THE FEDERAL RESERVE

-FedPayments Improvement



FEDERAL RESERVE PAYMENTS INSIGHT BRIEF: Banking my way – Gen Z and millennials are driving change in payments

Definitions

Instant payment services credit the payee's deposit account within a matter of seconds of initiation; some instant payment services are designed to enable transmission of rich data, such as extended remittance details, with the payment.

For this report, "faster payments" encompass electronic payment services that provide funds to the payee within seconds or up to a few hours of initiation by the payer, including instant payment services, same day ACH, push-to-card, and digital wallet.

Digital wallet apps fund the payee's digital wallet within minutes of payment initiation, where funds are used within the app or transferred to a bank account.

Embedded payments refer to the payment tools on e-commerce websites, where consumers choose their payment method and pay directly through an embedded link, providing single, one-click payment experience on apps and websites.

Same-day ACH credits the payee's deposit account by end of day if payment is initiated by the midday cutoff.

Push to card credits the payee's debit card account within minutes of payment initiation.

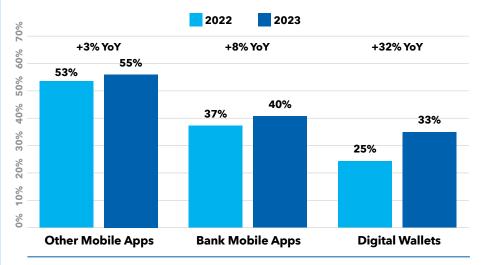
Executive summary

U.S. consumers – especially those in their 20s and 30s – are increasingly opting for the speed, flexibility and 24x7x365 convenience of digital and faster payment options to pay for goods and services in person and online, pay friends and family, and transfer money between accounts.

Our survey reveals that U.S. consumers' use of digital wallets, such as those popularized by non-bank technology or fintech providers, surged 32% in 2023 from the prior year, outpacing growth in bank mobile apps (8%) and debit cards (5%). While digital wallet usage surged, 4 in 10 consumers continue to use their bank's mobile app for their payment needs. Younger consumers in particular are embracing digital wallets and paying bills using their mobile phones. More than half of Generation Z (ages 18-25) and millennials (26-41) now use digital wallets, and 80% say it is important to be able to make payments by mobile device.

Consistent with 2022 research, about three-quarters of consumers (74%) used a faster payment service in the past 12 months – given the greater availability of digital commerce and payments, 57% of consumers expect to be using faster payment options more extensively in the future.

PERCENT USED MOBILE APPS AND DIGITAL WALLET PAST 12 MONTHS



Please indicate all the ways you have made or received payments using [payment method] in the past 12 months. (Select all that apply.)

During the second half of 2023, Federal Reserve Financial Services commissioned a survey of consumers' changing payment behaviors and drivers across payment types. Key findings include:

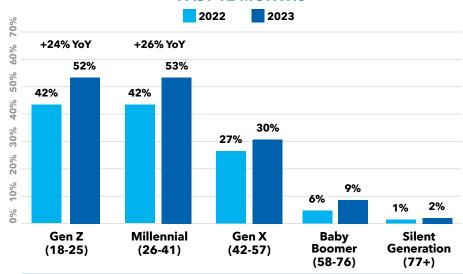
Growth in digital-first options with continued use of cash, debit cards and credit cards

- Use of digital wallets (e.g., Apple Wallet, Google Wallet, etc.) grew 32% (from 25% to 33%) in 2023, compared to 8% (from 37% to 40%) for bank mobile apps and only 3% (from 53% and 55%) for other non-bank mobile apps (e.g., PayPal, Venmo, Cash App, etc.).
- Use of digital wallets increased 6% for both in-person purchases and online shopping (e-commerce) as more consumers use their mobile devices to make payments.
- While debit card use grew 5% (from 63% to 66%) and over two-thirds of consumers still use cash (76%) and credit cards (69%) for payments, notably half of Gen Z and millennial consumers reported using digital wallets (52% and 53%, respectively).

Desire for convenience and ondemand, instant money movement

- Four in 10 (41%) consumers stated that it's important to be able to use a mobile device for payments, including 80% of those who fall into the Gen Z and millennial groups. More than half (56%) of millennials used their mobile phone to pay bills, up from 46% in 2022 (a gain of 22%).
- Six in 10 (61%) consumers stated that convenience and ease of use are the most desirable qualities in payments. One in four (25%) consumers are challenged by the slow speed of payments and prefer to have better options for instant money movement to help manage personal finances.

PERCENT GENERATIONS USED DIGITAL WALLETS PAST 12 MONTHS



Please indicate all the ways you have made or received payments using [payment method] in the past 12 months. (Select all that apply.)

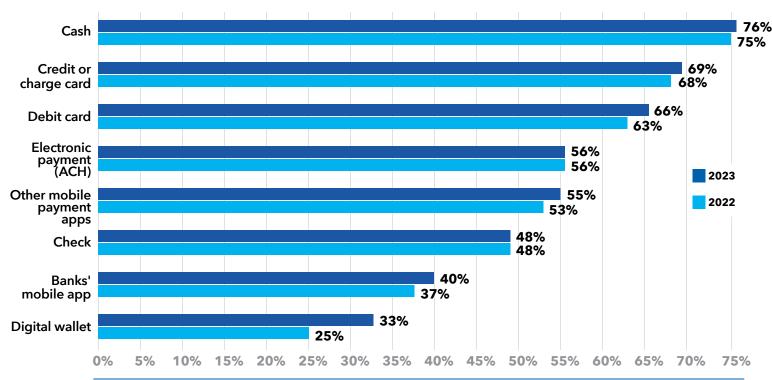
• Paying friends and family (55%), transferring money between accounts (30%), and paying bills (27%) continue to be the main use cases for instant payments. When considering additional use cases, there is noticeable interest in customer rebates/returns (60%), particularly for older generations. Gen Z and millennial generations are more interested in earned wage access¹ (55% and 43%, respectively) as well as digital wallet funding/defunding (48% and 43%).

Fraud concern remains key factor influencing consumer choice and key differentiator in choosing payment providers

- More than half of consumers (54%) state they are concerned about fraud, while 16% of consumers using mobile or digital payment options have encountered a fraud event in the past year. Consumers are looking to their preferred provider to provide fraud mitigation services.
- Eight in 10 consumers (79%) prefer to use a traditional bank for payments, but there is an increasing openness to using non-bank payment solutions to meet their payment needs, especially among Gen Z and millennials (56% and 73%, respectively).

¹ 'Payroll Cards and Earned Wage Access: Alternative Ways to Get Paid in North America' – Datos Insights

PERCENT USED PAYMENT METHOD PAST 12 MONTHS



Please indicate all the ways you have made or received payments using [payment method] in the past 12 months. (Select all that apply.)

Digital methods expand while cash and credit cards flatten

Cash (76%) and credit cards (69%) remained the top two most frequently used payment methods by consumers in 2023, while debit card usage grew 5% year over year (from 63% to 66%). Electronic check (Automated Clearing House, or ACH) payments held steady at 56%, while digital wallet use and mobile payment apps generally enjoyed significant gains. Bank mobile apps grew 9% year over year (from 37% to 40%), and digital wallets grew 32% (from 25% to 33%).

Debit card usage is most concentrated at the point of sale, i.e., in-person retail purchases (56%), while predominantly other mobile apps are being used for person-to-person payments (36%) and bank mobile apps for paying household bills (30%). In 2022, consumers continued to make a greater share of purchases remotely when compared to before the pandemic in 2019, making approximately one of every five purchases and person-to-person (P2P) payments online.²

Continuing the trend that began in 2020 during the COVID-19 lockdowns, e-commerce has grown to more than 15% of all U.S. retail commerce, up from 6% a decade ago.³ Two out of every 10 purchases, whether online or in person, are made with digital wallets. A recent study by Visa Acceptance Solutions and PYMNTS highlights the growing incidence of digital payments and the breaking down of boundaries between online and in-store shopping experiences.⁴

"It is extremely convenient not to have to pull your physical wallet out, and when the cashier actually understands how to process digital wallet payments, it makes shopping much faster. I also never carry cash, so it's difficult to pay friends back sometimes."

² <u>Diary of Consumer Payment Choice</u> – Federal Reserve Financial Services (2023)

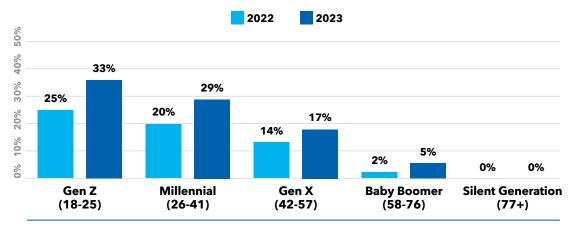
³ Quarterly Retail E-Commerce Sales 4th Quarter 2023 – U.S. Census Bureau News

⁴ 2024 Global Digital Shopping Index: U.S. Edition – Visa Acceptance Solutions and PYMNTS

As more consumers become comfortable using digital wallets online, they are also beginning to use digital wallets for in-person shopping. For in-person purchases, digital wallet usage for Gen Z grew 32% year over year (from 25% to 33% between 2022 and 2023) and rose 45% among millennials (from 20% to 29%).

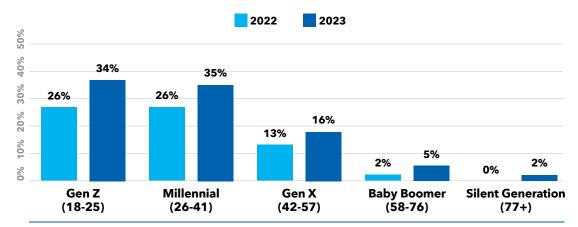
Online purchases continue to remain a top method of purchasing goods and services for consumers. Online digital wallet purchases grew 31% year over year (from 26% to 34%) for Gen Z and 35% (from 26% to 35%) for millennials.

PERCENT GENERATION USED DIGITAL WALLET FOR IN-PERSON PURCHASES PAST 12 MONTHS



Please indicate all the ways you have made payments using digital wallet for in-person purchases in the past 12 months. (Select all that apply.)

PERCENT GENERATION USED DIGITAL WALLET FOR ONLINE PURCHASES PAST 12 MONTHS



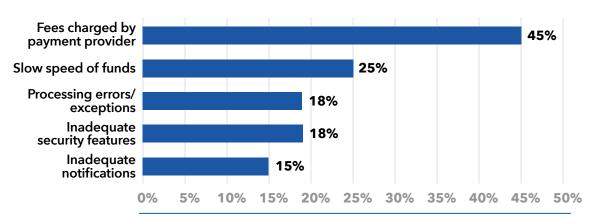
Please indicate all the ways you have made payments using digital wallet for online purchases in the past 12 months. (Select all that apply.)

Convenience, ease of use and immediacy are critical

Consumers are mostly intent on using payments that are convenient, easy to use and efficient. Consumer preference has shifted gradually over the years – slow, less convenient payment methods like paper checks are hardly ever used by millennials, for example, and their dissatisfaction with checks reflects the change in preference.

In terms of pain points, 45% of consumers noted fees charged by payment providers, 25% reported challenges with the speed of some payments and 18% mentioned processing errors. Consumers, particularly younger ones, pay fees where they perceive there is value, like with an instant payment.

TOP CONSUMER PAYMENT PAIN POINTS



Thinking about the different ways you make or receive payments, what are the top challenges you have with payments (bills, in-store and online purchases, sending payments to friends and family, etc.) that you would like to see improved? (Please select all that apply.)

"Getting paid the same day that I need to be paid [is important] because if I write a check out or send the money order to the biller, it takes a couple days for them to get it and then it takes the possibility that I may lose that service until they get my check."

Slow payments can have immediate consequences and negative impacts for consumers, ranging from late fees, insufficient funds penalties, credit issues, or the inability to secure needed basic goods and services.

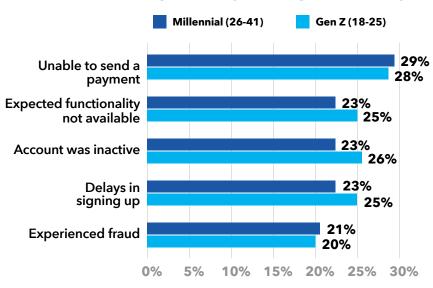
Other challenges and issues that consumers point to with digital payment types specifically are the inability to send a payment (22%), expected functionality not being available (16%), inactivity of a receiving account (14%), delays in signup and receiving access (16%), and risk of loss or fraud (16% have encountered fraud). Gen Z and millennials demonstrate greater awareness of electronic payment challenges, primarily the inability to send a payment (28% and 29%, respectively), unavailability of functionality (25% and 23%), and inactivity of an account at a receiving institution (26% and 23%). Importantly, as younger generations use mobile and digital payment options more frequently, they are encountering these challenges more than older generations.

Use of digital wallets and mobile apps on the rise

With consumers focusing on convenience and ease of use, it is no surprise that many are opting to use digital wallets and mobile payment apps – 61% state convenience or ease of use as the number one benefit of what works well for payments. Other top aspects for payments to work well include safety and security (43%), 24x7x365 availability (41%), the ability to pay online or with a smartphone (41%), reliability (40%), and being accepted by all or most people and businesses (35%).

Mobile payment apps and digital wallets have become commonplace for people who want to make payments safely and conveniently or confidently know that payments have been sent or received while they live an on-demand lifestyle. Given these findings, it comes as no surprise that 80% of Gen Z and millennials indicate it's important that they be able to use mobile phones to make payments. Millennial consumers are the generation primarily using their mobile phone for bill payments (56%).

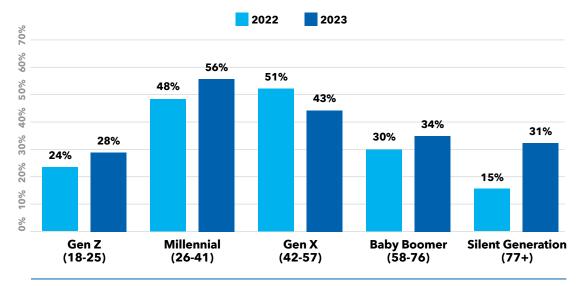
PERCENT STATING CHALLENGES WITH MOBILE APPS AND DIGITAL WALLETS



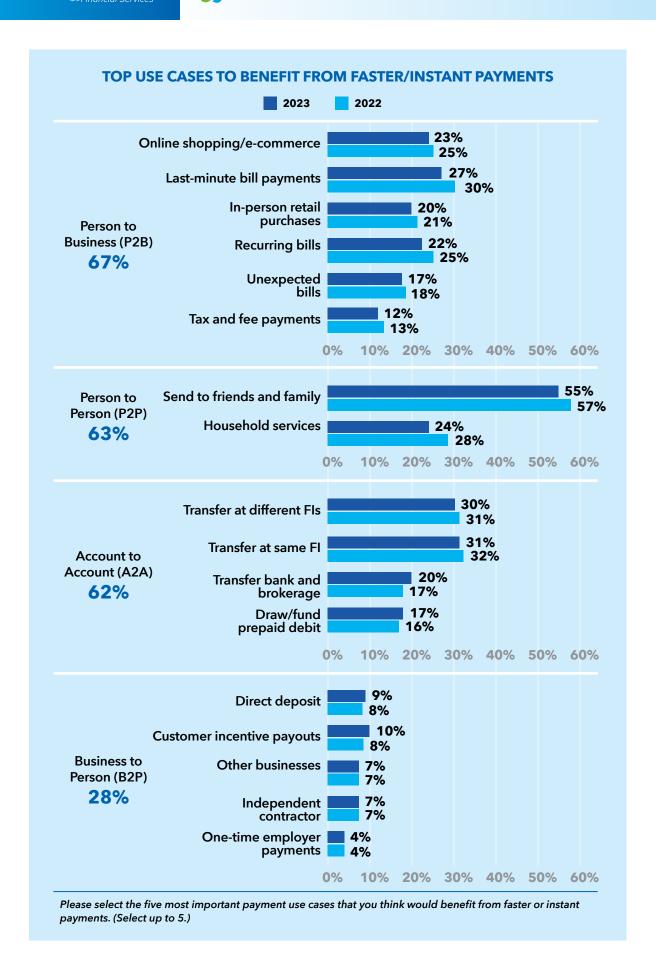
Which of the following problems have occurred while you've used mobile apps or digital wallets? (Select all that apply for each.)

"I particularly like the embedded feature when online shopping. It's extremely convenient and my favorite way to pay."

PERCENT GENERATION USED MOBILE PHONE FOR BILL PAYMENT PAST 12 MONTHS



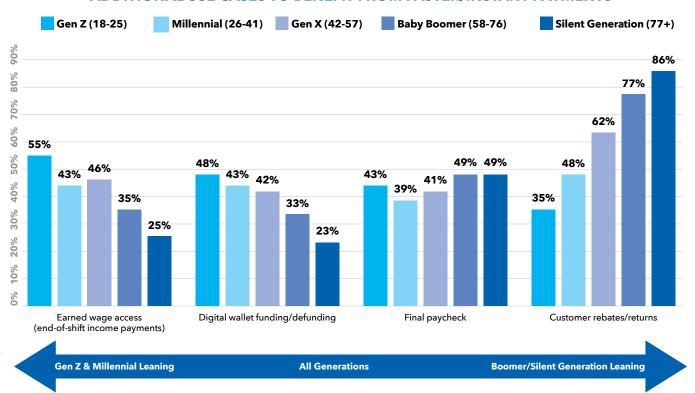
Have you made a bill payment using your mobile phone in the past 12 months? (Yes/No)



The faster, mobile and instant payment use cases that consumers identify as most beneficial include person-to-business (online shopping and bill payments), person-to-person (including sending money to friends and family), account-to-account (transferring money between accounts at the same or different financial institution) and business-to-person transactions.

Several new and emerging use cases were included in the 2023 study, signaling that consumers are also expecting instant payments to be useful in providing expedited payroll (earned wage access), digital wallet funding/defunding and small disbursements (rebates/refunds). Customer rebates/returns are popular for all generation types, while Gen Z and millennials are more interested in earned wage access (55% and 46%, respectively) and wallet funding/defunding (48% and 43%), especially since those generations are using their mobile phones and digital wallets more often. Consumers across the board benefit from getting paid daily, especially those who live paycheck to paycheck and cannot afford unexpected expenses.⁵

ADDITIONAL USE CASES TO BENEFIT FROM FASTER/INSTANT PAYMENTS



Please select the three most important payment use cases that you think would benefit from faster or instant payments. (Select up to 3.)

⁵ 'Exploring Earned Wage Access as a Liquidity Solution' – Financial Health Network



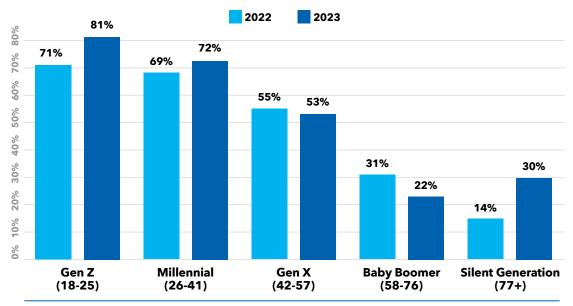


Fraud, app overload and account information-sharing insert friction

Today the majority (54%) of consumers are concerned about fraud in faster, digital and instant payments. In fact, 16% of consumers have encountered some sort of fraudulent situation using these payment methods. Subsequently, consumers are seeking strong fraud protection from their preferred payment provider (typically their primary financial institution) and value that relationship above others that provide similar safeguards. With the proliferation of mobile and digital apps and payment options, there is hesitation to register for another mobile app (47%) and share account information with another provider (40%). Additionally, almost a quarter of consumers state that their current institution or provider does not offer a faster/instant payment service.

As in past years, consumers are particular with respect to paying fees for payments; they are both cautious and would prefer to not pay fees, but they're also willing to pay a small fee when there is incentive value, especially younger generations. There is a direct relationship between age and willingness to pay a fee for an immediate/ instant payment. While only a small percentage of people in older generations indicated they paid a small fee for an immediate settlement using a digital wallet or mobile payment app, 81% of Gen Z and 72% of millennials indicated they paid these fees.

PERCENT GENERATION STATING THEY HAVE PAID INSTANT TRANSFER FEES



Some payment apps offer a choice to pay a small fee for instant transfers or wait a few days for the transfer but pay no fee. Thinking about the regular, everyday payments you make, have you ever paid the small fee for an "instant transfer" to or from your bank account? (Yes/No)

Looking to their preferred provider

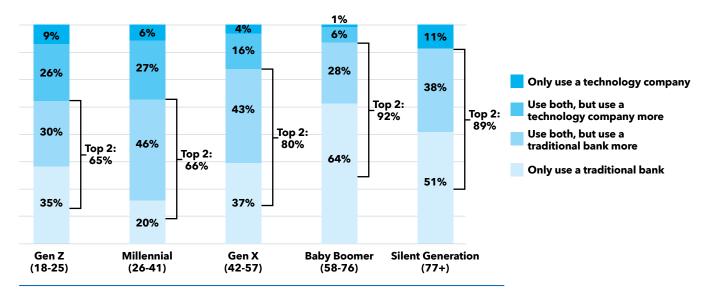
With the greater availability of digital commerce and payments, 57% of consumers expect to be using faster payment options more extensively in the future. For younger generations, there's more a sense of inevitability: 53% of Gen Z and 55% of millennials would like faster/instant payments to be automatically activated by their financial institution, compared to only 33% of baby boomers and 30% of Silent Generation.

This behavior can also be seen in other areas of using financial services.



Approximately one-quarter of Gen Z and one-third of millennials are actively using two or more financial institutions to meet their current financial needs. Most consumers prefer to use a traditional bank for their payment needs, but there is an increasing openness to using non-bank payment solutions – most Gen Z and millennial generations in particular are using both traditional financial institutions and technology companies (56% and 73%). When it comes to payment needs, consumers, particularly those that are younger, prioritize payment methods that are convenient and easy to use.

PERCENT PREFERENCE OF TRADITIONAL BANK VS TECHNOLOGY COMPANY FOR PAYMENTS



In the future, technology companies might offer services for you to pay another person or business. Which of the following statements best describes how you would pay others in the future?

The features consumers desire in faster, digital and instant payment service reflect the needs of on-demand commerce and an always-on way of life. Each generation views being able to use faster payments any time (42%), having control of money leaving accounts (29%), and ease of use compared to other payment types (28%) as important benefits. Older generations see potential for faster, digital and instant payments to reduce the number of paper checks they write (23%).

A multi-year trend in digital, mobile and embedded payments that offer 24x7 service and control has taken shape. There is growing awareness and caution of fraud and having information shared more broadly, which has converged with a trend in consumers seeking and valuing fraud protection services from their preferred provider. As expected, new use cases and customer benefits for these are becoming clearer and this presents an opportunity to those that provide such services and a risk to those that don't.



Survey methodology

The objective of this survey was to assess U.S. consumers' current payment practices, changing payment behaviors and drivers across payment types. Through an online questionnaire, household financial decision-makers⁶ provided information on their payment activities, their familiarity with and usage of different types of payments, and their views on the benefits they expect from using enhanced and faster payment options. The survey was conducted by Federal Reserve Financial Services (FRFS), a collaboration of the 12 Federal Reserve Banks. FRFS provides payment services to financial institutions, and thus the survey, and the statements and findings contained in this summary, are not independent academic research.⁷

The survey sample included 2,001 adults stratified by age and income in the United States.

RESPONSE SUMMARY

| TABLE 1: Summary Statistics for Demographics | | | | | | | |
|--|-------|--|--|--|--|--|--|
| Generation: | | | | | | | |
| Gen Z (18-25 years old) | 117 | | | | | | |
| Millennial (26-41 years old) | 580 | | | | | | |
| Gen X (42-57 years old) | 602 | | | | | | |
| Baby Boomer (58-76 years old) | 654 | | | | | | |
| Silent Generation (77+ years old) | 48 | | | | | | |
| Total | 2,001 | | | | | | |

⁶ Household financial decision makers include those who are responsible for "some" or "all" of the payment decisions for their households.

⁷ The online survey was conducted on behalf of Federal Reserve Financial Services by MarketCast, a market research company, with the panel-based sample provided by Dynata and Lucid. The sample of 2,001 was stratified by age, income and ethnicity and allows for a sampling margin of error of +/- 3% at a 95% confidence level.

APPENDIX 1

Select data by generation

| | Group | Total | Gen Z (18-25) | Millennial (26-41) | Gen X (42-57) | Baby Boomer (58-76) | Silent Generation (77+) |
|---------------------|--------------------------------------|-------|------------------|-----------------------|------------------|---------------------------|-------------------------------|
| | Year | 2023 | 2023 | 2023 | 2023 | 2023 | 2023 |
| | Sample size | 2,001 | 117 | 580 | 602 | 654 | 48 |
| Payment Usage | Cash | 76% | 83% | 78% | 73% | 75% | 67% |
| | Check | 48% | 38% | 35% | 42% | 67% | 83% |
| | Bank mobile app | 40% | 57% | 54% | 40% | 21% | 13% |
| | Other mobile apps | 55% | 77% | 71% | 55% | 33% | 11% |
| | Digital wallet | 33% | 52% | 53% | 30% | 9% | 2% |
| | Electronic payment (ACH)* | 56% | 45% | 49% | 61% | 62% | 57% |
| | Debit card | 66% | 80% | 79% | 66% | 49% | 34% |
| | Credit card | 69% | 46% | 63% | 69% | 81% | 85% |
| | Digital currency | 10% | 15% | 19% | 7% | 0% | 0% |
| Other Statistics | Underbanked | 14% | 22% | 23% | 12% | 4% | 4% |
| | Use 1 FI primarily | 41% | 54% | 41% | 50% | 64% | 64% |
| | Use 2+ Fls | 34% | 23% | 36% | 38% | 32% | 32% |
| | Digital/online first Fl | 9% | 16% | 12% | 10% | 3% | 0% |
| | Changed bank within past year** | 6% | 12% | 10% | 6% | 1% | 3% |
| | % Prefer online banking | 64% | 60% | 64% | 65% | 65% | 53% |
| | % Prefer in-person banking | 36% | 40% | 36% | 30% | 35% | 47% |
| | % Experienced fraud (digital/mobile) | 16% | 20% | 21% | 12% | 7% | 12% |

^{*}Electronic payment from checking account (Automated Clearinghouse (ACH) payment, not debit card)

^{**}J.D. Power 2024 U.S. Retail Banking Satisfaction Survey