

When Knowledge Isn't Enough: Financial Literacy, Social Media Advertising, and Impulse Buying in Adolescents and Emerging Adults

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ABSTRACT

Social media now plays a significant role in shaping how adolescents and young adults discover and buy products, often encouraging impulse purchases. At the same time, schools across the United States are placing greater emphasis on financial literacy to help students make responsible spending decisions. This study investigates the relationship between financial literacy, financial confidence, and impulse buying behavior among adolescents and emerging adults, with a specific focus on the influence of social media advertising. This research uses an anonymous online survey completed by 76 participants aged 13 to 24. The survey measured objective financial literacy, self-reported financial confidence, exposure to social media advertisements, and self-reported impulse-buying behavior using both self-reported questions and hypothetical purchasing scenarios. The results show that although financial literacy and financial confidence increase with age, impulse buying and purchases influenced by social media also increase, especially among participants aged 18–24. Higher financial literacy did not lead to lower impulse buying, and financial confidence did not consistently predict responsible spending behavior. These findings suggest that financial knowledge alone may not be enough to reduce impulsive spending in digital environments.

Keywords: Financial Literacy; Social Media Advertising; Impulse Buying; Consumer Behavior; Adolescence

INTRODUCTION

Social media refers to online platforms that enable users to create, share, and interact with content. These platforms also use algorithms to personalize content, shaping how users consume information and engage with others. Social media (e.g., TikTok, Instagram, and YouTube) has become one of the most prevalent channels

for advertising to Generation Z. Over the past decade, platforms have experienced rapid growth in global reach and influence, fundamentally changing how products are marketed to younger audiences. Industries, including food, fashion, and beauty, increasingly rely on short-form video content on social media to promote and sell their products in visually engaging and emotionally resonant ways. In addition, companies frequently partner with social media influencers, individuals with significant and dedicated followings, to promote products through brand trips, before-and-after content, and curated lifestyle portrayals. These strategies are designed to make advertised products appear relatable, aspirational, and seamlessly integrated into everyday life, thereby

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increasing their persuasive impact.

As social media advertising becomes increasingly prevalent, it is crucial that Gen Z becomes more aware of how they spend their money and where it goes. Financial literacy enables people to think critically about how and why they spend, especially in their younger years. Attention span may play a role in this issue, as ambiguous advertisements on social media platforms have condensed their promotions into 5-60-second videos, making it increasingly difficult to determine whether a product is a good purchase (1).

At the same time, efforts to promote financial literacy have gained momentum within school systems across the United States. In Colorado, for example, Governor Jared Polis signed House Bill 25-1192 into law, making completion of a financial literacy course a graduation requirement for high school students. Financial literacy is widely regarded as a foundational life skill, essential for managing money, making informed spending decisions, and developing responsible saving habits. Broader efforts to improve youth financial education are also underway at the national level. The Young Americans Financial Literacy Act, supported by organizations such as the Young Americans Center for Education, aims to enhance financial literacy among individuals aged 8 to 24 by funding evidence-based educational programs through the Consumer Financial Protection Bureau (CFPB). These initiatives emphasize budgeting, investing, student loans, and partnerships between educational and financial institutions (2).

Despite the growing emphasis on financial education at a young age, impulse buying remains widespread, particularly among adolescents and young adults. High rates of impulse buying can contribute to debt accumulation, poor budgeting habits, and long-term financial stress, raising questions about whether current levels of financial literacy are adequate to support responsible spending (3). Based on existing research, higher financial literacy is expected to be associated with reduced impulse buying and more responsible financial decision-making.

The objective of this study is to examine the relationship between financial literacy and impulse buying behavior among adolescents and young adults. This research aims to assess levels of financial literacy, analyze the influence of social media advertisements on impulse buying, and investigate whether higher levels of financial literacy is associated with reduced impulse buying. The central hypothesis was that higher levels of financial literacy would be associated with

reduced susceptibility to impulse buying, and that this relationship may vary across age groups and purchasing contexts.

LITERATURE REVIEW

Financial literacy is widely regarded as a crucial life skill that enables individuals to make informed financial decisions. Lusardi and Mitchell (4) define financial literacy as the ability to understand basic financial concepts such as interest, inflation, and risk. Their research shows that individuals with higher financial literacy tend to manage money more effectively, save more, and plan better for the future. However, the authors also acknowledge that financial knowledge does not always lead to better financial behavior, suggesting that other factors influence how people make spending decisions.

Research focused on adolescents and young adults yields similar findings. Lusardi et al. (5) report that many young people lack strong financial knowledge, particularly regarding complex financial topics. While financial literacy generally increases with age and experience, the study suggests that knowledge alone may not fully prepare young people to make informed decisions about real-world financial matters, especially as they gain greater independence.

Several studies highlight a gap between financial knowledge and actual behavior. Fernandes, et al. (6) examine the effects of financial education and find that while education increases financial knowledge, it has only a small and temporary impact on financial behavior. Over time, the effects of financial education often fade. Similarly, Allgood et al. (7) show that people's confidence in their financial knowledge often influences behavior more than their actual understanding. This overconfidence can lead to impulsive or risky decisions, particularly among younger individuals who may feel capable before developing the strong self-control skills necessary for responsible decision-making.

Research on impulse buying further explains why financial literacy alone may be insufficient to reduce unplanned spending. Rook (8) defines impulse buying as a sudden, emotionally driven urge to purchase with little prior planning. This type of buying is influenced by emotions and environmental cues rather than careful decision-making. Beatty and Ferrell (9) expand on this idea by identifying factors such as exposure to advertising, browsing behavior, and emotional state as key triggers for impulse buying. These studies suggest

that impulse buying is more strongly influenced by context than by financial knowledge.

Developmental research helps explain why impulse buying may increase during adolescence and early adulthood. Arnett (10) describes “emerging adulthood” as a stage of life marked by increased independence, exploration, and experimentation. During this period, individuals gain access to financial resources while still developing their long-term decision-making skills. Steinberg (11) explains that the parts of the brain responsible for reward develop earlier than those responsible for self-control, making young people more likely to act impulsively, especially in stimulating environments.

Although financial literacy, impulse buying, and adolescent development have been widely studied, several important gaps remain. Much of the existing financial literacy research focuses on knowledge levels rather than everyday spending behavior, especially impulsive purchasing. At the same time, impulse buying studies often do not focus specifically on adolescents and young adults, nor do they consider how financial knowledge and confidence may interact with impulsive tendencies. Additionally, many foundational studies were conducted before the rise of social media advertising and do not account for how frequent exposure to short-form, influencer-driven content may affect purchasing decisions. As a result, there is limited research examining whether increased financial literacy actually reduces impulse buying in highly digital environments. This study addresses these gaps by examining financial literacy, financial confidence, and impulse buying behavior simultaneously across different age groups, with a particular focus on the influence of social media advertising on purchasing decisions.

METHODS AND MATERIALS

This study employed a quantitative, correlational research design to examine the relationship between financial literacy and impulse buying behavior among adolescents and young adults. Data were collected using an anonymous online survey designed to assess financial literacy, financial confidence, impulse-buying behavior, and exposure to social media advertising.

The study draws on two survey datasets: Survey 1 included 29 respondents across two adolescent age groups: ages 13–15 ($n = 13$) and ages 16–18 ($n = 16$), while Survey 2 included 47 respondents aged 18–24, yielding 76 total respondents spanning early adolescence through

emerging adulthood. The sample is weighted toward older participants, with a greater proportion drawn from the 18–24 age group. This imbalance may bias the results toward patterns more characteristic of emerging adults and reduce the extent to which the findings generalize to early and mid-adolescent populations.

Participants and Recruitment

Participants were recruited through voluntary participation via an online survey distributed to adolescents and young adults in the United States. The survey was completed anonymously by respondents across a range of age groups, including middle school-aged adolescents, high school students, and emerging adults, representing diverse grade levels and backgrounds. Participation was optional, and no incentives were provided. To protect participant privacy, particularly for minors, no detailed demographic data (e.g., household income, parental education) were collected for respondents under the age of 18. For respondents aged 18–24, additional demographic characteristics were collected to provide contextual insight into the emerging adult subsample. The survey did not collect personally identifying information such as names, exact locations, or contact details. All responses were anonymous, ensuring confidentiality and reducing the likelihood of social desirability or response bias.

Survey Instrument

The survey consisted of five sections designed to capture demographic information, financial literacy, financial confidence, exposure to social media advertising, and impulse buying behavior.

The first section collected demographic information, including age range, gender identity, and monthly income, where applicable. The second section focused on financial decision-making and confidence. Participants were asked to self-report their confidence in making responsible financial decisions, whether they had received prior financial education, and the types of financial decisions they had encountered. The third section examined exposure to social media advertising. Participants responded to frequency- and agreement-based questions about product advertisements encountered on platforms such as TikTok, Instagram, YouTube, and Snapchat (e.g., frequency of exposure to ads in the past 30 days).

The fourth section assessed objective financial literacy through knowledge-based questions. These questions evaluated both basic and intermediate financial competencies, including budgeting, income versus

expenses, saving calculations, interest, credit scores, investment comparisons, and evaluation of long-term financial consequences. Responses were scored as correct or incorrect based on established financial principles. The fifth section assessed impulse buying behavior. Participants were presented with four hypothetical social media advertisements representing different product categories and price points (food, travel, pet-related products, and a low-cost trendy item). Participants indicated whether they would be inclined to purchase each item, allowing for assessment of susceptibility to advertising-driven impulse buying. This design aims to capture participants' real-time reactions to social media advertisements and reveal purchasing patterns that self-report questions alone might miss. Although responses from this section were not used as primary outcome measures, they provided supplementary contextual evidence that helped interpret participants' self-reported financial behaviors. Specifically, these responses offered insight into spending tendencies and complemented the other survey sections questions on impulse buying, such as the reported frequency of unplanned purchases and financial literacy indicators.

Variables

The variable of interest in this study was financial literacy, measured using both self-reported confidence and objective knowledge-based scores. Objective financial literacy was further categorized into basic and intermediate competencies. The dependent variable was impulse buying behavior, measured through self-reported purchasing behavior and responses to hypothetical advertisements. Exposure to social media advertising was examined as an influencing factor. Objective financial literacy was assessed using knowledge-based questions included in the survey. Percentages show the number of correct answers each question received, not an overall literacy score. (Percentages reflect the proportion of respondents selecting the correct answer to each objective question.) Intermediate financial literacy encompasses questions that require abstract reasoning, trade-off evaluation, and assessment of long-term consequences, rather than immediate arithmetic. These items reflect the kinds of financial decisions individuals increasingly face as they gain independence.

The data were first summarized to identify patterns across age groups, including financial literacy, financial confidence, and purchasing behavior. To examine relationships between variables, simple linear regression analyses were conducted. Financial literacy score

and financial confidence were treated as independent variables, while impulse buying behavior was measured using self-reported unplanned purchasing behavior (Q10) and responses to hypothetical purchasing scenarios. Scatterplots with fitted linear regression lines were generated using Desmos (graphing software), and the coefficient of determination (R^2) was used to evaluate the strength of each relationship. Given the relatively small sample size ($n = 76$), the analysis focuses on identifying general patterns and strength of relationships rather than strict statistical significance.

Procedure

Participants completed the survey in a single online session. The survey was administered anonymously and consisted of multiple sections presented in a fixed sequence. Participants first responded to general demographic questions, followed by questions that assessed their financial literacy. The survey then presented questions related to impulse buying behavior and exposure to social media advertising. Data collection occurred over a three-week period. All responses were submitted electronically and stored securely for analysis. No identifying information was collected, and participation was voluntary.

Following data collection, survey responses were analyzed to assess participants' levels of financial literacy and impulse buying tendencies. Objective financial literacy questions were grouped into two tiers based on cognitive and financial complexity.

Basic financial literacy questions (Q11–Q14: 1 point each) assessed concrete, short-term financial skills such as budgeting, income–expense management, saving, and simple interest calculations.

Q11: Budgeting — choosing how to allocate income between expenses and savings

Q12: Saving — calculating how long it takes to reach a savings goal

Q13: Interest — understanding how simple interest affects savings

Q14: Credit card use — understanding repayment and avoiding interest charges

Intermediate financial literacy questions (Q15–Q18: 2 points each) were weighted more heavily to reflect their greater level of difficulty and real-world financial complexity, as they require evaluation of long-term outcomes, risk, and trade-offs rather than straightforward calculations.

Q15: Credit score — understanding how financial behavior affects borrowing ability

Q16: Investment comparison — evaluating risk versus return across options

Q17: Borrowing costs — comparing long-term cost of loans with different interest rates

Q18: Financial trade-offs — choosing between compensation options (e.g., salary vs benefits)

This tiered classification enabled a more nuanced analysis of financial competency across age groups and supported comparison between foundational knowledge and higher-order financial reasoning. Finally, a metric was created to measure the score each person received after answering the financial literacy questions. This metric is simple: for every basic question a person gets correct, they will receive one point, and for intermediate questions, 2 points. The maximum points a person could earn would be 14. Intermediate questions were weighted more heavily to reflect their complexity relative to the basic questions. Individuals did not receive partial credit because it avoids the subjectivity of what is a “partial” understanding.

$$\text{Financial Literacy Score} = (\text{Points Earned} / 14)$$

Ethics Statement

This study was reviewed and determined to be exempt from formal Institutional Review Board oversight because it involved an anonymous, minimal-risk online survey of adolescents and young adults. Participation was voluntary, and all respondents provided informed consent prior to beginning the survey; for participants under 18 years of age, parental consent and youth assent were obtained in accordance with institutional guidelines. No names, contact details, or other directly identifying information were collected, and all responses were recorded and analyzed in de-identified form to protect participant confidentiality.

RESULTS

This section presents the results of the survey analysis examining financial literacy, impulse buying behavior, and the influence of social media advertising across age groups. Results are organized by financial confidence and literacy, social media influence, impulse buying behavior, and demographic differences.

Financial Confidence and Financial Literacy by Age Group

High levels of self-reported financial confidence were reported across all age groups. Among respondents aged

13–15, 69% reported high confidence in making basic financial decisions, compared to 62% among those aged 16–18. Confidence was highest among respondents aged 18–24, with 74% rating their confidence as high (4 or 5 on a 5-point scale). Financial confidence appears high in early adolescence, declines slightly among respondents aged 16–18, and increases again among respondents aged 18–24.

Impulse Buying and Unplanned Purchasing by Age

Responses to Q10 (frequency of unplanned online purchases in the past 30 days) reveal a clear increase in unplanned purchasing behavior with age. Among respondents aged 13–15, 23% reported making two or more unplanned online purchases in the past 30 days. This proportion increased to 31% among respondents aged 16–18 and rose substantially to 59% among respondents aged 18–24. Unplanned purchasing behavior across age groups is summarized in Table 1.

Table 1. Frequency of unplanned purchases across age groups (13–15, 16–18, 18–24), based on responses to Q10. Values represent the percentage of respondents reporting unplanned purchasing behavior.

Age Group	% With 2+ Unplanned Purchases (Q10)
13–15	23%
16–18	31%
18–24	59%

Influence of Social Media Advertising by Age

Responses to Q6 (In the past 30 days, have you bought something because you saw it on social media, including influencer posts or ads?) indicate that purchasing influenced by social media advertising occurs across all age groups. Among respondents aged 13–15, 62% reported purchasing an item as a result of social media advertising within the past 30 days. This proportion decreased to 38% among respondents aged 16–18 but increased again to 66% among respondents aged 18–24. The lower rate of social-media-influenced purchasing among respondents aged 16–18 likely reflects a transitional period combining increased critical awareness with limited financial autonomy. These adolescents may recognize advertising tactics more readily than younger peers but still face constraints including limited discretionary income, restricted

payment access, and parental oversight. In contrast, younger adolescents may be more influenced by novelty and emotional appeal, while emerging adults benefit from increased financial independence and frictionless access to digital purchasing platforms. As a result, late adolescence appears to represent a temporary decline in observable purchasing behavior driven not by reduced exposure to advertising, but by constrained ability to convert interest into purchases (Table 2).

Table 2. Percentage of respondents who reported making purchases influenced by social media advertising (Q6), segmented by age group.

Age Group	% Purchased Due to Social Media
13–15	62%
16–18	38%
18–24	66%

Perceived Effectiveness of Social Media Advertising by Age

Responses to Q8 (On a scale from 1-5, how effective do you think social media advertisements are? 1 being low, 5 being high.) examined how effective respondents perceived social media advertisements to be. Across age groups, perceptions of advertising effectiveness remained relatively consistent. Among respondents aged 13–15, 54% rated social media advertisements as effective or very effective. An identical proportion (54%) was observed among respondents aged 16–18. Among respondents aged 18–24, this proportion increased slightly, with approximately 60% rating social media advertisements as effective or very effective.

Objective Financial Literacy by Age Group

Objective financial literacy results are presented by competency tier (basic and intermediate). Across all age groups, basic financial literacy was consistently high, with average correctness exceeding 90%. Respondents demonstrated strong performance on foundational questions related to budgeting principles, interest calculations, and basic credit card use. High levels of basic financial literacy were observed among respondents in early adolescence, late adolescence, and emerging adulthood.

In contrast, performance on intermediate financial literacy questions varied substantially by age.

Respondents aged 13–15 demonstrated lower accuracy on questions requiring abstract or future-oriented financial reasoning, with an average correctness rate of approximately 48%. Accuracy improved among respondents aged 16–18 (approximately 66%) and was highest among respondents aged 18–24 (approximately 85%). These results indicate a clear age-related progression in intermediate financial literacy (Table 3).

Table 3. Objective financial literacy scores across age groups based on responses to Q11–Q18. Scores reflect correct responses to basic (1 point) and intermediate (2 points) financial literacy questions.

Literacy Tier	Ages 13–15	Ages 16–18	Ages 18–24
Basic (Q11–Q14)	>90%	>90%	>90%
Intermediate (Q15–Q18)	~48%	~66%	~85%

Together, these findings highlight differences in the development of foundational and higher-order financial competencies across age groups.

Comparative Behavioral and Financial Literacy Outcomes by Age Group

To provide an integrated view of financial confidence, financial literacy, and purchasing behavior, a consolidated comparison of key variables across age groups is presented in Table 4.

Table 4. Comparison of financial confidence, financial literacy knowledge, impulse buying behavior, and social media influence across age groups. Values represent the percentage of respondents or average scores for each measure.

Measure (Question)	Ages 13–15	Ages 16–18	Ages 18–24
Financial confidence (Q3)	69%	62%	74%
Purchased due to social media (Q6)	62%	38%	66%
Ads rated effective (Q8)	54%	54%	~60%
2+ unplanned purchases (Q10)	23%	31%	59%
Basic financial literacy (Q11–Q14)	>90%	>90%	>90%
Intermediate financial literacy (Q15–Q18)	~48%	~66%	~85%

This table summarizes age-related patterns across financial confidence, objective financial literacy, and consumer behavior. While financial confidence and basic financial literacy remain consistently high across all age groups, intermediate financial literacy improves substantially with age. At the same time, unplanned purchasing and social media-driven purchasing increase during emerging adulthood. These descriptive results illustrate how financial knowledge, confidence, and purchasing behavior vary across developmental stages.

Advertising Exposure and Purchasing Behavior

To further examine the relationship between social media advertising exposure and purchasing behavior, a frequency-based analysis was conducted (Table 5).

The data indicate a slight increase in purchasing behavior with higher levels of advertising exposure. Participants who reported greater exposure to social media advertisements also reported higher numbers of purchases. The results indicate a very weak relationship between financial literacy and impulse buying in this sample. Notably, even participants with high financial literacy scores reported making purchases when frequently exposed to advertisements.

Gender Differences in Social-Media-Driven Purchasing

Gender differences in social-media-driven purchasing were also examined. Among respondents aged 13–18, 38% of those identifying as she/her reported making purchases influenced by social media, compared to 12% of those identifying as he/him. In emerging adulthood (ages 18–24), this gap narrowed, with 32% of she/her respondents and 19% of he/him respondents reporting social-media-driven purchases.

DISCUSSION

The purpose of this study was to investigate the relationship between financial literacy and impulse buying behavior among adolescents and young adults, with a particular focus on the role of social media advertising in this context. The regression results showed very weak relationships between financial literacy, financial confidence, and impulse buying, meaning these factors explain only a small part of purchasing behavior. The findings still highlight a nuanced, nonlinear relationship between financial knowledge, financial confidence, and consumer behavior that is not well explained by these variables alone. While financial confidence and financial literacy increase with age, impulse buying and social-media-influenced purchases also increase, especially during emerging adulthood. These results suggest that financial knowledge alone may not be enough to reduce impulsive spending, particularly in digital environments where purchasing is fast and easily influenced by social media.

Financial Confidence Does Not Equate to Behavioral Control

One of the most notable findings of this study is the disconnect between financial confidence and behavioral outcomes. A simple linear regression analysis was conducted to examine the relationship between financial confidence and impulse buying behavior. The results indicate a very weak relationship between the two variables ($R^2 = 0.002$), suggesting that financial confidence does not predict purchasing behavior in this sample. Financial confidence was relatively high across all age groups, beginning in early adolescence and

Table 5. Relationship between frequency of social media advertising exposure, financial literacy scores, and unplanned purchasing behavior across age groups. The table compares key variables to illustrate trends between social media influence and consumer behavior.

Frequency	Criteria	# of people who saw the ad	# of people who purchased	% of people who purchased after seeing	People who saw the ad		People who purchased	
					Financial Literacy - Min	Financial Literacy - Max	Financial Literacy - Min	Financial Literacy - Max
1	>=1	1	0	0.00%	42.86%	42.86%	0.00%	0.00%
2	>=1	6	0	0.00%	7.14%	85.71%	0.00%	0.00%
3	>=1	13	0	0.00%	7.14%	86.00%	0.00%	0.00%
4	>=1	30	2	6.67%	21.00%	100.00%	21.00%	71.00%
5	>=1	26	12	46.15%	14.00%	100.00%	14.00%	100.00%

remaining stable through emerging adulthood. However, higher confidence did not correspond to lower levels of impulse buying. In fact, respondents aged 18–24 reported the highest levels of both confidence and unplanned purchasing. This divergence suggests that perceived competence may outpace actual self-regulatory capacity, particularly in environments where purchasing is fast, convenient, and heavily influenced by digital advertising. These findings support the conclusion that confidence in financial decision-making does not necessarily translate into effective behavioral control. The relationship between financial confidence and impulse buying is illustrated in Figure 1.

Social Media Influence Persists Despite Financial Awareness

Susceptibility to social media advertising remains relatively consistent across age groups. Across all age groups, approximately half or more of respondents rated social media advertisements as effective, with little variation between early, late, and emerging adolescence. This consistency suggests that increased age or experience does not substantially diminish perceived

influence from digital marketing.

Behavioral data further supports this pattern. Although respondents aged 16–18 exhibited a temporary reduction in social-media-driven purchasing, susceptibility increased again in emerging adulthood. This resurgence coincides with greater financial autonomy and purchasing access, indicating that contextual factors—such as frequency of exposure, ease of purchase, and the integration of advertising into social platforms—may exert a stronger influence on behavior than financial awareness alone.

As shown in Table 5, higher exposure to social media advertising is associated with increased purchasing behavior, even among participants with high financial literacy. Together, these findings suggest that impulse buying is shaped less by ignorance of marketing tactics and more by the structure of digital environments that normalize and accelerate purchasing decisions. Even when individuals recognize the influence of advertising, repeated exposure and low-friction purchasing mechanisms may continue to drive impulsive consumption.

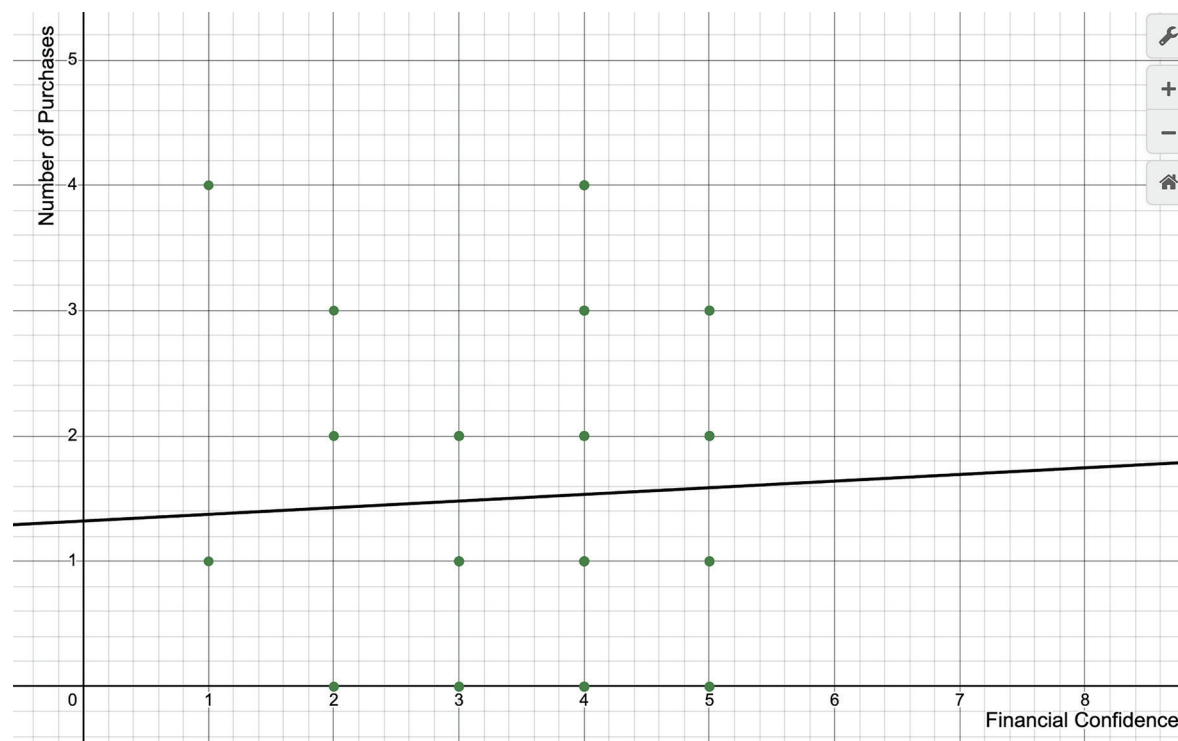


Figure 1. Relationship between financial confidence (Q3) and the unplanned purchasing behavior (Q10). Each point represents an individual response, with a fitted regression line ($R^2 = 0.002$) indicating a weak relationship between the variables.

Financial Literacy Develops in Tiers but Does Not Reduce Impulse Buying

Objective financial literacy results reveal a tiered developmental pattern. Basic financial literacy skills, such as budgeting, income–expense management, and simple interest calculations, were consistently strong across all age groups. In contrast, intermediate financial literacy, which requires abstract reasoning and evaluation of long-term consequences, improved substantially with age. Despite these gains, higher levels of intermediate financial literacy did not correspond to reduced impulse buying or lower susceptibility to social media advertising. This gap suggests that traditional financial education, which emphasizes knowledge acquisition, may not fully address the behavioral challenges of modern digital marketplaces (Table 2).

A simple linear regression analysis was conducted to examine the relationship between financial literacy score and impulse buying behavior. The results show a very weak relationship ($R^2 = 0.049$), meaning financial literacy does not predict unplanned purchasing behavior. For example, some participants with high financial literacy scores still reported making multiple purchases,

while others with lower scores reported fewer or no purchases. This suggests that financial knowledge alone is not enough to reduce impulse buying behavior.

Gender Differences and Developmental Context

Gender-based differences in social-media-driven purchasing were more pronounced during adolescence than in emerging adulthood. Among respondents aged 13–18, 38% of those identifying as she/her reported making purchases influenced by social media, compared to 12% of those identifying as he/him. In emerging adulthood (ages 18–24), this gap narrowed, with 32% of she/her respondents and 19% of he/him respondents reporting social-media-driven purchases. This pattern suggests that gender differences are more pronounced during adolescence but become less distinct as financial independence and access to purchasing increase. These findings support a developmental interpretation of gender differences, emphasizing context and access rather than fixed behavioral traits.

Implications for Financial Education

Together, these findings highlight important

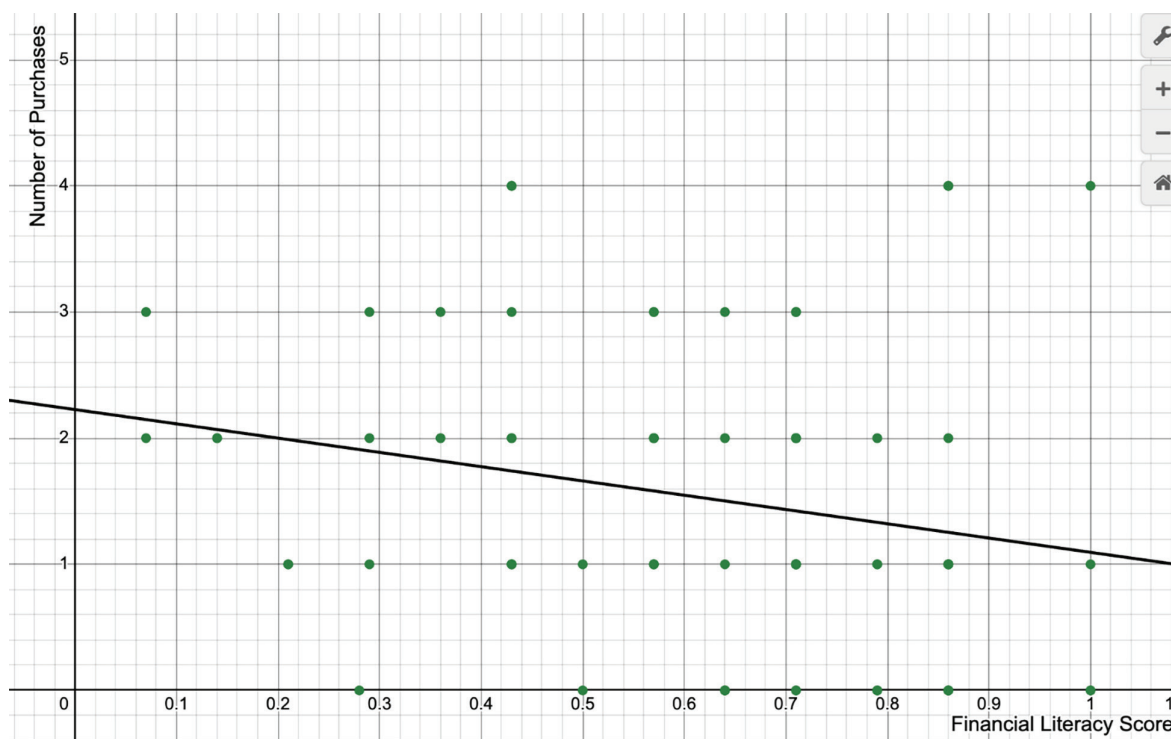


Figure 2. Relationship between financial literacy score and unplanned purchasing behavior (Q10). The regression line illustrates a very weak relationship between the variables.

implications for financial education and policy. While financial literacy initiatives are valuable and effective in building foundational knowledge, they may be insufficient on their own to reduce impulsive spending behavior. Educational interventions may benefit from incorporating behavioral strategies, such as self-regulation techniques, awareness of digital marketing tactics, and friction-based decision-making tools, to better prepare adolescents and young adults for real-world financial environments. Addressing the behavioral dimensions of spending may be particularly critical as individuals transition into financial independence.

Limitations and Future Research

This study has several limitations. The sample size was relatively small ($n = 76$), and the distribution of participants was uneven across age groups, with a larger proportion of respondents aged 18–24. This imbalance may have influenced the results, particularly trends related to impulse buying, and may limit the generalizability of the findings. In addition, participants were recruited through voluntary online survey distribution, which may introduce sampling bias, as individuals who chose to participate may differ from the broader population in meaningful ways.

Additionally, self-reported measures of confidence and purchasing behavior may be subject to response bias. Financial literacy assessment is also complicated by developmental context: a 13-year-old faces fundamentally different financial decisions than a 24-year-old with years of independent financial experience. Different generations will have different definitions and interpretations of basic and intermediate financial literacy. The survey defined a basic financial decision as something that can be applied to the daily life of both a middle schooler and a college student in the first section. Additionally, the survey did not define the exact intermediate and basic questions in the second section, so participants may interpret them differently. Future research should examine these relationships using larger, more diverse samples and longitudinal designs to better understand how financial literacy, confidence, and behavior evolve over time. Further investigation into intervention-based approaches may also help identify strategies that effectively bridge the gap between financial knowledge and financial behavior.

CONCLUSION

This study examined the relationship between financial literacy, financial confidence, and impulse

buying behavior among adolescents and young adults, with a focus on the role of social media. While financial knowledge and confidence tend to increase with age, the findings indicate that these factors are not strongly associated with reduced impulse buying.

These results suggest that financial education may need to extend beyond knowledge-based instruction to better address behavioral decision making. In digital environments where purchasing is immediate and influenced by social media, individuals may benefit from developing greater awareness of external influences and stronger self-regulation skills. Incorporating these elements into financial education may help support more intentional financial behavior.

Future research should further examine how behavioral approaches and digital contexts influence financial decision making. Expanding the sample size and diversity of participants would also strengthen the generalizability of these findings.

CONFLICT OF INTEREST

The author declares that there are no conflicts of interest related to this work

REFERENCES

1. Hilman E. This is your brain on social media: How social media use is changing our attention spans. Available from: https://www.researchgate.net/publication/385214649_This_is_Your_Brain_on_Social_Media_How_Social_Media_Use_is_Changing_our_Attention_Spans (accessed 2026-03-05).
2. United States Congress. Young Americans Financial Literacy Act. H.R. 3483, 117th Congress; 2021-2022. Available from: <https://www.congress.gov/bill/117th-congress/house-bill/3483> (accessed 2026-03-05).
3. Alemis MC, Yap K. The role of negative urgency, impulsivity and financial management practices in compulsive buying. *Aust J Psychol.* 2013; 65 (4): 224-231. <https://doi.org/10.1111/ajpy.12025>
4. Lusardi A, Mitchell OS. The economic importance of financial literacy: Theory and evidence. *J Econ Lit.* 2014; 52 (1): 5-44. <https://doi.org/10.1257/jel.52.1.5>
5. Lusardi A, Mitchell OS, Curto V. Financial literacy among the young. *J Consum Aff.* 2010; 44 (2): 358-380. <https://doi.org/10.1111/j.1745-6606.2010.01173.x>
6. Fernandes D, Lynch JG, Netemeyer RG. Financial literacy, financial education, and downstream financial behaviors. *Manage Sci.* 2014; 60 (8): 1861-1883. <https://doi.org/10.1287/mnsc.2013.1849>

7. Allgood S, Walstad WB. The effects of perceived and actual financial literacy on financial behaviors. *Econ Inq.* 2016; 54 (1): 675-697. <https://doi.org/10.1111/ecin.12255>
8. Rook DW. The buying impulse. *J Consum Res.* 1987; 14 (2): 189-199. <https://doi.org/10.1086/209105>
9. Beatty SE, Ferrell ME. Impulse buying: Modeling its precursors. *J Retailing.* 1998; 74 (2): 169-191. [https://doi.org/10.1016/S0022-4359\(99\)80092-X](https://doi.org/10.1016/S0022-4359(99)80092-X)
10. Arnett JJ. Emerging adulthood: A theory of development from the late teens through the twenties. *Am Psychol.* 2000; 55 (5): 469-480. <https://doi.org/10.1037/0003-066X.55.5.469>
11. Steinberg L. A social neuroscience perspective on adolescent risk-taking. *Dev Rev.* 2008; 28 (1): 78-106. <https://doi.org/10.1016/j.dr.2007.08.002>