

Digital Banking and Its Impact on Consumer Financial Behaviour

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Abstract

The rapid development of digital technologies has transformed the structure and functioning of the banking sector. Digital banking has expanded access to financial services through internet banking, mobile banking applications, digital payments, electronic wallets, automated financial services, and other technology-enabled platforms. These developments have not only changed the way consumers interact with financial institutions but have also influenced their saving, spending, borrowing, investment, payment, and financial-management behaviours. This paper examines the impact of digital banking on consumer financial behaviour from theoretical and empirical perspectives. It explores how technological accessibility, convenience, transaction speed, personalization, financial information, and reduced transaction costs influence consumers' financial decisions.

The study reviews relevant theoretical perspectives, including the Technology Acceptance Model, Theory of Planned Behaviour, financial inclusion theory, behavioural economics, and the concept of bounded rationality. Digital banking can improve financial inclusion by reducing geographical and transaction barriers and enabling consumers to access financial services at lower costs. At the same time, the convenience and immediacy of digital transactions can encourage impulsive spending, increase the frequency of consumption, and reduce consumers' psychological awareness of monetary expenditure. Digital credit and buy-now-pay-later arrangements can further influence borrowing behaviour by reducing perceived barriers to credit access. Conversely, digital banking platforms can facilitate budgeting, transaction monitoring, automated savings, investment planning, and personalized financial education.

The paper also examines the role of demographic and socioeconomic characteristics in determining consumers' adoption and use of digital banking services. Age, income, education, technological literacy, trust, perceived security, and digital infrastructure can significantly influence digital-finance behaviour. Cybersecurity concerns, privacy risks, digital fraud, technological exclusion, and information asymmetry remain important challenges. The paper argues that the impact of digital banking is therefore multidimensional: it can simultaneously promote financial inclusion and financial capability while creating new forms of behavioural and financial risk.

The study concludes that digital banking has become an important determinant of modern consumer financial behaviour. Its overall impact depends on the interaction between technology design, consumer financial literacy, regulatory safeguards, cybersecurity, and individual behavioural characteristics. Policies aimed at maximizing the benefits of digital banking should therefore combine technological innovation with consumer protection, digital financial education, responsible lending practices, data privacy, and inclusive digital infrastructure.

Keywords: Digital Banking, Consumer Behaviour, Financial Behaviour, Digital Finance, Mobile Banking, Financial Inclusion, Digital Payments, Financial Literacy, FinTech, Consumer Spending, Digital Credit, Banking Technology.

1. Introduction

The banking sector has experienced a profound transformation as a result of digitalization. Traditional banking once required consumers to visit physical branches to deposit money, withdraw cash, transfer funds, apply for loans, or obtain account information. Technological developments have increasingly shifted these activities toward digital channels.

Digital banking encompasses a broad range of services, including:

- internet banking;
- mobile banking;
- mobile payment systems;
- digital wallets;
- electronic fund transfers;
- automated investment services;
- digital lending;
- online account management;
- biometric authentication;
- artificial intelligence-based financial services.

The growth of digital banking has significantly altered the relationship between consumers and financial institutions. Banking services can now be accessed continuously and from geographically distant locations. Consumers can transfer funds, make purchases, monitor balances, pay bills, and access credit through mobile devices.

This transformation has important economic implications because financial behaviour influences household welfare, savings, debt accumulation, investment, consumption, and financial resilience.

Digital banking reduces transaction costs and increases convenience. However, these same characteristics can influence consumer psychology. When payments become faster and less tangible, consumers may experience less awareness of the money being spent. Digital credit can also make borrowing easier, potentially increasing household indebtedness if consumers do not adequately evaluate repayment obligations.

At the same time, digital technologies can improve financial management. Banking applications may provide transaction histories, spending summaries, automated savings tools, alerts, budgeting features, and investment information.

Thus, digital banking can produce both positive and negative effects.

The central research question is:

How does digital banking influence consumer financial behaviour, and what factors determine whether its effects are beneficial or harmful?

2. Background of the Study

Digitalization has transformed financial services globally.

The development of smartphones, high-speed internet, cloud computing, artificial intelligence, biometric authentication, and digital payment infrastructure has accelerated the transition from conventional banking to digital financial ecosystems.

The World Bank's Global Findex research has documented the increasing importance of digital financial services in expanding access to formal financial accounts and payments, particularly in developing economies.

Digital banking is especially important for countries where traditional banking infrastructure is geographically limited.

A consumer in a remote location may now access financial services through a mobile device without regularly visiting a bank branch.

This development has important implications for financial inclusion.

However, access alone does not guarantee beneficial financial outcomes.

Consumers must also possess:

- digital literacy;
- financial literacy;
- awareness of cybersecurity;
- knowledge of credit costs;
- ability to evaluate financial products.

Therefore, digital financial inclusion should be understood as more than technological access.

3. Objectives of the Study

The objectives of this paper are:

1. To examine the concept and evolution of digital banking.
2. To analyse the relationship between digital banking and consumer financial behaviour.
3. To examine the effects of digital banking on consumer spending patterns.
4. To analyse its impact on saving and investment behaviour.
5. To examine the influence of digital credit on borrowing behaviour.
6. To explore the relationship between digital banking and financial inclusion.
7. To examine the role of financial and digital literacy in digital banking adoption.
8. To identify behavioural risks associated with digital financial services.
9. To examine cybersecurity, privacy, and consumer-protection challenges.
10. To provide policy recommendations for responsible digital banking development.

4. Conceptual Framework

The relationship between digital banking and consumer financial behaviour can be conceptualized as follows:

Digital Banking Adoption

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Convenience + Accessibility + Speed + Information Availability + Lower Transaction Costs

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Changes in Financial Decision-Making

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Consumer Financial Behaviour

- Spending
- Saving
- Borrowing
- Investing
- Payments
- Budgeting
- Financial Planning

**Financial Outcomes**

- Financial Inclusion
- Financial Capability
- Household Welfare
- Financial Resilience

The relationship is moderated by:

Financial Literacy + Digital Literacy + Income + Age + Trust + Security + Regulation

5. Meaning of Digital Banking

Digital banking refers to the delivery of banking products and services through electronic and digital channels.

It differs from simple online access because modern digital banking increasingly involves integrated technological systems that allow consumers to complete financial activities remotely.

Major forms include:

5.1 Internet Banking

Internet banking enables consumers to access accounts and perform transactions through web-based platforms.

5.2 Mobile Banking

Mobile banking allows consumers to perform banking activities through smartphone applications.

5.3 Digital Payments

Digital payments include:

- electronic transfers;
- QR-code payments;
- card payments;
- mobile payments;
- account-to-account transfers.

5.4 Digital Wallets

Digital wallets allow users to store payment credentials or monetary value electronically.

5.5 Digital Lending

Digital lending platforms can automate parts of the credit application, evaluation, approval, and disbursement processes.

5.6 Digital Investment Services

Technology platforms can provide access to:

- securities;
- mutual funds;
- savings products;
- automated investment services.

6. Evolution of Digital Banking

The development of digital banking can be broadly divided into several stages.

Stage 1: ATM Banking

Automated teller machines reduced dependence on branch-based cash services.

Stage 2: Internet Banking

Internet banking allowed consumers to conduct account-management activities remotely.

Stage 3: Mobile Banking

Smartphones expanded access to financial services.

Stage 4: Digital Payments

Digital payment ecosystems significantly increased transaction speed and convenience.

Stage 5: FinTech Integration

Financial technology firms introduced innovative products involving payments, credit, investment, insurance, and financial management.

Stage 6: Intelligent Digital Banking

Artificial intelligence, machine learning, and data analytics increasingly enable:

- personalized financial recommendations;
- automated fraud detection;
- credit scoring;
- conversational banking;
- predictive financial services.

7. Theoretical Perspectives

7.1 Technology Acceptance Model

The Technology Acceptance Model proposed by Davis emphasizes perceived usefulness and perceived ease of use as major determinants of technology adoption.

Applied to digital banking:

Perceived Usefulness + Perceived Ease of Use → Digital Banking Adoption

Consumers are more likely to use digital banking when they believe it saves time, reduces effort, and improves financial management.

7.2 Theory of Planned Behaviour

The Theory of Planned Behaviour suggests that behavioural intentions are influenced by:

- attitudes;
- subjective norms;
- perceived behavioural control.

Digital banking adoption may therefore depend on consumers' perceptions of its benefits, social acceptance, and confidence in their ability to use digital services.

7.3 Financial Inclusion Theory

Digital banking can reduce geographical and economic barriers to financial services.

This can increase access among:

- rural households;
- low-income consumers;
- small businesses;
- previously underserved populations.

7.4 Behavioural Economics

Behavioural economics emphasizes that consumers do not always make perfectly rational financial decisions.

Digital interfaces can influence behaviour through:

- convenience;
- default options;
- notifications;
- personalized recommendations;
- transaction speed.

7.5 Bounded Rationality

Consumers face limitations in:

- information;
- time;
- attention;
- financial knowledge.

Digital platforms can reduce some information constraints but may also create information overload.

8. Digital Banking and Consumer Spending

One of the most significant effects of digital banking is its influence on spending behaviour.

Digital payments reduce the physical and psychological barriers associated with cash transactions.

With cash:

Payment → Physical Money Decreases

With digital payment:

Payment → Digital Balance Changes

The psychological experience may therefore differ.

Consumers may become less aware of the immediate cost of purchases when payments are frictionless.

Digital platforms can also make purchases easier through:

- one-click payment;
- stored cards;
- mobile wallets;
- automated checkout.

These technologies can potentially increase purchase frequency.

However, digital transaction records can simultaneously improve spending awareness.

Consumers can review:

- monthly expenditure;
- merchant categories;
- recurring payments;
- transaction histories.

Thus, digital banking may either increase or improve spending management depending on how consumers interact with the technology.

9. Digital Banking and Saving Behaviour

Digital banking can positively influence saving behaviour.

Applications can provide:

- automated transfers;
- recurring deposits;
- savings goals;
- balance notifications;
- spending analysis.

Automation reduces the need for consumers to make repeated decisions.

For example:

Income → Automatic Transfer → Savings Account

This can encourage consistent saving.

However, digital convenience may also increase consumption opportunities.

Therefore, the net effect depends on whether consumers use digital tools primarily for financial management or consumption.

10. Digital Banking and Investment Behaviour

Digital platforms have reduced barriers to investment.

Consumers can access investment information and financial products through mobile applications.

Advantages include:

- lower transaction costs;
- easier account opening;
- greater information availability;
- real-time portfolio monitoring.

However, easier investment access can also increase speculative behaviour.

Real-time price information and frequent notifications may encourage excessive trading.

Behavioural biases such as:

- overconfidence;
- loss aversion;
- herd behaviour;
- recency bias

may therefore become important in digital investment environments.

11. Digital Banking and Borrowing Behaviour

Digital banking has significantly simplified credit access.

Digital lending platforms can automate:

- application;
- identity verification;
- credit assessment;
- approval;
- disbursement.

This can benefit consumers who face barriers to conventional banking.

However, easier credit access creates potential risks.

Consumers may borrow more frequently because digital credit is easily accessible.

The process can be represented as:

Easy Credit Access → Lower Borrowing Friction → Higher Credit Use

If income does not increase correspondingly:

Higher Borrowing → Higher Debt-Service Obligations → Financial Stress

Responsible digital lending is therefore essential.

12. Buy-Now-Pay-Later and Consumer Behaviour

Buy-now-pay-later arrangements illustrate the relationship between financial technology and consumer psychology.

The consumer receives the product immediately while payment is divided over time.

This can reduce the perceived immediate cost of consumption.

Potential benefits include:

- payment flexibility;
- short-term liquidity management.

Potential risks include:

- overconsumption;
- multiple simultaneous obligations;
- late-payment charges;
- inadequate understanding of repayment conditions.

Consumer-protection regulation is therefore important in digital credit markets.

13. Digital Banking and Financial Inclusion

Financial inclusion refers to access to appropriate and affordable financial services.

Digital banking can expand financial inclusion by reducing:

- geographic barriers;
- transaction costs;
- branch dependence;
- account-access barriers.

Digital payments can also facilitate participation in formal economic activity.

However, digital exclusion can occur when consumers lack:

- smartphones;
- internet connectivity;
- digital literacy;
- identification documents;

- trust in digital systems.

Therefore:

Digitalization ≠ Automatic Inclusion

Effective digital financial inclusion requires accessible infrastructure and consumer capabilities.

14. Digital Banking and Financial Literacy

Financial literacy is the ability to understand and use financial information effectively.

Digital banking increases the importance of financial literacy because consumers encounter increasingly complex financial products.

Important knowledge areas include:

- interest rates;
- fees;
- credit costs;
- investment risk;
- fraud prevention;
- data privacy.

A digitally connected consumer without financial literacy may still make poor financial decisions.

Consequently:

Digital Literacy + Financial Literacy → More Effective Digital Financial Behaviour

15. Digital Literacy

Digital literacy refers to the ability to use digital technologies safely and effectively.

It includes:

- navigating digital platforms;
- identifying scams;
- protecting passwords;
- recognizing fraudulent messages;
- understanding privacy settings.

Low digital literacy can increase vulnerability to financial fraud.

16. Cybersecurity and Consumer Behaviour

Digital banking creates new cybersecurity risks.

Common threats include:

- phishing;
- identity theft;
- account takeover;
- malware;
- social engineering;
- fraudulent payment requests.

Security incidents can reduce consumer trust.

The relationship can be expressed as:

Perceived Security → Trust → Digital Banking Adoption

If perceived security declines:

Security Concerns → Lower Trust → Reduced Adoption

Financial institutions must therefore invest in strong cybersecurity systems and consumer education.

17. Privacy and Data Protection

Digital banking generates large amounts of consumer data.

This may include:

- transaction history;
- spending patterns;
- income information;
- credit behaviour;
- location information.

Data analytics can improve personalization but raises privacy concerns.

Consumers may not always understand:

- what data are collected;
- how data are used;
- who can access them;
- how long data are retained.

Strong data-governance frameworks are therefore essential.

18. Personalization and Artificial Intelligence

Artificial intelligence allows banks to analyse consumer data and personalize services.

Applications include:

- personalized financial recommendations;
- fraud detection;
- automated customer support;
- credit assessment;
- spending analysis.

Personalization can help consumers identify financial patterns.

However, algorithmic systems may also create concerns involving:

- bias;
- transparency;
- discrimination;
- excessive targeting.

Human oversight and explainability are therefore important.

19. Demographic Factors

Digital banking behaviour varies across demographic groups.

Age

Younger consumers generally have greater familiarity with digital technologies, although adoption depends on many factors beyond age.

Income

Higher-income consumers may have greater access to digital devices and financial products.

Education

Education can improve technological and financial literacy.

Location

Urban consumers may benefit from stronger digital infrastructure, although mobile technologies increasingly reduce geographic differences.

Gender

Digital financial access can also vary across gender depending on social, economic, and technological conditions.

20. Digital Banking and Consumer Financial Management

Digital banking can improve financial management through:

- real-time balance information;
- transaction categorization;
- automatic bill payment;
- savings reminders;
- spending alerts.

These tools can reduce information costs.

A consumer can monitor financial activity without waiting for monthly paper statements.

This can increase financial awareness.

21. Digital Banking and Behavioural Biases

Digital financial environments can amplify certain behavioural biases.

Present Bias

Consumers may prefer immediate consumption over future saving.

Overconfidence

Easy access to investment platforms can create excessive confidence.

Herd Behaviour

Digital information and social-media-driven financial trends may influence investment decisions.

Mental Accounting

Consumers may treat different digital accounts differently despite having identical economic value.

Loss Aversion

Digital portfolio monitoring may cause consumers to react excessively to short-term losses.

Understanding these behavioural factors is essential for designing consumer-friendly digital financial services.

22. Empirical Perspective

The empirical literature generally indicates that digital financial services influence consumer financial behaviour, but the effects vary across populations and financial products.

Research on financial inclusion suggests that digital financial services can expand access to formal financial systems.

Research on digital payments suggests that greater payment convenience can influence consumption patterns.

Research on financial technology indicates that digital platforms can reduce transaction costs and improve access to financial products.

At the same time, research on behavioural finance suggests that reduced payment salience and increased transaction convenience may influence spending and borrowing decisions.

Therefore, empirical evidence supports a **multidimensional relationship** rather than a universally positive or negative effect.

23. Digital Banking in Developing Economies

Digital banking has particular significance for developing economies.

Traditional banking systems may face:

- limited branch networks;
- high operating costs;
- geographic barriers;
- low account penetration.

Mobile-based financial services can address some of these constraints.

Digital banking can support:

- household payments;
- remittances;
- small-business transactions;
- government transfers;
- savings;
- credit access.

However, infrastructure and digital-literacy gaps remain important barriers.

24. Digital Banking and Small Businesses

Although this paper focuses on consumer behaviour, household financial behaviour is closely connected with small-business activity.

Digital banking can enable entrepreneurs to:

- receive digital payments;
- maintain transaction records;
- access credit;
- manage cash flows;
- pay suppliers.

This can contribute to formalization and financial inclusion.

25. Digital Banking and Economic Development

The broader economic effects of digital banking can be significant.

The transmission mechanism can be represented as:

Digital Banking

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Lower Transaction Costs

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Greater Financial Inclusion

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Higher Financial Participation

↓

Improved Allocation of Savings and Credit

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Economic Development

However, these benefits depend on effective regulation and infrastructure.

26. Challenges of Digital Banking

Major challenges include:

1. Cybersecurity risks.
2. Digital fraud.
3. Privacy concerns.
4. Digital exclusion.
5. Financial illiteracy.
6. Over-indebtedness.
7. Algorithmic bias.
8. Consumer-data misuse.
9. Technology dependence.
10. Operational risks.
11. Systemic cyber risks.
12. Inadequate consumer protection.

27. Policy Recommendations

27.1 Strengthen Digital Financial Literacy

Governments and financial institutions should provide education concerning:

- digital payments;
- credit costs;
- investment risks;
- cybersecurity;
- fraud prevention.

27.2 Improve Cybersecurity

Financial institutions should strengthen:

- authentication;
- fraud detection;
- transaction monitoring;
- customer alerts.

27.3 Strengthen Consumer Protection

Consumers should receive clear information about:

- fees;
- interest rates;
- repayment conditions;
- data usage.

27.4 Promote Responsible Digital Lending

Digital credit providers should assess borrowers' ability to repay.

27.5 Improve Digital Infrastructure

Governments should expand reliable and affordable internet and digital-payment infrastructure.

27.6 Protect Consumer Data

Data-protection frameworks should ensure responsible collection and use of financial information.

27.7 Encourage Transparent Algorithms

Financial institutions should improve transparency in automated credit and financial decision-making.

27.8 Promote Inclusive Design

Digital banking applications should be accessible to:

- older consumers;
- low-literacy users;
- people with disabilities;
- rural populations.

28. Future Research Directions

Future research could examine:

1. The relationship between digital payments and household consumption.
2. Digital credit and household indebtedness.
3. Artificial intelligence and financial decision-making.
4. Digital banking and savings behaviour.
5. Financial literacy and digital-finance adoption.
6. Cybersecurity and consumer trust.
7. Digital banking among rural households.
8. Gender differences in digital financial inclusion.
9. Buy-now-pay-later services and consumer spending.
10. Digital banking and financial resilience.
11. Open banking and consumer behaviour.
12. Central bank digital currencies and household financial behaviour.

29. Conclusion

Digital banking has fundamentally transformed the relationship between consumers and financial institutions. Banking services that once required physical interaction are increasingly available through smartphones, computers, digital wallets, and integrated financial platforms. The consequences extend beyond technological convenience. Digital banking influences the way consumers spend, save, borrow, invest, transfer money, and manage financial resources.

One of the most important benefits is greater financial inclusion. Digital banking can reduce geographical and transaction barriers, allowing consumers to access formal financial services at lower costs. Digital platforms can also improve financial management by providing real-time information, automated savings tools, budgeting functions, transaction histories, and personalized recommendations.

However, digital banking can also create behavioural risks. Frictionless payments may reduce the psychological awareness associated with spending. Easy access to digital credit may increase borrowing. Continuous investment information may encourage excessive trading. Personalized digital marketing can influence consumption decisions.

These effects demonstrate that technology itself does not determine financial outcomes. Consumer characteristics and institutional conditions matter.

Financial literacy and digital literacy are particularly important. A consumer who understands financial products, interest rates, credit costs, investment risks, and cybersecurity is better positioned to benefit from digital banking.

Trust is another critical factor. Consumers must believe that their money, personal information, and transactions are secure.

The overall impact of digital banking can therefore be summarized as:

Digital Technology

- **Greater Accessibility and Convenience**
- **Changes in Financial Decision-Making**
- **Changes in Spending, Saving, Borrowing and Investment**
- **Financial and Economic Outcomes**

The direction of these outcomes depends on consumer behaviour, financial literacy, technology design, regulation, and economic circumstances.

Digital banking should therefore not be viewed simply as a technological innovation. It is an important economic and behavioural transformation.

The future of digital banking should focus on creating systems that are not only fast and convenient but also **secure, transparent, inclusive, responsible, and financially empowering**.

A balanced approach is essential. Innovation should be encouraged, but it should operate alongside strong consumer protection, cybersecurity, data governance, responsible lending, and financial education.

Ultimately, digital banking has the potential to improve consumer welfare and contribute to broader financial inclusion and economic development, provided that technological progress is accompanied by appropriate institutional safeguards and informed consumer decision-making.

References

1. Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50(2), 179–211.
2. Allen, F., Demirgüç-Kunt, A., Klapper, L., & Martinez Peria, M. S. (2016). The foundations of financial inclusion: Understanding ownership and use of formal accounts. *Journal of Financial Intermediation*, 27, 1–30.

3. Arner, D. W., Barberis, J., & Buckley, R. P. (2016). The evolution of FinTech: A new post-crisis paradigm? *Georgetown Journal of International Law*, 47(4), 1271–1319.
4. Beck, T., Pamuk, H., & Demirgüç-Kunt, A. (2008). Banking and economic development. *World Bank Policy Research Working Paper*.
5. Berger, A. N. (2003). The economic effects of technological progress: Evidence from the banking industry. *Journal of Money, Credit and Banking*, 35(2), 141–176.
6. Carlin, B. I., Olafsson, A., & Pagel, M. (2019). FinTech adoption and payment diversion. *AEA Papers and Proceedings*, 109, 83–87.
7. Claessens, S., Frost, J., Turner, G., & Zhu, F. (2018). Fintech credit markets around the world: Size, drivers and policy issues. *BIS Quarterly Review*, September, 29–49.
8. Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly*, 13(3), 319–340.
9. Demirgüç-Kunt, A., Klapper, L., Singer, D., & Ansar, S. (2022). *The Global Findex Database 2021: Financial Inclusion, Digital Payments, and Resilience in the Age of COVID-19*. World Bank.
10. Demirgüç-Kunt, A., Klapper, L., Singer, D., Ansar, S., & Hess, J. (2018). *The Global Findex Database 2017: Measuring Financial Inclusion and the FinTech Revolution*. World Bank.
11. Gomber, P., Koch, J. A., & Siering, M. (2017). Digital finance and FinTech: Current research and future research directions. *Journal of Business Economics*, 87, 537–580.
12. Jack, W., & Suri, T. (2014). Risk sharing and transactions costs: Evidence from Kenya's mobile money revolution. *American Economic Review*, 104(1), 183–223.
13. King, B. (2012). *Bank 3.0: Why Banking Is No Longer Somewhere You Go but Something You Do*. Marshall Cavendish.
14. Klee, E. (2008). How people pay: Evidence from grocery store data. *Journal of Monetary Economics*, 55(3), 526–542.
15. Laeven, L., Levine, R., & Michalopoulos, S. (2015). Financial innovation and endogenous growth. *Journal of Financial Intermediation*, 24(1), 1–24.
16. Lusardi, A., & Mitchell, O. S. (2014). The economic importance of financial literacy: Theory and evidence. *Journal of Economic Literature*, 52(1), 5–44.
17. McKinsey & Company. (2023). *The State of Digital Payments and Banking*. McKinsey Global Institute.
18. Mishkin, F. S. (2007). *The Economics of Money, Banking, and Financial Markets* (8th ed.). Pearson.
19. Ozili, P. K. (2018). Impact of digital finance on financial inclusion and stability. *Borsa Istanbul Review*, 18(4), 329–340.
20. Ozili, P. K. (2020). Financial inclusion and FinTech during COVID-19 crisis: Policy solutions. *SSRN Electronic Journal*.
21. Puschmann, T. (2017). FinTech. *Business & Information Systems Engineering*, 59, 69–76.
22. Sahi, A. M., Khalid, H., Abbas, A. F., & Khatib, S. F. A. (2021). The evolving research of customer adoption of digital payment: Learning from content and statistical analysis

- of the literature. *Journal of Open Innovation: Technology, Market, and Complexity*, 7(4), 230.
23. Schär, F. (2021). Decentralized finance: On blockchain- and smart contract-based financial markets. *Federal Reserve Bank of St. Louis Review*, 103(2), 153–174.
24. Shiller, R. J. (2015). *Irrational Exuberance* (3rd ed.). Princeton University Press.
25. Suri, T., & Jack, W. (2016). The long-run poverty and gender impacts of mobile money. *Science*, 354(6317), 1288–1292.
26. Thaler, R. H. (2015). *Misbehaving: The Making of Behavioral Economics*. W. W. Norton.
27. Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS Quarterly*, 27(3), 425–478.
28. World Bank. (2022). *The Global Findex Database 2021: Financial Inclusion, Digital Payments, and Resilience in the Age of COVID-19*. World Bank.
29. World Bank. (2024). *Global Economic Prospects*. World Bank.
30. Bank for International Settlements. (2024). *Annual Economic Report 2024*. Bank for International Settlements.
31. International Monetary Fund. (2024). *Global Financial Stability Report*. International Monetary Fund.
32. International Monetary Fund. (2024). *World Economic Outlook*. International Monetary Fund.
33. Reserve Bank of India. (2024). *Annual Report 2023–24*. Reserve Bank of India.
34. Reserve Bank of India. (2024). *Report on Trend and Progress of Banking in India*. Reserve Bank of India.
35. Reserve Bank of India. (2024). *Financial Stability Report*. Reserve Bank of India.