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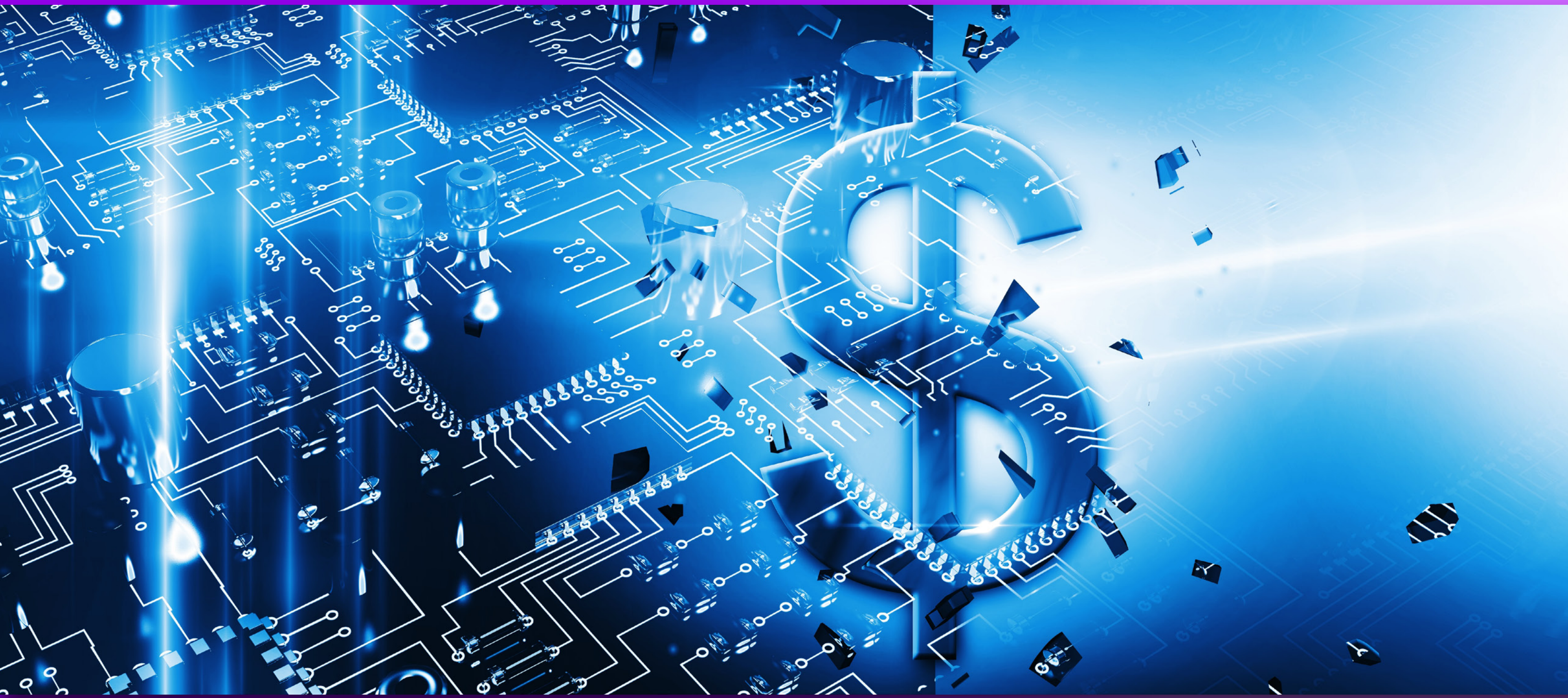

Financial Literacy in a Digital Age

Highlights of a Forum

Convened by the Comptroller General of the United States

November 2024

GAO-25-107168

GAO Highlights

Highlights of GAO-25-107168, a summary of a GAO forum

November 2024

HIGHLIGHTS OF A FORUM

Financial Literacy in a Digital Age

Why GAO Convened This Forum

Americans face various challenges in achieving and maintaining financial security, especially as digital products and information become more prevalent. The growth of these digital financial services, such as peer-to-peer payment methods, has significantly affected consumers' financial choices, opportunities, and risks. These developments also underscore the need for digital financial literacy—that is, the knowledge, skills, and abilities to safely use digitally delivered products and services to make informed financial decisions.

On June 12, 2024, GAO convened a group of experts and stakeholders for a forum on how consumers' financial literacy has been affected by the increased digital offering of products, services, and education. The participants discussed

- opportunities and risks of digital financial services,
- key skills for navigating the digital financial landscape, and
- digital delivery of financial literacy education.

Participants were selected to represent a range of experience and viewpoints. Participants included 15 experts and stakeholders from the private sector, federal government agencies, nonprofit organizations, and academic institutions. Participants reviewed a draft of this summary. Their comments were incorporated as appropriate. Views expressed during the proceedings do not necessarily represent the opinions of all participants, their affiliated organizations, or GAO.

View GAO-25-107168. For more information, contact Alicia Puente Cackley, (202) 512-8678 or cackleya@gao.gov, or Tranchau (Kris) T. Nguyen, (202) 512-7215 or nguyentt@gao.gov.

What Participants Said

Digital technology presents opportunities for greater access and customization of financial education and products for consumers but may pose risks as well. Participants highlighted the following themes during the forum:

- **Digital products can generally increase access to financial services**. Low-income and minority consumers that may have different cultural norms around finances and banking may benefit from the increased flexibility offered by digital products and services. Participants also noted that digital investment platforms tend to attract younger consumers, who see new opportunities for wealth-building previously seen as out of reach. However, limited access to broadband may hinder accessibility for some consumers.
- **Digital products and services offer consumers improved experiences but also pose risks**. These products and services enable personalized support, such as through advisers powered by artificial intelligence, to inform decision-making specific to a consumer's financial situation. However, the ease and convenience of digital transactions can lead to risky behavior, such as investment in crypto assets. Additionally, participants said consumers face increased risks of fraud and scams, including phishing and unauthorized sharing of personal information.
- **Consumers face challenges navigating the digital financial landscape**. Consumers need both technical skills and traditional financial knowledge to make informed decisions about digital financial services—for example, to detect biased marketing and to avoid scams. Reliable financial information, such as information offered through government sources, is available online but is often underused. Participants noted that many financial technology (fintech) companies offering digital products and services are lightly regulated and consumer protections are limited.
- **Digital technology expands options for financial education**. It allows for more cost-effective and scalable financial education initiatives using digital channels. Digital technology also creates opportunities for just-in-time education personalized for the consumer. Digital platforms offer diverse formats, such as podcasts and infographics, and can include game-like features like achievement badges, all of which can enhance engagement with educational materials. However, the quality of digital financial education sources can vary, participants noted, ranging from social media influencers to trusted government resources. Traditional schools, a trusted source for education, can also help build financial literacy and related skills.
- **More research is needed**. Participants agreed that to understand the effects of digital products on consumers, further evaluation of their use and outcomes is essential. However, researchers can face challenges collecting and analyzing data controlled by private companies. Data-sharing agreements between researchers and service providers can mitigate these challenges. Partnerships between the public and private sectors that allow for data sharing and monitoring could also improve efforts to evaluate products.

Contents

Abbreviations

FDIC	Federal Deposit Insurance Corporation
FINRA	Financial Industry Regulatory Authority
fintech	financial technology

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Introduction

Americans face an array of challenges in achieving financial security, particularly with the growing digitization of financial products and services. This shift has significantly affected consumers' financial choices, offering both opportunities and challenges. It also underscores the importance of digital financial literacy—that is, the knowledge, skills, and abilities to safely use digitally delivered products and services to make informed financial decisions.

Digital financial services like online banks, personal investment applications, and peer-to-peer payment methods may provide benefits for consumers and broader access to services.[1] However, while these services offer great promise, assessment of their actual effects is limited. In addition, these services may pose risks to individuals' financial well-being and complicate an already complex financial environment. Technology has expanded financial education's reach, but questions remain regarding when it should be delivered and how consumers can determine its reliability.

GAO reports and testimonies have examined federal financial literacy programs and financial technology (commonly known as fintech). Our recent work includes reports on financial literacy programs for older adults and people with disabilities, the benefits and risks of fintech products to underserved consumers, and cost disclosures for colleges and 401(k)s.[2] GAO also has facilitated knowledge transfers among key financial literacy

[1]Peer-to-peer payment platforms allow consumers to send money from an online bank account or mobile application without needing to write a check or exchange cash. Examples include PayPal, Venmo, and Cash App.

[2]GAO, *Financial Literacy: Better Outcome Reporting Could Facilitate Oversight of Programs for Older Adults and People with Disabilities*, GAO-24-106381 (Washington, D.C.: Apr. 24, 2024); *Financial Technology: Products Have Benefits and Risks to Underserved Consumers, and Regulatory Clarity Is Needed*, GAO-23-105536 (Washington, D.C.: Mar. 8, 2023); *Financial Aid Offers: Action Needed to Improve Information on College Costs and Student Aid*, GAO-23-104708 (Washington, D.C.: Nov. 1, 2022); and *401(k) Retirement Plans: Many Participants Do Not Understand Fee Information, but DOL Could Take Additional Steps to Help Them*, GAO-21-357 (Washington, D.C.: July 27, 2021).

players through prior Comptroller General forums in 2004, 2011, and 2015.[3]

On June 12, 2024, GAO convened a group of 15 financial literacy experts and stakeholders for a forum focused on how consumers' financial literacy has been affected by the increased digital offering of products, services, and education. The participants, selected to represent a range of experience and viewpoints, included representatives from the private sector, federal government agencies, academic institutions, and other organizations. The day-long forum was organized around three main topical sessions related to digital financial services and digital financial literacy. The three sessions of the forum addressed

- opportunities and risks of digital financial services,
- key skills for navigating the digital financial landscape, and
- digital delivery of financial literacy education.

The participants completed the day by identifying what they believed were the key themes generated by the forum.

The following is a summary of the discussion among the forum's participants. The summary aims to capture the ideas and themes that emerged from the collective discussion of the participants. Comments expressed during the proceedings do not necessarily represent the views of all participants, the organizations with which they are affiliated, or GAO. The forum was structured as a guided roundtable discussion where participants were encouraged to openly comment on issues and respond to one another, although not all participants commented on all topics. Participants were given the opportunity to comment on a draft of this summary.

We conducted our work from November 2023 to November 2024 in accordance with all sections of GAO's Quality Assurance Framework that are relevant to our objectives. The framework requires that we plan and perform the engagement to obtain sufficient and appropriate evidence to meet our stated objectives and to discuss any limitations in our work. We

[3]GAO, *Highlights of a Forum: Financial Literacy: The Role of the Workplace*, GAO-15-639SP (Washington, D.C.: July 7, 2015); *Highlights of a Forum: Financial Literacy: Strengthening Partnerships in Challenging Times*, GAO-12-299SP (Washington, D.C.: Feb. 9, 2012); and *Highlights of a GAO Forum: The Federal Government's Role in Improving Financial Literacy*, GAO-05-93SP (Washington, D.C.: Nov. 15, 2004).

believe that the information and data obtained, and the analysis conducted, provide a reasonable basis for any findings and conclusions in this product.

Appendix I provides the forum agenda, and appendix II provides a list of the participants. Appendix III is a description of our scope and methodology. For additional work on this topic, see a bibliography of reports and studies mostly provided or mentioned by participants during the discussion, and a separate list of some related GAO products.

This report is available on our website at www.gao.gov. For additional information on our work related to financial literacy, please contact Alicia Puente Cackley, Director, Financial Markets and Community Investment, at (202) 512-8678 or cackleya@gao.gov, or Tranchau (Kris) T. Nguyen, Director, Education, Workforce, and Income Security, at (202) 512-7215 or nguyentt@gao.gov. Key contributors to this report included Michael Collins, Kaitlan Doying, Daniel Horowitz, Kay Kuhlman, Dan Luo, Marc Molino, Evan Nemoff, Rhonda Rose, Jennifer Schwartz, Norma-Jean Simon, and Walter Vance.

I wish to thank all of the participants for their thoughtful contributions to our discussion of financial literacy in a digital age. The discussion enhanced our understanding and provided valuable suggestions for ways to make progress on this important issue.

Gene L. Dodaro
Comptroller General of the United States

November 13, 2024

Financial Literacy: Highlights of the Forum Discussion

Digital Products Can Generally Increase Access to Financial Services

Forum participants highlighted several ways that digital financial services increase access for consumers, including underserved groups, but identified limited access to broadband and industry overreliance on technology as key challenges facing some consumers.

- **Digital products may expand access to financial services.** Participants generally agreed that digital financial services increase access for consumers and that their usage is on the rise. They described increased access to banking, credit, payment, and investing options, as well as additional opportunities for financial advice. For example, one participant noted that most American consumers are now enrolled in online banking. Another participant said the growing use of peer-to-peer payment services and earned wage access suggested increased access to financial services for consumers.[4]
- **Low-income and minority consumers may benefit from digital financial services.** Participants noted an increase in the use of digital services among low-income and minority consumers. One participant suggested that these groups are increasingly using banking services provided by nonbank fintech companies rather than traditional banks. Another participant indicated that access to services from mobile devices is important for these consumers, who may not have access to computers. Other participants noted that some minority communities may have different cultural norms around finances and banking and may benefit from the flexibilities offered by digital financial services. For instance, one participant said immigrant families may be more likely to live in multigenerational households where one person uses online banking to manage finances for the whole family. Some participants said digital financial advice and

[4]Earned wage access is a product offered by fintech companies or through fintech-bank partnerships that provide consumers with access to wages that have been earned but not yet paid. There are two primary business models: employer-sponsored and direct-to-consumer. In July 2024, the Consumer Financial Protection Bureau released a proposed rule explaining that earned wage products are consumer loans subject to the Truth in Lending Act. The proposed rule aims to ensure that lenders disclose the costs and fees of earned wage products. For more information, see GAO-23-105536. Truth in Lending (Regulation Z); Consumer Credit Offered to Borrowers in Advance of Expected Receipt of Compensation for Work, 89 Fed. Reg. 61358 (July 31, 2024).

investment services provide opportunities for consumers with lower levels of wealth to access services that traditionally have higher costs.

- **Digital investment platforms attract younger consumers.** Several participants said digital investment platforms and services increase access to the market for young and low-income investors. One participant noted the surge of new investors entering the market during the COVID-19 pandemic, primarily driven by younger investors accessing the market through digital channels. According to the participant, this growth was fueled by the emergence of new opportunities for wealth-building previously perceived as inaccessible.
- **Limited broadband access may hinder accessibility of digital products.** Several participants highlighted limited access to broadband and other technology as a significant challenge to the accessibility of digital financial products. This "digital divide" separates consumers based on access to digital services and technology, disproportionately affecting those most in need of financial services and education. One participant noted that rural consumers are more likely to live in areas lacking access to reliable high-speed internet, making it difficult for them to access digital financial tools. However, two participants noted that consumers with limited broadband may be able to access digital financial services using mobile devices.
- **Digital services may leave some consumers behind.** Several participants said consumers may suffer from the financial industry's heavy reliance on technology in place of human interaction. Some consumers are more comfortable with in-person support for complex financial matters and are distrustful of digital advice. Other consumers may lack the necessary technical skills, equipment, or knowledge to use digital tools effectively. For example, they may lack access to a scanner or be unsure how to use their mobile phone for certain tasks. Participants also warned that digital products and services may be developed without considering the needs of smaller market segments, such as people with disabilities or non-English speakers. However, one participant noted that some providers are making efforts to reach these consumers.

Digital Products and Services Offer Consumers Improved Experiences but Also Pose Risks

Participants broadly agreed that digital financial services can offer improved and more personalized experiences for consumers. However, ease of use can also create risks.

- **Digital financial services can be tailored to improve consumer experience.** By leveraging consumer data, providers can offer personalized products and services that cater to individuals' needs and preferences.[5] For example, one participant noted that providers can adjust bill-payment schedules to align with consumers' income schedules. Another participant noted that providers can use consumers' information to guide them toward more beneficial products and services depending on their circumstances.

- **Digital tools can support consumers' financial decisions.** For example, participants noted that tools that use conversational or generative artificial intelligence can help consumers navigate complex financial questions. One participant discussed how such tools have helped families complete the college financial aid application process. Another participant discussed the potential benefits of robo-advisers in improving the allocation of consumers' investment portfolios.[6] This participant also said financial management tools can support consumers in building positive behavioral changes to encourage better decision-making. However, this participant also noted that artificial intelligence recommendations could expose some consumers to unsuitable advice.
- **Frictionless transactions can pose risks to consumers.** Several participants noted that digital products and services offer seamless transactions, making financial activities easier and more accessible. However, this convenience can also lead to risky consumer behavior. For example, two participants noted that investors may be more likely to invest in volatile assets like crypto assets due to a digital application's ease of use.[7] Another participant said digital applications can encourage frequent trading, which may harm retail investors. Two participants discussed a correlation between risky investing and gambling, particularly among Generation Z investors because they

[5]In this report, we use the term "provider" broadly to refer to any entity that offers digital financial products or services or financial education. These entities may be public, private, or nonprofit. In some cases, a provider may offer a combination of products, services, and education.

[6]Robo-advisers are automated digital investment advisory programs that create and manage investment portfolios for consumers. Robo-advisers typically base their portfolio recommendations on information provided by consumers through online questionnaires. Specific investment strategies and services provided can vary widely by robo-adviser.

[7]A crypto asset is a private-sector digital instrument that primarily depends on cryptography and distributed ledger technology or similar technology. Ledgers are "distributed" because multiple participants in a computer network share and synchronize copies of the ledger. We have previously reported that crypto assets pose a number of significant risks to consumers, including those related to volatility, market stability, intermediaries, fraud, and illicit activity. GAO, *Blockchain in Finance: Legislative and Regulatory Actions Are Needed to Ensure Comprehensive Oversight of Crypto Assets*, GAO-23-105346 (Washington, D.C.: June 22, 2023).

tend to be financial risk-takers.[8] Two participants discussed how buy-now-pay-later arrangements can encourage consumers to overspend due to the ease of consumption facilitated by digital platforms.

- **Digital technology increases risk of financial fraud and scams.** Participants said consumers of digital financial services face increased risks of fraud and scams, including phishing, unauthorized sharing of personal information, and unauthorized transactions. Digital technologies can enable some of these risks, as fraud groups can use social media, darknet forums, and encrypted messaging apps in their activities. Many consumers do not adequately protect themselves from these risks by changing their online passwords or verifying a provider's legitimacy before making a purchase. One participant noted that a substantial number of consumers fall victim to these risks. Another participant said victims do not always know how to find support once they have fallen victim to a scam.

Consumers Face Challenges Navigating the Digital Financial Landscape

Forum participants identified several challenges consumers face in navigating the digital financial landscape, including the need for diverse skills, the difficulty of discerning trustworthy information, and limited consumer protections.

- **Digital financial literacy requires both technical skills and traditional financial literacy.** Participants said digital financial literacy requires a combination of technical proficiency and traditional financial knowledge, enabling consumers to navigate online financial tasks effectively. One participant said that digital financial literacy is similar to traditional financial literacy and requires similar knowledge, but that the digital landscape is faster paced, provides more choices, and allows consumers to make mistakes more quickly. One participant said consumers need fundamental technical skills, such as the ability to use email and perform basic tasks online, to help them in using digital financial apps.
- **Digital product information may not be trustworthy.** Participants warned that digital product information can be misleading and that consumers may fall victim to deceptive marketing tactics that promote unsuitable products. One participant said companies' profit motive creates an inherent conflict of interest between providers and their customers. Another participant mentioned that there are many unscrupulous providers of financial products online. For example,

[8]These participants agreed that more research is needed to determine if this correlation between risky investing and gambling is causal.

predatory lenders may offer loans with very high annual percentage rates, ranging from 300 to 700 percent, but reveal the rate in small print where consumers are less likely to see it.

- **Reliable financial information is available online but is often underused.** One participant said government agencies and some nonprofits are more likely to provide reliable and objective financial information online because they have no profit motive, but that this information is often overlooked. Other participants noted that these entities have difficulty competing with private companies' marketing efforts. They also said funding and resource constraints hinder the development of informational materials that are as engaging as those of the private sector. Two participants also said the wealth of free information offered by government agencies is often underused because consumers and other providers are unaware of its existence or because it is not among the first results in internet searches.
- **Digital services are often lightly regulated, and consumer protections are limited.** According to two participants, many fintech companies that offer digital services are largely unregulated, which may leave consumers assuming too much risk and responsibility with few consumer protections.[9] Six participants generally agreed that consumers should verify the trustworthiness of online sources but noted that assessing online information can be challenging. Further, one participant noted that consumers may be confused about the protections offered by existing regulation—for example, consumers may be unclear about the extent to which federal deposit insurance applies to online accounts managed by third-party nonbank

[9]Some fintech companies are subject to oversight by state and federal financial regulators. These companies must comply with a range of laws designed to protect consumers and ensure the safe and sound operations of financial institutions. For example, fintech companies that directly provided certain financial services to consumers and small businesses must secure state-based licenses and are subject to state regulator examinations, among other requirements.

companies, including fintech companies.[10] In addition, one participant said regulators struggle to keep pace with the constantly evolving digital financial services market. This participant noted that the lengthy approval process for regulatory changes as part of the notice-and-comment rulemaking process makes it difficult for government agencies to be timely and responsive to changes in the market.

Digital Technology Expands Options for Financial Education

Forum participants discussed several ways that digital technology has enhanced financial education by improving distribution and personalization of and engagement with educational materials. However, the quality of sources offering digital financial education varies, making it challenging for consumers to identify trustworthy sources.[11]

- **Digital technology improves distribution of financial education materials.** Participants highlighted the benefits of digital tools and communication channels, such as AARP's Fraud Watch Network for antifraud messaging, in implementing national financial education strategies. Digital technology offers providers a more cost-effective way to develop and distribute financial education material. Some participants described how education providers can use data to assess the popularity and effectiveness of content, enabling them to scale up financial education interventions and reach a broader audience. Another participant noted that digital channels facilitate asynchronous learning, allowing consumers to learn on their own schedule and interact with material most relevant to their circumstances.
- **Partnerships between organizations offer unique distribution channels for financial education.** One participant cited Capital One's arrangement with Khan Academy to provide free financial

[10]In this type of account, consumers make deposits using a consumer-facing app maintained by a nonbank company or fintech company. These companies may hold these deposits in an account with a partner bank. If a bank is involved, consumers' deposits generally are held in a single custodial account at the partner bank, rather than in an individual account designated for each consumer. Federal Deposit Insurance Corporation (FDIC) insurance applies to funds once they are stored with an FDIC-insured partner bank. However, these custodial accounts may hold funds for thousands of consumers, and partner banks may not readily be able to determine the individual owners of funds if the nonbank provider goes into bankruptcy. In September 2024, FDIC released a proposed rule to strengthen recordkeeping and reconciliation requirements for certain bank accounts that commingle deposits received from third-party nonbank companies that accept deposits on behalf of customers. Recordkeeping for Custodial Accounts, 89 Fed. Reg. 80135 (Oct. 2, 2024).

[11]Public, private, or nonprofit entities may be providers of financial education content.

education online, leveraging Khan Academy's brand appeal to younger consumers familiar with its other tutoring and education content. This arrangement allows Capital One to refer its customers, community partners, and associates to relevant, trusted, on-demand financial education content at key moments, such as when they apply for credit cards. Another participant described a partnership between the Financial Industry Regulatory Authority Inc. (FINRA) Investor Education Foundation and 300 libraries across every state to offer *Thinking Money for Kids*, an interactive learning program.[12] This program combines librarian-led instruction with a digital component accessible via learning tablets that can be borrowed from the library and used without Wi-Fi.

- **Digital technology offers personalized financial education.** Digital technology can allow providers to collect consumers' data through interactive features and embed customized financial education content into the user experience. For example, one participant highlighted how relevant, just-in-time information could be provided to consumers during transactions, such as by linking a consumer to a personalized video after the consumer makes a deposit. This participant noted that tailored financial education could be integrated into various digital financial tools, such as banking apps and investment portals.
- **Digital technology can enhance engagement with educational materials.** One participant noted that digital technology enables the presentation of educational information in diverse formats, making education more engaging and interactive. This participant noted that formats like videos, podcasts, or infographics may be more effective than plain text. Other participants noted that consumers indicate they prefer information in short, easy, and fun snippets, similar to what can be found on TikTok or other social media applications. Participants said incorporating pop culture content or partnering with influencers could expand the reach of financial education. Other participants

[12]FINRA is a not-for-profit self-regulatory organization dedicated to investor protection and market integrity. FINRA regulates the securities industry to protect America's investors by making sure the U.S. broker-dealer industry operates fairly and honestly. All securities broker-dealers doing business with the public in the United States must be registered with FINRA. With approval from the Securities and Exchange Commission, FINRA writes rules to govern these firms and their representatives and examines for and enforces broker-dealer compliance with FINRA rules and federal securities laws. FINRA also provides market surveillance and other regulatory services for equities and options markets. The FINRA Investor Education Foundation is a nonprofit subsidiary of FINRA that aims to provide underserved Americans with the knowledge, skills, and tools to make sound financial decisions throughout life.

highlighted the benefits of incorporating game-like features, such as rewards, achievement badges, and confetti, into digital educational content.

- **Sources of digital financial education vary in quality.** Two participants said the quality of financial education varies, ranging from authoritative sources like government agencies to less reliable sources like Tik Tok influencers. One participant said having diverse resources can provide multiple venues for consumers to gain valuable information and learn from each other's experiences. But participants cautioned that consumers may struggle to identify the best or most trustworthy sources. For example, one participant said newer investors may mistakenly believe they have done adequate research by engaging with social media, rather than consulting authoritative sources. Similarly, another participant said peers and social media are the most influential sources for young consumers. Another participant said online searches can lead consumers to unreliable information. For example, searching topics like credit scores or credit counseling often yields results from debt consolidation or debt management companies, rather than nonprofit organizations or government agencies.
- **Traditional schools can help build financial literacy and related skills.** Two participants generally agreed that teaching financial education should begin as early as possible. One participant said developing critical financial literacy skills should begin in elementary school and continue through high school and beyond. This participant said schools could develop students' financial capability by building executive function, encouraging positive habits, and teaching research and decision-making skills. Another participant said K-12 schools are well positioned to offer financial education because they are already trusted providers. In addition, two participants agreed that financial education should be part of the core curriculum at the college level.

More Research Is Needed

Participants generally agreed that more research is needed to understand the effects of digital financial services and products on consumers. They noted that access to data was a key challenge and offered suggestions for improving measurement and evaluation moving forward.

- **More evaluation of the use and outcomes of digital products is needed.** Participants highlighted the need for additional research into consumers' use of digital financial products and services, stressing the importance of using high-quality data. Several participants said future research should account for differences between consumer groups and improve existing measurements of digital financial literacy. Moreover, participants suggested that effective research should aim to understand the broader effects of digital services on consumers' financial health, rather than focusing exclusively on individual products.

- **Collecting and analyzing data can be challenging.** For example, participants cited the potential for skewed results when using online surveys due to biases toward consumers with digital skills. Additionally, one participant noted that consumer survey respondents may not fully understand the extent of their engagement with digital services, which could affect data collection efforts. Another participant noted that useful data for the analysis of certain products and services are not currently being collected. For example, there are restrictions on lenders' ability to collect consumer information related to race, sex, and other characteristics when making a credit or loan decision. In addition, two participants mentioned that evaluating the effectiveness of some digital services can be challenging. In some cases, services can be beneficial for consumers initially but harmful when overused. Services may also benefit some groups but not others.
- **Access to data from financial institutions and fintech companies would aid research.** Several participants emphasized the need for greater access to data from companies that provide digital products and services to better understand the effects of these services. According to two participants, research partnerships between industry and other stakeholders can facilitate access. However, several participants mentioned challenges to accessing proprietary data controlled by private companies. To address this issue, two participants suggested anonymizing data to alleviate companies' concerns, including about negative findings affecting their business. Another participant highlighted the importance of protecting consumer data privacy when considering expanding access to data.
- **Partnerships among stakeholders can aid research on digital financial services.** Several participants said collaborations between the public and private sectors could facilitate data sharing and increase access for researchers. One participant also said partnerships between researchers and companies could enable randomized trials to test product effects. Two participants called for the creation of regulatory sandboxes for safe stress testing of

products.[13] One participant noted that this would require data sharing between government and private companies to allow for adequate monitoring. Additionally, other participants said establishing public-private dialogues, such as roundtable discussions, could facilitate the sharing of resources and knowledge across sectors.

[13]Regulatory sandboxes can provide businesses with an opportunity to test innovative products without being subject to certain laws or regulation.

Appendix I: Forum Agenda

Financial Literacy in a Digital Age

A Forum Convened by Comptroller General of the United States Gene L. Dodaro

Wednesday, June 12, 2024

Agenda

9:15 – 10:00 am	Registration and continental breakfast
10:00 – 10:30 am	**Opening Session** • Welcome • Opening remarks by Comptroller General Dodaro • Personal introductions • Overview of agenda
10:30 – 12:00 pm	**Session 1: Opportunities and Risks of Digital Financial Services**
12:00 – 1:00 pm	Lunch
1:00 – 2:30 pm	**Session 2: Key Skills for Navigating the Digital Financial Landscape**
2:30 – 2:45 pm	Break
2:45 – 4:15 pm	**Session 3: Digital Delivery of Financial Literacy Education**
4:15 – 4:30 pm	Break
4:30 – 5:00 pm	**Concluding Remarks from Participants**
5:00 pm	GAO Closing Remarks and Adjourn

Appendix II: Forum Participants

External Participants	
Shena Ashley	Vice President, Capital One Community Impact and Investment
Angelena Bradfield	Head of Policy, Financial Technology Association
Amy Marty Conrad	Managing Director, Insights, National Endowment for Financial Education
Angela Fontes	Vice President, Policy and Research, The Financial Health Network
Delicia Reynolds Hand	Senior Director, Digital Marketplace, Consumer Reports
Lyn Haralson	Financial Education Program Analyst, Consumer Financial Protection Bureau
Bianca Isaincu	Policy Analyst, Financial Markets Division, Organization for Economic Co-operation and Development
Priya Madrecki	Communications and Policy Lead, Capital One Insights Center
Tanya McInnis	Deputy Director, Office of Consumer Policy, Department of the Treasury
Nayeli Pelayo	Chief of Staff, Prosperity Now
Leigh Phillips	President and CEO, SaverLife
Louisa Quittman	Community Development Expert, Office of the Comptroller of the Currency
Alberto G. Rossi	Hachigian Professor of Finance, Georgetown University
Gerri Walsh	President, FINRA Investor Education Foundation, Senior Vice President, FINRA
Stephanie R. Yates	Endowed Professor and Chairperson, University of Alabama at Birmingham
GAO Participants	
Cindy Brown Barnes	Managing Director, Education, Workforce, and Income Security
Alicia Puente Cackley	Director, Financial Markets and Community Investment
Gene L. Dodaro	Comptroller General of the United States
Daniel Garcia-Diaz	Managing Director, Financial Markets and Community Investment
Tranchau (Kris) T. Nguyen	Director, Education, Workforce, and Income Security
Walter Vance	Moderator, Assistant Director, Applied Research and Methods

Appendix III: Scope and Methodology

This report summarizes discussions at the GAO forum, Financial Literacy in a Digital Age, which took place on June 12, 2024, at GAO headquarters in Washington, D.C. The following sections describe our process for selecting our topic and participants, the forum proceedings, and our analysis and summary of forum discussions.

Topic Selection

To identify a relevant topic for the forum, we performed an initial background search on key issues related to financial literacy, including identifying recent financial literacy conferences and reviewing prior GAO work and relevant literature. We also reached out to congressional stakeholders with an interest in and knowledge of financial literacy issues. We then held discussions with internal and external stakeholders familiar with the financial literacy field to gather input on potential topics. Using these steps, we identified digital financial literacy as a key topic of interest. We limited the scope of the forum to focus primarily on the adult, working-age population. Prior to the forum, we prepared and distributed a package of reading materials to invited participants. The package featured the planned agenda and a brief, descriptive overview of the selected topics.

Participant Selection

The 15 selected participants represented a range of professional backgrounds, including federal government agencies, nonprofit organizations, private-sector service providers, academic institutions, and an international organization. To identify participants, we began by reviewing past GAO work—including prior financial literacy forums—on financial education, digital financial technology, and other related topics. We then surveyed recent literature and professional conferences and symposia focused on digital financial literacy to identify experts and stakeholders. We also consulted internal and external stakeholders to solicit recommendations of individuals and organizations with relevant expertise and experience.

Using these steps, we identified an initial list of potential forum participants, and we judgmentally selected potential participants for interviews. During these interviews, we discussed potential participants' professional backgrounds and their familiarity with our selected topic.

We judgmentally selected the final group of 15 participants from the experts and stakeholders we interviewed using the criteria below and considering their availability. We selected participants to represent a mix of the following:

- general professional backgrounds, including participants from the public, private, nonprofit, and academic sectors and including at least one participant with an international background; and
- relevant experience with different elements of digital financial literacy and digital financial technologies, including product development, financial education, evaluation of digital financial literacy, and the regulation of digital financial technologies.

Our final group of participants included three academics/researchers, three federal agency representatives, three private-sector representatives, five nonprofit representatives, and one international organization representative. While perspectives shared in a forum of this type may potentially reflect participants' underlying interests, we worked to mitigate this concern by (1) structuring the forum to ensure that a range of viewpoints and perspectives were included, (2) performing a systematic analysis of the information generated from the discussions, and (3) asking all participants to refrain from promoting specific products or services. In addition, the meeting was organized around high-level discussion topics (for example, opportunities and risks, navigation of the financial landscape, and financial literacy education) and was not focused on any specific proprietary technology or commercial application. See appendix II for a list of the forum participants.

Comptroller General Forum

The forum was a 1-day event consisting of three 90-minute sessions and one final 30-minute closing session. In addition to the Comptroller General of the United States, three GAO officials participated in at least one session as a moderator or subject-matter expert. The forum was structured as a guided roundtable discussion where participants were encouraged to openly comment on issues and respond to one another, but not all participants commented on all topics. GAO contracted with a professional court reporting service to ensure we accurately captured a transcript of the forum proceedings.

The first session addressed opportunities and risks presented by digital financial services, such as effects on the accessibility of services. The second session focused on key skills for navigating the digital financial landscape, including a discussion of how to evaluate digital financial literacy. The third session focused on the delivery of financial education through digital methods, including opportunities and challenges. The final session provided participants a chance to reflect on discussions held throughout the day and offer takeaways for consideration. See appendix I for the forum agenda.

Thematic Analysis and Forum Summary Report

To summarize the discussions held during the event, we reviewed a transcript of the forum proceedings and developed a process to analyze and thematically summarize the content of the forum. Using the transcript, analysts reviewed each session to develop an initial list of thematic categories and then refined these categories iteratively to develop a final list. Two analysts then reviewed each session independently to assign final categories and met as necessary to resolve disagreements. We found that participants' statements highlighted the following key categories: opportunities, risks, skills and knowledge, the role of stakeholders, and measurement. We organized participants' statements using these key categories to create the summaries included in this report. We also provided a draft of the summary report to participants for their review and incorporated their comments as appropriate.

While this report summarizes the key ideas that emerged during the forum, it is not intended to present an exhaustive catalogue of all ideas discussed by participants nor to represent all perspectives. In addition, the information presented in this summary does not necessarily represent the views of all participants or the views of their organizations, including GAO.

We conducted our work from November 2023 to November 2024 in accordance with all sections of GAO's Quality Assurance Framework that are relevant to our objectives. The framework requires that we plan and perform the engagement to obtain sufficient and appropriate evidence to meet our stated objectives and to discuss any limitations in our work. We believe that the information and data obtained, and the analysis conducted, provide a reasonable basis for any findings and conclusions in this product.

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