of financial strain (M = 2.65, SD = .78), and lower levels of financial optimism (M = 2.77, SD = .62). Respondents scored up to six points on the financial knowledge questions and the average score was 3.22 (SD = 1.61).

When examining respondents' financial education, more than half of the sample had never taken a financial education course nor had they had peer counseling. Almost 36% of the sample had taken a financial education class but had never had peer counseling. About 6% of respondents had peer counseling but had not taken a financial education class, and a little less than 8% had experienced both. The sample was predominantly female (67%), with an average age of about 21 years old. More than two-thirds of respondents had parents with at least a college degree. About 64% of the sample was White, non-Hispanic, 95% of students were single, and 60% were employed.

Regression Results

The OLS regression results for each of the five models are reported in Table 2. For Model 1, all three methods of financial education were positively related to financial management behaviors. Having both a financial education class and peer counseling corresponded with a .10 point increase in financial management scores compared to those without any financial education (SE = .01). Likewise, students who only had peer counseling compared to those without any financial education were predicted to have .09 higher financial management scores (SE = .02). Having only a financial education class was associated with a .02 higher financial management score compared to no financial education (SE = .01). Race, marital status, and employment status were all significantly related to financial management behaviors.

In Model 2, taking a financial education class and having both a class and peer counseling (β = .14, SE = .02) compared to no financial education (β = .11, SE = .01) was positively related to financial self-efficacy. Peer counseling alone was not significant. Women were predicted to have .25 higher financial self-efficacy scores than men (SE = .01). Of the covariates, parents' education level, race, and employment status were significantly related to financial self-efficacy.

In Model 3, taking only a financial education class compared to not having any financial education was expected to reduce financial strain by .08 points (SE = .01). However, students who reported only having peer counseling (β = .22, SE = .02) or having both a class and peer counseling (β = .07, SE = .02) were predicted to have more financial strain compared to those with neither. Gender, parent's education level, marital status, and employment were significantly related to financial strain with results displayed in Table 2.

For Model 4, only having a financial education class and having both financial education and peer counseling were significantly associated with financial optimism. Both were positively associated with financial optimism and appeared to increase financial optimism to the same extent (β = .11, SE = .01). Of the covariates, gender, age, parent's education level, race, and marital status were significantly related to financial optimism.

Lastly, in Model 5, all three financial education methods were positively and significantly related to financial knowledge. Having a financial education class was associated with a .29 increase (SE = .02) in financial knowledge scores compared to having no financial education. Respondents who had peer counseling were predicted to have .26 higher financial education scores (SE = .04) and respondents with both a class and peer counseling were expected to have .08 higher financial knowledge scores (SE = .04) compared to respondents with no financial education. All covariates were significantly related to financial knowledge.

IPWRA Treatment and Outcome Results
The tables below illustrate the ATE and ATET of financial education on the five dependent variables of interest in this study. In Table 3, the results for all outcome variables are reported. The results indicate that taking a financial education class would increase positive financial management behaviors by 0.025 points. Peer counseling has the largest ATE, with only peer counseling increasing positive financial management behaviors by 0.104 points and having both a financial education class and peer counseling increasing behaviors by 0.104 points. The results are similar when looking at the ATET, meaning that respondents who took only a financial education class experienced an increase of 0.021 points on positive financial management compared to what their score would have been if they had not taken the course.

The findings of the IPWRA indicate that having only a financial education increases a student's financial self-efficacy by 0.111 points. Only peer counseling is not associated with financial self-efficacy scores, however, the ATE of both a financial education class and peer counseling is 0.135 points increase in financial self-efficacy compared to having neither. The results are consistent for ATET.

Taking a financial education class alone reduced financial strain by 0.073 points, however, having only peer counseling increased financial strain (ATE = 2.52), and having both a financial education class and peer counseling also increased financial strain compared to neither. The findings were similar for ATET.

Financial education classes exerted a positive ATE of 0.110 on financial optimism. Similarly, having both a financial education class and peer counseling increased financial optimism by 0.1 points. However, having only peer counseling had a negative ATE of .041, resulting in decreased financial optimism. The findings were consistent for ATET.

Lastly, taking only a financial education course had the largest ATE across all five models, with an increase of .3 points in students' financial knowledge scores. Having only peer counseling, however, reduced financial knowledge scores by .261 points. Taking both a financial education course and undergoing peer counseling did not have a significant ATE. However, it was associated with a .091 financial knowledge score increase for students who had both classes and peer counseling compared to what their score would have been if they had neither.

Discussion
This study explores the efficacy of financial education classes, peer counseling, and a combination of the five factors (financial management behaviors, financial self-efficacy, financial strain, financial optimism, and financial knowledge) related to the financial well-being of college students. The findings offer confirmation of the importance

of financial education and provide valuable insights into the complementary role of peer counseling interventions. All three methods (classes only, peer counseling only, and a combination of classes and peer counseling) are associated with positive financial management behaviors, such as planning for major purchases, tracking spending, and attempting to avoid overspending by monitoring account balances. Specifically, both financial education classes and peer counseling, whether separately or combined, were related to increasing financial management scores. In fact, when the two educational methods are combined, they show the highest increase in positive financial management behaviors, suggesting a strong complementary effect when used together. This is consistent with literature that recommends financial education be combined with some form of psychological counseling to achieve financial behavioral change (Peeters et al., 2018). The result that peer financial counseling aids in improving responsible financial behaviors is contrary to previous research (LeBaron-Black et al., 2023). However, the peers in LeBaron-Black et al. (2023) were friends and not necessarily peer counselors. When peers are trained to be reliable and credible sources of information and support, peers functioning in a counseling role can raise awareness and motivate behavioral change (Topping, 2022).

The results for financial self-efficacy were similarly positive. Students who only took financial education classes and students who combined classes with peer counseling reported higher self-efficacy scores compared to those without financial education interventions. Peer counseling alone, however, did not significantly impact financial self-efficacy. This suggests that while peer support may influence behaviors, it might not be as effective at increasing confidence in one's financial abilities without the foundation provided by a financial education class. It also could be a result of financial counseling often being a short-term intervention, as research has suggested a dosage effect with financial education effectiveness being linked to the length and quantity of the intervention (White et al., 2024). Perhaps peer counseling would be more effective if students used it for an extended period rather than just as a short-term solution.

The results suggest a more complex relationship between the financial education methods in this study and financial strain. Taking a financial education class alone was associated with students experiencing less stress about their personal finances, less worry about meeting their financial obligations, and believing they had enough money to participate in the same activities as their peers. This counters studies that found quality financial education increased the likelihood of experiencing financial anxiety (White et al., 2024). However, students who had participated in peer counseling, whether in isolation or combination with a financial education class, reported higher stress, higher worry, and feelings of not keeping up financially with their peers. These mixed results suggest that peer counseling, while beneficial for certain financial behaviors, may not always alleviate the stress and worry often associated with personal finance. Peer counseling may inadvertently highlight financial issues or create a sense of comparison that increases strain. This is in line with research suggesting that comparing consumption to peers increases financial stress among students (White, 2020). One explanation may be that peer counseling can sometimes bring financial challenges to the surface in such a personal way not provided through classes alone which results in additional stress and worry. In this way, peer counseling may be effective because it brings a heightened awareness of the possible perils of poor financial decisions in a way that a financial education class is not able to personalize.

The results suggest that financial education classes, particularly when combined with peer counseling, are associated with increased optimism about future financial outcomes. Students who participated in both classes and peer counseling were more optimistic about their financial future and believed their investment in college would pay off and make it possible for them to support themselves financially upon graduation. However, it is noteworthy that peer counseling alone appeared to decrease financial optimism. This finding is somewhat surprising because the characteristics of peer counseling include being positive, supportive, and reassuring (Topping, 2022). Peer counseling in isolation may not always encourage an optimistic outlook on financial futures, particularly if the content of the counseling is primarily focused on support for current financial issues rather than the foundations for long-term empowerment often presented in financial education classes. These findings highlight a need for additional research on peer counseling to further investigate this relationship.

The strongest effects of financial education were observed in financial knowledge, where taking a financial education class alone led to the largest increase in financial knowledge scores. This finding provides additional evidence showing that individuals receiving quality financial education tend to increase their financial knowledge (Kaiser et al., 2022; White et al., 2024). Peer counseling alone, however, was found to reduce financial knowledge, which is contrary to Gallardo et al. (2022) who found increases in financial knowledge after individuals received peer counseling. The results herein may be due to the lack of structured financial content provided in peer

counseling sessions. It is interesting that the combination of classes and peer counseling did not produce a significant additional increase in financial knowledge compared to the class alone. Peer counseling is associated with positive behavioral outcomes; however, peer counseling does not necessarily contribute to an understanding of financial topics.

Limitations

Several limitations warrant discussion when interpreting this study's findings. First, the dataset is cross-sectional, which restricts the ability to draw causal inferences or establish a clear temporal sequence between receiving financial education or peer counseling and subsequent financial outcomes. In addition, research suggests that financial education may have long-term effects on some financial outcomes, so depending on the timing, the effects of the education may not have been fully realized (Wagner & Walstad, 2019). Moreover, although inverse-probability weighted regression adjustment (IPWRA) reduces confounding by balancing observed covariates across treatment conditions, the method can only account for measured variables included in the model. Unobserved factors may still influence both the likelihood of receiving financial education and key outcomes. After all, research has suggested that some psychological aspects regarding money (e.g., self-control, motivation) may impact financial behaviors more strongly than literacy (Fernades et al., 2014). Future studies should employ experimental designs to investigate the impact of financial education and financial peer counseling, as doing so may strengthen causal inferences.

Implications

JiTT suggests that students' prior knowledge and experiences are used as a foundation on which they build understanding (Novak, 2011). Therefore, according to JiTT, the financial management scores of students who have had both financial education and peer counseling should be higher because one would build on the other, as this data bears out. The results that students who had only peer counseling compared to those without any financial education resulting in lower knowledge scores are in line with what JiTT suggests due to a lack of relevant prior knowledge and experiences of the respondents.

Implications for practice on college campuses include pairing financial education with peer financial counseling opportunities. While peer counseling had a positive treatment effect on some of the variables of interest in this study, it increased financial strain, decreased financial optimism, and decreased financial knowledge. Further investigation on the correct curriculum and training of peer financial counselors is needed to ensure that peer counseling has the intended effect. It may also be important to examine whether the level of financial education (i.e., high school or college) has a differing impact on these outcomes in future studies. Still, these findings indicate that financial education is influential in college student lives. This research should be influential in state education departments where financial education is not yet required at the high school level as a starting point to consider the longer-term impacts of financial education.

The intersection of peer counseling and financial education positively influencing financial management behaviors, financial self-efficacy, and financial optimism suggests that generalized education at the high school or college level, and then the personalization of that education via one-on-one peer counseling is important to student financial success. Financial education is not required at most universities and even where financial education is available, peer financial counseling opportunities may not exist. Higher education decision-makers should consider opportunities to bring personal finance to all students, whether through a requirement or relevant, single-topic financial education workshops given in for-credit classes. Pairing financial education with peer financial counseling may be a way to partner in local and regional communities through grants or other funding opportunities and results in stronger financial experiences and outlooks for emerging graduates.

Research regarding the impact of peer counseling and financial education is somewhat limited. Further research that controls for how peer counselors were trained and what topics they covered in their one-on-one sessions would allow researchers and practitioners to better understand the impact of one-on-one personal finance education may influence financial optimism and financial strain as reported in this study. Additionally, understanding the best practices of peer financial counseling is a vastly understudied topic that should be influential in further understanding the impact of peer counseling on financial behaviors, financial self-efficacy, financial strain, financial optimism, and financial knowledge.

Conclusion

The results suggest that financial education plays a role in improving financial behavior, confidence, optimism, and knowledge. How individuals access and use financial information from formal education, the topics covered in financial education programs, the timing of the education, and the length of sessions should all be considered to effectively improve financial behaviors (Gibson et al., 2022; Zhang & Fan, 2022). Additionally, proper funding for teacher training is crucial to successfully implement these programs (Zhang & Fan, 2022). Peer counseling can be a valuable complement to financial education, especially for financial behaviors and self-efficacy where the influence of peer counseling was most impactful. However, it may not always provide the same benefits in terms of reducing financial stress or enhancing financial knowledge. These findings point to the importance of designing comprehensive financial education programs that combine both foundational formal education and supportive peer sessions that influence positive financial outcomes.

Tables

Table 1
Descriptive Statistics

Variables	Prop (%)	M (SD)
Positive financial management		3.51(.57)
Financial self-efficacy		2.90(.64)
Financial strain		2.65(.78)
Financial optimism		2.77(.62)
Financial knowledge		3.22(1.61)
Financial education		
No class or peer counseling	50.93	
Only class	35.66	
Only peer counseling	5.71	
Class and peer counseling	7.70	
Female	66.54	
Age		21.49(5.24)
Parent education		
High school or less	20.37	
Some college	10.71	
Associate's or bachelor's	40.53	
Master's or higher	28.40	
White, non-Hispanic	63.89	
Single	95.22	
Employed	60.19	

Table 2

OLS Results

Variable (Reference Group)	Model 1 Positive financial management N = 24,900		Model 2 Financial self-efficacy N = 24,892		Model 3 Financial strain N = 24,868		Model 4 Financial optimism N = 24,855		Model 5 Financial knowledge N = 23,386	
	Coeff	SE	Coeff	SE	Coeff	SE	Coeff	SE	Coeff	SE
Financial education (No class or peer counseling)										
Only class	0.02**	0.01	0.11***	0.01	-.08***	0.01	0.11***	0.01	0.29***	0.02
Only peer counseling	0.09***	0.02	0.02	0.02	0.22***	0.02	-.03	0.02	-0.26***	0.04
Class and peer counseling	0.10***	0.01	0.14***	0.02	0.07***	0.02	0.11***	0.01	0.08*	0.04
Female (Male)	0.01	0.01	.25***	0.01	0.2***	0.01	-0.20***	0.01	-0.77***	0.02
Age	-0.002	0.003	0.000	0.00	0.03***	0.00	-.01*	0.003	0.11***	0.01
AgeXAge	0.000	0.000	0.000	0.00	0.000***	0.00	0.000***	0.00	-.001***	0.00
Parent education (High school or less)										
Some college	0.01	0.01	0.02	0.02	-.07***	0.01	-.02	0.01	0.06	0.04
Associate's or bachelor's	0	0.01	0.05***	0.01	-.23***	0.01	0.05***	0.01	0.2***	0.03
Master's or higher	-.02	0.01	0.07***	0.01	-.44***	0.01	0.13***	0.01	0.36***	0.03
Non-White (White)	-.04***	0.01	-.06***	0.01	0.08***	0.01	-.06***	0.01	-0.37***	0.02
Married (Single)	0.11***	0.02	0.15***	0.02	-0.15***	0.03	0.21***	0.02	0.23***	0.06
Employed (Unemployed)	0.12***	0.01	0.04***	0.01	0.16***	0.01	-.01	0.01	0.10***	0.02
Intercept	3.46***	0.05	2.86***	0.06	2.16***	0.07	2.91***	0.06	1.66***	0.15

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

Table 3

Effects of financial education on positive financial management, financial self-efficacy, financial strain, financial optimism, and financial knowledge: Inverse Probability Weighted Regression Adjustment estimates

	Model 1			
	Positive financial management			
Financial education	**ATE**	**SE**	**ATET**	**SE**
Only class	.025**	0.008	.021**	0.007
Only peer counseling	.104***	0.015	.103***	0.016
Class and peer counseling	.104***	0.013	.104***	0.013
	Model 2			
	Financial self-efficacy			
	ATE	**SE**	**ATET**	**SE**
Only class	.111(.009)***	0.009	.110(.009)***	0.009
Only peer counseling	.010(.019)	0.019	-.001(.020)	0.02
Class and peer counseling	.135(.015)***	0.015	.135(.016)***	0.016
	Model 3			
	Financial strain			
	ATE	**SE**	**ATET**	**SE**
Only class	-.073***	0.011	-.073***	0.011
Only peer counseling	.252***	0.021	.263***	0.021
Class and peer counseling	.087***	0.019	.094***	0.019
	Model 4			
	Financial optimism			
	ATE	**SE**	**ATET**	**SE**
Only class	.110***	0.008	.111***	0.008
Only peer counseling	-.041*	0.017	-.046*	0.018
Class and peer counseling	.100***	0.016	.094***	0.016
	Model 5			
	Financial knowledge			
	ATE	**SE**	**ATET**	**SE**
Only class	.300***	0.022	.305***	0.022
Only peer counseling	-.261***	0.047	-.250***	0.049
Class and peer counseling	0.08	0.041	.091*	0.042

* $p < .05$ ** $p < .01$ *** $p < .00$

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Student loans and financial well-being: A comparison of private and public sector employees with sociodemographic insights

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Abstract

Using primary data and ordered logistic regressions, this study analyzes how student loans are related to financial well-being among private- and public-sector employees. Currently having student loans is associated with lower financial well-being overall. Public sector employees who paid off their student loans do not experience a negative relationship with financial well-being, whereas private sector employees continue to have lower levels of financial well-being. Access to debt-management resources is positively associated with financial well-being. Finally, demographic factors also influence financial well-being. These findings highlight the importance of interventions from employers, policymakers, and practitioners to mitigate the burden of student debt.

Background

On average, student loan borrowers had about $38,180 in federal debt as of July 2024, nearly 3% higher than at the end of 2023, and college tuition has increased about 2.5% for public four-year in-state colleges (Federal Student Aid, n.d.). There is ongoing concern about the long-term effects of this student loan debt on financial well-being. While some studies have observed that student loans represent an investment in one's human capital that provides economic benefits down the road (Baum, 2017; Black et al., 2023) others have raised concern that student loan debt is associated with increased financial stress, decreased life satisfaction, poorer health outcomes, and the postponement of other life goals (Black et al., 2023; Kim & Chatterjee, 2018; Korankye & Kalenkoski, 2021; Mezza et al., 2020; Tran et al., 2018). As practitioners and policymakers grapple with how to help those with student loans, new borrowers continue to join the ranks.

Research is needed to unpack how student loans impact the subjective perceptions of financial control and stress. Students often borrow to improve their career outlook (Britt et al., 2017), which necessitates an understanding of how the effects of student loans on financial well-being differ for those in various career paths. One understudied group in the student loan literature is public sector employees. These employees are often eligible for debt relief programs such as the Public Service Loan Forgiveness (PSLF). Despite these options, public service employees still experience stress from their student loans and may tend to be more likely to have student loans than private sector employees (Young, 2024).

Purpose

State and local government employees are foundational for society at large as they provide services that nearly every American relies on including education, health care, transportation, public safety, and judicial systems. Understanding how to improve morale, financial well-being, and other facets of public employees' well-being is critical to state and local governments maintaining a strong workforce and continuing to provide high-quality services to Americans (MissionSquare, n.d.). Accordingly, this study attempts to understand for whom student loans impact financial well-being while considering how these relationships vary for private and public sector employees. Sociodemographic differences between private and public sector employees are also explored in this study. These findings are intended to develop a clearer understanding of who may perceive a lower level of financial well-being because of their student loans and whether this varies by employment sector (i.e., private or public).

Specifically, the research questions for this study are as follows:
- How does current student loan status relate to financial well-being? And how does self-assessed financial well-being vary for private and public sector employees who currently have, never had, and used to have student loans?
- How does the association between respondent's sociodemographic characteristics and financial well-being vary based on their student loan and the sector they work in?
- Do employer-provided resources on managing debt and student loan forgiveness improve financial well-being for public sector employees?

Theory

This study frames borrowing behavior through the lens of human capital theory (HCT), which suggests that individuals invest in themselves through their education or on-the-job training to increase their productivity and earnings (Becker, 1962). Borrowing for education would, therefore, be perceived as a mechanism to increase earnings in a career (Oreopoulos & Salvanes, 2011). HCT posits that younger individuals may be more inclined to make investments through education than older individuals because younger individuals are less likely to have to give up higher salaries or prioritize family obligations to pursue training. In addition to age, Becker (1962) suggests that sociodemographic variables (such as gender) are also important. For example, he describes how women, on average, spend less time in the workforce, which may result in lower investments in human capital.

Student loans do not offer the instantaneous and tangible benefits (e.g., immediate access to cash) as other types of consumer debt but rather borrow with the knowledge that while they are earning less now, "their future income will enable them to pay off loans at an early age" (Zhang & Fan, 2022, p. 325). Students who borrow large amounts could be perceived as behaving rationally as they do so because they expect to enter a career that provides a large income (Britt et al., 2017). There may be problems, however, if students change their minds and switch to a career path with lower earnings potential after they have already taken out student loans or perceive a great amount of stress from their loan balances (Britt et al., 2017). In this way, HCT is limited by assuming student loan behavior is completely rational. Despite this limitation, the core tenets of HCT are useful to understand this behavior. For example, public sector employees borrow more for school than private sector employees (Young, 2024). Within the framework of HCT, this may suggest that individuals who plan to enter the public sector are aware of the possible loan forgiveness options available to them, thereby justifying their additional borrowing behavior.

Methodology
Data
The data for this study were collected by the MissionSquare Research Institute in collaboration with Greenwald Research. The research was conducted via an online survey between April 30 and May 21, 2024, targeting U.S. employees aged 18-49 in both the public and private sectors. The survey assessed the impacts of student loan debt on financial well-being, retirement readiness, and career decisions. The survey included 2,036 respondents, with a nearly even split between public sector employees (1,001 respondents) and private sector employees (1,035 respondents). Respondents were asked about their education, occupation, job tenure, level of student debt, and the impact of debt on their personal finances and career paths.

Variables
 Financial well-being
The dependent variable for this study was the CFPB's abbreviated measure for financial well-being. Five questions were asked of respondents concerning how well a statement describes them with responses ranging from "Not at All" to "Completely," coded as "1" and "5" respectively. The fourth question was reverse-coded. As is standard practice with the CFPB financial well-being scale, categorizing scores into ranges was completed with our data. The categories included "Very Low", "Low", "Medium Low", "Medium High", "High", and "Very High" with the scores ranging from 0-29, 30-37, 38-49, 50-57, 58-67, and 68-100, respectively.

 Student loans
Three student loan-related variables were included in at least one of the models. First, respondents were asked whether they never had student loans, currently have student loans, or had student loans in the past. Next, respondents were asked to indicate "No," "Yes," or "Don't Know," regarding whether their employer provides information on PSLF forgiveness. Finally, respondents were asked if their employers provided any debt-management resources, with "No," "Yes," or "Don't Know" as choices.

 Sociodemographic variables
Sociodemographic variables were used to examine differences in financial well-being for public- and private-sector employees. Gender included three categories — male, female, and prefer to self-describe. Age was a categorical variable ranging from 25 years old to 49 years old. Categories for race/ethnicity included White, Black, Hispanic/Latino, Asian/Pacific Islander, and other. Respondent's marital status was also examined, which included six categories (single, married, living with a partner, divorced or separated, widowed, and those who preferred not to say). Respondents were asked to choose the category corresponding with their household income range in increments of $25,000. Those who said they did not know their household income were preserved in the data.

 Data analysis

The data contained a variety of variables to examine student loan debt across the sample. Ordered logistic regressions were used to explore the relationship between student loan debt and financial well-being, where the dependent variable was the CFPB score range (Very Low to Very High). An ordered logistic regression is used to model the relationship between a set of independent variables and an ordinal dependent variable, where the categories have a natural order with intervals that are not necessarily equal. This method estimates the odds of a respondent being in a higher category of financial well-being based on their characteristics. Unlike standard linear regression, which assumes a continuous outcome, ordered logistic regression is particularly suitable when the outcome is categorical and ranked, capturing shifts between categories of well-being rather than assuming equal distance between them. The odds ratios produced by this model indicate the likelihood of moving to a higher category of financial well-being for each predictor, controlling for all other factors in the model.

Multiple subgroups were used to analyze the research questions in this study. First, Model 1a examined financial well-being for the full sample, private sector employees (Model 1b), and public sector employees (Model 1c). Next, Model 2a examined financial well-being for private sector employees with student loans, private sector employees who previously had student loans (Model 2b), and private sector employees who never had student loans (Model 2c). The same methodology was applied to public sector employees — those with student loans (Model 3a), those who previously had student loans (Model 3b), and those who never had student loans (Model 3c). Finally, Model 4 included whether, for the public sector respondents, employers provided PSLF resources or other debt resources as predictors.

Results
Descriptive Statistics
Descriptive statistics are provided below to discuss differences in financial well-being and student loan status among private- and public-sector employees. In general, public-sector employees report lower financial well-being and a greater percentage of public-sector employees reported having student loans than private sector employees.

Sample demographics
Sample demographics are presented in Table 1. The study included 2,036 participants from both public and private sectors, with 49% (1,035 respondents) working in state and local government roles and 51% in various private sector positions (1,001 respondents). The sample was predominantly female, with 60% identifying as female, 39% as female, and >1% preferring to self-describe. The distribution was more evenly split for respondents in the private sector (52% female and 48% male). Participants ranged from 18 to 49 years old, with 45% being 40 years old or older. The largest group were those 45 to 49 years old (23%).

The sample was somewhat racially diverse with 75% identifying as White, 9% as Hispanic/Latino, 9% as Black/African American, and 5% as Asian/Pacific Islander. Most respondents were married (55%). More private sector employees were single (32%) compared to the public sector (23%). Income distribution among respondents showed a broad range, with 22% earning between $50,000 and $74,999 annually, and 16.85% earning $150,000 or more. Educational attainment varied, with 75% of public sector employees holding at least a bachelor's degree compared to 62% in the private sector. Higher education levels were more prevalent among those in public sector roles, reflecting the need for advanced degrees in fields such as education and public safety.
Model 1 Ordered Logistic Regression Results

The odds ratios, significance levels, and model fit statistics for all four models (and each subgroup model) are reported in Table 2. The first model (1a-1c) examines how student loan status and sociodemographic impact financial well-being for the total sample and the subgroups of employees. Model 1a examines the relationship between student loan debt and financial well-being for the total sample. The model was statistically significant (p < 0.001), with a pseudo R2 of 0.0521, indicating that the predictors explain approximately 5.2% of the variation in financial well-being. Model 1b examines this relationship for private-sector employees. The model was statistically significant (p < 0.001), with a pseudo R2 of 0.0528, indicating that the model explains approximately 5.3% of the variability in financial well-being. Finally, Model 1c examines this relationship for public-sector employees. The model was statistically significant (p < 0.001), with a pseudo R2 of 0.0582, indicating that the model accounts for approximately 5.8% of the variability in financial well-being.

Student loan status

In the full sample and the subgroups for private and public sector employees, having student loans now was significantly and negatively associated with financial well-being. In Model 1a (the total sample), respondents who currently had student loan debt had 52% lower odds of being in a higher financial well-being category compared to those who never had student loans (OR = 0.48, p < 0.001). In Model 1b, for private sector employees, having student loans also resulted in 52% lower odds of being in a higher financial well-being category compared to private sector employees who never had student loans (OR = .48, p < 0.001). For public sector employees, having student loans was associated with 50% lower odds of being in a higher financial well-being category compared to public sector employees who never had student loans (OR = .50, p <0.001). Having student loans in the past was only significant for private sector employees in Model 1b. Compared to private sector employees who never had student loans, those who previously had student loans but no longer do had 29% lower odds of being in a higher financial well-being category (OR = .71, p < 0.016).

Gender and age
When examining sociodemographic factors, gender was significantly related to financial well-being in all three of the models. Compared to male respondents, female respondents had lower odds of being in a higher financial well-being. Age was only significant for public sector employees ages 35 to 39 years old (Model 1c). These respondents had 48% lower odds of having higher financial well-being compared to those under 25 years old (OR = 0.52, p = 0.024).

Race/Ethnicity
In all three models, Black respondents and Asian/Pacific Islander respondents had higher odds of being in a higher financial well-being category than White Respondents. Hispanic/Latino and other race categories did not show significant differences in financial well-being compared to Whites. In Model 1a, Black respondents had 1.86 times the odds of being in a higher financial well-being category compared to White respondents, (OR = 1.86, p <0.001), while Asian/Pacific Islanders had 78% higher odds (OR = 1.78, p = 0.002). In Model 1b, Black private sector employees had 71% higher odds to be in a higher financial well-being category compared to White private sector employees (OR = 1.71, p = 0.007). Asian/Pacific Islander private sector employees had 60% higher odds of being in a higher financial well-being category than White private sector employees (OR = 1.60, p = 0.044). In Model 1c, Black public sector employees had 2.04 times the odds of being in a higher financial well-being category (OR = 2.04, p < .001) and Asian/Pacific Islander public sector employees had 1.89 times the odds of being in a higher financial well-being category when compared to White public sector employees (OR = 1.89, p = 0.049)

Marital status
In Model 1a, married respondents, respondents who lived with a partner, and divorced or separated respondents had lower odds of being in a higher financial well-being category compared to respondents who were single and never married. Marital status was not a significant predictor of financial well-being for private sector employees. For public sector employees in Model 1c, those who were not married but living with a partner had significantly lower odds of being in a higher financial well-being category compared to single respondents (OR = 0.55, p =0.017). Those who were divorced or separated also had lower odds of being in a higher financial well-being category (OR = 0.65, p = 0.078), although this was marginally significant.

Income
Income was a significant predictor of financial well-being in Model 1a, 1b, and 1c. In general, higher incomes were associated with more financial well-being. In the total sample (Model 1a), respondents earning between $75,000 and $99,999 had nearly 3 times the odds of being in a higher financial well-being category compared to those earning less than $25,000 (OR = 2.80, p < 0.001). Those earning between $100,000 and $124,999 (OR = 2.41, p = 0.002), those earning between $125,000 and $149,999 (OR = 2.51, p < 0.01), and those earning over $150,000 (OR = 6.88, p < 0.001) also had significantly higher odds of being in a higher financial well-being category compared to those who had a household income below $25,000. These findings were very similar for both private (Model 1b) and public (Model 1c) sector employees.

Education
Education was a significant predictor of financial well-being in the total sample in Model 1a and for private sector employees in Model 1b, however, it was not significant for public sector employees in Model 1c. In Model 1a, individuals with an associate or technical degree had 58% higher odds of being in a higher financial well-being category, (OR = 1.58, p = 0.020), while those with a bachelor's degree (OR = 1.63, p = 0.005) and a graduate

degree (OR = 1.63, p = 0.008) had similarly increased odds compared to those who never went to college. In Model 1b, private sector employees with an associate or technical degree had more than twice the odds of being in a higher financial well-being category compared to those with no college education (OR = 2.28, p = 0.001). Similarly, those with a bachelor's degree (OR = 2.08, p = 0.001) or a graduate degree (OR = 2.48, p < 0.001) had significantly higher odds of being in a higher financial well-being category.

Model 2 Ordered Logistic Regression Results
The results of the ordered logistic regressions for Model 2a through 2c are reported in Table 2. The models in this section analyze whether sociodemographic factors influence financial well-being differently depending on whether a private sector employee currently has student loans (Model 2a). Model 2a was statistically significant (p <0.001), with a pseudo-R2 of 0.0674, indicating that the model accounts for approximately 6.74% of the variability in financial well-being. Model 2b examined private sector employees who previously had student loans but do not currently have student loans. The model was statistically significant (p < 0.001), with a pseudo-R2 of 0.07, indicating that the model accounts for approximately 7.0% of the variability in financial well-being. Model 2c examined private sector employees who never had student loans. The model was statistically significant (p < 0.001), with a pseudo-R2 of 0.0703, indicating that the model explains approximately 7.03% of the variability in financial well-being.

Gender and age
Gender was only significantly related to financial well-being at the 10% significance level for private sector employees who currently had student loans or had student loans in the past, with female respondents having lower odds of being in a high financial well-being category than male respondents. Age was only significant in Model 2b. Older private sector employees who had student loans in the past generally had less financial well-being when compared to 18- to 24-year-olds. Age was found to have a significant negative association with financial well-being among the older age groups. Compared to respondents under 25, those aged 35–39 had 81% lower odds of being in a higher financial well-being category (OR = 0.18, p = 0.028), those aged 40–44 had 89% lower odds (OR = 0.11, p = 0.005), and those aged 45–49 had 81% lower odds (OR = 0.19, p = 0.031).

Race/Ethnicity
Race/ethnicity was a significant predictor of financial well-being. Black (OR = 2.28, p = 0.010) private sector employees who currently have student loans (Model 2a) had more than twice the odds of being in a higher financial well-being category compared to White respondents. In Model 2c, Hispanic/Latino private sector employees who never had student loans had nearly three times the odds of being in a higher financial well-being category, however, this was only significant at the 10% level (OR = 2.18, p = 0.021).

Marital status
For private sector employees with varying student loan status, marital status did not appear to significantly predict financial well-being. The predictors were only marginally significant. For example, for private sector employees who never had student loans, married respondents had lower odds of being in a higher financial well-being category compared to single respondents (OR = 0.67, p = 0.055). Widowed respondents also had lower odds of being in a higher category compared to single respondents (OR = 0.09, p = 0.071).

Income
Income was a significant predictor of financial well-being among private-sector respondents with current student loans. In general, for private sector employees with student loan balances, more income was associated with greater financial well-being. These results were not as pronounced when looking at private sector employees who used to have student loans or never had student loans. Only having a household income greater than $150,000 was significantly associated with financial well-being in Models 2b and 2c.

Education
Education level was inversely associated with financial well-being for private sector employees with student loans. Respondents with "some college" education were significantly less likely to be in a higher financial well-being category compared to those without college education (OR = 0.18, p = 0.053). Similarly, respondents with a bachelor's degree (OR = 0.26, p = 0.112) and those with a graduate degree (OR = 0.21, p = 0.072) also showed a trend toward lower financial well-being, although this was only at the 10% significance level. When looking at how education was associated with financial well-being for private sector employees who used to have student loans,

education was strongly related to financial well-being. For example, having an associate's degree compared to a high school degree or less was associated with 7.5 greater odds of being in a higher financial well-being category (OR = 7.42, p =0.008). Similarly, having a graduate degree was associated with nearly 11 times the odds of being in a higher financial well-being category compared to private sector employees with student loans (OR = 10.86, p =0.002). The findings were similar for those who never had student loans but the magnitude of the odds ratio was not as large in Model 2c.

Model 3 Ordered Logistic Regression Results
In Model 3a through 3c, the sample was restricted to public sector employees. Model 3a analyzed public sector employees with current student loans. The model was statistically significant (p = 0.006), with a pseudo-R2 of 0.0474, indicating that the model explains approximately 4.7% of the variability in financial well-being. Model 3b analyzed public sector employees who previously had student loans. The model was statistically significant (p=0.0005), with a pseudo-R2 of 0.0591, indicating that the model explains approximately 5.9% of the variability in financial well-being. Model 3c analyzed public sector employees who never had student loans. The model was statistically significant (p<0.001), with a pseudo-R2 of 0.0755, indicating that the model explains approximately 7.6% of the variability in financial well-being. The results are reported in Table 2.

Gender and age
Female public service employees who currently have student loans (OR = 0.57, p = 0.025) and never had student loans (OR = 0.63, p = 0.038) had lower odds of being in a higher financial well-being category than male respondents. Age was found to be significantly associated with financial well-being for some age groups. Public service employees who currently have student loans and were aged 25-29 had significantly lower odds of being in a higher financial well-being category compared to those under 25 (OR = 0.28, p = 0.014).

Race/Ethnicity
In Model 3a, Black public sector employees who have student loans had more than twice the odds of being in a higher financial well-being category compared to White public sector employees with student loans (OR = 2.09, p = 0.033). These findings were similar to Model 3c, where Black respondents who never had student loans had nearly 3 times the odds of being in a higher financial well-being category compared to White respondents (OR = 2.71, p = 0.008).

Marital status
The only significant demographic variable in Model 3b was that married public employees who used to have student loans had 1.9 times the odds of being in a higher financial well-being category when compared to single public sector employees who used to have student loans (OR = 1.90, p = 0.064). This was only significant at the 10% significance level. Public employees who never had student loans who live with a partner had significantly lower odds of being in a higher financial well-being category compared to single respondents who never had student loans (OR = 0.34, p = 0.006).

Income
In Model 3a, a few of the income categories were significant predictors of financial well-being in this model. Public employees with student loans with household incomes between $50,000 and $74,999 had more than four times the odds of being in a higher financial well-being category compared to those earning less than $25,000 (OR = 4.46, p = 0.030). Respondents earning between $75,000 and $99,999 had over nine times the odds (OR = 9.28, p = 0.002), and those earning $150,000 or more had over fourteen times the odds of higher financial well-being (OR = 14.10, p = 0.001). In Model 3c, public employees who never had student loans and had a household income of $150,000 or more had significantly higher odds of being in a higher financial well-being category compared to those earning less than $25,000 (OR = 3.32, p = 0.049). Respondents earning between $75,000 and $99,999 also showed higher odds of financial well-being, though this was only marginally significant (OR = 2.52, p = 0.097).

Model 4: Public Sector Employees and Employer Debt Resources
An ordered logistic regression was conducted to evaluate the relationship between demographic characteristics, employer-provided resources on student loan forgiveness and debt management, and financial well-being among public sector employees (Model 4). The model was statistically significant (p < 0.001), with a pseudo R2 of 0.0630, indicating that the model explains approximately 6.3% of the variability in financial well-being. The results are reported in Table 3.

Student loan status was a significant predictor of financial well-being. Respondents with current student loans had significantly lower odds of being in a higher financial well-being category compared to those without student loans (OR = 0.53, p < 0.001). Two employer-provided resources were included as predictors in this model — whether an employer provided information on PSLF and whether an employer provided resources on managing debt. Interestingly, respondents whose employers provided information on PSLF did not show significantly different financial well-being compared to those whose employers did not provide this information. However, respondents whose employers provided resources on managing debt had 1.5 times the odds of being in a higher financial well-being category compared to those whose employers did not provide such resources (OR = 1.47, p = 0.007). Respondents who were unsure whether their employer provided debt resources also had higher odds of better financial well-being compared to those whose employers did not provide these resources (OR = 1.65, p = 0.001).

Among the demographic variables, gender, age, race/ethnicity, marital status, and income were significantly related to financial well-being. Female respondents had 31% lower odds of being in a higher financial well-being category compared to male respondents (OR = 0.69, p = 0.004). Age was significantly associated with financial well-being for certain age groups. Respondents aged 35–39 had significantly lower odds of being in a higher financial well-being category compared to those under 25 (OR = 0.52, p = 0.027).

Race/ethnicity played a significant role in predicting financial well-being. Black respondents were twice as likely to be in a higher financial well-being category compared to White respondents (OR = 2.07, p = 0.001). Asian/Pacific Islander respondents also had higher odds of being in a higher financial well-being category (OR = 1.93, p = 0.040). Marital status was a significant predictor for those not married but living with a partner, who had significantly lower odds of being in a higher financial well-being category compared to single respondents (OR = 0.541, p = 0.015).

Income was a strong predictor of financial well-being. Respondents earning between $75,000 and $99,999 had higher odds of being in a higher financial well-being category compared to those earning less than $25,000 (OR = 3.09, p = 0.006). Those earning $100,000 to $124,999 (OR = 2.40, p = 0.034), $125,000 to $149,999 (OR = 2.50, p = 0.034), and $150,000 or more (OR = 6.30, p < 0.001) also had significantly higher odds of greater financial well-being.

Discussion
This study finds that student loan debt significantly reduces financial well-being for both public and private sector employees, although the effect weakens once loans are paid off. Interestingly, private employees appear to have decreased financial well-being even after their loans are paid off. For public employees, there was no association between previously having student loans and financial well-being. Differences may be due to access to forgiveness programs like PSLF, degree choices, or the level of employer-provided support (Young, 2024; Jacob et al., 2023). Although this study does not employ longitudinal data and cannot be interpreted as causal, these findings appear to align with HCT (Becker, 1962).

Receiving employer-provided resources related to debt management was associated with greater financial well-being. This underscores the importance of employer support in improving employees' financial outcomes, especially when managing existing debt. Providing information about PSLF alone did not significantly affect financial well-being, suggesting the need for more comprehensive support services rather than simply sharing information. Although this information remains valuable, employees may require assistance enrolling in PSLF to experience a notable improvement in financial well-being.

The results also show that sociodemographic factors' influence on financial well-being may vary depending on what sector an employee works in and what their current student loan status is. For example, marital status mostly seems to matter for public sector employees who never had student loans and live with a partner. Their lower levels of financial well-being could be attributable to economic hardships that prevent them from becoming married and experiencing the financial benefits of marriage (Smock et al., 2005; Painter & Vespa, 2012). Black and Asian/Pacific Islander public and private sector employees had higher financial well-being scores compared to their White counterparts when looking at those who currently have student loans. These results may seem initially surprising, given the well-documented evidence for racial gaps in wealth accumulation and income (Farrell, et al., 2021). It may be that once the various factors (e.g., income, education, marital status) that contribute to the racial wealth gap are controlled for, non-White individuals experience greater financial well-being. Future research should

explore these findings, as few studies have examined how subjective financial well-being varies by race/ethnicity. Income is a predictor of financial well-being, but it does not appear to play a significant role for public and private sector employees once they have paid off their loans. Finally, education has a significant and positive relationship with financial well-being. This holds true when looking at private sector employees of varying loan status. These findings also align with HCT, as those who have more education would be expected to see a greater return on their educational investment.

Implications

Current student loans are linked to lower financial well-being, suggesting it is a major financial burden. Employers, particularly in the public sector, can play a critical role in improving their employees' financial well-being by providing resources on debt management and implementing or enhancing programs that provide comprehensive debt management support, financial literacy education, and personalized counseling services. The persistent impact of student loans on financial well-being also calls for policy interventions that mitigate the financial burden on borrowers. Policies that support debt forgiveness programs, such as PSLF, need to be more accessible and better communicated (Tait et al., 2024). Simply providing information is not sufficient to improve employees' financial well-being; comprehensive support is needed to guide employees through complex processes and help them understand the benefits available. For instance, Cloud and Fossey (2014) suggested that the Department of Education should publish a more accurate default rate that makes the impact of the student loan debt burden clearer, as well as regulate and curtail fraud and abuse by enforcing regulations that require educational institutions to ensure their graduates are prepared for gainful employment.

It is important to note that for those in our sample who had repaid their loans, the negative impact on well-being seemed to lessen. These results may suggest that there is still a return on investment from receiving additional education even with the temporary burden of a dip in well-being until they are paid off. Having a degree, in general, appears to be associated with increased financial well-being. However, public sector employees do not enjoy the same benefits of educational attainment as private sector employees based on the results of this study. There are opportunities in the public sector for jobs that do not necessarily require a degree. Recruiters may wish to also highlight the possibilities of careers that do not require a college education to high school seniors to illustrate the many possible opportunities available in the public sector.

Private sector respondents continue to bear the financial burden of student loans even after they are paid off. This is especially interesting considering that public sector employees tend to have more student loans than private sector employees (Young, 2024), which could suggest that while respondents within the public sector tend to take on more student loans and it takes them longer to pay those loans off, private sector respondents appear to be more negatively impacted by student loans in both the short- and long- term. More research is needed to understand the implications of this finding.

In addition to differences between public and private sector workers, the results also revealed demographic disparities—particularly by gender. Women in both sectors reported lower financial well-being than their male counterparts. Gender-specific support initiatives, such as employer resources, mentorship programs, and inclusive workspace cultures, may help address the significant disparities observed in financial well-being between male and female employees. For example, while male and female public-sector employees both value professionalism and innovation in their workplace, female public-sector employees value strong team dynamics, inclusive environments, and improving communities (MissionSquare, 2024). Structuring working environments that support women may increase retention and alleviate financial insecurity.

Another notable finding was that Black and Asian/Pacific Islander respondents demonstrated higher odds of greater financial well-being compared to White respondents in the private and public sectors. This contrasts with existing research on financial well-being that has examined wealth and income differences by race (Hudson et al., 2022). However, subjective financial well-being outcomes by race and ethnicity are relatively understudied (Brüggen et al., 2017). These findings highlight the need to understand the differences in objective and subjective financial well-being measures by race and ethnicity. For example, Woodyard and Rob (2016) found that after controlling for many factors including financial sophistication, race was not a significant predictor of financial satisfaction. More research is needed to examine potential gaps between subjective and objective financial well-being across racial and ethnic groups.

Student loan debt can have a profound influence on clients' psychological well-being and decision-making which can perpetuate emotional distress. This stress may manifest as delaying significant life milestones or seeking mental health services for debt-related anxiety and depressive symptoms. Consequently, professionals working at the intersection of finance and mental health (e.g., financial planners, financial therapists, mental health professionals) must recognize and address the psychological dimensions of student loan debt. Practitioners can offer integrative approaches that attend to fiscal realities and emotional needs, empowering clients to navigate these obligations and improve both their overall and financial well-being (McCoy et al., 2013). Increasingly, planners are being trained in client psychology as part of their formal education, which can help them integrate psychological insights into their practice and deliver more holistic and empathetic guidance (Byram et al., 2023).

Tables

Table 1 *Sample demographics for the full sample and subgroups*

Variables	Full		Private Employer		Public Employer	
Student loans	Prop	%	Prop	%	Prop	%
Has student loan debt now	627	30.80	283	27.34	344	34.37
Had student loan debt in the past	598	29.37	78	7.54	97	9.69
Never had student loan debt	811	39.83	70	6.76	70	6.99
Whose student loans						
Has a student loan - self	627	30.80	283	27.34	344	34.37
Has a student loan - spouse/partner	175	8.60	78	7.54	97	9.69
Has a student loan - other (child)	140	6.88	70	6.76	70	6.99
Gender						
Male	800	39.29	497	48.02	303	30.27
Female	1229	60.36	534	51.59	695	69.43
Prefer to self-describe	7	.34	4	.39	3	.30
Age						
18-24	93	4.57	45	4.35	48	4.80
25-29	202	9.92	124	11.98	78	7.79
30-34	392	19.25	209	20.19	183	18.28
35-39	431	21.17	210	20.29	221	22.08
40-44	454	22.30	237	22.90	217	21.68
45-49	464	22.79	210	20.29	254	25.37
Race						
White	1536	75.44	774	74.78	762	76.12
Black	188	9.23	93	8.99	95	9.49
Hispanic/Latino	179	8.79	86	8.31	93	9.29
Asian/PI	110	5.40	70	6.76	40	4.00
Other	23	1.13	12	1.16	11	1.10
Marital Status						
Single	559	27.46	326	31.50	233	23.28
Married	1112	54.62	504	48.70	608	60.74
Partnered	178	8.74	105	10.14	73	7.29
Divorced or separated	174	8.55	92	8.89	82	8.19
Widowed	11	0.54	6	0.58	5	0.50
Prefer not to answer	2	0.10	2	0.19	0	0.00
Personal income						
Under $25,000	72	3.54	32	3.09	40	4.00
$25,000 to $49,999	421	20.68	215	20.77	206	20.58
$50,000 to $74,999	664	32.61	315	30.43	349	34.87
$75,000 to $99,999	398	19.55	189	18.26	209	20.88
$100,000 to $124,999	219	10.76	116	11.21	103	10.29
$125,000 to $149,999	105	5.16	53	5.12	52	5.19
$150,000 or more	150	7.37	111	10.72	39	3.90
Don't Know	7	0.34	4	0.39	3	0.30
Household income						
Under $25,000	49	2.41	27	2.61	22	2.20
$25,000 to $49,999	301	14.78	158	15.27	143	14.29
$50,000 to $74,999	455	22.35	252	24.35	203	20.28
$75,000 to $99,999	375	18.42	190	18.36	185	18.48
$100,000 to $124,999	315	15.47	143	13.82	172	17.18
$125,000 to $149,999	198	9.72	85	8.21	113	11.29
$150,000 or more	328	16.11	174	16.81	154	15.38
Don't Know	15	0.74	6	0.58	9	0.90
Education						
Less than a high school diploma	6	0.29	5	0.48	1	0.10
Graduated high school	161	7.91	108	10.43	53	5.29
Some college (no degree)	247	12.13	139	13.43	108	10.79
Associate degree, technical or vocational school	232	11.39	142	13.72	90	8.99
Bachelor's degree	776	38.11	432	41.74	344	34.37

Graduate/professional degree	614	30.16	209	20.19	405	40.46

Table 2 *Results of Models 1 through 3*

Models	1a - Full	1b - Private	1c - Public	2a - Has SL Now	2 - Private 2b - Had SL	2c - Never SL	3a - Has SL Now	3 - Public 3b - Had SL	3c - Never SL
Student Loans [Ref: Never Had Student Loan]									
Has Student Loan Now	0.48***	0.48***	0.5***						
Had Student Loan	0.87	0.71**	1.12						
Gender [Ref: Male]									
Female	0.67***	0.73***	0.68***	0.65*	0.64*	0.89	0.57**	0.76	0.63**
Self-Describe	0.55	0.52	0.52	0.85	-	0.54	1.1	0.06	10.88
Age [Ref: 18-24]									
25-29	0.76	0.77	0.68	0.96	0.21*	0.71	0.28**	0.37	2.2*
30-34	0.9	1.02	0.76	1.04	0.31	1.14	0.63	0.62	1.03
35-39	0.74	0.99	0.52**	0.82	0.18**	1.65	0.41*	0.44	0.75
40-44	0.85	0.92	0.73	1.29	0.11***	1.49	0.88	0.65	0.87
45-59	0.78	0.88	0.66	0.99	0.19**	0.99	0.58	0.49	0.98
Race [Ref: White]									
Black	1.86***	1.71***	2.04***	2.28**	1.19	1.63	2.09**	1.48	2.71***
Hispanic/Latino	1.19	1.37	1.21	1.37	0.91	2.18*	1.05	1.16	1.52*
Asian/Pacific Islander	1.78***	1.6**	1.88**	3.74*	1.25	1.6	0.78	1.52	2.31**
Other	1.07	0.98	1.31	5.3	1.6	0.78	1.11	4.68	0.74
Marital Status [Ref: Single, Never Married]									
Married	0.78**	0.78	0.85	0.91	0.94	0.67*	0.71	1.9*	0.61*
Partner	0.72**	0.87	0.55**	0.93	0.61	0.71	0.62	2.22	0.34***
Divorced	0.69**	0.71	0.65*	0.47*	1.93	0.56*	0.66	1.09	0.43*
Widowed	0.68	0.43	1.42	0.28	3.41	0.09*	1.95	-	1.03
Prefer not to say	2.31	2.37	-	-	10.61	1.1	-	-	-
Household Income [Ref: Under $25,000]									
$25,000 to $49,999	1.07	1.25	0.9	2.79	4.49*	0.74	2.95	1.56	0.38*
$50,000 to $74,999	1.7	1.68	1.72	5.34	2.41	0.99	4.46**	3.42	0.91
$75,000 to $99,999	2.8***	2.34**	3.14***	8.66**	1.56	1.81	9.28***	3.33	2.52*
$100,000 to $124,999	2.42***	2.47**	2.32**	8.25*	2.24	1.76	5.36**	4.04	1.74
$125,000 to $149,999	2.52***	2.5**	2.52**	6.63*	3.48	1.75	6.27**	2.2	2.48
$150,000 or more	6.88***	6.75***	6.2***	21.02***	8.75***	5.37***	14.1***	11.27	3.32**
Don't Know	1.6	0.83	2.47	5.08	0.16	0.64	6.73	2.36	2.47
Education [Ref: HS Grad or Less]									
Some College	1.19	1.32	1.11	0.18**	6.2**	1.31	0.43	1.28	1.22
Associate/Technical Degree	1.58**	2.28***	0.99	0.4	7.42***	2.08**	0.76	0.76	0.82
Bachelor's Degree	1.63***	2.08***	1.27	0.26*	6.86***	2.22***	0.66	1.24	1.37
Graduate degree	1.63***	2.48***	1.34	0.21*	10.86***	2.55***	0.54	1.5	1.56
Pseudo r-squared	0.0521	0.053	0.058	0.0674	0.07	0.07	0.047	0.059	0.076
n	2036	1035	1001	283	285	467	344	313	344

Table 3 *Model 4 results including employer provided debt resources and information on PSLF*

	4 - Public
	Employer Resources
Student Loans [Ref: Never Had Student Loan]	
Has Student Loan Now	0.53***
Had Student Loan	1.14
Employer Provides Info on PSLF Forgiveness [Ref: No]	
Yes	0.98
Don't Know	1.12
Employer Provides Debt Resources [Ref: No]	
Yes	1.47***
Not sure	1.65***
Gender [Ref: Male]	
Female	0.69**
Self-Describe	0.49
Age [Ref: 18-24]	
25-29	0.69
30-34	0.77
35-39	0.52**
40-44	0.75
45-59	0.7
Race [Ref: White]	
Black	2.02***
Hispanic/Latino	1.24
Asian/Pacific Islander	1.93**
Other	1.45
Marital Status [Ref: Single, Never Married]	
Married	0.87
Living with a Partner	0.54**
Divorced or separated	0.65*
Widowed	1.38
Prefer not to say	-
Household Income [Ref: Under $25,000]	
$25,000 to $49,999	0.89
$50,000 to $74,999	1.77
$75,000 to $99,999	3.09***
$100,000 to $124,999	2.4**
$125,000 to $149,999	2.5**
$150,000 or more	6.3***
Don't Know	2.33
Education [Ref: HS Grad or Less]	
Some College	1.16
Associate/Technical Degree	1.02
Bachelor's Degree	1.28
Graduate degree	1.38
Pseudo r-squared	0.063
n	1001

*** $p<.01$, ** $p<.05$, * $p<.1$

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Financial Threats, Perceptions and Financial Planning among Young Adults

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Background

The COVID-19 pandemic influenced the global economy and negatively affected individuals and families in the United States, especially young adults (Stanescu, 2021). During the COVID-19 pandemic, a substantial number of young adults experienced job loss, income drop, and difficulty covering their basic needs (Gould & Kassa, 2020; Peter G. Peterson Foundation, 2022). While young adults are experiencing such financial threats, it is vital to make sure that they are financially capable and engage in good financial behavior because the financial behaviors adopted by young adults today help shape their long-term financial well-being (Bonnie et al., 2015; Breitbach & Walstad, 2016). Little is known about how financial threats and perceptions are associated with young adults' financial planning behaviors. Understanding the associations between financial threats, financial perceptions, and planning behaviors among adults can be beneficial because the findings can provide important implications for financial practitioners in securing financial futures of young adults. Early engagement in financial planning among young adults represents a proactive behavior that can enhance not only their current and future financial well-being but also their psychological well-being (Aboagye & Jung, 2018; Chakravorty, 2022; De Brujin & Antonides, 2020; Magwegwe et al., 2023).

Purpose

The main purpose of this study is to examine the associations between financial threats, perceptions, and planning behaviors among young adults. In this study, young adults refer to those ages 18 to 40 which include Generation Z and Millennials. Financial perception can be defined as an individuals' assessment of their financial situation and subsequent worry and anxiety (De Brujin & Antonides, 2020; Lee & Kelley, 2023; Magwegwe et al., 2023). Using data from the 2021 National Financial Capability Study (NFCS) that was collected during the COVID-19 pandemic, this study assesses how financial threats, negative financial perceptions, and financial literacy influence financial planning behaviors among young adults. The theory of planned behavior (Ajzen, 1991) has previously been applied to financial behaviors (Rutherford & DeVaney, 2009; Xiao, 2008) and is applicable to the current study.

Findings

Descriptive results showed that 36.8% of the study sample reported experiencing a large drop in income, 30.7% reported being laid off due to COVID-19, and 61.0% reported having difficulty paying bills during the COVID-19 pandemic. As for negative financial perceptions, the mean level for perceived financial dissatisfaction was 5.9, on a range of 1-10, while the mean level for financial worry was 10.1, on a range of 3-15, and the mean level for financial anxiety was 5.3, on a range of 1-7. The 2 results showed significant differences in financial planning behaviors between the two age groups (ages 18-27 vs ages 28-40). The OLS regression results showed that financial threats such as experiencing a large income drop and job loss due to COVID-19 significantly increased financial planning behaviors, but difficulty paying bills significantly decreased their planning behaviors. As expected, financial worry and lower levels of financial satisfaction significantly decreased their engagement in financial planning.

Implications

Regarding financial threats, as young adults experienced a large income drop or being laid off due to the COVID-19 pandemic, they were more likely to be involved in financial planning behaviors (Fiksenbaum et al., 2017). This shows that not all financial threats are bad, and some can help motivate young adults to plan for their financial futures. However, difficulty paying ongoing bills negatively influenced financial planning behaviors, implying that this is not a financial threat issue due to COVID-19. Rather, this association might be due to lack of emergency savings, which can undermine individuals' capability to engage in financial planning aimed at improving future financial well-being (Friedline et al., 2021; Gjertson, 2016). This study also found that lower levels of perceived financial satisfaction and financial worry significantly decreased participation in financial planning. The findings imply that repetitive negative feelings, emotions, or thoughts about uncertain future financial situations negatively impacted financial planning behaviors (Fenton-O'Creevy, & Furnham, 2021; Maison, 2019). Financial practitioners should be informed by this study that young adults who are not happy with their financial situation and who experience financial worry are less likely to engage in financial planning behaviors

Conclusion

Addressing negative perceptions of financial conditions among young adults is crucial as it significantly decreases their financial planning behaviors. Practitioners should incorporate strategies to manage and reduce financial worry and negative perceptions in their education or counseling sessions targeted for young adults. Further, the negative influence of negative financial perceptions on financial planning behaviors can provide useful information for policymakers. Less than a quarter of the young adults in the study sample reported that they had participated in a formal financial education program. Knowing the positive association between received financial education and financial planning behavior, it is critical for policymakers to support financial education related to financial planning.

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Research to Practice

Developing the Next Generation of Money Habitudes: Building Successful Research-Practice Partnerships

Jeffrey Anvari-Clark, University of North Dakota, Axton Betz-Hamilton, South Dakota State University, & Cara Macksoud, Money Habitudes, LLC

Keywords: assessment tools, behavioral economics, financial behavior, financial coaching, financial counseling

Target Audience
The session is for financial professionals and researchers interested in building effective research-practice collaborations that enhance evidence-based tools. Applicable to both academics seeking industry partnerships and practitioners looking to incorporate research validation into their offerings.

Objectives/Purpose
This session will provide an overview for successful researcher-practitioner partnerships by showcasing our collaborative journey to enhance Money Habitudes through: (1) complementary expertise utilization, (2) systematic data collection and analysis processes, (3) iterative implementation of findings, and (4) shared dissemination strategies that benefit both academic and practice communities.

Description
The presentation will show the methodical development of a research-practice partnership that enhanced the psychometric properties of the Money Habitudes assessment tool. The collaboration started with the practitioner partner providing access to a large dataset of online user responses (N = 35,108) and establishing channels for practitioner testing and feedback collection, while the academic partners contributed methodological expertise in factor analysis and statistical validation procedures. This mutual exchange of resources established a foundation for sustained collaboration.

The research process followed systematic protocols involving institutional review board exemptions and financial disclosures, regular consultation meetings where analyses were reviewed, refinement of statement wording based on psychometric findings, and the design of follow-up studies. This methodical approach generated two additional rounds of assessment data (n = 349; n = 133) that enabled validation of new and revised item statements. Throughout the collaboration, the team addressed competing professional imperatives, reconciling academic publication requirements with implementation considerations while maintaining integrity.

Statistical findings were operationalized into concrete tool improvements, with particular attention to problematic statements identified through factor analysis and the concerning overlap between security and planning habitudes (Anvari-Clark & Betz-Hamilton, 2025). The partnership employed a comprehensive dissemination strategy encompassing peer-reviewed publication, scholarly conference presentation, practitioner training programs, and field testing and implementation—thereby creating pathways for knowledge transfer across both research and practice domains.

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Before the Diagnosis: The Early Financial Toll of Dementia

Angelena Bradfield, Financial Technology Assoication, Lisa D'Ambrosio, MIT AgeLab, & Jilenne Gunther, AARP

Keywords: consumer financial protection; health and financial issues; protecting

Session description
Recent academic research has highlighted that the years leading up to a dementia diagnosis pose serious risks for personal finances. As the population ages and lives longer, the risk of dementia and the scale of the financial losses suggest that more individuals and families will be at greater financial risk at a vulnerable time of their lives. This panel session will provide an overview of recent academic work, describe the challenge using a visual "leaky pipeline" metaphor, identify areas of opportunity – and unanswered questions. The session will also highlight some practice and policy tools stakeholders in financial services and allied industries currently have, such as materials from AARP's BankSafe Initiative, and what they can do to effect positive change and better protect individuals and families.

Purpose
This panel session presents an overview of recent efforts around the pre-diagnosis impacts of dementia on personal finances. Recent academic research has highlighted that the years leading up to a dementia diagnosis pose serious risks for personal finances; for example, a 2023 study found that older adults' median household net worth drops by more than half in the 8 years leading up to diagnosis (Li et al. 2023). As people continue to live longer and the older adult population grows, so too are dementia diagnoses projected to increase. Nearly 10 percent of US adults over 65 are currently believed to have diagnosable dementia (Manly et al. 2022), including Alzheimer's disease, and between 2020 and 2050 the number of people with Alzheimer's disease is expected to more than double (Alzheimer's Association 2024). The growing population affected by dementia, and the scale of the financial losses, suggests that more individuals and families will be at greater financial risk at a vulnerable time of their lives.

The MIT AgeLab and AARP have partnered to raise awareness, to engage experts, and to explore different drivers of these steep financial losses that precede a dementia diagnosis (Yoquinto, Kali & Miller 2025). This session will provide an overview of the challenge using a visual "leaky pipeline" metaphor, identify areas of opportunity – and unanswered questions, and highlight what practice and policy tools stakeholders in financial services and allied industries currently have and what they can do to effect positive change and better protect individuals and families.

This AFCPE session will: 1) Provide an overview of recent findings around the nature, scale and impacts of financial losses that precede a dementia diagnosis; 2) Offer attendees insight and information about the role and impacts of financial exploitation within the "leaky pipeline" and point to existing resources financial professionals might leverage to help support individuals and families, including materials from AARP's BankSafe Initiative; 3) Give attendees perspectives on how other aspects of the "leaky pipeline" affect people's finances and how advisors and financial professionals engage clients around this issue; and 4) consider some of the challenges or barriers to protecting people from financial fraud or exploitation at the intersection of financial institutions, regulations and families.

The objectives of this session are to raise awareness around the issue of financial losses that precede a dementia diagnosis, to discuss likely sources for these losses, and to highlight existing resources or approaches for financial professionals to help support or protect individuals and families – as well as what some of the current barriers or challenges are to doing so.

Format and audience
This panel session will leverage a more traditional presentation format, including introductions and an overview of the context and nature of the problem from the session chair, followed by presentations from each panel member. A period at the end of the session (10-15 minutes) will be reserved for comments and questions from attendees.

The intended audience for this session is broad, including financial professionals who work with individuals and families and others in the financial services industry who are engaged in research or helping to protect families and individuals.

Learning objectives

Following this session:
- Attendees will understand that the years that precede a dementia diagnosis can pose significant financial risks and have a framework for understanding the nature of different financial "leaks" that are potential sources of financial losses.
- Attendees will know about some existing programs and resources to help protect and prevent individuals, families and clients from experiencing financial losses in the period before a dementia diagnosis.
- Attendees will learn about how other financial professionals are trying to support clients and families who are managing possible cognitive declines or a formal dementia diagnosis in their own practices.

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Developing the Next Generation of Money Habitudes: Building Successful Research-Practice Partnerships

Jeffrey Anvari-Clark, University of North Dakota, Axton Betz-Hamilton, South Dakota State University, & Cara Macksoud, Money Habitudes, LLC

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It's All Connected: Applying a System Approach to Financial Counseling, Coaching, Planning, and Education

Sonya Lutter, PhD CFP® LMFT, Texas Tech University and Cherie Stueve, PhD CFP® AFC® FFC® FBS® CAP®

Keywords: assessment, family finance, psychology, systems

Target Audience

The session is for established financial professionals with an interest in psychology and therapy. Participants should be interested in enhancing their ability to connect with clients in more holistic, emotionally aware ways by understanding how family systems, intergenerational dynamics, and emotions influence financial behavior. The session is designed to help financial professionals communicate more therapeutically, without becoming therapists. A clear awareness of boundaries is necessary to apply a system approach to financial counseling, coaching, planning, and education.

Objective

The goal of this session is for financial professionals to view their client interactions from a systems approach. As a result, gain a deeper understanding of clients' thinking, feelings, and behavior through systems theory. This empirical-based comprehensive framework seeks to understand and explain the dynamics within systems (e.g., families, workplace, communities) and how individual members interact with one another. This presentation will illustrate how a systemic approach is more effective in achieving client well-being.

Description

Maybe you have helped a client make progress in one area, only to see new issues pop up somewhere else. In this session, we will take a closer look at how a systemic lens can improve your work in financial counseling, coaching, planning, and education. You will learn core systems theory concepts—like interconnectedness, process, and differentiation of self—and how to apply them in real conversations with clients. Two seasoned researchers and practitioners in financial behavior will guide the session, exploring how financial decisions are shaped by larger systems like families, workplaces, and communities. We will show how tools like genograms and strategic questions can help you get to the root of what is really going on. Whether you are brand new to systems thinking or ready to go deeper, this session will offer practical insights and tools you can use right away.

Understanding what has happened to people in their lives (i.e., their system exposure) provides insight into how they make decisions or how to communicate with them. In alignment with the systems concepts of interconnectedness and the whole being greater than the sum of its parts, a systems approach appreciates that events are not linear. Furthermore, altering one element of a person's life automatically creates change in another part of their life—directly or indirectly. Financial professionals in all roles must recognize the domino effect of changing one element, such as setting up a financial plan and ignoring the psychological elements of that change. By thinking systemically, practitioners and educators will deepen their empathy, communication skills, and effectiveness in helping clients achieve lasting financial well-being.

This presentation will demonstrate the added value of utilizing a systemic approach to financial counseling, coaching, planning, and education. More specifically, understanding how individuals make financial decisions and how these decisions are influenced by their experiences and the broader systems in which they exist. Every issue that a financial professional encounters will benefit from an expanded systems theory perspective.
Systemic communication is less about the words being said (the content) than it is about how the words are said or not said (the process). The way family members/systems communicate, including both verbal and nonverbal communication, contributes significantly to overall functioning and well-being. Attendees will be shown different ways of gathering information to produce more process-based responses.

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Research Papers

Factors Associated with Tax Identity Theft Victimization and the Emotional and Physical Consequences Experienced by Victims

Axton Betz-Hamilton, South Dakota State University

Tax identity theft is a problem in the United States, with one million returns flagged by the Internal Revenue Service (IRS) from January-March 2023 as being filed by potential identity thieves (Iacurci, 2023). This type of identity theft occurs "when someone uses your Social Security number and personal information to steal your tax refund or get employment" (Federal Trade Commission, 2024; para. 1). After submitting a paper return and Form 14039, it takes several months for the IRS to respond. "Taxpayers should know that it is taking the IRS about 22 months, on average, to work Identity Theft Victim Assistance (IDTVA) cases" (Taxpayer Advocate Service, 2024; para. 4). This means tax identity theft victims' refunds could be delayed for two years or longer. Victims can experience financial, emotional, and physical consequences as a result. Tax identity theft disproportionately impacts low-income taxpayers; 57% of victims were financially burdened because of the crime, with some victims experiencing food insecurity (Taxpayer Advocate Service, 2024). Victims may experience stress and anxiety (Taxpayer Advocate Service, 2024). Despite the prevalence of tax identity theft, the length of time it takes to resolve tax identity theft cases with the IRS, and the emotional and physical consequences associated with victimization, there is limited research on tax identity theft victimization. To address this gap, the purpose of this study was to identify the demographic factors and time spent clearing one's name associated with tax identity theft victimization and emotional and physical consequences experienced by victims. Two hypotheses were tested in this study: H1: Greater time spent working to recover one's identity, being of an older age, having a lower household income, and being a victim of tax identity theft will predict if an individual experiences worry or anxiety, anger, feeling sad or depressed, vulnerable, violated, unable to trust, or unsafe, and H2: Greater time spent working to recover one's identity, being of an older age, having a lower household income, and being a victim of tax identity theft will predict if an individual experiences headaches, trouble sleeping, changes in eating or drinking habits, upset stomach, fatigue, high blood pressure, or muscle or backaches.

Data were obtained from the 2018 National Crime Victimization Survey—Identity Theft Supplement (NCVS-ITS). Given the dichotomous nature of the emotional and physical consequences dependent variables (i.e., "Yes"/ "No" responses), a series of logistic regressions were conducted using each emotional and physical consequence variable as a dependent variable. Independent variables included tax identity theft victimization, time spent clearing one's identity, age, and household income. Results indicated the odds of experiencing worry or anxiety, trouble sleeping, upset stomach, and fatigue increased as time spent clearing one's identity decreased. The odds of experiencing being unable to trust increased as time spent clearing one's identity decreased and household income increased. The odds of experiencing sadness or depression increased when household income increased.

The findings of this study should be interpreted with respect to several limitations. First, the sample was comprised of tax identity theft victims who had higher household incomes who spent less than one month working to recover their identity. Moreover, the average age of the sample was approximately 50 years. Younger identity theft victims who have lower household incomes may report differences with regard to time spent working to clear their identity as well as the emotional and physical consequences experienced. A key limitation of this study is the large amount of missing data for the emotional and physical consequences variables. Regarding the odds ratios about time spent recovering one's identity, less time spent does not necessarily mean recovery was complete. This could explain the increased odds of experiencing worry or anxiety, feeling unable to trust, experiencing trouble sleeping, changes in eating or drinking habits, upset stomach, or fatigue identified when less time is spent on recovering one's identity in this study. With victims' recovery from tax identity theft largely contingent on actions taken by the IRS, victims' perceived level of control over their recovery process may impact the emotional and physical consequences experienced.

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The Lived Experiences of Familial Identity Theft Victims

Axton Betz-Hamilton, Priscilla Nez, & Kirsten Houg, South Dakota State University

Keywords: familial identity theft, identity theft, phenomenology, polyvictimization

Abstract

Familial identity theft, which is a growing problem in the United States, occurs when an individual steals the identity of another family member. The purpose of this qualitative, phenomenological study was to explore the lived experiences of familial identity theft victims. Interview data were obtained from a purposive sample of nine participants. Three researchers analyzed the data were analyzed using constant comparison, classical content analysis, and word count.

Key findings included "Offender Mental Health Concerns" and "Victim Emotional Effects" were the most salient themes as they were present for all nine participants. Other themes included "Polyvictimization", "Recovery", and "Relational Impacts". Despite the limitations of this study, findings provide needed insights on an often-overlooked problem that can have serious financial, emotional, and relational consequences for victims and their families.

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THE VULNERABLE ON CAMPUS: FINANCIAL INDEPENDENCE OF COLLEGE STUDENTS

Jing Jian Xiao & Nilton Porto, University of Rhode Island, Luiz Cruz, Ceara State University, & Ting An, Renmin University of China

Keywords: college student, financial literacy, financial education, financial independence, personal finance

Abstract
College years are a critical transition period from financial dependence to financial independence for young adult college students but research on financial independence of this population is limited. The purpose of this mixed-method study is to identify types of young adult college students in terms of financial independence. With data from a sample of college students at a public university in the U.S., cluster analyses show four distinct clusters regarding their funding sources for education: parental dependent, scholarship dependent, loan dependent, and self-dependent. These clusters show differences in student characteristics. Among them, self-dependents and loan dependents are the most vulnerable. These students tend to show lower GPA scores, longer work hours during the academic year and summer, and responsibilities for most spending items. Results also show several personal finance topics demanded by students differ by clusters. Similarity analyses indicate cluster differences in students' interpretation of the meaning of financial independence.

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Planning Under Pressure: Household Financial Strain and Planning

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Keywords: material hardship, financial planning, vulnerable households

Abstract
This study explores how material hardships, including food insecurity, housing strain, and limited healthcare access, shape household financial planning behaviors in the United States. Results show that greater hardship significantly reduces the likelihood of planning ahead financially. Education, income, health, gender, and marital status also influenced planning attitudes. Findings highlight that financial vulnerability constrains planning capacity and underscore the need for counseling approaches and support services tailored to the realities of vulnerable households.

Background
Household financial hardships represent significant challenges that directly influence financial planning behaviors across diverse populations. These hardships, including income volatility, unexpected expenses, job loss, and medical emergencies, often necessitate immediate financial responses that deviate from optimal long-term planning strategies. Recent studies indicate that approximately 37% of American households have experienced some form of financial hardship within a given year, with disproportionate impacts on lower-income and minority households (Collins & Urban, 2020). According to Lusardi et al. (2021), these financial shocks frequently deplete household savings and trigger high-cost borrowing behaviors, undermining previously established financial plans and creating long-term financial instability.

The relationship between financial hardships and planning behaviors manifests in several observable patterns. First, households experiencing financial strain typically demonstrate reduced saving rates and diminished participation in retirement planning programs. Rhee and Sabadish (2022) found that workers who experienced income disruptions were 42% less likely to contribute to employer-sponsored retirement plans compared to their financially stable counterparts. Second, financial hardships often precipitate a shift from proactive to reactive financial behaviors. Rather than engaging in comprehensive budgeting, goal-setting, and wealth accumulation strategies, households under financial pressure tend to adopt short-term financial management approaches focused on meeting immediate needs (O'Neill & Xiao, 2019). Third, financial hardships frequently lead to the liquidation of existing assets and premature withdrawal from retirement accounts, reversing previous planning progress. Kim and Wilmarth (2023) documented that households facing severe financial hardships were three times more likely to tap into retirement savings early, incurring substantial penalties and compromising long-term financial security. Finally, Hanna et al. (2022) demonstrated that the experience of financial hardship significantly reduces a household's likelihood of maintaining adequate insurance coverage across multiple domains (health, property, disability), creating vulnerability to future financial shocks. Understanding these behavioral responses is essential for developing interventions that can effectively support sustainable financial planning practices even during periods of economic stress or hardship.

Purpose
This study investigated the relationship between financial hardship and financial planning behavior among U.S. households. Specifically, it examined whether households experiencing higher levels of material hardship—such as food insecurity, difficulty affording housing, and limited access to healthcare and medication—are less likely to engage in forward-looking financial planning. The purpose of this study was to examine whether and to what extent financial hardship affects households' likelihood to engage in financial planning. By focusing on this dynamic, the results can inform interventions and financial counseling practices that support planning behaviors among vulnerable populations.

Methodology
This study utilized data from the Financial Health Pulse Survey, a nationally representative dataset collected by the University of Southern California Center for Economic and Social Research. The analysis focused on adult respondents living in U.S. households, with complete data on financial hardship and planning behavior. The dependent variable was financial planning behavior, which was measured on a five-point Likert scale ranging from "agree strongly" to "disagree strongly." The primary independent variable was a financial hardship index constructed by summing binary indicators for four experiences over the past 12 months: food insecurity, difficulty

paying housing costs, inability to access healthcare due to cost, and underuse of medication due to affordability. Each item was coded as 1 if the respondent reported the experience "often" or "sometimes," and 0 otherwise, resulting in a scale ranging from 0 (no hardship) to 4 (multiple hardships). Control variables included age, gender, race, marital status, education, household income, employment status, and health condition. The analysis used ordered logistic regression to estimate the relationship between financial hardship and the likelihood of engaging in financial planning behavior, adjusting for sociodemographic factors.

Results

Our results showed that greater financial hardship was significantly associated with lower levels of financial planning. Specifically, each additional hardship experienced (on a 0–4 scale) was associated with a decrease in the odds of reporting a higher financial planning score, indicating that individuals facing more hardship were less likely to agree that their household was planning ahead financially. Several covariates were also significantly associated with financial planning attitudes. Women and married respondents were more likely to report higher planning scores. Higher education levels and income levels were positively associated with financial planning; for example, those with a postgraduate degree had significantly higher planning scores than those with less than a high school education. Better self-rated health was also strongly associated with higher planning scores, with those in excellent health showing the largest positive association. More findings of this study will be shared at the conference.

Conclusions and Implications

This study highlighted a strong inverse relationship between material hardship and financial planning attitudes—households experiencing food insecurity, housing strain, or difficulty affording healthcare and medication were significantly less likely to report planning ahead financially. These findings suggest that vulnerable households, who stand to benefit most from financial planning, may lack the capacity—rather than the knowledge—to engage in such behaviors. Financial stress can impair decision-making and shift focus to short-term survival. For financial counselors, these results underscore the need for trauma-informed, behaviorally sensitive approaches that address emotional and cognitive burdens. Integrating financial counseling with screenings for basic needs, referrals for public benefits, and partnerships with social service providers may help stabilize households and create space for long-term planning.

Beyond hardship, the study found that structural and demographic factors also shaped planning attitudes. Higher education, income, and better health were all associated with a greater likelihood of financial planning, pointing to the role of systemic advantages. Employment status was also significant compared to retirees; individuals who were working, unemployed, or in other/mixed statuses were less likely to plan, likely due to unstable income, time constraints, or competing demands. Additionally, women and married individuals were more likely to engage in planning, possibly due to shared responsibilities or support networks. These insights highlight the importance of tailoring financial counseling to clients' life circumstances, employment situations, and household dynamics to make planning more accessible and effective.

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Applying the Theory of Planned Behavior in Estate Planning

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Keywords: consumer behavior, estate planning, financial planning, structural equation modeling, theory of planned behavior

Purpose: The purpose of this study is to apply the theory of planned behavior to better understand estate planning behavior.

Design/methodology/approach: Data are from online surveys, collected at two points in time, including 261 participants in the United States. Structural equation modeling (SEM) is used to validate new measures.

Findings: First, data confirmed the hypothesized factor structure for the theory of planned behavior-based estate planning measures. Second, the SEM model supports predicted positive relationships between attitude towards estate planning, estate planning perceived behavior control, and behavioral intention to estate plan and between behavioral intention to estate plan and estate planning behavior.

Research implications: For scholars, this study further expands on the research being conducted about estate planning and further applies the theory of planned behavior to estate planning. Importantly, this study provides researchers with a new, reliable, and validated instrument to measure estate planning based on the theory of planned behavior. Depending on the area of interest for the researcher, different facets of the estate planning measure may be used to better understand how an intervention could change estate planning behavior. As an additional example, a researcher may be interested in understanding what intervention could improve a participant's estate planning subjective norm and they may use the subjective norm estate planning scale.

Practical implications: This study has practical implications for practitioners and United States policymakers. First, for practitioners, this study could begin to expand the method used to communicate with clients about the importance of estate planning and to better understand how to influence a client's estate planning behavior. For example, a practitioner may want to better understand items like a client's attitude towards estate planning before asking directly about estate planning behavior. For United States policymakers, this study could inform them about how they might want to influence individuals to estate plan and reduce time that families take to work through the probate courts. In addition to probate court fees, there are federal and state estate tax influences when considering estate planning.

Originally/value: First, this study creates a novel set of estate planning behavior related scales. Second, the study examines the relationships between estate planning factors associated with estate planning behavior, using the theory of planned behavior.

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Treating Financial Infidelity: An Exploratory Qualitative Study

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Abstract
Although financial infidelity is a prevalent and complicated phenomenon with documented potential negative effects (Jeanfreau et al., 2018; LeBaron-Black et al., 2024; NEFE, 2021), existing research has not investigated the treatment of financial infidelity by practitioners. The present study begins to address this by examining how licensed therapists treat clients who experience financial infidelity. Using primary data collected in semi-structured interviews with a sample of licensed therapists, the present study uses the Therapeutic Pyramid (Fife et al., 2014) as a theoretical framework to organize patterns observed in practitioner processes. Findings indicate that (1) Therapists' way of being includes a personal money history that can affect their work with clients. (2) Successful treatment though the therapeutic alliance requires both financial and therapeutic skills. (3) Therapists' skills and techniques for individual, relational, and financial factors encourage client healing. The present study provides practical action-steps for licensed therapists, recommendations for financial planners, and ideas for future research on the treatment of financial infidelity.

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Student Research

What WPI Students Know about Personal Finance

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Abstract

I conducted and analyzed an eighty-question survey covering a variety of financial topics. Three key themes surfaced: (1) The number of finance/economic courses taken improves literacy and understanding of investing and debt. (2) There exist large gaps in general financial knowledge along with many misconceptions about the capability of financial tools. (3) Even though there is a strong self-reported desire to learn about financial preparedness, the data on literacy reflects minimal action taken to prepare oneself. The aggregate conclusion is that college students don't have enough knowledge of general financial tools and practices to be financially successful in the long-term. Keywords: college students, behavior finance, financial knowledge, personal finance

Introduction & Methodology

The underlying reason young people go to college is to achieve economic advancement, as many doors can only be opened by a university education. And often after graduating they find themselves struggling to manage their finances and build wealth. Not starting to save until their late twenties or paying off student debt for over a decade are common occurrences. These people frequently aren't prepared for the financial hurdles ahead of them, and this leaves them without the financial independence and redundancy that provides stability.

So how can we do better? The purpose of this research was to determine what students know about personal finance and economics, and what beneficial practices can be brought about to best prepare them for post-college long-term financial success.

An alignment of interests at Worcester Polytechnic Institute, where a large percentage of students have never taken an economics or finance course, brought about this research. Professor Alexander Smith, who has a lengthy academic background in economics with a specialization in behavioral economics, taught one of my very first courses at the institute and made a pitch explaining his work in the field. After, I discussed the possibility of working with him and it went from there. As the principal investigator, I bring a background of experience in the finance industry and am also pursuing dual degrees in Economics and Robotics Engineering.

I choose a descriptive research design because of how the data was to be analyzed. It is important to track major themes and trends across all participants to see what the broad consensus is, but it is just as important to separate responses based on the number of finance/economic courses taken. I collected the data using an 85-question quantitative survey, with random sampling, which was split into two halves to save time and for better participant focus. No economics or finance specific course was surveyed and there were a total of 200 workable responses. I followed ethical standards throughout the entire research process. IRB approval was granted before any data collection began. Informed consent (participation in the research is voluntary, participants may end their participation at any time, participants need not answer every question in an interview or survey), anonymity, confidentiality, and protecting participant data was upheld.

The structure of the rest of the paper is as follows. First will be the methods section. The results will follow and be broken down by topic, these topics being: (1) savings, (2) budgeting, (3) investing, (4) taxes, (5) credit score, (6) insurance, and (7) debt. Each topic will have a similar format, with an emphasis on the figures and tables. The discussion section will interpret the results for themes and consider what role psychology plays. Lastly, the conclusion will recap the key points and provide an outlook on what can be done to better impart beneficial financial practices.

Results

There were 100 respondents per survey and the average age was 19.5, with just under two thirds of respondents being male. Of this, 42.0% were freshman, 24.5% sophomores, 15.5% juniors, and 18.0% seniors. And out of everybody, 40.5% responded yes to taking an economics or finance course before, with the breakdown being 26.5% only taking one course, 10% two to three courses, and approximately 4.5% taking anywhere from four to five courses.

Savings

Most college students have already started saving and believe it is beneficial to start saving young. The mean in the data tells that students believe the optimal time to start saving is at the age of 19.4. Respondents nearly unanimously think that one should start before the age of 28 (Figure 1).

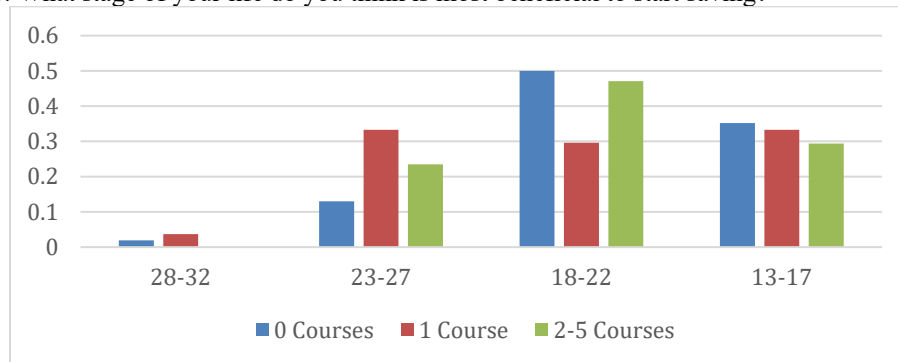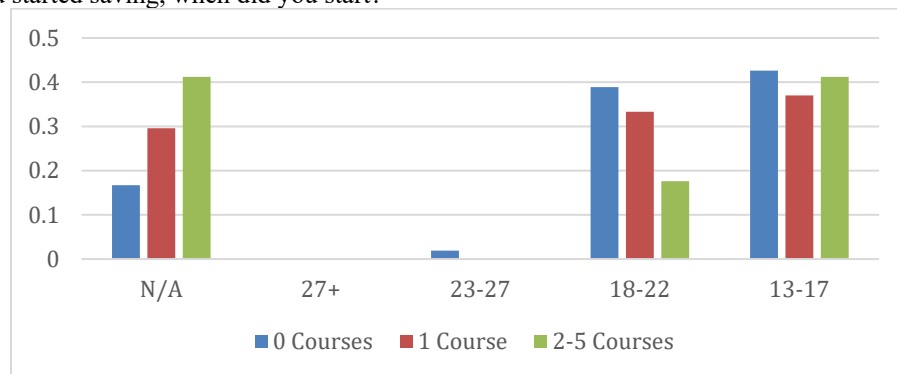Figure 1: What stage of your life do you think is most beneficial to start saving?

Figure 2: If you started saving, when did you start?

83.3% of respondents that had taken no courses have already started saving, while 70.4% with 1 course and 58.8% with 2-5 courses have as well (Figure 2). The correlation between when students think it is most beneficial to start saving and when they started saving, excluding those who haven't started saving, is high at 0.882.

So, students think it is good to start saving early and many have, 74.5% by the age of 22. But how much should they save when they are working full-time?

Figure 3: What do you think is a good percentage of your income to save when you're working full-time?
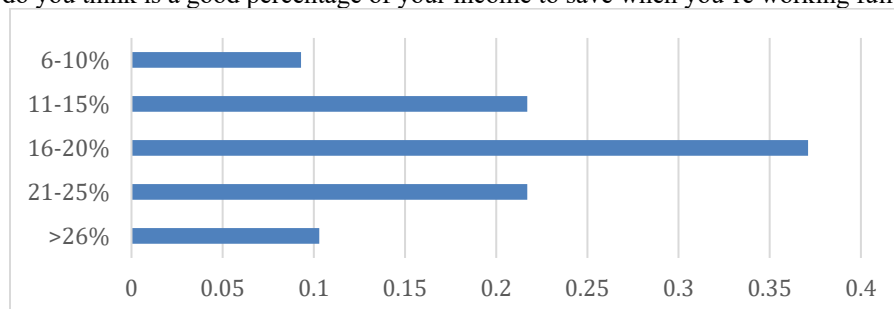
Overall, these savings rates are high, the median being 17.9% (Figure 3). A substantial number of respondents, 32.0% responded with a savings rate of >20%. And when asked about how much of their income they think they should be saving when they are 50, the percentage of income they wanted to save increased; the mode being >26%. Most respondents have thought about these responses before too. Saying that they have thought, on average, "some" to "a little" about what percentage of their income they will save once working full time. In another question,

respondents reported thinking even more about how they would invest those savings. In both these questions, those that had taken 2-5 finance/economic courses had the highest average for how much they had thought about it.

Budgeting
This subsection revolves around how much, how students feel about, and how consistently they budget. It is seen that 77.6% of respondents have budgeted in the past, with this percentage increasing with more courses taken; 70.4% from zero courses, 81.5% that have taken one course, and 94.1% from two-to-five courses currently budget (Figure 4). This is reflected in the present data as well, since the more courses that a respondent has taken means there is a stronger chance they are budgeting their money; 74.1% from zero courses, 77.8% that have taken one course, and 82.4% from two-to-five courses (Figure 4). When comparing these present budgeting values to their respective past ones via correlation, a value of 0.858 is received showing not much has changed.

Figure 4: Did/have you budgeted and how much (past v. present)?
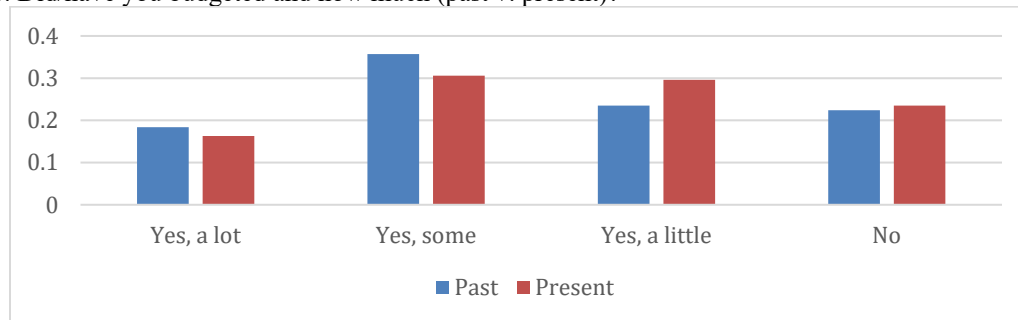
Figure 5: Were/are you happy with your budget (past v. present)?
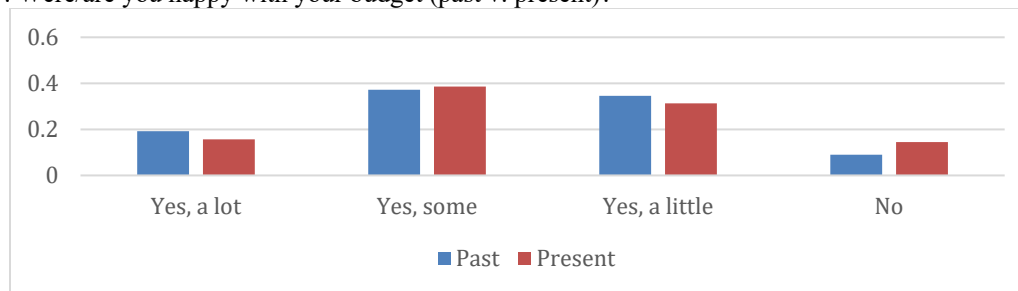
Viewing happiness values shows that respondents were only slightly happier with their past budget, and that overall students were moderately happy in both time periods (Figure 5). Though, if the correlation between past budgeting and the relating happiness is calculated, it reveals a weak correlation of 0.358. Yet, when the same operation is done with current budgeting and its corresponding happiness, the correlation is a strong 0.757. It is important to note here that students' general happiness with their budget is good news because it shows students are at least partially enthusiastic about their financial futures. As well, it is great that respondents think budgeting is important, especially long-term budgeting since 73% of respondents said having one was "very important."

Investing
Respondents say they know and care about investing. 76.5% said they know at least "a little" while 43.9% of that say they know "some" or "a lot" (Figure 6).

Figure 6: How much would you say you know about investing?
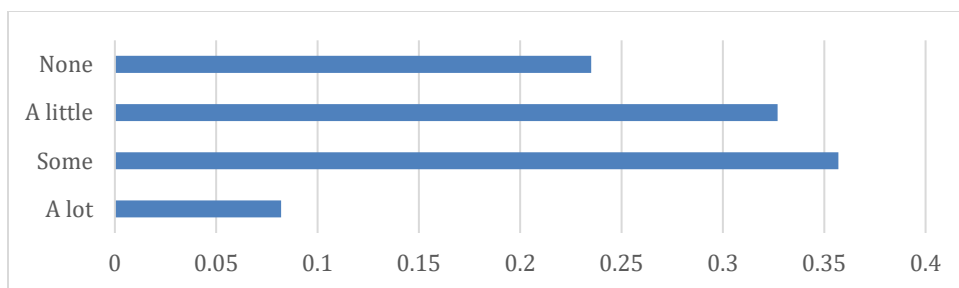
Only 23.5% said they knew nothing about investing. And when asked "how much have you thought about how you'll invest your savings when you are working full-time" 93% had thought about it, with "some" being the median response while 18% said they had thought "a lot" about it.

Most respondents have a realistic idea of investment return rates. The question "what do you think is a good average rate of return to earn on your investments" was posed, with 40.8% answering the range 9-11% and another 36.7% saying 6-8%. Only 14.3% of respondents thought that an average rate of return equal to or greater than 12% was good.

Out of the respondents 59.2% have not invested before, and of those that have invested 42.5% did so between the ages of 13-17 and 50% between the ages of 18-22 (Figure 7).

Figure 7: When did you start investing?
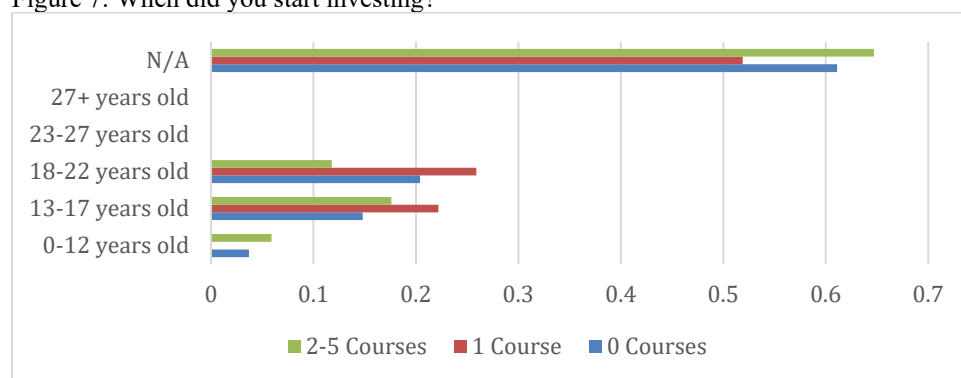
Figure 8: Why did you start investing?

Why did they start investing? Largely because of familial influence which doubled what the next closest response was for zero courses (Figure 8). Yet, familial influence decreases with more courses taken while advice from literature catches up. With the expansion and greater diversity of investors over the last five years, the fact that family is the greatest investment influencer means there is a great amount of potential to increase the viability of investing.

Next, I considered five major forms of investing to learn about student preferences. Across the board, Crypto is considered the riskiest with 76.8% of respondents and the stock market a distant second with 17.9%. Bonds are seen as the safest form of investment with 36.6% of respondents, 22.6% for index funds, 20.4% for mutual funds, and 19.4% for stocks (Figure 9).

Figure 9: What do you think is the safest form of investing?
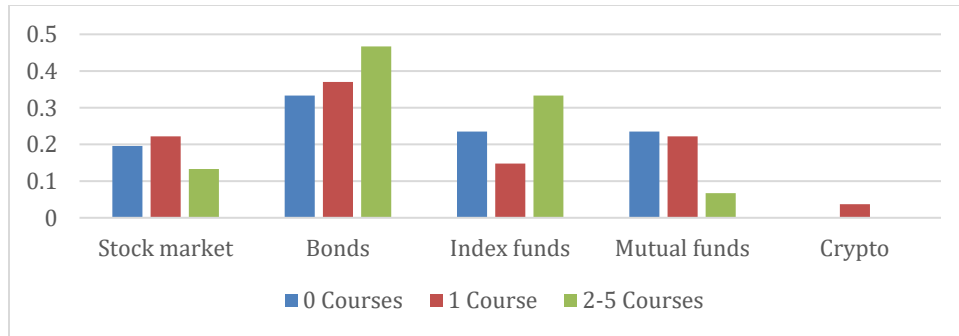
Regarding risk, the distribution is relatively consistent. Yet for "the safest form of investing" there is a smaller distribution of answers for the two-to-five courses respondents, with the consolidation being in bonds and index funds. While for one course and zero courses the stock market and index and mutual funds took up a sizable portion of the whole. Generally, the comparative safety of bonds is not fully understood, even though a distinction between government and corporate bonds was not given.

I also determined students' preferences when it comes to which form of investing they would take part in.

Figure 10: Which form of investing would you prefer most?
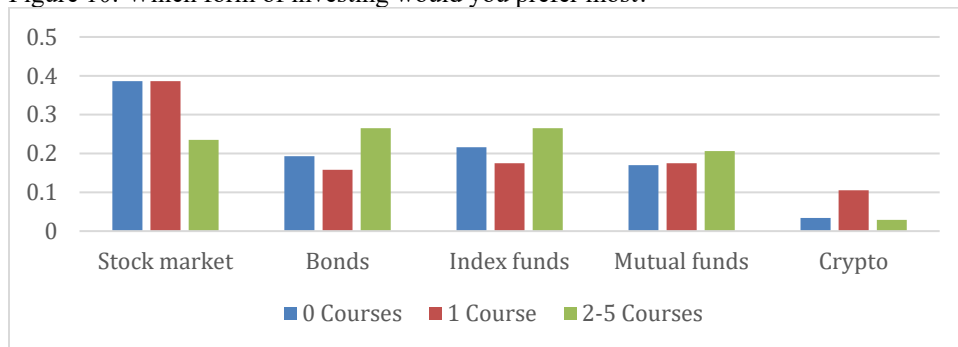
All forms of investing besides crypto are popular, yet many more respondents with zero or one course choose the stock market as one of their forms (Figure 10). It is also apparent that respondents are diversifying via selecting approximately two forms on average.
The next area focuses on risk. First, it was asked whether "you think all forms of investing are inherently risky," 41.8% said "yes" (Table 1).

Table 1: Do you think all forms of investing are inherently risky?

	0 Courses	1 Course	2-5 Courses
Yes	51.9%	40.7%	11.8%
No	48.1%	59.3%	88.2%

Yet, when breaking the data down by course risk perception widely changes with more courses taken.
Another interesting result came from the question "how do you think your willingness to take financial risk compares to others" was posed. The mode of students at 53.5% rated themselves as taking "less" or "near zero" risk. The second highest response, taking "the same" risk, had substantially fewer responses, with 28.7%. Relatively few respondents, 17.8%, answered that they took more financial risk compared to others.

Lastly, students want to know more about investing. 44% of respondents said "yes, a lot," with 93% saying yes in some form.

Taxes
Respondents were initially asked "how much do you think you know about the US tax system" to which 54.0% responded that they knew "a little." Another 30.0% said they knew "some" and 13.0% "none." Then each was asked "do you think it's important to know about taxes" where every respondent said it was "yes" important to some extent. 55.0% said "yes, it is very important" and 39.0% said "yes, it is important." In a follow-up question stating, "have you ever looked at the US Tax Code."

Figure 11: Have you ever looked at the US Tax Code?
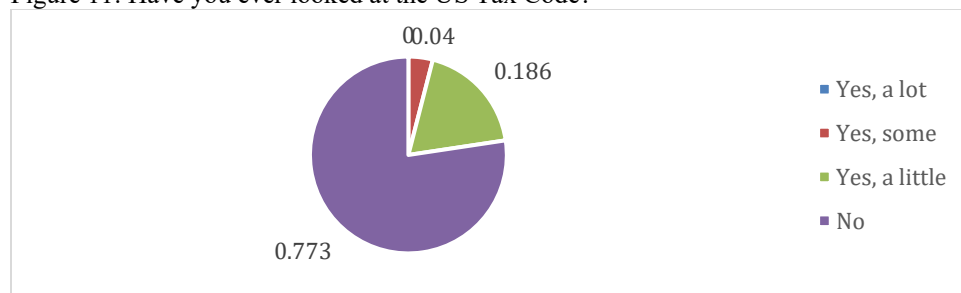
Here, 77.3% said "no" with another 18.6% saying "yes, a little" (Figure 11). Few students have looked at the US Tax Code, and even less have spent time looking into it.

Shifting to a more immediate question to many respondents, asking if they believed they could reduce their taxes by using the Tax Code to their advantage, there are many general and categorically distinct answers.

Figure 12: Do you believe you can reduce your taxes by using the Tax Code to your advantage?
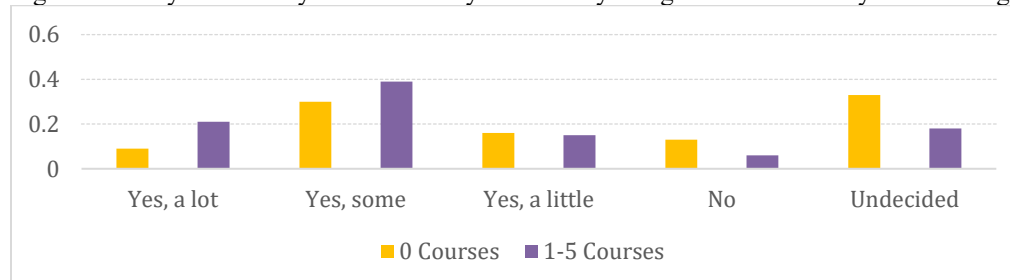
65.0% said "yes" in being able to reduce their taxes in some capacity, with the other 35.0% being "undecided" or saying "no" (Figure 12). The mode of respondents, at 34.5%, said "yes, some." Uniquely, if broken down by courses taken the one-to-five courses group has a much higher distribution of answers. Comparably, many more respondents with zero courses said they are "undecided." On the other hand, there is a general "want to learn more about taxes" because 44.1% responded "yes, some" and 28.0% "yes, a lot" out of the 93% of respondents answered "yes."

Credit Score
Shifting to an often unfamiliar concept for college students, credit score. Immediately it was asked "do you know what your credit score is." The split was near 50-50, at 51% "yes" to 49% "no." Next, even though there was a wide distribution of answers respondents mostly knew what factors influence credit score. Also importantly, 87.0% of respondents said "yes" to "do you know what the benefits of having a good credit score are."

Respondents really care about maintaining a good credit score. 63.2% of those who have a credit score said they care "a lot" with another 30.3% saying "yes, some." When asked in the future tense, "will you care about maintaining a good credit score even if you don't have one or don't know currently," 69.3% answered "yes, a lot" and 22.8% "yes, some."

Most students, 94.1% said that they "think it's important to learn more about how credit scores are determined," with 80.2% answering between "yes, a lot" and "yes, some." A high percentage of respondents also "want to learn

more about what credit score is." 84.2% said "yes," with 47.1% of that saying "yes, some." Do account that 13.9% responded "no" to this question.

Insurance
Taking a look at insurance, respondents don't feel they know as much compared to some of the other topics. 43% responded "some" and 45% "a little" to "how much would you say you know about insurance." The desire to know more was consistent with past answers though, with 90% saying "yes" to "do you want to know more about insurance." Approximately 96% of students do think "insurance is part of a good financial plan," with 54% strongly answering "yes, a lot."

Respondents think they need insurance now but also think that they will need even more in the future.

Figure 13: What kind(s) of insurance do you have or think you need now and/or in the future?
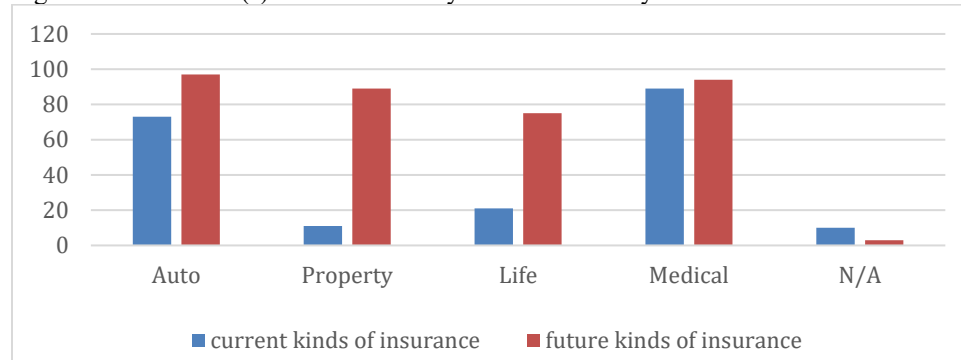
The question "do you have or think you need any form of insurance right now?" garnered an 89.1% "yes" response, with the remaining respondents saying "no" and "undecided." The two major types of insurance being auto and medical (Figure 13). Few students currently possess or think they need life and/or property insurance right now. Distinctly, responses to "do you think you will need insurance in the future" saw most respondents saying they will need more insurance in the future. A near unanimous 98.2% said "yes" to some capacity, the mode being "yes, a lot" with 70.3%. Both life and property insurance leaped, almost catching up with medical which stayed roughly the same as before (Figure 13). Auto insurance saw an increase of approximately 24.7%. The total of perceived insurance needed in the future has a ratio of 40:23 to what students have/think they need now.

The last area of this subsection on insurance looks at respondent's insurance threshold. It was first posed "what the value of your vehicle would have to be for you to buy insurance for it."

Figure 14: What would the value of your vehicle have to be for you to buy insurance for it?
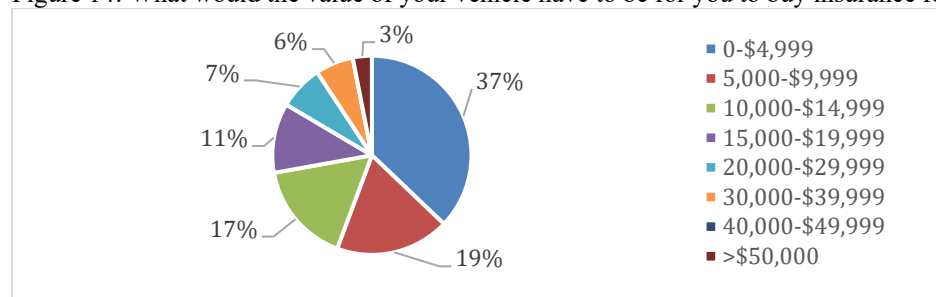

Interestingly, there is a distinct mode at the range 0-$4999 with 36.6% of respondents. The following range of 5000-$9999 is about half the size and proceeding ranges from there on decrease. As seen, 55.5% had a tolerance of below $10k (Figure 14). There is a greater utility among respondents with insurance than without, yet wanting insurance on an asset of such low value seems abnormal, especially when considering how much insurance would be per year relative to the asset's price. It's important to note though that WPI is in Massachusetts, a state notorious for

congested and poorly planned roads, and dare it be said, a large quantity of horrible drivers. So, it may be due to location that insurance is heavily desired on low value assets.

Debt
Entering the world of debt, respondents say they know a good amount about it. 10.1% said they knew "a lot" about debt, 46.5% "some," and 37.4% "a little." When asked about their views on debt, the general mood and mode was that debt is "somewhat bad."
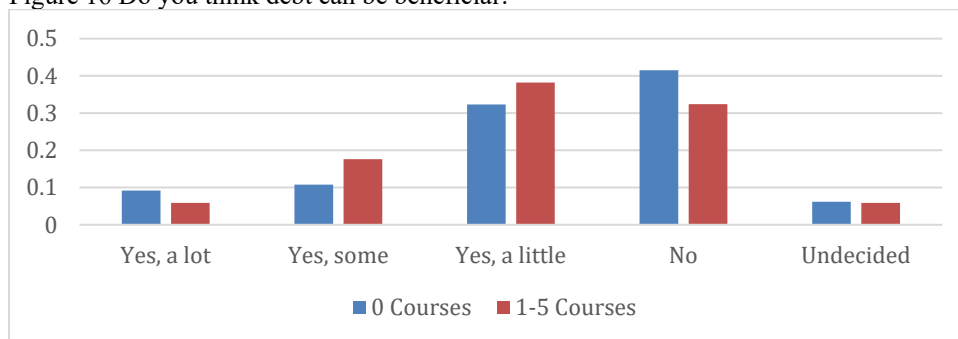
Figure 15: How do you view debt?
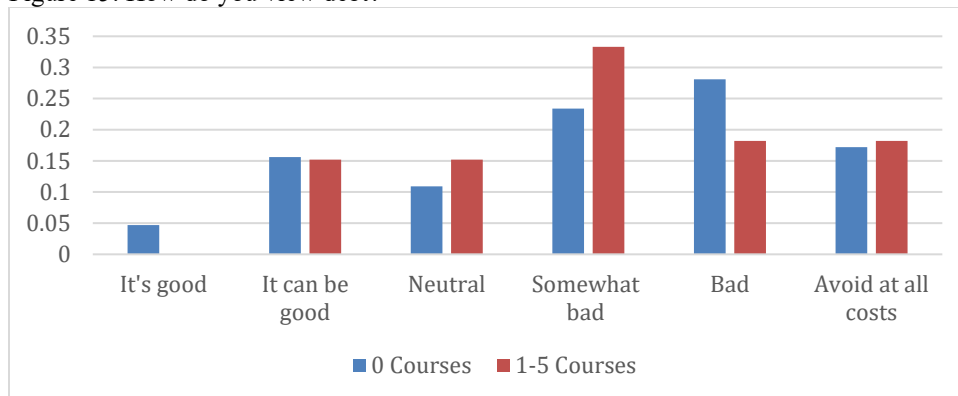
The response "bad" was close behind though. Looking at the zero courses category, more than 20% do think debt can be at least good (Figure 15).

When asked about debt hypotheticals, different averages surfaced. First the question of whether "you think debt can be beneficial" was posed.

Figure 16 Do you think debt can be beneficial?

Second, when asked a similar question "do you think you can leverage debt to boost your long-term financial position" just worded more specifically, answers completely differ.

Figure 17: Do you think you can leverage debt to boost your long-term financial position?
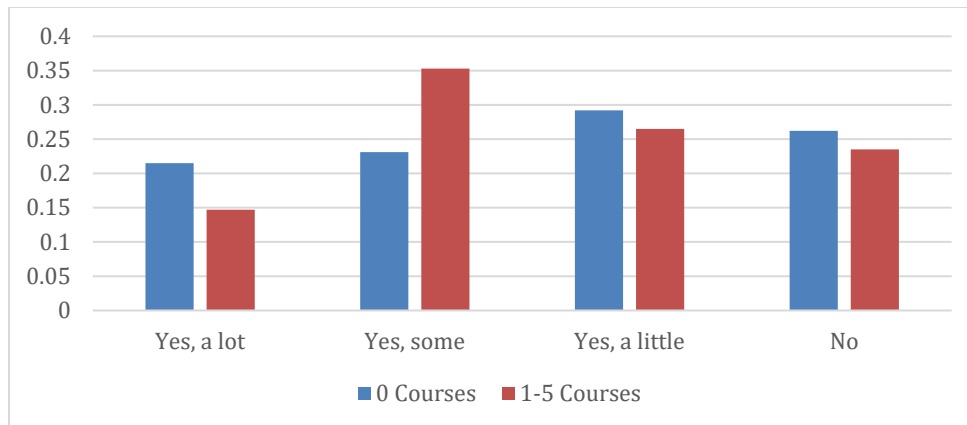
Comparing the first and second questions' values, 36.6% : 23.8% said "no," 33.7% : 28.7% said "yes, a little," and 21.8% : 46.5% said debt can do more than just "a little" (Figures 16 and 17). In the first question most respondents thought that debt wasn't or could only be minimally beneficial, while in the second question the mean outlook was much higher.

The next three questions work together, as debt tolerance is investigated along sequentially decreasing values.

Figure 18: Let's say you have $x in debt, how do you feel about it on a day-to-day level?
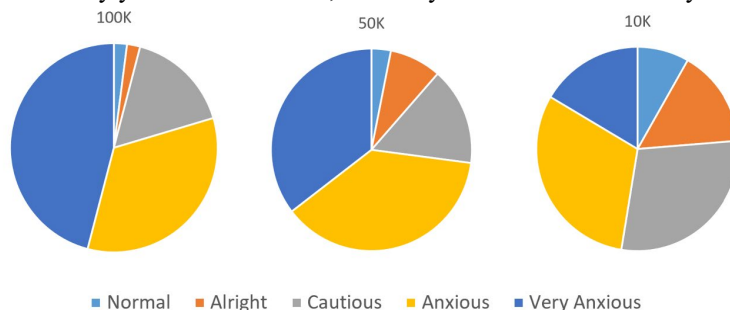
As seen, anxiety while having $100,000 in debt is very high. And as we move down in debt the anxiety decreases. It is in Figure 18 that 45.9% of respondents said they would feel "very anxious," with another 33.7% responding "anxious" and 16.3% "cautious." In Figure 23 "very anxious" decreases to 35.4%, "anxious" increases to 37.5%, and "cautious" becomes 15.6%. Lastly Figure 24 sees "very anxious" drop to 16.5%, "anxious" decrease to 30.9%, and "cautious" jump to 28.9% with the answer "alright" doing the same at 15.5%. Overall, anxiety decreased a good amount with decreasing debt values, yet students were still, on average, "anxious" and "cautious" when it came to being $10,000 in debt. Categorizing this data is also interesting, as respondents with one-to-five courses were slightly less anxious in general, especially when it came to $100,000.

In the final question of this subsection, respondents were asked whether they would "prefer being in debt, which gains interest, due to student loans for 15 years while making $90,000 (your spending would be restricted during these 15 years) or having no debt and be making $70,000?" Interestingly, 67.7% said "no." Doing some quick math shows that after 15 years the debt option will make 1.35 million while the no debt option makes 1.05 million. The difference is $300,000, or $20,000 per year. Given that it would be unlikely for a student would owe (with interest) $300,000 in student loans, it is striking that 67.7% would not take the higher income level.

Literacy
In most of the subsections previously seen on the survey, I asked a question or two to gauge how much students knew about a particular topic. This provides important insights into potential current and/or future financial positions.

The first question about investing asked "what do you think the interest rate will need to be for a sum of money to double in 25 years."

Figure 19: What do you think the interest rate will need to be for a sum of money to double in 25 years?
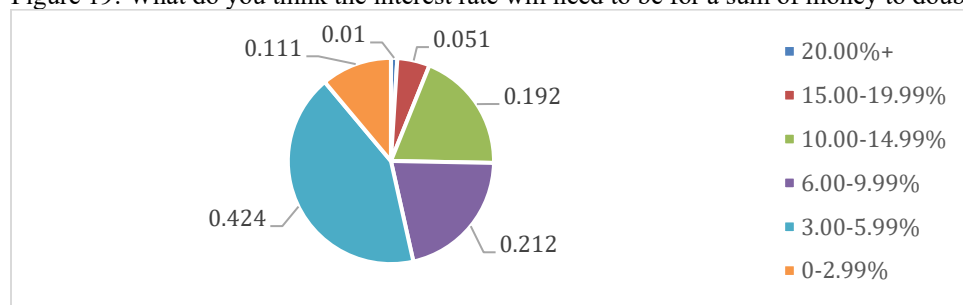
With the correct answer being approximately 2.9%, most respondents missed this question with the mean response being 7.26%. So, 46.5% of respondents were off by more than 3%, all answering too high of an interest rate. A similar question was also asked in Figure 20.

Figure 20: At a 6% interest rate, how long do you think it would take for a sum of money to double?
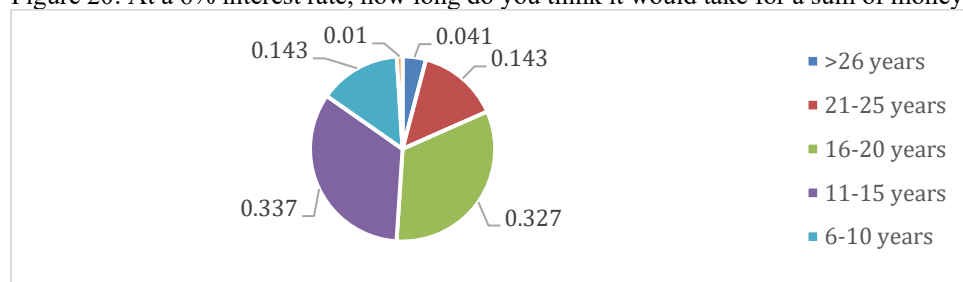
The same pattern was seen as before, this time with 51.0% of respondents answering at least four years above the correct answer of approximately 11.9 years. The mean response was 15.8 years, yet the mode response was correct with "11-15 years." The remaining 15.3% thought that it took 1-10 years to double (Figure 20).

The next literacy question asked, "can a tax deduction reduce your taxable income." A bit over half, 53.6% answered correctly with the response "yes." The other 46.4% said "no." When it came to "is interest earned on a savings account typically considered taxable income?" responses were much weaker.

Figure 21: Is interest earned on a savings account typically considered taxable income?
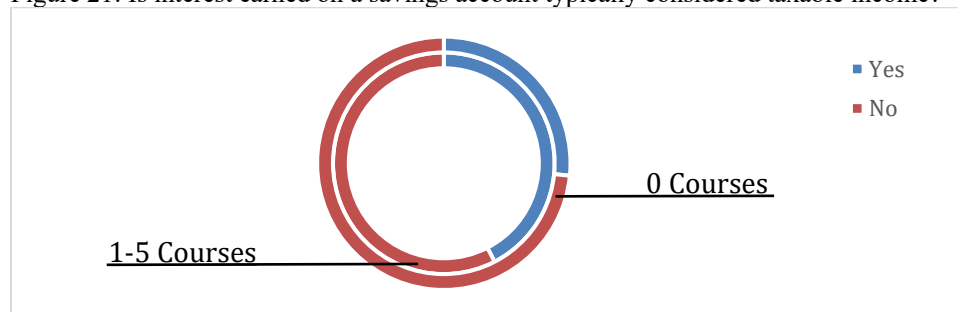
Only 32.0% answered correctly with "yes," meaning the other 68% saying "no" don't think interest earned on a savings account can typically be considered taxable income. Do note that one-to-five course students did perform considerably better on this question.

One question was asked relating to credit score, as seen in Table 2:

Table 1: Which of the two choices is better for your credit score?

	0 Courses	1-5 Courses
A	56.2%	72.7%
B	43.8%	27.3%

A: Having a high credit age over a small number of accounts
B: Having a high credit age over a large number of accounts

Out of all respondents 38.1% answered correctly with option B, "a large number of accounts." Notably students having taken zero courses averaged a higher correct percentage at 43.8%.

Insurance questions were much more accurate. 76.3% were right when asked what the difference is between a premium and deductible. Similarly, 71.1% answered correctly via responding "yes" when asked "is renters' insurance designed to cover personal property within a rented apartment or house?"

Closing this section with debt literacy, questions were also mostly correct. "Can paying more than the minimum payment on a credit card help reduce overall debt faster" saw only 7.20% respond incorrectly, saying "no." And when asked "is a student loan considered a type of unsecured debt?" 71.1% answered correctly, with the right answer being "yes."

Discussion
After the work of organizing, analyzing, and writing up on the data, a few main themes materialize. Firstly, a distinct positive correlation is seen between the number of courses taken and how much beneficial financial knowledge one has. Secondly, there are many large gaps and erroneous beliefs in general knowledge. Thirdly, students want to know more about finance, yet this desire is not reflected in the data on literacy. This section will explore each of the main themes and peer into the psychology at play.

Correlation Between Courses and Beneficial Financial Practices
On multiple occurrences, students that had taken one or more financial/economic courses responded with an answer that was, on average, better for financial success than students with zero courses. This does not hold true for every single question and topic, such as for Table 2, but it is a common theme.

This correlation was first seen with savings. 68.0% of students didn't know "interest earned on a savings account" would typically be considered taxable income (Figure 21), but the percentage of one-to-five course students that answered incorrectly was about 15.8% lower than those with zero courses. There is also correlation with budgeting. Categorizing the data from Figure 4 revealed that whether it was in past budgeting or present budgeting, those that had taken more courses had a stronger chance of budgeting their money.

Viewing what students thought about investing, similar patterns surfaced. Those that thought "all forms of investing are inherently risky" dramatically decreased with more courses taken (Table 1), specifically by 40.2% from zero to two-to-five courses. This dramatic shift in how each group perceives the risks associated with investing highlights how students that have taken more courses think investing is not as risky and that these same students are also more comfortable with investing. The students with zero courses seem to have an unease and possible lack of trust in investing. Figure 9 also displayed how zero and one course respondents had more dispersed beliefs in what they thought was the safest form of investment was.

When it came to "using the Tax Code to your advantage," those students with finance/economic course experience were much more optimistic about their ability to reduce their taxes (Figure 12). This data also supports the tendency that not only are students with more courses more optimistic financially, but that they are more confident in their financial capabilities.

And with debt, those with more courses felt they could leverage and utilize the tool with less anxiety than those with no courses (Figures 16-18).

This positive correlation between beneficial financial knowledge and the number of courses taken—being especially true in savings, investing, the Tax Code, and budgeting—is critical to the overall understanding of how financial literacy can improve financial viability.

Gaps and Misconceptions in Financial Knowledge
Consistently in the data large gaps exist in literacy and knowledge of beneficial financial practices—beneficial financial practices meaning a practice that is financially beneficial to the person practicing it over the long-term, e.g. habits that sustain a high credit score or incurring debt to graduate college. Many a time students believe the opposite of what is right to be true, while saying they know a moderate amount about these same topics. It will be seen that this overconfidence in one's knowledge is a reoccurring predisposition.

Right from the start of investing, both questions regarding the interest rate or time needed to double a sum of money had unrealistic answers. When asked about the interest rate needed to double a sum of money in 25 years or how long it would take a sum of money to double at a 6% interest rate, about half of respondents thought it would take longer or that there would need to be a higher interest rate to double the sum (Figures 19 and 20). This gap in knowledge may very well be why so many students consider all forms of investing risky (Table 1). Investing is considered a much more difficult, lengthy, and lower return process than it is in reality which makes students turn their attention away from it.

Comparing how many students have invested to how much every student says they know about investing brings about a fascinating dilemma (Figures 6 and 7). More students say they know a moderate amount about investing than have actually invested. This is quite the distinction, as how do you know so much about a topic without ever practicing or experiencing it? Again, it looks that these students have an overconfidence in their financial knowledge and abilities.

Looking back over Figures 9 and 10—which covered what the respondent thought was the safest, riskiest, and preferred form(s) of investing—a pattern arises in preferences. Those students with zero or one course preferred investing less in what they considered safer forms of investing, bonds. As well their preferred form of investing was the stock market, doubling other preferred forms of investment; recall as well that 17.9% with zero or one course said that the stock market was the riskiest form of investment. It was determined earlier investment perception changes with courses taken, but are students with less courses more risk-loving and/or overconfident about their chances of beating the odds? It seems so.

When going into the data on taxes, while only 65% believe you can use the tax code to your advantage (Figures 11 and 12). It's not just these points that bring about the suspicion that college students don't know how the tax system works, but also that only 53.5% know a tax deduction can reduce their taxable income (3.8). Such questions are important as not knowing may cost these individuals thousands of dollars in future net income. Looking back at Figure 21 magnifies this fracture, as only one-third of respondents say they know that interest earned on a savings account is typically considered taxable income. Overall, in regard to taxes, students view themselves as knowing a moderate amount yet their answers are largely erroneous and reflect minimal understanding of the tax code, or how to leverage it.

There are fewer gaps when it comes to credit score. Earlier the example was given where most students know the benefits of a good credit score while only half know their credit score (subsection 3.5). There was also the large misconception that having a "small number of accounts" was better for your credit score (Table 2). Yet, students typically know what influences credit score and they did almost answer unanimously correct when asked "if you have a good credit score, can you get lower interest rates on loan and better terms?" When looking at what makes a good credit score though, respondents generally don't know enough to build good financial habits and/or financially strategize.

In correlation with most other topics, students do not feel as confident about insurance. This lack of confidence is reflected in the average responses to the insurance literacy questions in subsection 3.8. On average 74.3% were correct, but the literacy questions were quite common. Also to note, nearly all students surveyed live or have lived in

rented housing while in college, so the 70% range is actually not a good percentage for questions students should have personal experience with.

The same students consider insurance a critical part of a good financial plan. Yet students think they will need so much insurance that it seems to be treated as more of a checklist item than a financial decision (Figure 13). Peering into debt, there is a broad feeling of dislike. A majority of respondents put their view of debt to be between "somewhat bad" and "avoid at all costs," with just 19.8% viewing it as good to some extent. In subsection 3.7 a majority of respondents chose a lower paying job over a higher paying one that involved incurring student debt, even though they would likely have paid off the debt in less than ten years. Most respondents don't think debt can be all that beneficial either (Figure 16). So, it begs the question, do these students know the importance and power of debt in today's world? Do they know how critical loans are to new and growing businesses or that close to half of college students take out loans, both of which being forms of debt. Why do these students turn their backs to the upsides and opportunities debt enables? There is a vast gap in knowledge about how debt can be used as a leveraging tool.

What students think they know about debt also uncovers an equally important insight. Students think they know a decent amount about the topic and have a distaste and/or unbeknownst towards the possibilities debt can open. Combining this information with tens of hours spent over the data in spreadsheets leads to a conclusion that students think they know a decent amount about debt just because they have heard the term more. Because of the higher exposure—hearing it extensively on the news, largely regarding the US national debt, and likely talking about it with peers and relatives—these students think they know more about it. It would be as if a banker who drives by a construction site everyday becomes more knowledgeable about construction with each pass. These students believe they know more about what is right and beneficial than they really do and are building themselves a self-replicating sense of overconfidence.

In sum, this subsection reviewed and discussed the large gaps in literacy and knowledge of beneficial financial practices. Many of the topics, specifically regarding taxes and investing, saw the students' literacy data negatively correlate with what they themselves believe to know. And this overconfidence held, including the unknown benefits of financial tools such as debt, shows a deficiency in financial preparedness.

Curiosity Without Action
One of the most common themes intertwined in each topic was the desire to know more about it. And to an equal extent the respondents thought these same topics were important. Whether it was savings or investing, credit score or debt, this theme remained true. For example: 90.8% of respondents "want to learn more about investing" and 82.5% think insurance is, at minimum, an "important" "part of a good financial plan." Yet, the data does not reflect that this desire has been converted into action.

One of the most pertinent examples was when students were asked "do you know what your credit score is." 49% said "no" while 84.2% "want to learn more about what credit score is" (subsection 3.5). These students have no doubt had conversations about credit score with parents or friends, and as seen have a strong desire to learn more but about half still don't know what theirs is, or if they have one.

Similarly, 61.9% of students were incorrect when answering a literacy question about how lines of credit affect one's credit score (Table 2). Nealy every student wants to maintain a good credit score in the future, so it would be in their best interest to build good financial habits such as having more lines of credit (subsection 3.5). Yet, they don't know that this strategy improves your credit score, even though they are extremely interested in maintaining a good credit score now and in the future.

Earlier on, two questions about taxes were posed in which 53.5% and 32.0% were right respectively (subsection 3.8 and Figure 21). And when asked "do you want to learn more about taxes" 92.1% said "yes" (subsection 3.4). Again, with such a vast interest in taxes, why do students not know more about how they work.
Why this difference between interest and action exists is likely due to the discounting and immediacy effects. Students metaphorically keep kicking the can down the road instead of stopping to pick it up. A further discussion on the psychology of this theme will occur in the next subsection, Psychology at Play.

Psychology at Play

Many of the results reflect human psychology. The overconfidence effect, comparative optimism bias, IKEA effect, and confirmation bias play a distinct role in why respondents answered the way they did. Psychology is critical to understanding students' beliefs, perceptions, and assumptions, and how they play out versus reality.

First, there seems to be a preference for believing one's own choices are/were best (Figures 1 and 2) and a bias towards the present where one thinks what they are doing now is better than what they were doing in the past (Figures 4 and 5); each are respectively known as confirmation bias and temporal-self comparison. Students also believed that when they started to save was the best time to start. This idea is very similar to the IKEA effect in the sense that they think their decision in the past was best because of the effort they put into making it. Self-bias is seen in subsection 3.3, where most students think they take less risk than their peers, even though in a perfect world only 50% do. This is an instance of comparative optimism bias, where these students on average believe they are less risk-taking than others.

Throughout the debt subsection (3.7), there was a distaste and unease surrounding the topic. If the term debt was switched with loan, what would change in the respondents' answers? The term "debt" has a negative connotation due to the burden and side effects that can play out, yet the media has stimulated the negativeness of debt without counterbalancing with the benefits it can provide. Hence, debt has become a bitter term where a negative image comes to most students' minds when they hear it. The horn effect, if reapplied to terms, relates to this well. Most probably for these reasons, as well as negativity bias, students have a pessimistic outlook on debt.

Subtly, two questions about the prospects of debt of the same effect were asked, but with different connotation (Figures 16 and 17). And two greatly different results came about, with the more explicit question receiving warmer responses. This was an instance of the framing effect, as both questions are substantially the same it is just that Figure 17 provoked a different feeling in the respondent.

Everyone is susceptible to these psychological shortfalls, especially regarding one's perception of reality versus actuality. But knowing that one's own decisions aren't always best, that they are no luckier than anyone else, that the status quo isn't completely representative of reality, and how connotation can affect choice, will make individuals more financially aware of the factors influencing and assumptions affecting their decisions.

Conclusion
The purpose of this research was to learn what college students know financially and economically. My aim was to then take the data analyzed to determine potential beneficial practices that can be brought forward to best prepare students for post-college long-term financial success. I can conclude that current college students don't have enough knowledge to start off on the right foot after graduating. Major deficiencies specifically exist in budgeting, investing, credit score, taxes, and debt. And considerably, many students are overconfident in their knowledge.

I produced three main findings: (1) The number of finance/economic courses taken improves literacy and understanding of investing and debt. (2) There exist large gaps in general knowledge along with many misconceptions about the capability of financial tools. (3) Even though there is a strong self-reported desire to learn more about how to be financially prepared, the data on literacy reflects minimal action taken to ready oneself. Paralleling these were the many subvert psychological factors influencing students.

A few critical examples help highlight what college students know versus what they think they know. First, when dealing with savings the interest rate decides the pace at which a sum of money will grow (excluding taxes and fees). So, knowing this relationship is critical to determining how much of one's income they should save to invest and for how long. If one underestimates how quickly money can grow at x interest rate, they are less likely to invest as much due to the smaller perceived payoff and vice versa. In the survey, two separate questions involving an interest rate and time were asked, and in both instances students underestimated how quickly the interest rate would grow a sum of money; on average 48.8% of respondents answered at least 3% or four years too high (subsection 3.8). And because these students think it will take money longer to grow than it does, they are less likely to see investing for the tool it really is.

Second, only 32.0% of students know that interest earned on a savings account is typically considered taxable income (Figure 21). There are several other instances in the data where large gaps and misconceptions in knowledge exist, yet this result was particularly stunning because not knowing that this type of interest can be taxed could cost

the respondent hundreds of thousands of dollars in the future. Not knowing details such as this leaves these students' financial futures vulnerable.

Third, overconfidence was one of the major undercurrents throughout the data. For example, within the topic of investing more students reported that they knew a moderate amount about investing than had actually invested (Figures 6 and 7); how is this? Similar overconfidence dilemmas surfaced in credit score, taxes, and debt. While these three brief yet significant examples fall well short of displaying the other important factors and biases, such as negativity bias surrounding debt, they do provide insight into where improvement should take place.

Many times, the strengths and weaknesses of my research approach became quite clear. The strong comprehensive coverage of financial topics proved essential in distinguishing the general trends and themes. And data analyzation didn't need highly sophisticated methods, which meant I didn't need to be an expert to conduct or interpret this research. Yet weaknesses were just as prevalent. More time could've been spent over the data, via running a greater number and variety of mathematical tests. The research would have benefitted from a larger pool of participants. And having other researchers from different academic backgrounds collaborate would drastically improve the quality and insights of this research.

With hindsight, I could have adopted a more effective approach with less limitations. Due to logistical constraints, several smaller topics, such as basic economic concepts and behavioral finance, went untouched. As is human, heuristics were involved—with the availability and anchoring heuristic being foremost—of which I reduced to the most minimal level possible. Yet the greatest limitation was the issue of limited participant involvement from different academic areas. But at the same time, conducting this research over a somewhat niche group of participants, as all are studying at WPI and most are engineering majors, has the potential to highlight what different university educations provide and produce. Further research can better approach determining the financial knowledge of college students.

To develop this improved approach, I recommend two new and two improved elements. New background questions that indicate whether a respondent has come from an environment and/or has a distinct personal interest in finance would better separate the data to improve solutions and suggestions. And, bringing on an academically diverse group to conduct the research would help bring about different insights that would not have been caught before. Beyond the two new elements, both more in-depth research—via improved data analysis/testing, a longer timeline, etc.—and a greater quantity and variety of pooled participants would improve the current research methods.

Extending this research would look very similar to these recommendations but would also involve going to other universities in Worcester and Greater Boston to (1) test how and why those universities differ in what their students know and (2) continue to develop and/or disprove existing and/or new themes in college students' financial literacy. As well, developing a playbook which can help tackle financial gaps and misconceptions would be of great use to many of these same students who want to know more and improve their financial preparedness. A resource such as this, which would be capable of predicting deficiencies via a short question form, could enable students to start post-college life with the knowledge needed to be financially successful.

The most important impacts to come from this research were that students' key financial deficiencies and influences were identified; credit score knowledge can easily be improved upon while parents should take a greater role in introducing the rungs of investing. At the same time, it would be in student's best interest to think more critically about the capacity of financial tools like debt. Setting oneself up for long-term financial success is an involved and iterative process that wouldn't be possible without personal conviction.

This matters because financial independence and stability let one live how they desire. Freedom to make your own decisions and being capable of withstanding tough economic times is uplifting. Smarter and earlier savings habits lead to more being left over for later. Better personal finance enables improved allocation of resources and optimized economic efficiency, which in turn will benefit universal financial viability if good financial habits are built and sustained.

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Exploring Buy Now, Pay Later Using the 2023 Survey of Household Economic Decision-Making (SHED) Dataset

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Abstract

Buy Now, Pay Later (BNPL) is one of the newest short-term credit options available in the marketplace today. It is designed to be an interest-free way of splitting the cost of a good or service into smaller payments to be repaid in full over the course of six weeks. Despite being a highly unregulated form of credit, BNPL has seen exponential growth over the last five years. This paper seeks to explore the profile of the typical BNPL user, as well as the financial attitudes and beliefs, with the ultimate goal of answering the question of whether BNPL is a prudent financial practice utilized by the financially savvy or a predatory form of credit designed to target the financially vulnerable. This paper uses the 2023 Survey of Household Economics and Decision-Making (SHED) to attempt to answer these questions. Finally, this paper advocates for regulatory bodies in the United States to devise legislation to protect the most vulnerable from some of the most potent risks of BNPL products, including loan stacking and overextending.

Motivation

Buy Now Pay Later (BNPL) is one of the newer forms of point-of-sale financing available in the United States marketplace and worldwide. BNPL first appeared around 2015 and started gaining traction in the United States around 2019. There are five main providers in the BNPL marketplace today: Afterpay, Affirm, Klarna, PayPal, and Zip (formerly Quadpay). Between 2019 and 2021, the number of short-term loans issued by the top five BNPL lenders increased by 970 percent (Shupe et al., 2023). The payment terms differ slightly among providers, but it is a method of splitting online retail purchases into smaller installments. The Consumer Financial Protection Bureau (CFPB) is a U.S. agency responsible for implementing and enforcing financial laws that protect consumers and ensure competitive and transparent markets (Consumer Financial Protection Bureau, 2025). While the Consumer Financial Protection Bureau, CFPB (2021), acknowledges that there is no single definition of BNPL, the terms typically involve the borrower paying 25% upfront, with the remaining balance spread into biweekly payments over the course of six weeks.

Consumers who use BNPL typically do not incur fees or interest charges; however, they may incur late charges. According to the Consumer Financial Protection Bureau (2021), approximately 10.5% of BNPL borrowers incurred at least one late fee. Late charges vary based on the lender and the borrower's state of residence, and they typically range between $7 and $10 (CFPB, 2022). BNPL may seem like a financially prudent way for borrowers to smooth their consumption in a less costly way than by using traditional credit products, but there are risks, such as loan stacking and overextending. Currently, the BNPL lenders do not report to the credit bureaus, nor does the application for a BNPL loan register as a hard inquiry on a person's credit report. Many BNPL lenders utilize a "low and grow" strategy, where they will approve a small loan to a first-time borrower and gradually raise the limits after on-time repayment. In 2021, the average approval rate across the five major lenders was 73% (CFPB, 2022).

There are two ways that consumers can utilize BNPL: when checking out at participating online retailers or through the lender's app, where consumers are given an approved limit and can spend at any retailers that appear within the app's ecosystem. The danger of BNPL financing is the risk of taking out many loans through different BNPL providers, a practice known as loan stacking. This is easy to do since one BNPL provider cannot see other BNPL loans a person may have outstanding due to the lack of reporting to the credit bureaus. Additionally, BNPL users are at risk of overextending their borrowing. For example, there is an 85% higher merchant average order value when using BNPL than other payment methods (CFPB, 2022). Further, users utilizing BNPL through the BNPL app spend a staggering 72% more per transaction than when shopping online (CFPB, 2022). Finally, BNPL users make purchases 36% more frequently than non-users (CFPB, 2022).

We seek to explore whether BNPL lenders prey on the financial well-being of those who use it to determine whether interest-free BNPL is a predatory practice aimed at targeting the vulnerable or a prudent financial practice used by the financially savvy. Conflicting information exists on the profile of the average BNPL user. In a study by The Federal Reserve Bank of New York, Aidala et al. (2023) conclude that consumers with unmet credit needs or access

to credit are more financially vulnerable and use BNPL disproportionately. Conversely, the Federal Reserve Bank of Philadelphia reported that lack of credit access was not the primary driver of BNPL adoption (Akana, 2022).

This study aims to understand the typical profile of consumers likely to use BNPL by exploring their financial attitudes and behaviors that would ascertain the prudency or predatory nature of BNPL payment. The research question we seek to answer is which behavioral aspects play a role in BNPL purchases that indicate prudence or vulnerability in household consumption.

Theoretical Framework

Life-Cycle Hypothesis

According to Modigliani and Brumberg (1954), consumers maximize their utility by choosing the optimal consumption level given their preferences and the resources available now and in the future. The Life-Cycle Hypothesis suggests that individuals maximize their utility over time through intertemporal decision-making involving trade-offs between current and future consumption. Buy Now, Pay Later payment offers the opportunity to make purchases without paying the full amount upfront. The tradeoff of acquiring an item or service with flexible payments aids smooth consumption as the theory pivots to determining the optimal consumption pattern. The assumptions are criticized as unrealistic due to their failure to accommodate psychological concepts, such as thriftiness and refraining from consumption (Wärneryd, 1989). The paper will explore why individuals use BNPL by examining the lens of accessibility to credit, age, education, or other influencing attributes.

Behavioral Life Cycle Hypothesis

The Behavioral Life-Cycle Hypothesis (BLC) was first proposed by Shefrin and Thaler (1988); it incorporates three important behavioral aspects that they claimed to be missing in the Life-Cycle Hypothesis in the analysis of household consumption, namely, self-control, mental accounting, and framing. This study will focus on self-control, which is assumed to be a costly investment of willpower to postpone consumption to a future, affordable period. Shefrin and Thaler (1988) proposed a dual preference framework in which the planner and doer functions exist within the same individual; the former is long-term oriented, while the latter is short-term. By postponing consumption to a future period, a planner will seek mechanisms to support their ability to delay gratification, such as saving and creating mental accounts of allocating income. The doer will pursue immediate gratification and often fall prey to luring payment models; the BNPL decision is influenced by the consumer's inability to delay gratification due to a lack of self-control, impatience, and present bias (Thaler & Shefrin, 1981; O'Donoghue & Rabin, 2015). Gathergood (2012) found that although self-control explained over-indebtedness, most financial burdens were associated with financial illiteracy and self-control problems. Consumers with low financial literacy find financial products confusing; Disney and Gathergood (2013) and Ru and Schoar (2016) found that most credit providers target the less financially knowledgeable with their products. A report from one of the largest BNPL providers disclosed that only 36% of its loans had zero interest (Ledbetter, 2023). Most American households are familiar with using credit cards because the product has existed for many years. However, BNPL has not been studied to understand the benefits and disadvantages of utilizing it as a credit system. We seek to understand the profile of BNPL users while examining their short-term traits and long-term financial behaviors from the perspective of the Behavior Life-Cycle Hypothesis.

Theory of Planned Behavior

There is an implicit assumption in the Theory of Planned Behavior that individuals have control over their actions and decisions. Tamara and Agustina (2024) conducted research on Shopee, PayLater (a BNPL service popular in Indonesia), and Gen Z (ages 18-26) users. They examined the impact of financial literacy and self-control, using education level as a mediator on financial management behaviors, as measured by consumption patterns, cash flow management, savings and investment behaviors, and credit management. Using the Shopee PayLater Malang Facebook group and other social media outlets such as WhatsApp, X (formerly Twitter), and Instagram, they administered questionnaires to interact with Gen Z consumers in their element. They conclude that the financial management behaviors (budgeting, investing, saving) of BNPL users are positively affected by financial literacy, self-control, and education level. When consumers have a higher level of financial literacy, they can better understand how various financial products work and how to use them responsibly. With a higher level of financial literacy, users also understand the need to save for tomorrow, allowing them to exert self-control to avoid consuming all their income today.

In their paper, Powell et al. (2023) explore BNPL usage in Australia and find that when the terms and conditions are reviewed and understood by BNPL users, it positively impacts financial well-being, which requires a moderate-to-

high level of financial literacy. Corroborating the research by Tamara and Agustina (2024), Powell et al. (2024) also found that budgeting for purchases and lower impulse buying positively impact financial well-being, as did lower compulsive buying. A surprising finding was that using a debit card instead of a credit card for BNPL purchases did not significantly impact financial well-being.

The opposite of planned behavior is impulsive buying. Susanto et al. (2024) demonstrated that BNPL, particularly when coupled with hedonic motivation, significantly increased impulsive purchases among Gen Z Shopee users. Collectively, these studies suggest that BNPL products amplify the risks of poor self-control, especially when combined with low financial literacy (Wang et al., 2022; Susanto et al., 2024). These findings provide support for the risks of overextending that BNPL products can have on users with low financial literacy, low self-control, and impulse control.

Literature Review
Life-Cycle Hypothesis
The life-cycle hypothesis is a foundational theory that has influenced many other theories seeking to explain human behavior. An article by Papich (2022) explores how BNPL affects financial well-being through the lens of consumption smoothing. Papich suggests that many Americans do not have access to credit, which begs the question of whether increased access to credit (through BNPL financing) would cause them to overextend themselves financially by taking on more debt than they can repay. Papich suggests that increases in credit access should smooth consumption for a fully rational person, but many may overextend themselves by acquiring more debt than they can repay. Using event study data, Papich tests whether different groups acted the same way before BNPL became available as they do after BNPL availability. Contrary to much of the literature on the subject, Papich concludes that BNPL access did reduce financial distress (total past due, number of current delinquencies, and total public records), measured in young people under the age of 40. Additionally, when the demographic groups were analyzed, the results concluded that no group's financial stress increased due to BNPL access. Finally, the results show an increase in credit score (average of 1.6 points) when consumers had access to BNPL. Papich (2022) suggests that the ability to smooth consumption is likely the reason for the reduction in financial stress (Papich, 2022).

BNPL, when properly utilized, should be able to help an individual smooth their consumption; however, when consumers "refinance" their interest-free BNPL loan by making payments with their credit card, their financial well-being may be negatively impacted. Guttman-Kenney et al. (2023) look at the prevalence of BNPL use on credit cards in the United Kingdom (U.K.), using credit card transactions from multiple banks and credit card issuers. They find that, in the U.K., 19.5% of active credit cards in December 2021 had at least one transaction from a BNPL lender. In addition, it is estimated that 26% of U.K. users use a credit card for their BNPL purchases. This is estimated to be 22% in the U.S., Guttman-Kenney et al. (2023), and is reported to be 10% according to data from the Federal Reserve Bank of New York (Aidala et al., 2023). A staggering 47.7% of the BNPL transactions made on credit are by consumers between 18-39 years old, and the trend of using credit for BNPL purchases increased 21.4 times from January 2019 to December 2021. These findings are worrisome as those 18-39 are earlier in their life cycle and are more vulnerable than those older. As the BNPL users in this age group attempt to smooth their consumption across time periods, they are less likely to pay their credit card balance in full each month than the older groups, thereby incurring interest. While regulators have yet to create any policy prohibiting such practices, Capital One has blocked BNPL purchases from being used on its credit cards (Kaye, 2020).

Behavioral Life Cycle Hypothesis
  Self-Control
Self-control is an element of the Behavioral Life-Cycle Hypothesis, and we deem it an important mechanism in moderating the use of BNPL short-term credit offerings. Self-control issues can be seen in the difficulty of delaying gratification and acting in the present in a way that does not align with a person's long-term goals. Due to the lack of BNPL providers reporting to the credit bureaus, BNPL may be viewed as a threat to consumers lacking in self-control, as they may resort to loan stacking or overextending themselves by taking out more loans than their monthly income can support. The Federal Reserve Bank of Kansas City published a report in 2021 citing a poll on BNPL users that found that 45% of respondents said that they use BNPL to purchase items that would not fit in their budget (Backman, 2021; Alcazar & Bradford, 2021).

The CFPB's 2022 Making Ends Meet survey found that BNPL users are disproportionately Black or Hispanic, female, and under the age of 35, with household incomes between $20,000-$50,000. Further, BNPL users are more likely than non-users to carry high debt burdens, leave credit card balances unpaid, have past-due bills, rely on costly credit alternatives, maintain lower credit scores, and exhibit higher credit utilization (Brennan, 2017; Shupe et al., 2023). The Federal Reserve Bank of Philadelphia reported that most BNPL use is motivated by convenience and cost rather than lack of access to credit (Doubinko & Akana, 2023).

Experimental evidence confirms these behavioral risks. Ackert et al. (2024) compared debt preferences under opaque BNPL and credit card terms. Participants were presented with several purchase scenarios and simplified disclosures for BNPL (four equal payments with a 20% late fee) and credit cards (24.99% interest). Results showed that participants were significantly more likely to purchase using BNPL (48.10%) compared to credit cards (38.46%) and particularly inclined to finance vacations with BNPL (p < 0.001).

Earlier research on credit card behavior reinforces this dynamic. Gross and Souleses (2002) found that debt rises immediately when credit limits increase. Meier and Sprenger (2010) reported that time-inconsistent individuals are 15% more likely to hold credit card debt, with balances 25% higher than time-consistent peers. Tanaka and Murooka (2012) further demonstrated that debt is more sensitive to decreases in interest rates than to increases. Taken together, these findings highlight how BNPL products exploit vulnerabilities in self-control, leaving consumers at risk of overextension and financial strain.

Mental Accounting
Mental accounting is a way of exercising self-control (Heath & Soll, 1996; Shefrin & Thaler, 1988; Thaler, 1985, 1999; Soman & Cheema, 2002). When mental accounting is applied to credit decisions, Swacha-Lech and Solarz (2019) present findings from Ranyard et al. (2006) that total cost is the most important factor in determining repayment plans. This may explain why the average balance of BNPL loans in 2021 was only $135 (CFPB, 2022) and why loan stacking and overextension may threaten the naïve BNPL consumer, especially given the 'low and grow' strategy that BNPL lenders employ.

Soman and Cheema (2002) conducted a study in which they tested students' propensity to spend by manipulating the amount of credit available based on a person's credibility (earnings potential), as assigned by a "rigorous scientific process." The participants in the high credibility group ($5,000) had a greater propensity to spend than those in the low credibility group ($2,000). In another study by Soman and Cheema (2002), the authors included students as well as participants between the ages of 36-70 and had similar findings; the less experienced students with high credibility and a higher credit limit exhibited a higher propensity to spend, while the older, more experienced participants had less propensity to consume when their credit limit was high. When consumers have increased their BNPL credit limit, they may mentally account for it as a reflection of their earnings outlook, encouraging them to spend more than they can afford today.

In a working paper on BNPL's user characteristics and effects on spending, the authors mention a "liquidity flypaper effect" where additional retail liquidity through BNPL "sticks where it hits" (Di Maggio et al., 2022, p. 1). Through their analysis, the authors found that total consumer spending increases by approximately $130 the first time a consumer uses BNPL, and this level remains elevated over the following 24 weeks. Mental accounting can play a role in tracking costs and benefits. Siemens (2007) conducted research on the satisfaction, perceived fairness, and behavioral intentions of various transactions where there is a delay in consumption and payment. Conducted before the inception of BNPL, the study does nonetheless simulate a BNPL scenario using real money by having participants watch a video and complete a 30-minute survey. Upon watching the video, participants were paid $5 and then had to complete the survey. Participants were assigned in groups that completed the survey immediately, with no delay, while the others had a three-day delay, a one-week delay, or a two-week delay. The study revealed that when there were delay conditions present, the participants were less satisfied, less likely to repeat the exercise, and viewed the transaction less fairly than the participants without delay; all the levels decreased as the time delay increased. The research finds that the benefit is more psychologically salient when the transaction cost and benefit are coupled.

In a Federal Reserve Bank of Philadelphia survey, Akana (2022) found that only 68.5% of BNPL users are satisfied or very satisfied compared to 81.1% of credit card users. Additionally, when asked about the likelihood of using the payment method in the future, 53.2% said they would use BNPL again, compared to 82.7% of credit card users

(Akana, 2022). Through the lens of mental accounting, these results are not surprising considering Siemens' research on separating the cost and benefit in the transaction. A credit card balance is a lumping together of all purchases during a period where the consumer makes one payment, while BNPL loans can differ, and a consumer can have three additional payments for a single good or service.

Hypothesis

The Consumer Financial Protection Bureau (2015) has defined financial well-being as:
"A state of being wherein you have control over day-to-day and month-to-month finances, have the capacity to absorb a financial shock, are on track to meet your financial goals, and have the financial freedom to make the choices that allow you to enjoy life" (CFPB, 2015, p. 5).

We have outlined many risks associated with BNPL loans. Nevertheless, BNPL, when used responsibly, is generally the least expensive method compared to credit cards or even layaway (Alcazar & Bradford, 2021).

We therefore present the following hypotheses:

Financial Attitude
H1: Having $400 emergency cash is negatively associated with Buy Now, Pay Later utilization.
H2: Having $1,000 or more is negatively associated with using the Buy Now, Pay Later service.
H3: Household spending more than income is positively associated with using Buy Now, Pay Later utilization.

Financial Behaviors
H4: Households with savings and investments over $50,000 are negatively associated with the Buy Now, Pay Later usage.
H5: Households on track for retirement savings are negatively associated with Buy Now, Pay Later usage.
H6: Having a savings behavior is negatively associated with Buy Now, Pay Later utilization.
H7: Having insurance plans is negatively associated with the use of Buy Now, Pay Later.
H8: Delayed purchases due to increased prices are negatively associated with the use of Buy Now, Pay Later.

Method
Data and Sample
The study used the Survey of Household Economics and Decision-making (SHED) dataset for 2023 from the Federal Reserve Board. The dataset is nationally representative of United States households. The total population of the survey was 11,400 respondents. The study focused on households that had utilized the Buy Now, Pay Later (BNPL) payment to make purchases in the previous year. Respondents who responded "Yes" to patronizing BNPL were 1,455 of the survey population. In examining the financial attitudes and financial behaviors of BNPL users, the sample size was reduced to 9,965 respondents due to 1,839 missing responses in the household savings category. The study sought to understand the short-term financial attitudes and the long-term behavior that informs the household's use of BNPL. The BNPL users comprised 11.03% males and 14.5% females, totaling 628 and 827, respectively. Females utilized BNPL more compared to males. Those with less than a high school education were found to be the heaviest users of BNPL. On marital status, the separated, 23%, and single,16% individuals used BNPL more than other groups. Respondents with household incomes between $25,000 and $49,000 were the highest BNPL users at 16% compared to those with a household income of $150,000 and more, who only account for 8%. Black and Hispanic households had higher instances of BNPL usage at 20% compared to other races. Respondents between 18-24 years represented the highest BNPL consumers at 19% compared to other age groups. Finally, unemployed BNPL users were the highest at 15% compared to working professionals.

Dependent Variable
The dependent variable, Buy Now, Pay Later (BNPL), is a new form of credit that allows users to pay for goods or services at a merchant outlet or using a mobile app. The Consumer Financial Protection Bureau (2023) refers to BNPL as an exclusively zero-interest, pay-in-four (or fewer) installment loan that facilitates purchases at the point of sale. The dependent variable question specifically asked, "In the past year, have you used a 'Buy Now, Pay Later' service to buy something? Households that responded "yes" were coded as 1, and those that responded "no" were coded as 0. The total sample of households that patronized BNPL was 1,455.

Independent Variables

The independent variables were classified into three categories: financial attitude, financial behavior, and demographic variables. The variable coding and sample proportions are reported in Table 1.

Financial attitude focuses on short-term aspects determining a household's propensity to utilize BNPL. The financial attitude variables use responses from four questions on how they handle short-term financial needs and spending, while examining the ability to handle emergency situations, and having at least one banking mechanism. These questions inquire about the household's ability to have $400 cash in their accounts for emergencies, their spending capacity of living below/within their means, if they held a checking, savings, or money market account, the savings instruments as an account, and/or a certificate of deposit or money market account. The access to $400 to handle an emergency, the presence of a checking, savings, or money market account, and having a savings or asset account, such as a certificate of deposit, are all binary variables measuring the household's financial attitude. The household total spending is categorically coded, ranging from those who consume less than their income to those who exceed their income.

Financial behavior focuses on long-term aspects that examine behavioral aspects that aid or deter the use of BNPL. The household's ability to handle emergencies was measured using the amount they could handle without strain and the amount of their savings and investments as categorical variables. The household's ability to be on track with their retirement savings plan, having a retirement account such as a 401(K), through an employer, IRA, or Roth IRA, having a cash value in a life insurance policy, and their ability to delay their purchases due to an increase in prices are binary variables. The delayed purchases variable is used as a moderator of self-control, as discussed in the Behavioral Life-Cycle Hypothesis in the literature review.

Several demographic variables were used as explanatory variables to examine the profile of BNPL users. These include education, age, ethnicity, gender, employment status, household income, and marital status. The employment status includes respondents who work full-time, part-time, or are unemployed. The marital status ranged from married to separated, divorced, or never married. The household income ranged from less than $10,000 to $150,000 and more.

Multivariate Analysis

The results from the study using a nationally representative dataset provide further insight into the characteristics of individuals who patronize BNPL. The increase in payment options allows consumers to acquire products and services they typically would only be able to afford to pay for in full. The study sample size was 11,400; however, the probit regression used 6,369. The initial part of the analysis was to determine the short-term financial attitude and financial behavior of respondents who used BNPL for purchases. Compared to households that spend less than their income, those that spend the same and those that spend more are highly likely to use BNPL by 2 and 5 percentage points, respectively. Compared to those who can handle an emergency under $100, those who can pay between $1,000 and $1,999 and $2,000 and more are less likely to use BNPL by 7 and 9 percentage points. Compared to those with household savings and investments under $50,000, households with household savings between $50,000 and $99,999 and $100,000 and $249,999, respectively, are less likely to use BNPL by 4 percentage points. Households with savings and investments above $250,000 were insignificant compared to households with less than $50,000, and they are all unlikely to use BNPL. The "not sure" category is for households that did not indicate their household savings and investment category; they are, however, highly unlikely to use BNPL by 4 percentage points. The retirement savings being on track, possession of cash value insurance, and having investment assets were insignificant amongst those likely to use BNPL. Households that did not delay their purchase due to the increase in prices were highly likely to use BNPL by 4 percentage points.

The analysis indicates that age, ethnicity, gender, employment status, household income, and marital status are all significantly related to the likelihood of using BNPL for purchases. Compared to the respondents aged 18-24, those aged 25-34 are more likely to utilize BNPL by 4 percentage points. Compared to the White respondents, Blacks and Hispanics are more likely to purchase using BNPL with 8 and 7 percentage points, respectively. At the same time, there were no significant differences between the respondents identifying as other races/ethnicities and the White respondents. Compared to respondents with less than a high school education, respondents with a high school diploma, some college education, and those with a bachelor's degree and higher are less likely to use BNPL. Compared to male respondents, females are highly likely to purchase using BNPL by 3 percentage points.

Compared to respondents who are employed full-time, those not employed are highly likely to patronize BNPL by 6 percentage points; those employed part-time were not significantly different compared to those employed full-time.

Compared to those with a household income of less than $10,000, those between $25,000 and $49,999 are highly likely to use BNPL purchases by 5%. Respondents earning between $50,000 and $74,999 and between $75,000 and $99,000 are highly likely to use BNPL by 6 and 8 percentage points, respectively. Respondents earning between $100,000 and $150,000 and above $150,000 are highly likely to patronize BNPL by 6 and 8 percentage points, respectively. Compared to the married households, separated households are highly likely to use BNPL by 9%; the widowed, divorced, and never married were insignificant compared to the married respondents.

Discussion

BNPL is a relatively new financial offering with limited research into its usage and financial implications. When used responsibly, BNPL could effectively mitigate the high interest rates that credit cards charge when users float a balance. Conversely, due to the lack of credit reporting and easy access to financial capital, BNPL could be detrimental to a user's financial health. We sought to gain a better understanding of the profile of the typical BNPL user by exploring their financial attitudes and behaviors to determine whether BNPL usage is a prudent financial practice utilized by the financially savvy or a predatory practice where users with lower financial literacy were targeted by Fintech firms offering BNPL.

Table 1 Binary probit results: Purchases using BNPL, 2023 SHED

Variable	Respondents (n=1,455)			
	Coeff	S.E.	p-value	AME*
Constant	-2.102	0.174	<0.000	-
Emergency Cash $400 (money in the account)	-0.005	0.046	0.908	-0.001
Household Total Spending (Less than Income)				
The same as income	0.118	0.051	0.021	0.024
More than income	0.219	0.058	<0.000	0.046
Emergency Handling Amount (Under $100)				
$100 to $499	-0.045	0.068	0.513	-0.011
$500 to $999	-0.059	0.079	0.459	-0.015
$1,000 to $1,999	-0.284	0.086	<0.001	-0.065
$2,000 or more	-0.434	0.080	<0.000	-0.092
Household Savings & Investments (Under $50,000)				
$50,000 - $99,999	-0.185	0.068	0.007	-0.038
$100,000 - $249,999	-0.188	0.072	0.009	-0.039
$250,000 - $499,999	-0.126	0.092	0.172	-0.027
$500,000 - $999,999	-0.199	0.109	0.068	-0.041
$1,000,000 or more	-0.191	0.126	0.128	-0.039
Not sure	-0.207	0.099	0.036	-0.042
Retirement Savings Plan-On Track	-0.050	0.053	0.343	0.008
Saving Behavior	0.040	0.055	0.463	0.008
Insurance planning	-0.037	0.052	0.479	-0.008
Inflation Delayed Major Purchase	0.166	0.037	<0.000	0.037
Education (Less than High School)				
High School	-0.066	0.092	0.473	-0.014
Some college	-0.021	0.094	0.822	-0.005
College and more	-0.134	0.099	0.176	-0.028
Age (18-24)				

25-34	0.213	0.090	0.018	0.044
35-44	0.101	0.094	0.284	0.020
45-54	0.106	0.099	0.287	0.021
55-64	-0.005	0.102	0.959	-0.001
65-74	0.035	0.141	0.804	0.007
75+	0.177	0.290	0.542	0.036
Ethnicity (White)				
Black	0.375	0.062	<0.000	0.084
Hispanic	0.321	0.056	<0.000	0.070
Others	0.100	0.075	0.180	0.020
Gender (Male)				
Female	0.145	0.043	<0.001	0.030
Employment (Working full-time)				
Working part-time	0.139	0.078	0.074	0.024
Not employed	0.303	0.067	<0.000	0.058
Household Income (Less than $10,000)				
$10,000 to $24,999	0.218	0.132	0.099	0.035
$25,000 to $49,999	0.308	0.123	<0.012	0.052
$50,000 to $74,999	0.335	0.126	0.008	0.057
$75,000 to $99,999	0.443	0.130	<0.001	0.080
$100,000 to $149,999	0.369	0.131	0.005	0.064
$150,000 or more	0.424	0.135	0.002	0.076
Marital Status (Married)				
Widowed	0.015	0.174	0.929	0.003
Divorced	0.039	0.073	0.590	0.008
Separated	0.382	0.136	<0.005	0.092
Never married	0.020	0.054	0.715	0.004
Log-likelihood	-2376.46			
Pseudo R-squared	0.088			

Source: Unweighted regression of respondents who purchased using BNPL in the 2023 Survey of Household Economics Decision-making. The reference groups are identified in parentheses. *AME Average Marginal Effects. The total sample size is 6,359.

Our demographic results of the typical BNPL user being Black or Hispanic females aged 25-34 who are unemployed and are separated but not divorced. Surprisingly, regarding individuals making less than $10,000, the analysis found that those who make between $25,000 and $99,000 have a higher likelihood of using BNPL purchases. These findings are consistent with findings conducted by others. For example, Akana (2022) of the Federal Reserve Bank of Philadelphia found that BNPL users are more likely to earn less than $75,000 annually, be under the age of 36, and be non-white than credit, debit, and P2P users. However, our findings differ from those of Akana, who found that BNPL users were most likely to report employment. By analyzing the responses to the Making Ends Meet survey conducted by the CFPB, Schupe et al. (2023) found that "Black, Hispanic, and female consumers and those with household incomes between $20,000-$50,000 were significantly more likely to borrow using BNPL compared to white, non-Hispanic and male consumers, or those with household incomes below $20,000" (p.2). Regarding education level, Schupe et al. (2023) find that those with a high school diploma or less were less likely than those with a bachelor's degree to utilize BNPL, which is consistent with the research presented in this paper.

H1: Having $400 emergency cash is negatively associated with using Buy Now, Pay Later payment.

This hypothesis is not supported (p-value=0.908). However, the AME (-0.001) indicates that with an increase in emergency cash, the users are less likely to patronize BNPL. Powell et al. (2023) proposed a similar hypothesis in their research, postulating that planning and budgeting for purchases by BNPL users positively impacted a person's financial well-being. Their results were also supported, with two-thirds of survey respondents believing that planning for BNPL purchases was very important. Powell et al. (2023) also found that the respondents used different ways of budgeting. Some used more formal methods (46.4%), such as pen and paper, spreadsheets, or apps, while others (43.1%) used the less formal approach of mental accounting. The Federal Reserve of Kansas City conducted a poll in March 2021 and found that 45% of people who used BNPL did so because they could not otherwise afford the item in their budget. (Backman, 2021, as cited in Alcazar & Bradford, 2021). We suggest that having a separate emergency fund ties into the theories of the Behavioral Life-Cycle Hypothesis under Self-Control, Mental Accounting, and the Theory of Planned Behavior. When someone has the wherewithal to save and earmark funds for an emergency, it takes diligence and self-control to stay committed to the goal and not spend the funds haphazardly while building and once in place. The act of saving for such a goal implies that the saver is planning for unknown events that have not occurred.

H2: Having $1,000 or more is negatively associated with using the Buy Now, Pay Later payment method.
For the second hypothesis, it was assumed that when a person has greater than $1,000, the need to rely on BNPL would be negative. Our findings support this hypothesis. When respondents had between $1,000 and $1,999, there was a negative association with BNPL usage (AME=-.065; p-value=0.001). Additionally, when respondents had between $2,000 and $4,000, the negative association with BNPL usage is (AME=-.092; p-value=0.000). This is consistent with research conducted by the Federal Reserve Bank of New York, where they also found that BNPL users were more "financially fragile," as measured by the average likelihood of coming up with $2,000 when an emergency arose (Aidala et al., 2023). Aidala et al. (2023) also found that BNPL users (42%) were less likely to use savings when experiencing an unexpected financial burden compared to non-BNPL users (68%).

H3: Households spending more than their income is positively associated with using Buy Now, Pay Later payment.
This hypothesis is supported. Household spending more than income is positively associated with using BNPL when spending is the same as income (AME=0.024; p-value=0.021) and when household spending is more than income (AME=0.046; p-value=0.000). These findings were not surprising. According to the Life-Cycle Hypothesis, consumers make trade-offs between consumption today and tomorrow. Like using credit cards, BNPL is a new way to accomplish the same objective: to spend more today, hoping that one's income will be greater tomorrow, and one can maintain a similar standard of living across different periods. The danger of using products such as BNPL is overextending oneself and having difficulty repaying the balance in the future. Papich (2022) explored whether BNPL positively or negatively impacted the user's financial well-being. In support of the Life-Cycle Hypothesis, Papich concluded that BNPL access reduced financial distress, which was measured by the amount past due, number of delinquencies, and number of total public records, in users under age 40. Baek and Hong (2004) asked whether households whose spending is greater than their income would be more likely to have debt than those whose spending is less than or equal to their income. While this research predates the availability of BNPL, the authors believe that the findings are still applicable today, as BNPL is just one more outlet where households can smooth their consumption across different periods. Baek and Hong (2004) found that households that spent more than their income were more likely to have credit card debt than those that spent at or below their income.

H4: Households with savings and investments over $50,000 are negatively associated with the Buy Now, Pay Later payment.
This hypothesis is not supported. All p-values were insignificant at the 95% confidence interval, and all AMEs were negative. A potential reason for this hypothesis's lack of statistical support may be due to mental accounting. Because people place different values on different buckets of money, having a savings and investment bucket over $50,000 may be accounted for in the long term, but a person may still use BNPL products to fund their short-term or mid-term buckets, especially if the person struggles with exerting self-control in the present. In our review of the existing literature on BNPL, Swacha-Lech and Solarz (2019) discuss mental accounting vs. credit decisions. Citing Ranyard et al. (2006), they highlight, "The total cost is more important for repayment plan decisions since consumers often represent specific credit plans in terms of total mental accounts and recurrent budget period accounts are used to evaluate monthly repayments and anticipate future goals and hazards" (Swacha-Lech & Solarz, 2019, p. 8). Perhaps the decision to use BNPL boils down to how the bi-weekly payments fit within a person's actual or mental budget and are not contingent upon a person's net worth.

H5: Households on track for retirement savings are negatively associated with using Buy Now, Pay Later payments.
This hypothesis is not supported. The p-value was insignificant at the 95% confidence interval. Given the novelty of BNPL in the marketplace, the literature on the topic of the long-term financial well-being of BNPL users is not robust. However, given the profile of the most prolific user of BNPL as a person who is more likely to have various forms of debt, have a revolving balance on their credit card, have delinquent debts, and use pawnshops, payday lenders, or overdraft their accounts (Shupe et al., 2023), the authors encourage further research in the domain of the long-term financial health of BNPL users.

H6: Having savings behavior is negatively associated with using Buy Now, Pay Later payments.
This hypothesis is not supported. The p-value was insignificant at the 95% confidence interval. In a similar vein to hypothesis 4, the authors suggest that mental accounting may be responsible for the lack of statistical significance of the negative relationship between savings behavior and the usage of BNPL. There appears to be a gap in the literature examining the savings behaviors of BNPL users.

H7: Having insurance plans is negatively associated with using Buy Now, Pay Later payments.
This hypothesis is not supported. The p-value was insignificant at the 95% confidence interval, and the AME was negative. In reviewing the existing literature on BNPL usage, the authors did not encounter this question, which could be an opportunity for further research. It is surmised that a person who carries insurance, a judicious product where holders do not always reap a monetary benefit, would exhibit higher self-control tendencies and perform mental accounting acts.

H8: Delayed purchases due to increased prices are negatively associated with using the Buy Now, Pay Later payment.
This hypothesis is supported and is significant (AME= 0.037; p-value=0.000). When viewed through the lens of the theory of planned behavior, this finding is expected. The theory of planned behavior assumes that people make conscious decisions about their purchases and are not impulsive. In an article, Powell et al. (2023) cite the finding of Bellini et al. (2017), where, when there is a higher level of pre-shopping preparation, such as comparing prices, there tend to be lower levels of impulsive buying. Observing the increase in price and making the conscious choice to delay the purchase until later so that the purchaser can either save more money or wait for the price to fall indicates planned behavior and self-control.

Limitations and Recommendations for Future Research
The 2023 SHED dataset had no financial literacy questions. Hence, the study utilized inflation literacy as a measure to establish awareness of price escalation and self-control. The dataset limitation on financial literacy and education of respondents could support the financial attitudes and behaviors. The BNPL purchase responses were limited to payments in 2022; the survey did not capture the frequency or their status. Hence, this study is limited to those who paid using BNPL in 2022. More research is necessary to substantiate the prudence of using BNPL for financially savvy households. Behavioral analysis using psychometric assessments in decision-making may enhance understanding of human response to incentivized purchases. Depending on the reference groups, the discussion may differ if a different group is selected in the analysis.

Conclusion
The impact of our findings suggests to the authors that BNPL is a predatory financial product that targets the financially vulnerable or fragile. With the overwhelming growth of BNPL over the past 5 years, 970 percent, according to Shupe et al. (2023), this paper serves as a call to action for regulatory bodies in the United States to do something to protect the nation's most vulnerable. We propose that one of the most effective short-term changes that could be implemented in the BNPL marketplace is to require the reporting of BNPL user activity to the major credit bureaus to limit the risk of user overextension and loan stacking, which can severely negatively impact an individual's financial well-being. We also suggest following Capital One's example and blocking the ability to use a credit card for BNPL purchases.

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