Financial literacy and wellness among U.S. women

Insights on underrepresented minority women

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Executive summary

The TIAA Institute-GFLEC Personal Finance Index (P-Fin Index) provides an annual measure of overall financial literacy among the U.S. adult population, plus a nuanced analysis of personal finance knowledge across eight functional areas. The 2020 P-Fin Index survey was fielded in January 2020 and included an oversample of women. This enables examining the state of financial literacy and financial wellness among U.S. women immediately before the onset of COVID-19. A more refined understanding of financial literacy among women, including areas of strength and weakness and variations among subgroups, can inform initiatives to improve financial wellness, particularly as the United States moves forward from the pandemic and its economic consequences.

Key findings for 2020 include:

- Financial literacy is low among U.S. adults in general, including women. On average, female adults correctly answered 49% of the 2020 *P-Fin Index* questions.
- Comprehending risk and uncertainty is the area of lowest financial literacy among women. Unfortunately, the COVID-19 pandemic has greatly amplified the degree of risk and uncertainty in the economy along multiple dimensions, such as employment, earnings, investment returns, and expenses. Low financial literacy, especially with regards to risk and uncertainty, means that individuals are particularly ill-positioned to make appropriate financial decisions in this environment.
- Borrowing and debt management is the area of greatest personal finance knowledge among women. Debt tends to be a feature of personal finance common across the lifecycle for many individuals; knowledge and understanding may emerge from confronting accumulated debt, often from the early stages of adulthood.
- Personal finance knowledge tends to be lower among underrepresented minority women—African American and Hispanic women—compared with their white peers. The former correctly answered 38% of the index questions, on average, and the latter 54%.
- Financial literacy is notably lower among underrepresented minority women compared with their white peers in seven of the eight functional areas. Comprehending risk is the lone area where functional knowledge is equal across the two groups; nonetheless, it is a relative weakness for both. The area of lowest financial literacy among underrepresented minority women—insuring—is also the area with the biggest gap. Comprehending risk and understanding insuring are particularly important during a crisis with tremendous health and economic consequences like the current one.
- The *P-Fin Index* survey contains several indicators of financial wellness and each shows a significant gap between underrepresented minority women and their white peers. With that said, greater financial literacy is associated with greater financial wellness among underrepresented minority women. African American and Hispanic women who correctly answered over 50% of the index questions are more likely to engage in behaviors connected to higher financial well-being compared to underrepresented minority women who correctly answered 50% or less of the questions.

Introduction

COVID-19 and its economic consequences have negatively affected the financial well-being of many Americans. For example, 30% of those employed in October 2019 have experienced a job loss or reduction in work hours since March 2020 (Board of Governors of the Federal Reserve System, 2020). Beyond the aggregate view, however, COVID-19 will exacerbate pre-existing gaps in financial well-being among U.S. adults to the extent that different demographic groups are disproportionately impacted. Women are at risk in this sense.

Prior to COVID-19, women were already facing greater economic challenges than men. Data from the 2018 *National Financial Capability Study* (FINRA, 2019) highlight this reality along various dimensions, such as:

- Difficulty making ends meet.
- Lack of confidence in the ability to achieve financial goals.
- Trouble covering an unexpected expense.
- Concern about retirement personal finances.¹

Now evidence is emerging that the COVID-19 pandemic has financially impacted women more so than men. While women comprised 46% of the workforce prior to COVID-19, they account for 54% of overall job losses (McKinsey Global Institute, 2020). The norm division of household responsibilities has also imposed a greater impact on women's work availability as schools switched to at-home, online instruction for most of the spring and in many cases the fall semester. A July survey by the Federal Reserve found that 23% of working mothers expected to reduce their hours of work if schools did not have in-person classes during the fall and an additional 4% expected to stop working completely. The analogous figures among working fathers were 15% and 2%, respectively (Board of Governors of the Federal Reserve System, 2020).²

An ability to manage personal finances in periods of financial uncertainty and challenges depends, at least in part, on financial literacy. Financial literacy is knowledge and understanding that enable sound financial decision making and

² Alon et al. (2020) provide analogous arguments that occupational and childcare factors will result in a disproportionate negative effect from COVID-19 on women and their employment opportunities.

Any opinions expressed herein are those of the authors, and do not necessarily represent the views of TIAA, the TIAA Institute or any other organization with which the authors are affiliated.

¹ Women are less likely to have a retirement account and less likely to have tried to determine how much they need to save.

effective management of personal finances. In times that are anything but normal, such as the current pandemic environment and its severe economic consequences, the ability to make appropriate financial decisions matters greatly.

This report uses data from the 2020 TIAA Institute-GFLEC Personal Finance Index (*P-Fin Index*) to examine the state of financial literacy and financial wellness among U.S. women immediately before the onset of COVID-19. A more refined understanding of financial literacy among women, including areas of strength and weakness and variations among subgroups such as underrepresented minority women, can inform initiatives to improve financial wellness, particularly as the United States moves forward from the pandemic. While not a cure-all, increased financial literacy can lead to improved financial capability and practices that benefit even those with relatively modest resources.

The *P-Fin Index* is unique in its capacity to examine financial literacy across eight areas of personal finance in which individuals routinely function, in addition to providing a robust indicator of overall personal finance knowledge and understanding.³ The online survey is fielded each January with a sample of U.S. adults; the 2020 sample consisted of 1,008 individuals.⁴ At the same time, the survey is also fielded with a separate oversample of a particular demographic group to enable detailed analysis of that group; 1,000 women were oversampled in 2020.^{5,6} Previous oversamples were Hispanics in 2017, millennials in 2018, and African Americans in 2019.

³ See Yakoboski, Lusardi and Hasler (2020) for a full discussion of the *P-Fin Index* and the 2020 findings for the U.S. adult population.

⁴ The sample was drawn from Ipsos' *KnowledgePanel*, which is a large-scale probability-based online panel. The sample was weighted by gender, age, race and ethnicity, census region, metropolitan status, education level, household income and language proficiency to be nationally representative of U.S. adults, ages 18 and older.

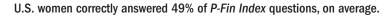
⁵ There is no overlap between members of the general population sample and the oversample; the 525 women in the general population sample were not included among the 1,000 members of the women's oversample.

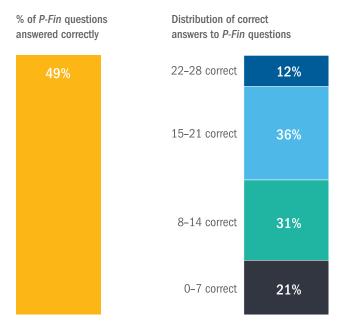
⁶ The women's oversample too was weighted by age, census region, metropolitan status, education level, and household income to be nationally representative.

Women's financial literacy

Financial literacy is disturbingly low among U.S. adults in general, including women. On average, female adults correctly answered 49% of the 2020 *P-Fin Index* questions. Forty-eight percent correctly answered over one-half of the index questions, with 12% demonstrating a relatively high level of financial literacy, i.e., they answered over 75% correctly (Figure 1).

Figure 1. 2020 P-Fin Index





Source: TIAA Institute-GFLEC Personal Finance Index (2020).

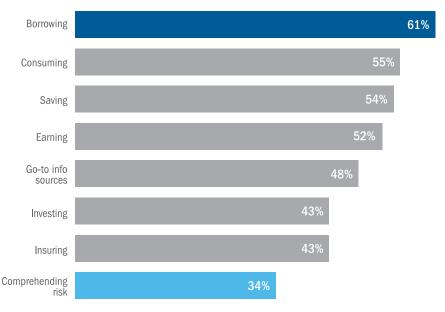
The *P-Fin Index* gauges personal finance knowledge and understanding in eight functional areas⁷:

- 1. Earning—determinants of wages and take-home pay.
- 2. Consuming—budgets and managing spending.
- 3. Saving—factors that maximize accumulations.
- 4. Investing—investment types, risk and return.
- 5. Borrowing and managing debt—relationship between loan features and repayments.
- 6. Insuring—types of coverage and how insurance works.
- 7. Comprehending risk and uncertainty—understanding uncertain financial outcomes.
- 8. Go-to information sources—recognizing appropriate sources and advice.

Comprehending risk and uncertainty is the area of lowest financial literacy among women. Comprehending risk and uncertainty involves, for example, understanding that the expected outcome in a given scenario depends on the range of possible outcomes, the financial implication associated with each outcome, and the likelihood of each outcome occurring. On average, women correctly answered 34% of these questions (Figure 2).

Figure 2. Functional knowledge

Borrowing is where women's financial literacy is highest; comprehending risk is where it is lowest.



% of P-Fin questions answered correctly



7 These areas correspond to the National Standards for Financial Literacy outlined by the Council for Economic Education. See http://councilforeconed.org/resource/national-standards-for-financial-literacy/. Risk and uncertainty are inherent across the realms of personal finance, not just investments. The ultimate outcomes from a given decision are often unknown when making the decision. An individual's financial situation can change unexpectedly, in particular, in terms of employment and income, as seen during the ongoing crisis. Therefore, understanding risk and its implications are important for sound financial decision making.

The COVID-19 pandemic has greatly amplified the degree of risk and uncertainty in the economy along multiple dimensions, such as employment, earnings, investment returns, and expenses. Low financial literacy, especially with regards to risk and uncertainty, unfortunately means that individuals are particularly ill-positioned to make appropriate financial decisions in this environment.

Borrowing and debt management is the area of greatest personal finance knowledge among women, with 61% of these questions answered correctly, on average. Debt tends to be a feature of personal finance common across the lifecycle for many individuals; knowledge and understanding may emerge from confronting accumulated debt, often from the early stages of adulthood.

Apart from debt, only up to approximately one-half of the questions in the other functional areas are answered correctly, revealing a low level of knowledge in important areas of financial decision making.

Self-perceptions

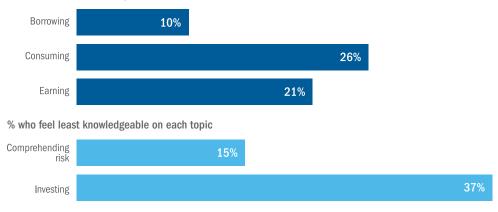
Many women do not know what they do know in terms of financial literacy. Consuming and earning are the areas where the largest share of women rate their financial knowledge as being highest (26% and 21%, respectively) (Figure 3). While these are areas of relative strength in terms of financial literacy, clearly many do not recognize the level of knowledge they possess regarding borrowing. While borrowing is where functional knowledge is greatest among women, only 10% rate themselves most knowledgeable in this area. Perhaps challenges individuals face in managing debt are viewed as signaling a lack of knowledge.

At the same time, many women do not know what they do not know. Investing is by far where the largest share (37%) think they know the least, and this is an area of relative weakness with 43% of the index questions on investing answered correctly. However, only 15% think comprehending risk is where they know the least, when it is actually where women show the lowest level of functional knowledge. Many seem to not recognize their more prevalent weakness.

Figure 3. Self-awareness

Many women do not know what they do know or what they do not know.

% who feel most knowledgeable on each topic



Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Variations among women

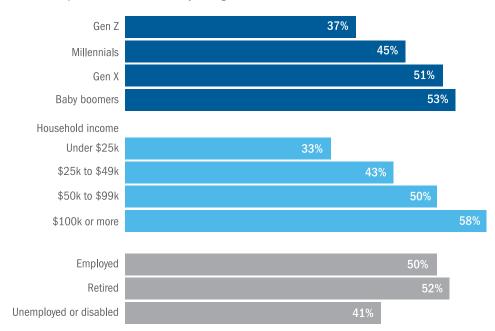
Financial literacy among women varies across socioeconomic and demographic groups (Figure 4).

- Financial literacy tends to be lowest among Gen Z women and highest among Gen X and baby boomers. Gen Z correctly answered 37% of the index questions, on average, compared with 51% among Gen X and 53% among boomers. While generation and age effects cannot be distinguished in a single cross-section of data, these findings stand out for how little young women seem to know given the complexity of today's financial environment.
- Financial literacy tends to be greater among women with higher household incomes. There is a significant 25 percentage point difference in *P-Fin Index* questions answered correctly between women with household incomes below \$25,000 and those with household incomes of \$100,000 or more.
- Personal finance knowledge varies with employment status. In particular, unemployed or disabled⁸ women have markedly lower financial literacy than those employed⁹ and those retired.

9 Includes those employed full time, part time and self-employed.

⁸ Includes those unemployed or on temporary layoff, as well as those disabled and unable to work.

Figure 4. Variation among women



% of P-Fin questions answered correctly among women

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Financial literacy also varies among women depending upon family status (Figure 5).

- Even though they are de facto responsible for making their own financial decisions, women who have never been married tend to have lower financial literacy. They correctly answered 41% of the index questions, on average. By comparison, women who are married or living with a partner and women who are widowed or divorced correctly answered approximately 50%.
- At the same time, women with children under age 18 tend to have significantly lower financial literacy than those with no children under 18.

Figure 5. Variation among women



% of P-Fin questions answered correctly among women

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Finally, financial literacy tends to be greater among women with more education and those who have received financial education (Figure 6).

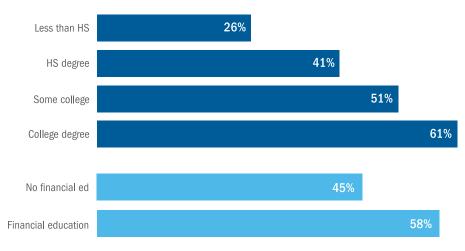
- Women with a college degree correctly answered 61% of the *P-Fin Index* questions, on average, compared with 26% among those with less than a high school degree.
- There is a 13 percentage point difference in the percentage of index questions answered correctly between women who have participated in a financial education class or program and those who have not.¹⁰

¹⁰ See Lusardi and Mitchell (2014) for a discussion of existing research regarding the relationship between financial education programs and financial literacy levels, as well as the challenges inherent in empirically establishing causality and effectiveness.

Figure 6. Variation among women

Financial literacy increases with education.





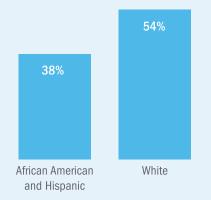
Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Financial literacy among underrepresented minority women

Personal finance knowledge tends to be lower among underrepresented minority women—African American and Hispanic women—compared with their white peers. The former correctly answered 38% of the index questions, on average, and the latter 54% (Figure 7). This is analogous to financial literacy levels among the entire U.S. adult population—underrepresented minorities correctly answered 38% of the index questions, on average, while their white peers correctly answered 58%.

Figure 7. African American and Hispanic women

Financial literacy among African American and Hispanic women lags that of their white peers.



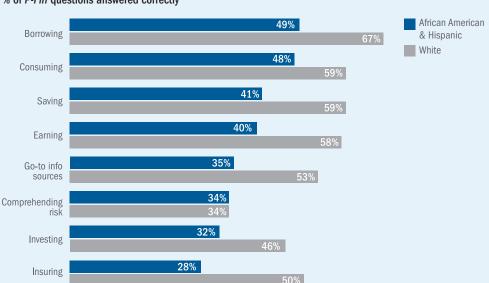
% of P-Fin questions answered correctly

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

In terms of functional knowledge, underrepresented minority women answered less than one-half of the index questions correctly in each of the eight areas (Figure 8). Beyond that, financial literacy is particularly low in some areas. African American and Hispanic women correctly answered 28% of the insuring questions, on average. One-third of the questions in the areas of investing, comprehending risk, and go-to information sources were answered correctly.

Figure 8. African American and Hispanic women

Financial literacy among African American and Hispanic women lags that of their white peers across functional areas.



[%] of P-Fin guestions answered correctly

Borrowing and debt management, as well as consuming, are the areas of greatest personal finance knowledge among underrepresented minority women, with approximately one-half of the questions in each answered correctly on average. Borrowing and managing debt often begin relatively early in life. Thus, knowledge and understanding can emerge from experience tracing back to relatively young ages.

Comparisons of functional knowledge among underrepresented minority women with their white peers are noteworthy along several dimensions. Financial literacy is notably lower among underrepresented minority women in seven of the eight functional areas, with the difference in percentage of correctly answered questions ranging from 11 to 22 percentage points (Figure 8). Comprehending risk is the lone area where functional knowledge is equal

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

across the two groups; nonetheless, it is a relative weakness for both with only one-third of the questions answered correctly on average. In fact, it is by far the lowest area of financial knowledge among white women. In contrast, the area of lowest financial literacy among underrepresented minority women—insuring is also the area with the biggest gap. Comprehending risk and understanding insuring are particularly important during a crisis with tremendous health and economic consequences like the current one.

A more rigorous empirical analysis confirms these findings. The regression results presented in Table 1 show that financial literacy tends to be lower among African American and Hispanic women relative to their white peers, even with controlling for other socioeconomic factors such as household income and education. While age, education, and income also have a statistically significant relationship with female financial literacy levels, marital status and the presence of children under the age of 18 do not after controlling for other variables.

Race (BL: White)	
African American	-9.456***
	(2.342)
Hispanic	-8.301***
	(2.151)
Other	-5.447*
	(2.951)
Age (BL: 18-29)	
Age 30-44	5.105**
	(2.430)
Age 45-59	8.315***
	(2.164)
Age 60+	11.67***
	(2.330)
Education (BL: Less than HS)	
High School	7.817***
	(2.969)

Table 1. Regression analysis for womenDependent variable: Percentage of *P-Fin Index* questionsanswered correctly

Some College	17.21***
	(3.043)
Bachelor's degree or higher	24.92***
	(3.321)
Income (BL: <\$25K)	
\$25-50K	4.650**
	(2.285)
\$50-100K	7.473***
	(2.215)
>\$100K	9.506***
	(2.479)
Work status (BL: unemployed/disabled/retired)	
Employed	1.683
	(1.559)
Marital status (BL: Married)	
Single	-1.801
	(2.225)
Widowed/divorced/separated	-0.020
	(1.843)
Children under 18	
Yes	-1.482
	(1.738)
Constant	22.747***
	(3.323)
Observations	1,000
R-squared	0.310

Notes: Estimated regression coefficients are compared to the following baseline values: Age category 18–29 for the age variable, household income of less than \$25,000 for the income variable, having less than a high school degree for the educational attainment variable, being married for the marital status variable, and unemployed/disabled/retired for the work status variable. Robust standard errors in parentheses: p<0.10, p<0.05, p<0.01.

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Financial wellness

Previous *P-Fin Index* findings have demonstrated that financial wellness tends to be greater among U.S. adults with higher levels of financial literacy.¹¹ This implies that those with greater financial literacy are better positioned along various dimensions to weather adverse economic conditions such as those that exist today.

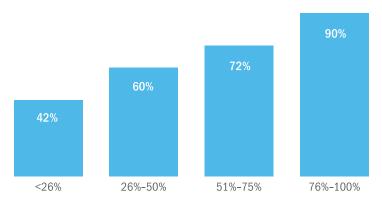
The same finding holds when focusing on women in particular—those with greater financial literacy tend to exhibit greater financial wellness. Specifically, women who correctly answer more of the *P-Fin Index* questions are doing better on a variety of indicators linked to financial wellness:

- Better able to make ends meet (Figure 9).
- More likely to feel unconstrained by debt (Figure 10).
- Better able to cope with a financial shock (Figure 10).
- More likely to make loan payments in full and on time (Figure 11).
- More likely to save and plan for retirement (Figure 12).

Figure 9. Financial wellness

Making ends meet is easier for women with greater financial literacy.

% who do not find it difficult to make ends meet in a typical month



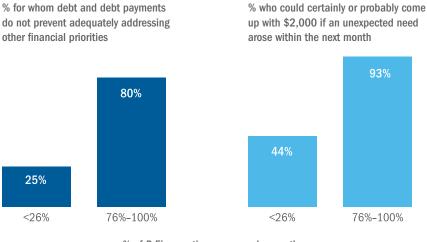
% of P-Fin questions answered correctly

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

¹¹ See Yakoboski, Lusardi and Hasler (2020). The 2020 *P-Fin Index* survey contained several questions indicative of financial wellness—questions regarding outcomes that demonstrate financial wellness or regarding behaviors that should promote financial wellness. A strong link between *P-Fin Index* scores and these financial wellness indicators was found to exist among the U.S. adult population.

Figure 10. Financial wellness

Women with greater financial literacy are less likely to be debt constrained and less likely to be financially fragile.

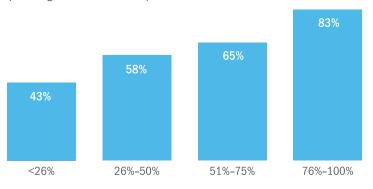


% of P-Fin questions answered correctly

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Figure 11. Financial wellness

Women with greater financial literacy are more likely to make loan payments in full and on time each month.



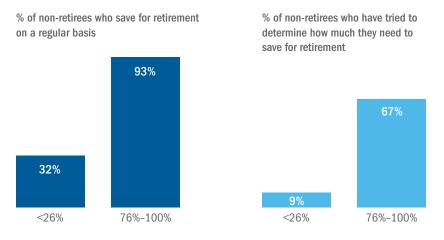
% of women with a loan who always make their payments in full and on time each month (including credit card balances)

% of P-Fin questions answered correctly

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Figure 12. Financial wellness

Women with greater financial literacy are more likely to save and plan for retirement.





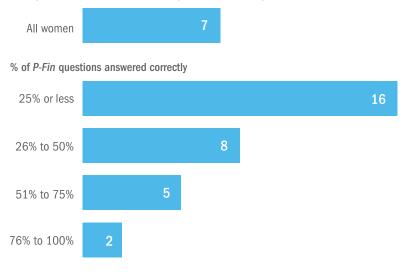
Source: TIAA Institute-GFLEC Personal Finance Index (2020).

In addition, women with higher levels of financial literacy tend to spend less time on personal finance issues and problems (Figure 13). Overall, women spend an average of seven hours per week thinking about and dealing with issues and problems related to their personal finances. However, among those with the lowest levels of financial literacy (i.e., those who correctly answered 25% or less of the *P-Fin Index* questions), this figure is more than double—16 hours. By comparison, those with the highest levels of financial literacy (i.e., those who correctly answered over 75% of the *P-Fin Index* questions) averaged only 2 hours per week.

Figure 13. Financial wellness

Women with greater financial literacy spend less time on financial issues and problems.

Average hours per week spent thinking about and dealing with issues and problems related to personal finances



Source: TIAA Institute-GFLEC Personal Finance Index (2020).

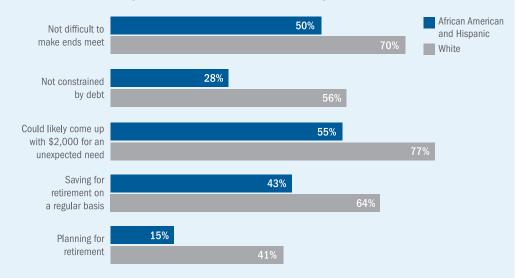
Financial wellness among underrepresented minority women

For each indicator of financial wellness in the *P-Fin Index* survey, there is a significant gap between underrepresented minority women and their white peers (Figure 14).

- One-half of African American and Hispanic women can readily make ends meet in a typical month compared with 70% of white women.
- About one-quarter of African American and Hispanic women do not feel debt constrained compared with 56% of white women.
- Fewer African American and Hispanic women can deal with an unexpected financial emergency. Specifically, 55% of underrepresented minority women, could likely come up with \$2,000 within 30 days to cover an unexpected need, compared with 77% of white women.
- Less than one-half of non-retired African American and Hispanic women (43%) save for retirement on a regular basis, and among the same group, only 15% are planning for their retirement.

Figure 14. African American and Hispanic women

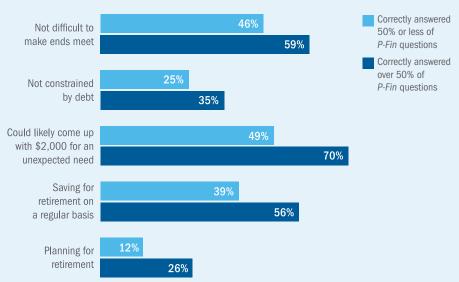
Financial wellness among African American and Hispanic women lags that of their white peers.



Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Consistent with the findings among all U.S. adult women, greater financial literacy is associated with greater financial well-being among underrepresented minority women. African American and Hispanic women who correctly answered over 50% of the index questions are more likely to engage in behaviors connected to higher financial well-being compared to underrepresented minority women who correctly answered only up to 50% of the index questions (Figure 15).

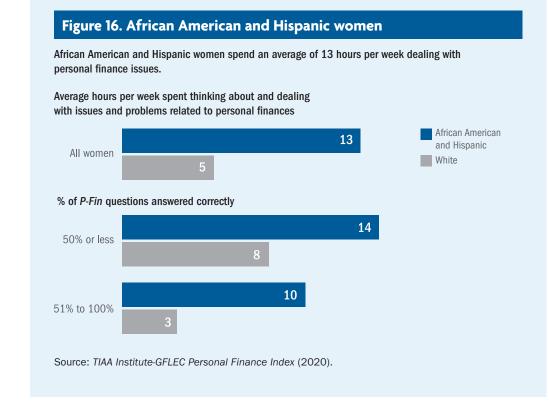
Figure 15. African American and Hispanic women



Financial wellness is higher among African American and Hispanic women with greater financial literacy.

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

Underrepresented minority women spend more than double the time as their white peers thinking about and dealing with personal finance issues—13 hours per week on average compared with 5 hours (Figure 16). The link between financial literacy and time spent on personal finance issues observed among all women also exists specifically among African American and Hispanic women. With that said, the relative time saving with greater financial literacy is lower among underrepresented minority women. African American and Hispanic women who correctly answered over 50% of the *P-Fin Index* questions spent about 30% less time per week on personal finance issues compared with their peers who correctly answered 50% or less of the index questions. The analogous figure among white women is over 60%.

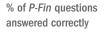


The gender gap

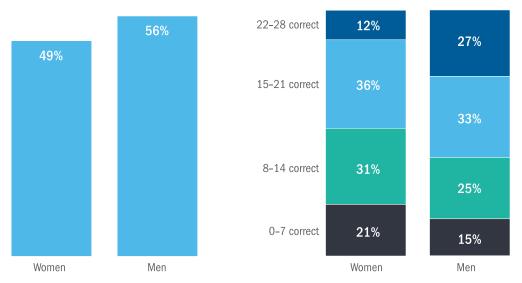
Comparing financial literacy among women with men provides context useful in tailoring financial literacy initiatives to the particular needs of women. As expected, personal finance knowledge tends to be lower among women than among men. On average, men correctly answered 56% of the *P-Fin Index* questions (Figure 17). Sixty percent of men correctly answered over one-half of the index questions, with 27% answering over 75% correctly. In contrast, 21% of women demonstrated a relatively low level of financial literacy, i.e., they correctly answered 25% or less of the index questions, compared with 15% of men.

Figure 17. Financial literacy gender gap

Women's financial literacy tends to lag that of men.



Distribution of correct answers to *P-Fin* questions

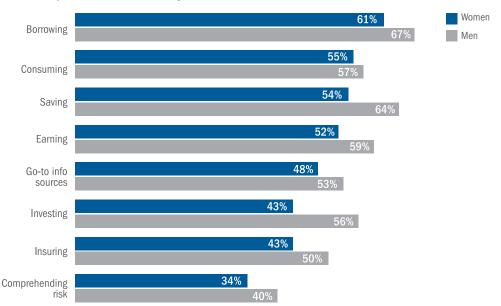


Source: TIAA Institute-GFLEC Personal Finance Index (2020).

This gender gap in financial literacy continues to hold in terms of functional knowledge. Women's financial literacy lags that of men in each functional area (Figure 18). The differential is particularly large in the realm of investing—13 percentage points. Except for consuming, all gender differentials in functional knowledge are statistically significant.

Figure 18. Financial literacy gender gap

Women's financial literacy tends to lag that of men across functional areas.



% of *P-Fin* questions answered correctly

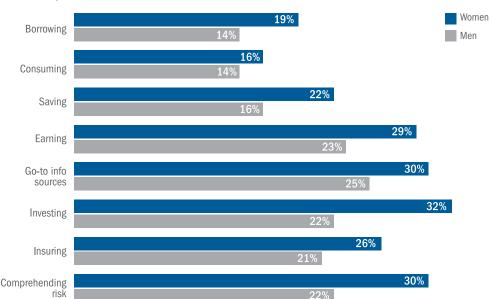
It is useful to note an important finding in the data. The financial literacy questions in the *P-Fin Index* survey are multiple choice, including the option "I don't know." Women answered with "don't know" to 25% of the index questions, on average. By comparison, men answered with "don't know" to 20% of the index questions. In addition, women more often choose the "don't know" response compared to men across every functional area except for consuming (Figure 19). This finding has also been reported in other surveys and can be interpreted as evidence of lack of confidence in addition to lack of knowledge.¹²

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

¹² See Lusardi and Mitchell (2014).

Figure 19. "Don't know" responses

Women are more likely than men to answer "don't know" across most functional areas.



% of P-Fin questions answered with "don't know"

Discussion

Financial literacy is knowledge and understanding that enable sound financial decision making and effective management of personal finances. In times that are anything but normal—like today with the COVID-19 pandemic and its severe economic consequences—the ability to make appropriate financial decisions matters greatly.

Unfortunately, many Americans are functioning in today's environment with a poor level of financial literacy. This is more true among women than men, and more true among underrepresented minority women than their white peers. Especially problematic in today's environment is the finding that financial literacy is particularly low in the area of comprehending and understanding risk and uncertainty. On average, U.S. women correctly answered only one-third of the index questions related to risk and uncertainty. The same holds true among African American and Hispanic women. This means that individuals are ill-positioned to make decisions in a time when uncertainty and volatility dominate economic and financial life.

Source: TIAA Institute-GFLEC Personal Finance Index (2020).

These findings highlight points on which to focus as the United States eventually moves forward from the pandemic and its economic consequences. Better financial well-being is related to greater financial literacy. This holds for all women, including underrepresented minority women. A heightened focus on improving financial literacy, with an emphasis on understanding and managing risk and uncertainty is an important step that will increase Americans' financial resiliency in the future. While not a cure-all, increased financial literacy can lead to improved financial capability and practices that benefit even those with relatively modest resources.

References

- Alon, Titan, Matthias Doepke, Jane Olmstead-Rumsey and Michèle Tertilt. 2020. "The Impact of COVID-19 on Gender Equality," NBER Working Paper 26947.
- Federal Reserve System Board of Governors. 2020. Update on the Economic Well-Being of U.S. Households: July 2020 Results.
- FINRA Investor Education Foundation. 2019. The State of U.S. Financial Capability: The 2018 National Financial Capability Study.
- Lusardi, Annamaria, and Olivia S. Mitchell. 2014. "The Economic Importance of Financial Literacy: Theory and Evidence," *Journal of Economic Literature* 52 (1): 5-44.
- McKinsey Global Institute. 2020. COVID-19 and gender equality: Countering the regressive effects.
- Yakoboski, Paul J., Annamaria Lusardi and Andrea Hasler. 2020. The 2020 TIAA Institute-GFLEC Personal Finance Index: Many Do Not Know What They Do and Do Not Know.



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Paul Yakoboski is a Senior Economist with the TIAA Institute where he is responsible for research on lifetime financial security, including topics related to defined contribution plan design, individual saving and investing, financial literacy and capability, and asset management during retirement, as well as research on workforce issues in the higher education and nonprofit sectors. Prior to joining the TIAA Institute, Yakoboski held positions with the American Council of Life Insurers, the Employee Benefit Research Institute and the U.S. Government Accountability Office. Yakoboski earned his B.S. in economics from Virginia Tech and M.A. and Ph.D. in economics from the University of Rochester.

Annamaria Lusardi is a University Professor of Economics and Accountancy at the George Washington University, and the founder and academic director of GFLEC. She has published extensively and in many leading economics journals, and is the recipient of several prestigious awards. Lusardi also directs the Financial Education Committee in Italy, in charge of implementing a national strategy for financial literacy. In addition, she chairs the OECD's International Network for Financial Education Research Committee. She previously taught at Dartmouth College, Princeton University, the University of Chicago Harris School of Public Policy and Booth School of Business, and Columbia Business School. She also was a visiting scholar at Harvard Business School. She earned her B.A. from Bocconi University in Milan and Ph.D. from Princeton University. Lusardi is a TIAA Institute Fellow.

Andrea Hasler is an Assistant Research Professor in Financial Literacy and the deputy academic director of GFLEC. She leads the team of researchers working on financial literacy and capability and develops analyses for educational and policy initiatives. Hasler has recently worked on projects focused on financial literacy levels of the young, women, entrepreneurs, investors, and minorities in the United States and around the world. She holds a Ph.D. in finance as well as an M.Sc. and B.A. in business and economics from the University of Basel. During her doctorate, she spent two years at the New York University Stern School of Business conducting research on household saving and financial decision making. Her professional experience includes the development of an online advanced studies course in financial market theory and work as an analyst conducting global equity market research.





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