

Effectiveness of Personal Finance Education at the High School Level

School District of Palm Beach County / FAU Center for Economic Education

I. Motivation

In the fall of 2023, the state of Florida implemented a high school graduation requirement mandating a one-semester course in personal finance for incoming students. This study seeks to evaluate the effects of this financial literacy mandate. Existing research on personal finance education highlights various outcomes associated with coursework, with the most fundamental being an improvement in students' knowledge of personal finance concepts and the functioning of financial systems. While knowledge acquisition is a critical foundation, the ultimate goal of personal finance education is to encourage changes in financial behaviors and attitudes, allowing students to make informed financial decisions.

A key aspect of this study will be examining the persistence of these impacts over time. Specifically, it will assess both short-term effects (observed during the semester) and medium-term effects (up to one semester following course completion) on students' financial behaviors. By addressing these dimensions, the research aims to provide insights into the effectiveness and continued influence of financial literacy education in shaping students' financial decision-making and behaviors.

II. Questions upon which this study will focus.

1. Do personal finance courses lead to increases in student knowledge and to changes in financial behaviors and attitudes compared to a control group?
2. Does it matter if the control group is an economics class or another non-economics class?
3. What is the relationship between increases in student financial knowledge and changes in financial behavior?
4. Are there differences in outcomes between the social-studies-based financial literacy course, the CTE-based financial literacy course, and the math-based financial literacy course?
5. Are there differences in outcomes if the student takes the course in ninth grade versus twelfth grade?

III. Process and Timeline

Fall 2024	Development of proposal, instruments
Spring 2025	Trial runs on surveys, tests
Summer 2025	Revision of final instruments
Beginning Fall 2025	Pretest, questionnaires on short-run behavior and attitudes

End Fall 2025	Posttest, questionnaires in short-run behavior and attitudes
End Spring 2026	Questionnaire on medium-run behavior and attitudes
Summer 2026	Analysis of data
Fall 2027	Initial Results

IV. Data Collection

Student Surveys and Tests:

- Pre-survey and test: Administered prior to the start of the financial literacy course to assess baseline knowledge, behaviors, and attitudes.
- Post-survey and test: Administered at the end of the course to measure changes in financial literacy knowledge, behaviors, and attitudes.
- Details:
 - The survey focuses on financial behaviors and attitudes.
 - The test includes approximately 25 questions aligned with the required benchmarks for financial literacy content.
 - Rough drafts of the questionnaires and tests are attached.

Teacher Survey:

- Captures information on instructional practices, including time spent on various financial literacy topics.
- Collects teacher background data, such as certification status and professional experience.

In-School Follow-Up Survey:

- Conducted at the end of the semester following the completion of the financial literacy course.
- Designed to assess medium-term changes in financial behaviors and attitudes and determine if students have applied the knowledge gained during the course.

District Administrative and Transcript Data:

- Includes demographic information, coursework records, and test scores, as outlined in the appendix.
- Serves as a complementary data source for understanding student outcomes in the context of broader academic and demographic variables.

V. Samples

The composition of the sample will depend on the scheduled classes. Target classes would be:

- Full year personal financial literacy and economics courses that introduce financial literacy in the first semester. 30 sections (15 teachers), 30 students each, 900 students.
- Full year math and financial literacy courses that introduce financial literacy in the first semester. 10 sections (5 teachers), 30 students each, 300 students.
- Full year personal financial literacy course offered in CTE areas. 5 sections (5 teachers), 30 students each, 150 students.
- Ninth-grade one-semester personal financial literacy courses that preferably have attached courses in spring semester so surveys can be given easily to students at the end of the next semester. 10 sections (5 teachers), 30 students each, 300 students.
- Economics course without financial literacy taught in the 12th grade as a control. 10 sections (five teachers), 30 students each, 300 students.
- Other one-year social studies courses at the 12th grade level as a control. 10 sections (five teachers), 30 students each, 300 students.

VI. Analysis

Once data collection is complete, the following strategies will be employed to address the research questions:

- Knowledge Gains:
 - The effectiveness of the personal financial literacy course in improving knowledge will be assessed by comparing pretest and posttest scores between treatment and control groups.
 - The control group may include students enrolled in economics courses, as these courses may impart relevant knowledge that influences financial literacy outcomes. This comparison will provide valuable insights into the relative impact of personal finance and economics curricula.
- Behavioral Changes:
 - Behavioral changes will be examined by analyzing pre- and post-survey responses from students in the treatment and control groups.
 - To assess the persistence of these changes, the survey will be administered again later in the school year. This follow-up will help determine whether behavioral modifications observed during the course endure over time or fade after its completion.
- Course and Grade-Level Comparisons:
 - Differences in outcomes across various course formats (e.g., standalone personal finance vs. integrated approaches) and grade levels (e.g., 9th vs. 12th grade) will be analyzed by comparing test and survey results.
 - These comparisons will help identify which course structures and grade levels are most effective in achieving the desired knowledge and behavioral outcomes.

VII. Budget Considerations

Incentives for:

50 teachers (varying levels of participation)

2,250 students

Stipends for:

FAU Center for Economic Education / William Bosshardt

VII. Conclusions and Anticipated Contributions

Knowledge Gains:

While an increase in financial knowledge is an anticipated outcome, this study will focus on quantifying the magnitude of that increase. Particular attention will be given to identifying correlations between knowledge gains and specific student or class characteristics, providing valuable insights into the factors that influence learning outcomes.

Comparison with Economics Courses:

This study will explore how personal financial literacy courses compare to traditional economics courses in preparing students for financial decision-making. Economics often takes a theoretical approach, while personal financial literacy emphasizes practical application. Comparing these approaches will offer insights into the relative effectiveness of applied versus theoretical methodologies in financial education.

Behavioral Changes:

The primary objective of financial literacy education is to effect behavior change. This study will measure behavioral changes at two points: immediately after course completion and at the end of the following semester. Although the observation period is relatively short, this dual measurement will help determine whether initial gains persist or diminish over time, contributing to a deeper understanding of the lasting impact of financial literacy education.

Course Delivery and Implementation:

Identifying the most effective grade levels and instructional styles for delivering financial literacy courses is critical to optimizing their implementation. By examining these factors, the study will provide actionable recommendations for schools and districts to enhance curriculum design and delivery, ensuring the greatest possible impact on student outcomes.

Appendix A: District administrative / archival data

General Data Requirements:

Student Demographic Information:

- Gender
- Ethnicity
- Age
- Country of birth
- Native language

High School Transcript information for students:

Coursework information

- District Number, Where Credit Earned - as is
- School Number, Where Credit Earned - as is
- School Year - Course Taken - as is
- Term - as is
- Course Number - as is
- Course, State Subject Area Requirements - turn into series of 0/1 variables
- Course Flag - turn into series of 0/1 variables
- Credit Attempted, Course - as is
- Credit Earned, Course - as is
- Course Grade - turned into numerical value for GPA calculations, regressions
- Online Course - turn into 0/1 variable

Summary Information for Student

- Year - as is
- School Number, Current Enrollment - as is
- Survey Period Code - as is
- Gender - turn into 0/1
- Grade Level - as is
- Native Language, Student - turn into categorical variable with fewer alternatives (combining less frequent categories)
- Primary Language Spoken In Home - turn into categorical variable with fewer alternatives
- Country of Birth - turn into categorical variable with fewer alternatives
- Birthdate - turn into two variables, year and month of birth
- Lunch Status - turn into 0/1
- Graduation Option - - turn into categorical variable, turn into 0/1 graduated variable

- Residence County - as is
- Ethnicity - turn into categorical variable with fewer alternatives (also given below)
- Race: American Indian or Alaska Native
- Race: Asian
- Race: Black or African American
- Race: Native Hawaiian or Other Pacific Islander
- Race: White
- Date Entered United States School - turn into two variables, year and month
- Florida Education Identifier – turned into code
- Migrant residency date
- Scores on end of course assessments
 - Algebra 1 and Geometry
 - Grade 7 & 8 Mathematics
 - ELA Grade 10 Reading and Writing
- Community service hours

School Information:

- School Name
- School Number