



# Barriers and Drivers Of E-Banking Acceptance in Nationalized and Scheduled Banks: A Case Study of Nagpur District

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## Abstract

The transition to e-banking has revolutionized the banking industry, offering enhanced convenience, efficiency, and accessibility to customers. This case study investigates the barriers and drivers of e-banking acceptance in nationalized and scheduled banks within the Nagpur District of India. By examining a wide array of factors including technological awareness, perceived ease of use, perceived usefulness, trust, security concerns, and demographic influences, this research aims to provide a nuanced understanding of customer attitudes towards e-banking. Through a comprehensive review of existing literature and empirical data, this study identifies key impediments such as security concerns, lack of technological infrastructure, and limited digital literacy, while also highlighting drivers including convenience, time-saving, and enhanced service quality. The comparative analysis between nationalized and scheduled banks reveals distinct challenges and opportunities, offering valuable insights for banking institutions to tailor their strategies for increasing e-banking adoption. This study contributes to the academic discourse on digital banking and provides actionable recommendations for policymakers and bank executives to foster greater acceptance of e-banking services in the Nagpur District and similar regions.

**Keywords – Banking Industry, Digital Literacy, Financial Inclusion, Service Quality, Customer Perceptions**

## Introduction

The landscape of banking services has evolved significantly with the advent of electronic banking (e-banking), offering customers unprecedented convenience, accessibility, and efficiency in financial transactions. In India, this transformation is particularly noteworthy, driven by advancements in technology, increasing internet penetration, and a growing demand for digital solutions. Nationalized banks, characterized by their extensive branch networks and government ownership, coexist with scheduled banks, including private sector entities and regional rural banks, each offering distinct approaches to digital banking services.

The Nagpur District, situated in Maharashtra, India, serves as a pivotal economic hub where both nationalized and scheduled banks play crucial roles in catering to diverse customer needs. Understanding the factors influencing customer acceptance of e-banking services within these banking structures is essential for optimizing service delivery and enhancing customer satisfaction. While nationalized banks traditionally enjoy a reputation for security and reliability, scheduled banks often lead in technological innovation and customer-centric service offerings.

This study aims to explore the barriers and drivers of e-banking acceptance among customers of nationalized and scheduled banks in the Nagpur District. By conducting a detailed analysis encompassing technological awareness, perceived ease of use, perceived usefulness, trust, security concerns, and demographic influences, this research seeks to uncover nuanced insights into customer perceptions and behaviors towards e-banking. Through a comparative case study approach, this research will delineate the distinctive challenges and opportunities faced by both types of banks in promoting e-banking adoption.

By bridging gaps in existing literature and incorporating empirical findings, this study contributes to the broader discourse on digital banking adoption in India. It provides actionable insights for banking institutions to refine their strategies, address customer concerns, and capitalize on emerging opportunities in the dynamic landscape of e-banking. Ultimately, this research aims to support informed decision-making among policymakers and banking executives, fostering greater financial inclusion and enhancing the overall banking experience in the Nagpur District and similar regions.

## Literature review

V. Suresh, (2022) Customers hold private sector banks in greater esteem than public sector banks when it comes to service aspects. Customers' greater interest in transacting with private





sector banks, as opposed to public sector banks, may explain why these institutions are held to higher standards. Customers have higher hopes for private sector banks than for public sector ones, suggesting that they will be more satisfied overall. To evaluate financial institutions' service quality, this approach was based on the SERVQUAL methodology's foundational elements. For this data collection, 30 respondents were chosen at random from each bank.

In 2022, Behin (M. H.) The results of this survey highlight the fact that private sector bank clients have more significant difficulties while using E-banking services in comparison to public sector bank customers. Online banking services are well-received by consumers of both public and private sector banks, according to the research.

Tyagi, M., & Fatima, (2022) set out to compare and contrast SBI and ICICI Bank's online banking services in an effort to learn more about the elements that influence consumers' opinions of both banks' online banking offerings and their expectations for the future of online banking. A descriptive research approach was chosen as the technique to accomplish the project's goal. A systematic questionnaire is developed and 150 clients from SBI and ICICI bank are selected to participate in this study. When comparing SBI Bank and ICICI Bank, the research found that SBI Bank had the superior E-banking service. Internet banking in India is expected to see fast expansion in the future, thanks to available technology that guarantees the safety and privacy of e-transactions and the standards set by the RBI on several elements of the industry.

Researchers Dhanya B. K. and V. P. Velmurugan (2022) looked at how different demographics impacted trust, satisfaction, value, and quality of service when it came to online banking. In the Thiruvananthapuram area of Kerala, India, 290 clients from three different banks—Canara, Punjab National, and Indian Overseas Bank—were interviewed as part of a study. The study found that customers with greater levels of education, better incomes, and longer histories of utilizing Internet banking for a majority of their financial accounts tended to have more favorable perceptions and attitudes about e-banking services. Gender and age were shown to have little impact on consumers' expectations about the Internet banking service's efficiency, value, satisfaction, and trustworthiness.

An analysis of the online banking services offered by a few public and commercial banks in Gujarat was carried out by Rahulkumar, M., and Dhruv, M. (2021). Customers' opinions on the North Gujarat Region's public and commercial banks' electronic banking services are the main data point that this study needs. Analyzing client perceptions has brought to substantial evolutions in this field. The survey found that private sector banks' online banking services were more well-liked by consumers than those of public sector banks.

The current state of electronic banking in India's banking sector is summarized by Nithya, C., and Mahadeswari, P. (2021). Data for the research came from a variety of sources, including RBI websites, publications on banking trends and growth in India, and RBI annual reports. With the use of new technologies like AI-MML, big data, blockchain, cloud computing, robotic process computerization, and many more, financial institutions may now cater to diverse groups of customers with a focus on their needs. Using passwords and secondary verification in virtual banking helps to reduce the scope of bank frauds. As a result of technological advancements, competition among banks has increased, leading to greater services for customers.

Researchers Nagadeepa, C. (2020) looked the demographic variations among rural clients in Tumkur Taluk to determine the impact of e-banking adoption. This research looks at the e-banking services in the Tumkur area of Bangalore and how different demographic factors, such as age, gender, and profession, affect them. In order to gather main data, the research used structured questionnaires. A 5-point Likert scale was used to design the questionnaire's questions. One hundred surveys were gathered in all. The study's findings show that e-banking acceptance varies significantly by demographic variables like consumers' gender, age, and employment. The younger generation largely embraced the services. At home, they stick to what they know: the old-fashioned banking system. According to the findings, there has to be a greater effort to raise consciousness among the elderly and win over all kinds of consumers. In 2020, S.P. Dhandayuthapani In comparison to nationalized banks, private sector banks





provide better management in terms of transparency, efficiency, and customer satisfaction according to the research. It is clear that all government employees have their paychecks deposited into a nationalized bank. Although the majority of services provided by both the public and private sectors are same, respondents are more likely to favor the former.

Kolte, D. M., & Humbe, D. V. R. (2020) investigated Aurangabad students' familiarity with and use of UPI/BHIM services. The sample for the study consisted of 200 students drawn at random from the city of Aurangabad. Students often utilize UPI/BHIM for payments up to Rs. 10,000/-, and they are enthusiastic about real-time payments and their settlement in bank accounts. Apps developed by third parties, such as PhonePe, are the most popular UPI/BHIM apps, according to the study.

Researchers Sankararaman, Suresh, and Thomas (2020) looked at how people felt about UPI transactions. Using structured questionnaires, 119 samples were obtained for this descriptive study. To gather the samples, the researcher has used the Convenience sampling approach. The vast majority of people who took the survey have heard of UPI and are familiar with it as a digital payment option; furthermore, they have selected Google Pay as their preferred Virtual Payment Address. Among the many digital payment options, some respondents have made UPI their go-to and have used it at every single establishment included in the survey, including supermarkets, pharmacies, online retailers, hotels, and clothing boutiques.

Author: M. Vairavani In terms of client satisfaction with e-banking, research indicates that perceived threats and security-related issues have a significant role. Customers' concerns about hacking and the potential theft of their money make them hesitant to use online banking services. However, banks are making great efforts to provide their customers the finest security options. Free online banking is just one more way banks entice clients. Customers of different ages have different views and levels of use of e-banking services, according to the survey. In order to enhance the online banking experience, financial institutions should prioritize catering to customers of all ages. It was also found that customers' views on e-banking services vary depending on their profession.

In 2017, Agrawal Most individuals hold accounts with private banks, according to the research. Customers of public banks are more likely to have issues than those of private banks. Results show that private sector banks' banking services are well-received by the general public.

In 2016, Padmajathi and Reshaha published. The researchers in this study compared how clients of public and private banks felt about their online banking services. For online banking to be a success, banks must fully commit to the platform and work to understand their customers' demands. Customer pleasure is the final objective of electronic banking, which aims to make online financial transactions easier and safer.

### **Objectives of the study**

- To examine the level of technological awareness and digital literacy among customers of nationalized and scheduled banks, and their impact on e-banking adoption.
- To assess customer trust levels in e-banking systems and security concerns associated with digital transactions, distinguishing between perceptions of nationalized and scheduled banks.
- To provide practical recommendations for nationalized and scheduled banks in the Nagpur District to enhance their e-banking services, improve customer trust, and mitigate barriers to adoption.

### **Research methodology**

This study employs a mixed-methods research approach to investigate the barriers and drivers of e-banking acceptance in nationalized and scheduled banks within the Nagpur District. The research begins with a comprehensive literature review to identify existing theories, empirical studies, and key factors influencing e-banking adoption globally and specifically in the Indian context. This literature review serves as a foundation to develop a conceptual framework that guides the empirical investigation. Quantitative data will be collected through structured surveys administered to a representative sample of customers from nationalized and scheduled banks in the Nagpur District. The survey instrument will be designed to capture demographic information, technological awareness, perceptions of ease of use and usefulness of e-banking





services, trust in banking institutions, security concerns related to digital transactions, adoption behavior.

### Data analysis and discussion

**Table 1: Key Services Offered by Transactional Internet Banks  
(Percentage of Internet Banks)**

	All Banks	Public Sector Banks	Private Sector Banks	Foreign Banks
<b>View-only Functions</b>				
1. Balance Enquiry	100.0	100.0	100.0	100.0
2. Monthly statement by e-mail	8.2	0.0	17.6	16.7
3. Interest rates Updates	100.0	100.0	100.0	100.0
4. Foreign exchange rates Updates	24.5	7.7	41.2	50.0
5. Market Watch	14.3	0.0	23.5	50.0
6. One view account	2.0	0.0	5.9	0.0
7. Demonstration of I-Banking	42.9	42.3	47.1	33.3
<b>Action/Account Control Functions</b>				
8. Funds Transfer (Self-account)	85.7	84.6	82.4	100.0
9. Third party funds transfer	83.7	80.8	82.4	100.0
10. Bills Payment	59.2	61.5	47.1	83.3
11. Requests/Standing Instructions	95.9	100.0	88.2	100.0
12. Cheque/Enquiry status	87.8	96.2	70.6	100.0
13. Receive Alerts	51.0	38.5	64.7	66.7
14. TDS Enquiry	18.4	11.5	29.4	16.7
15. Customer correspondence	100.0	100.0	100.0	100.0
16. Change password and User Profile	100.0	100.0	100.0	100.0
<b>Applying for New Banking Services</b>				
17. Account Opening application	30.6	15.4	35.3	83.3
18. Loan applications	32.7	19.2	35.3	83.3
19. Deposit Applications	51.0	26.9	70.6	100.0
<b>More Advanced Transactions</b>				
20. Insurance	4.1	0.0	11.8	0.0
21. Demat holdings	22.4	11.5	29.4	50.0
22. Brokerage	4.1	0.0	11.8	0.0
23. Investments	28.6	15.4	35.3	66.7
24. Credit card operations/payments	26.5	15.4	23.5	83.3
25. Trading online	24.5	15.4	35.3	33.3
26. Online shopping	22.4	7.7	41.2	33.3
27. Charity online	18.4	7.7	29.4	33.3
28. Online tax payment	32.7	50.0	17.6	0.0
29. Online Ticket Booking	46.9	53.8	41.2	33.3
30. Corporate Internet Banking	77.6	80.8	70.6	83.3
31. Privacy Statement	93.9	92.3	94.1	100.0
<b>BASIC</b>	59.2	61.5	47.1	83.3
<b>PREMIUM</b>	49.0	42.3	47.1	83.3

The table provides a detailed overview of the key services offered by transactional internet banks across different categories: view-only functions, action/account control functions, applying for new banking services, more advanced transactions, and privacy statements. Here's a paragraph analysis focusing on the trends and insights derived from Table 1:



The data reveals that balance enquiry and interest rate updates are universally offered by internet banks surveyed, irrespective of their classification as public sector, private sector, or foreign banks, reflecting these services' fundamental importance. However, notable disparities emerge in other functionalities. For instance, while monthly statements by email are minimal across all banks at 8.2%, private sector banks lead significantly with 17.6%, suggesting a higher inclination towards digital communication among private banks. Similarly, foreign exchange rates updates and market watch functionalities exhibit substantial variance, with foreign banks notably prioritizing these features at 50.0% and 50.0%, respectively, compared to 7.7% and 0.0% in public sector banks. Fund transfer capabilities, including third-party transfers and bills payment, are widely implemented, yet foreign banks lead in completeness, indicating a broader range of service offerings catering to diverse customer needs. Conversely, basic functionalities like TDS enquiry and charity online services are underrepresented across all bank categories, indicating potential areas for enhancement in digital service portfolios.

This analysis highlights the competitive landscape of e-banking services, emphasizing how different bank classifications prioritize functionalities to meet customer expectations and operational objectives. The data underscores the importance of continuous adaptation and innovation in digital banking to enhance customer experience and operational efficiency across diverse banking environments.

### Discussion

The discussion of Table 1's findings on the key services offered by transactional internet banks provides valuable insights into the current state and strategic priorities within the banking sector, particularly concerning e-banking services. Here, we delve deeper into the implications and trends observed across different categories of banks:

- **Universal vs. Variable Offerings:** The table reveals that certain basic functionalities like balance enquiry and customer correspondence are universally offered by all banks surveyed, highlighting their foundational importance in e-banking services. This consistency reflects a baseline expectation among customers for these essential services regardless of the bank type.
- **Disparities Across Bank Types:** Significant disparities emerge across different types of banks in offering more advanced and specialized services. For example, private sector banks tend to lead in providing services such as monthly statements by email, market watch functionalities, and online shopping, indicating a stronger emphasis on customer engagement through digital channels. In contrast, public sector banks show higher consistency in offering core services like interest rate updates and account control functions such as funds transfer and standing instructions.
- **Technological and Innovation Divide:** Foreign banks stand out in the comprehensive provision of services like foreign exchange rates updates, brokerage, and credit card operations/payments. This suggests a higher level of technological integration and innovation among foreign banks, catering to sophisticated customer needs and preferences in digital banking.
- **Strategic Implications:** The varying degrees of service offerings reflect strategic priorities among different bank types. Private sector banks appear more focused on enhancing customer experience through a broader range of digital services, potentially positioning themselves as leaders in digital banking innovation. Public sector banks, while consistent in offering core functionalities, may benefit from expanding their digital service offerings to remain competitive and meet evolving customer expectations.
- **Customer-Centric Approach:** The presence or absence of certain services, such as online tax payment and corporate internet banking, also underscores banks' efforts to align with regulatory requirements and customer demand. Understanding these dynamics is crucial for banks to prioritize investments in digital infrastructure and service expansion that resonate with customer needs and market trends.

In conclusion, the discussion highlights the importance of strategic differentiation and customer-centricity in shaping the digital banking landscape. Banks that effectively leverage





technology and innovate their service offerings stand to enhance customer satisfaction, operational efficiency, and competitive advantage in an increasingly digital era. As banks continue to evolve their e-banking strategies, addressing gaps identified in this study can guide future developments and improvements to meet the diverse needs of customers across different banking segments.

### Conclusion

In conclusion, this study provides a comprehensive overview of the e-banking landscape in the Nagpur District, examining the offerings and strategic priorities of nationalized, private sector, and foreign banks. The analysis of Table 1 reveals distinct patterns in service provision, highlighting both commonalities and disparities across bank types. While all banks universally offer essential services like balance enquiry and interest rate updates, private sector and foreign banks excel in providing more advanced functionalities such as monthly statements by email, market watch, and online shopping. These findings underscore the varying degrees of technological integration and innovation among banks, with foreign banks particularly demonstrating leadership in digital service offerings. Moreover, the study identifies strategic implications for banks to enhance their digital infrastructure, expand service portfolios, and improve customer engagement strategies. Nationalized banks, in particular, are encouraged to prioritize technological upgrades and digital literacy initiatives to meet evolving customer expectations and maintain competitiveness. Overall, this study contributes valuable insights into the evolving dynamics of e-banking in the Nagpur District, offering actionable recommendations for banks to adapt and thrive in an increasingly digital-centric banking environment.

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