

**A CASE STUDY OF NIC ASIA BANK ON CUSTOMER'S PERCEPTION OF ADAPTATION OF MOBILE BANKING SERVICES****Hrishav Koirala<sup>1</sup>, Suman Bhattacharya<sup>2</sup>**<sup>1</sup>PG Scholar, Lord Buddha Education Foundation, Kathmandu, Nepal<sup>2</sup> Professor, Lord Buddha Education Foundation, Kathmandu, Nepal**Abstract**

This research report examines customer perceptions and preferences towards mobile banking services offered by NIC Asia Bank in Nepal. Digitalization has led to the adoption of mobile banking services, with NIC Asia Bank embracing this trend. The study focuses on the factors influencing mobile banking adoption, such as safety, ease of use, and perceived benefits. The research questions explore and analyze these relationships, with hypotheses positing positive correlations. The Technology Acceptance Model is used to understand customer perceptions of mobile banking services. The research methodology includes positivism, a deductive approach, a survey strategy, and data collection methods. Results show moderate agreement and positive perceptions among respondents regarding mobile banking, customer attitude, knowledge, and awareness. Correlation analysis reveals positive correlations between these variables. The study concludes that positive attitudes, awareness, and knowledge positively influence customer perceptions of mobile banking services. Implications for digital technologies and the banking sector include customer experience improvements and tailored offerings. Recommendations include prioritizing security, user-friendly designs, promoting benefits, enhancing customer engagement, ensuring ongoing security measures, and adapting to changes. The findings have

implications for enhancing customer satisfaction, improving services, and guiding technological advancements in the banking sector.

*Key Words: Consumers' Perception, Mobile Banking, Services*

## 1 Chapter 1: Introduction

### 1.1. Background of the Study

Banks play a crucial role in the economy by providing safe and secure financial services to people and businesses. They offer long-term loans and deposits, ensuring smooth economic flow and maintaining the smooth functioning of businesses. Digitalization is revolutionizing the way banks process data and information, enabling them to offer innovative services to customers both locally and globally. Mobile banking, which involves using a mobile device for various financial activities, is becoming increasingly popular (Arch, 2020).

Banks are implementing security measures, such as private networks, special logins, and extra verification steps, to ensure the safety of their client's accounts. In Nepal, mobile banking services are growing at a rate of 35%, with 95% of internet users using mobile devices. NIC Asia Bank Limited has started using mobile banking, with 1.5 million users as of mid-May. With BFIs, 16.12 million people have savings accounts (Waal, 2009).

### 1.2. Problem Statement

- A 2019 survey found that mobile banking adoption is influenced by factors like helpfulness, safety, ease of use, privacy, trust, security, compatibility, and perceived benefits (Kelly and Palaniappan, 2019).
- Study shows positive perceptions of mobile banking apps are linked to cognitive aspects, usefulness, and privacy security (Yin and Lin, 2022).
- Report shows customer satisfaction in rural areas influenced by dependability, adaptability, productivity, and loyalty (Bala *et al.*, 2021).

### 1.3. Research Question

- Is there a significant relationship between customer attitude and the perception of customers to adopt mobile banking services?

- Is there a significant relationship between customers' awareness and the perception of the customers to adopt mobile banking services?
- Is there a significant relationship between customers' knowledge and the perception of the customers to adopt mobile banking services?

#### 1.1 1.4. Research Objectives

- To study whether there is a significant relationship between customer attitude and the perception of customers to adopt mobile banking services.
- To study whether there is a significant relationship between customers' awareness and the perception of the customers to adopt mobile banking services.
- To find out whether there is a significant relationship between customers' knowledge and the perception of the customers to adopt mobile banking services.

#### 1.2 1.5. Research Hypothesis

H1: There is a positive relationship between customer attitude and the perception of customers to adopt mobile banking services.

H2: There is a positive relationship between customers' awareness and the perception of the customers to adopt mobile banking services.

H3: There is a positive relationship between customers' knowledge and the perception of the customers to adopt mobile banking services.

#### 1.3 1.6. Significance

- **Customer-focused approach:** Adapt digital banking to meet customer needs, enhancing satisfaction and usage.
- **Enhanced digital offerings:** Use findings to improve security, engagement, and overall mobile banking services.
- **Improved decision-making:** Study results aid choices in tech investment and staff training.

- **Contribution to the banking sector:** Guide for other banks, advancing understanding of mobile banking in Nepal.

#### 1.4 1.7. Scope

- Consumer sentiment towards NIC Asia Bank's mobile banking initiatives in Nepal.
- Evaluation of usability, security, and accessibility impacting client perception.
- Measuring satisfaction with NIC Asia Bank's mobile banking in Nepal.
- Awareness of challenges in using the bank's mobile services.
- Research customer desires and improve digital products.

#### 1.5 1.8. Limitations

- **Sampling bias:** Conclusions based on a limited customer sample, not representing all opinions.
- **Data reliability:** Results depend on data quality and self-reported data could be unreliable.
- **Limited applicability:** Findings specific to NIC Asia Bank in Nepal, might not apply to other banks.
- **Time-specific:** The study's conclusions are relevant only to a specific period.
- **Assumptions:** Relies on customer honesty and participation.

## 2 Chapter 2: Literature Review

### 2.1 2.1. Research Theory

The Technology Acceptance Model (TAM) is a research framework that helps understand how customers perceive and welcome the use of mobile banking services, particularly at NIC Asia Bank. It focuses on the belief in the usefulness and ease of use of new technology, which affects its adoption. Measurements of perceived usefulness and ease of use can help understand why customers choose or avoid using mobile banking services. TAM can also identify factors like gender, educational background, age, and familiarity with mobile banking services that impact customer perceptions of utility and user-friendliness (Theoryhub, 2023).

To understand customer sentiments, surveys, interviews, or focus groups can be conducted to understand what drives them to adopt or avoid mobile banking services. This data can help the bank understand how to improve the mobile banking experience and attract more customers. Overall, using TAM as a research model provides a systematic way to study customer perceptions and usage of mobile banking services, providing actionable insights for the bank to enhance its mobile banking experience.

### 2.2 2.2. Base Papers Literature Review

#### 2.3 2.2.1. Customer perspectives on the acceptance of FinTech within the Islamic banking industry in Malaysia and Saudi Arabia.

<b>Title</b>	<b>Customers' perceptions of FinTech adaptability in the Islamic banking sector: comparative study on Malaysia and Saudi Arabia</b>
<b>Author Name/Year</b>	Ruhaini M., Md. M. Alam, O. R. Olaopa, and Ibrahim A. Oladapo/2020–2021.
<b>Features</b>	1. The document offers an outline of the Islamic banking industry, the evolution of financial technology (FinTech), and the foundational framework for the study.
	2. The review explores the elements influencing consumer adoption of fintech.
	3. The research investigates how customers perceive the adoption of FinTech in the Islamic banking sectors of Malaysia and Saudi Arabia. The report presents the study's findings.

<b>Benefits</b>	1. The research furnishes insights into how consumers within Malaysia and Saudi Arabia perceive the utilization of fintech within the Islamic banking domain. This data can facilitate enhanced customer comprehension for Islamic banking establishments, leading to advancements in their provided products and services.
	2. In order to help Islamic banking institutions grow their clientele and tap into new markets, the paper analyses opportunities for FinTech acceptance and utilization in the sector.
	3. The paper provides evidence-based information that Islamic financial institutions can use to inform their decisions about the adoption and use of FinTech.
<b>Limitations</b>	1. The research is of a descriptive nature and does not establish a causal connection between the variables that are being examined.
	2. The study only uses quantitative methods for gathering and analyzing data.
	3. The sample size of the study is fairly small, making it more difficult to apply the findings to other Islamic banking systems and countries.
<b>Advantages</b>	1. The paper places special emphasis on the challenges Islamic banking institutions face while integrating and utilizing FinTech.
	2. The paper explains the possibility that FinTech will be adopted and used in the Islamic banking sector.
	3. The survey offers crucial data concerning customers' views on the adaptability of FinTech within the banking sector of Islam, aiding its banking enterprises in gaining a deeper understanding of their consumers and improving their offerings.
<b>Techniques for Research</b>	The employed research approach is the quantitative research methodology.
<b>Model</b>	The utilized model for conducting this research is the descriptive one.

*Table 1: Literature Review on Customer perspectives on the acceptance of FinTech within the Islamic banking industry in Malaysia and Saudi Arabia*

## 2.4 2.2.2. Influencing factors behind India's mobile banking adoption

Title	<b>Consumer perspectives about mobile banking adoption in India – a cluster analysis</b>
Author Name/Year	D. Chawla and H. Joshi / 2016
Features	1. Indian consumer behavior and attitudes toward the use of mobile banking. 2. Factors influencing India's adoption of mobile banking 3. Different client categories according to their attitudes and actions towards mobile banking. 4. Strategies for enhancing the adoption rates of mobile banking services in India.
Benefits	1. Furnishes information regarding the demographic factors, technological challenges, and confidence in financial establishments that influence the uptake of mobile banking among Indians. 2. Categorizes customer demographic groups according to their perceptions and usage of mobile banking, empowering suppliers to tailor their services effectively. 3. Gives advice to mobile banking service providers of India for increasing the rates of adoption.
Limitations	1. The study's limited sample size might lead to results that are not fully representative of all Indian mobile banking users. 2. The employment of a cross-sectional approach in the study offers only a concise snapshot of consumer behaviors and attitudes regarding mobile banking utilization. 3. The survey only included feedback from users of mobile banking services and eliminated responses from non-users.
Advantages	1. The study makes it simpler to pinpoint primary determinants that impact the utilization of mobile banking services in India., such as demography, technical difficulties, and trust in financial institutions. 2. The study divides the groups of people who use mobile banking into several subgroups based on their attitudes and behaviors.



	3. The research findings can be used by decision-makers to develop laws and regulations that support the boost of mobile banking within India.
<b>Techniques for Research</b>	The employed research approach is the quantitative research methodology.
<b>Model</b>	The utilized model for conducting this research is the descriptive one.

*Table 2: Literature Review on Influencing factors behind India's mobile banking adoption*

### 3 Chapter 3: Research Methodology

#### 3.1 3.1. Introduction

A research method outlines a logical, organized approach for a study, involving data collection, gathering, and analysis of information (Lovino, 2020).

#### 3.2 3.2. Research Philosophy

The research philosophy of a study is its fundamental ideas, assumptions, and vision (Lovino, 2020).

- **Positivism:** Uses scientific methods, like stats and hypotheses (Lovino, 2020).
- **Interpretivism:** Focuses on subjective human experience (Lovino, 2020).

**This research will be using Positivism.**

#### 3.3 3.3. Research Approach

A set of rules and methods known as the research approach defines how an entire study will be conducted (Kirti, 2022).

- **Deductive:** Start with theory, test with data (Spens, 2006).
- **Inductive:** Begin with observations, then form theory (Spens, 2006).

**This research is conducted using a Deductive approach.**

#### 3.4 3.4. Research Strategy

Research methodology involves selecting the best approach based on study aims and questions. This study will use a survey with a questionnaire distributed to target populations, analyzing data from respondents (Magusiak, 2023).

#### 3.5 3.5. Methodology

Research methodology involves procedures for locating, choosing, compiling, and evaluating data on a topic. Qualitative research involves focus groups, interviews, and observations, while quantitative methods use surveys, databases, tests, and questionnaires. A

mixed-methods approach combines qualitative and quantitative concepts for a more realistic view (Potgieter, 2022).

**The technique for this study will be a mixed-methods approach.**

### 3.6 3.6. Time Horizon

Time horizon refers to data gathering instances, with longitudinal and cross-sectional approaches. Longitudinal time horizons examine developments over time, while cross-sectional time horizons gather information at a single point (Jansen, 2021).

### 3.7 3.7. Data

Data is the primary source of information obtained, executed, and reviewed in research tasks. Primary data is untouched by prior analysis, making it inherently "pure." Secondary data, acquired from the original point of collection, indicates material accumulated by researchers (Lovino, 2020).

**This research will use both primary and secondary data.**

### 3.8 3.8. Instruments

Instrumentation is a tool used for collecting, measuring, and analyzing data in research, affecting qualitative, quantitative, or mixed techniques (Murshed, 2016).

**The research instrumentation will be a questionnaire.**

### 3.9 3.9. Sources of Data

Primary and secondary sources are used to gather data, including observations, experiments, surveys, and interviews, while secondary sources are pre-existing findings.

### 3.10 3.10. Sampling

This research will use convenience sampling to collect information from 350-400 people.

### 3.11 3.11. Research Model

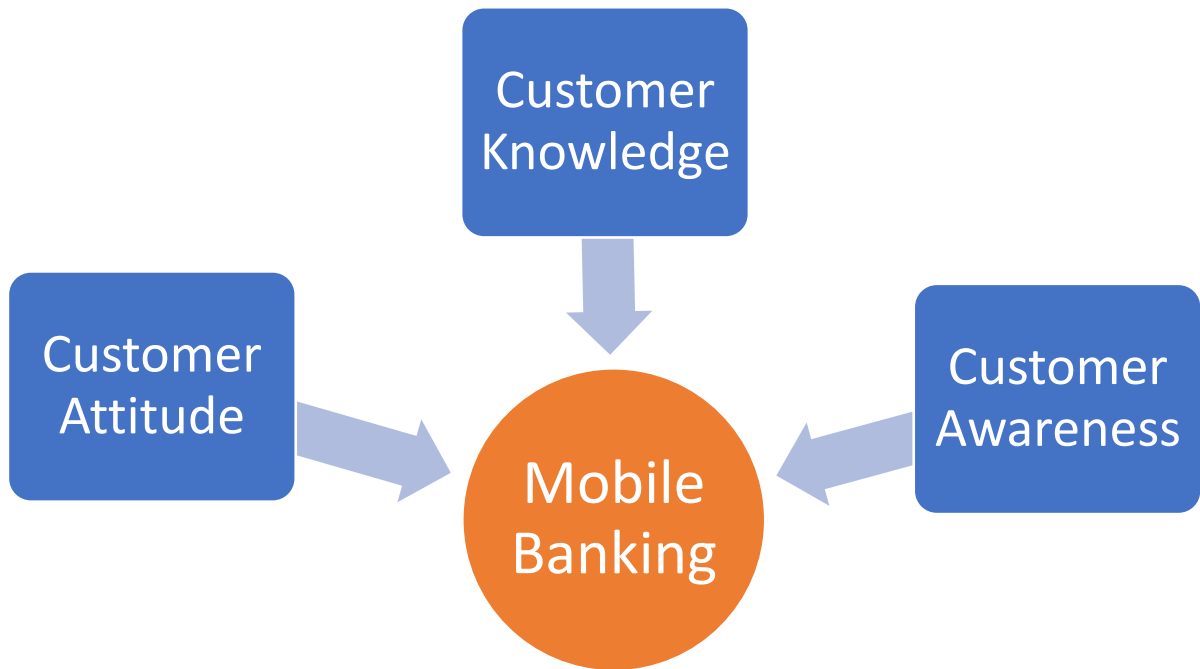
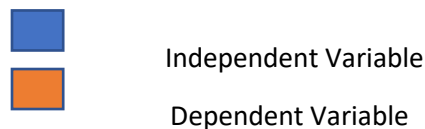


Figure 1: Research Model



### 3.12 3.12. Data Processing

Data processing involves editing and coding surveys to correct technical mistakes, missing information, and gaps, and converting data into numerical form before submitting to a spreadsheet.

### 3.13 3.13. Data Analysis

Data analysis is a strategy for organizing, analyzing, and drawing conclusions from vast amounts of information. It helps break down information into manageable portions, ensuring reliability and validity in measurements and tests.

### 3.14 3.14. Ethical consideration

Researchers must adhere to ethical considerations for proper money management, research misconduct prevention, and public trust.

## 4 Chapter 4: Findings and Analysis of Data

### 1.4.Introduction

This chapter discusses data presentation, analysis, and conclusions from a survey questionnaire gathered from 336 clients. The study aims to improve NIC Asia Bank's mobile banking services and provide actionable insights for customer satisfaction and long-term success in digital banking.

### 1.5. Respondents Feedback

Questionnaire	Number of Questionnaires
Distributed	370
Collected	336

*Table 3: Respondents Feedback*

A survey approach was used to gather 336 closed-ended samples, with 370 respondents given questionnaires. However, some were not returned and errors were discovered in replies, resulting in a total of 336 test data generation.

### 1.6. Reliability Test

Reliability Statistics	
Cronbach's Alpha	N of Items
.978	27

*Table 4:Reliability Test*

A reliability test for numerous questions in a survey is known as Cronbach's Alpha. Cronbach's alpha is .978, which is very good. This indicates that the survey's 27 questions are closely related and consistently assess the same thing.

### 1.7. Descriptive Statistics of Variables

Variables	Mean	Std. Deviation	N
Mobile Banking	3.3470	.98462	336
Customer Attitude	3.6414	.90901	336
Customer Knowledge	3.6131	.88404	336
Customer Awareness	3.5992	.92805	336

Table 5: Descriptive Statistics of Variables

The study's data shows moderate agreement or positive perceptions for Mobile Banking, Customer Attitude, Customer Knowledge, and Customer Awareness among participants. The mean scores are 3.3470, 3.6414, 3.6131, and 3.5992, respectively. The standard deviations show moderate variability, with responses clustering close to the mean scores.

### 1.8. Correlation Analysis

		Mobile Banking	Customer Attitude	Customer Knowledge	Customer Awareness
<b>Pearson Correlation</b>	Mobile Banking	1.000	.708	.737	.737
	Customer Attitude	.708	1.000	.885	.865
	Customer Knowledge	.737	.885	1.000	.878
	Customer Awareness	.737	.865	.878	1.000
<b>Sig. (1-tailed)</b>	Mobile Banking	.	.000	.000	.000

	Customer Attitude	.000	.	.000	.000
	Customer Knowledge	.000	.000	.	.000
	Customer Awareness	.000	.000	.000	.

Table 6: Correlation Analysis

The correlation matrix displays the correlation coefficients between Mobile Banking, Customer Attitude, Customer Knowledge, and Customer Awareness. Positive correlations are observed between Mobile Banking and Customer Attitude (0.708), Mobile Banking and Customer Knowledge (0.736), and Mobile Banking and Customer Awareness (0.778). These positive correlations indicate a tendency for both variables to rise as one increases. Overall, the data indicates moderate to strong positive relationships between these variables.

### 1.9. Normality Testing

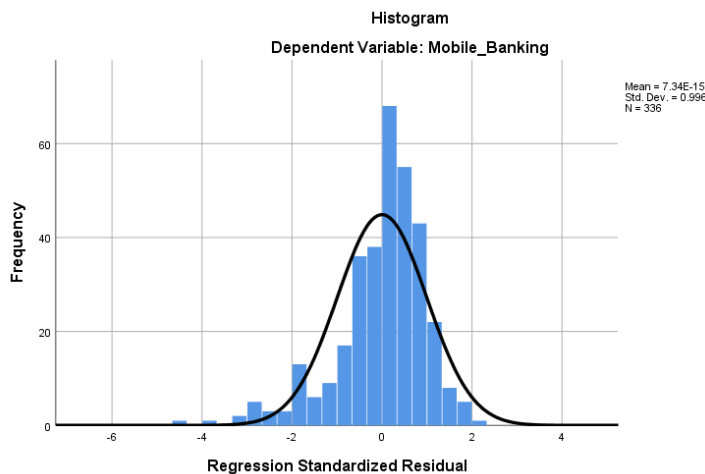


Figure 3: Regression Standardized Residual

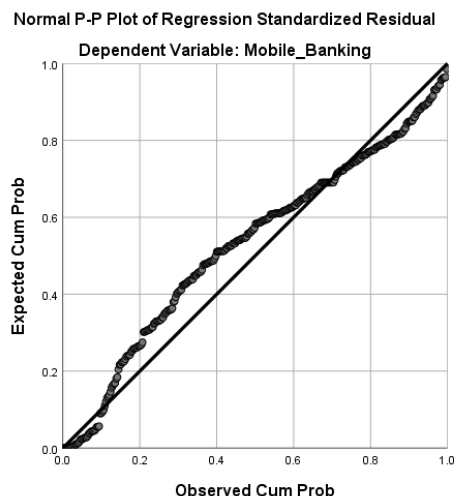


Figure 2: Linear Line Residual Plot

It is concluded from the above graphic that the data are often symmetrically distributed around the mean. It indicates that the histogram's left and right halves are approximately mirrored. The linear line residual plot also clarified the same idea. It is also clear from the mentioned Normal P-P Plot of Regression Standardized Residual that the points on the PP plot approximately follow a straight line.

#### 1.10. Multiple Regression Analysis

It is a statistical method that enables the investigation of the connection between a single dependent variable and several independent variables.

##### 4.1 4.7.1 Model Summary Table

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.886 <sup>a</sup>	.785	.764	.55213
a. Predictors: (Constant), Customer Awareness, Customer Knowledge, Customer Attitude				
b. Dependent Variable: Mobile Banking				

Table 7: Model Summary Table

The study's adjusted R-squared value of .764 shows that 76.4% of the variance in mobile banking is accounted for by independent variables (Customer Awareness, Customer Knowledge, and Customer Attitude) in the regression model, indicating a strong positive correlation between the variables.

##### 4.2 4.7.2. ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	188.601	3	62.867	153.270	.000 <sup>b</sup>
	Residual	136.176	332	.410		
	Total	324.777	335			



a. Dependent Variable: Mobile Banking
b. Predictors: (Constant), Customer Awareness, Customer Attitude, Customer Knowledge

Table 8: ANOVA

The F value of 153.270 indicates greater variation between groups, while a P value of .000b indicates a significant interaction between the dependent variable (Mobile Banking) and independent variables (Customer Awareness, Customer Attitude, Customer Knowledge). This indicates that the independent variable is a significant predictor of the dependent variable.

#### 4.3 4.7.3. Coefficient Table

Coefficients <sup>a</sup>						
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.238	.150		1.580	.115
	Customer Attitude	.128	.090	.118	1.423	.156
	Customer Knowledge	.364	.097	.327	3.767	.000
	Customer Awareness	.369	.086	.347	4.296	.000

a. Dependent Variable: Mobile Banking

Table 9: Coefficient Table

- a. Perception of customers to use Mobile banking is projected to increase by 0.128 units when the relationship with customer attitude increases by one unit when all other independent variables remain constant, and vice versa (positive impact).
- b. Perception of customers to use Mobile banking is projected to increase by 0.364 units when the relationship with customer knowledge increases by one unit when all other independent variables remain constant, and vice versa (positive impact).

- c. Perception of customers to use Mobile banking is projected to increase by 0.369 units when the relationship with customer awareness increases by one unit when all other independent variables remain constant, and vice versa (positive impact).

All three independent variables positively impacted the dependent variables.

#### 4.4 4.7.4. Results of Hypothesis

Developed Hypothesis	P-Value	Impact	Status of Developed Hypothesis
H1: There is a positive relationship between customer attitude and the perception of customers to adopt mobile banking services.	0.156	Positive	Supported
H2: There is a positive relationship between customers' awareness and the perception of the customers to adopt mobile banking services.	0.000	Positive	Supported
H3: There is a positive relationship between customers' knowledge and the perception of the customers to adopt mobile banking services.	0.000	Positive	Supported

Table 10: Results of Hypothesis

## 5 Chapter 5: Conclusion and Recommendation

### 5.1 5.1. Discussion of Findings

***Question 1: Is there a significant relationship between customer attitude and the perception of customers to adopt mobile banking services?***

The study explored the relationship between people's attitudes and their perceptions of mobile banking. A positive attitude towards mobile banking was linked to a positive attitude towards its application. A strong coefficient value of 0.708 indicated a strong connection between attitude and perceptions. Multiple regression analysis supported the proposition's validity, revealing that changes in attitudes can explain significant fluctuations in opinions about mobile banking. Even small changes in attitudes were associated with more favorable perceptions of using mobile banking, highlighting the complex relationship between attitudes and perceptions.

***Question 2: Is there a significant relationship between customers' awareness and the perception of the customers to adopt mobile banking services?***

The research highlights the connection between customer perceptions and awareness of mobile banking adoption. A strong match and R-value of 0.886 confirm the strong association between customers' opinions and their awareness of the topic. Variations in customer awareness levels account for 76.4% of the variability in opinions on mobile banking use. The coefficient table provides comprehensive details about these relationships, with a positive-signed unstandardized coefficient value of 0.369 given to client awareness. These results support the hypothesis that aware consumers are more likely to embrace mobile banking, opening the door for future improvements in banking procedures and consumer behavior.

***Question 3: Is there a significant relationship between customers' knowledge and the perception of the customers to adopt mobile banking services?***

The study highlights the significant relationship between consumer knowledge and their perceptions of mobile banking adoption. A strong correlation value of 0.885 highlights the importance of consumer knowledge in influencing financial technology choices. Greater

consumer knowledge leads to a more favorable attitude toward mobile banking adoption. The model summary table and R-value of 0.886 support this claim, with a corrected R-square value of 0.764. The customer knowledge variable has a positively signed unstandardized coefficient value of 0.364, highlighting its critical significance. This knowledge-based link highlights the role of well-informed consumers in market development and illuminates the trend of mobile banking technology adoption.

### 5.2 5.2. Implication of Study

The study on customer perceptions and preferences in mobile banking interactions with NIC Asia Bank has significant implications for digital technologies and the banking sector. It highlights the importance of fostering pleasant customer experiences and improving mobile banking offerings. Financial organizations can improve their mobile banking approach by prioritizing user-friendly interfaces, raising awareness, and providing thorough customer education. Demographic traits also play a crucial role in influencing how people perceive mobile banking.

### 5.3 5.3. Conclusion

NIC Asia Bank, in particular, can benefit from a deeper understanding of client preferences and the decision-making process for mobile banking according to this study. It examines the complex connections that exist between the ideas and perceptions of customers and places an emphasis on the significance of their interactions with digital banking platforms. The findings indicate that financial institutions should work to improve customer happiness with mobile banking, as well as raise knowledge of its benefits and encourage more widespread use of the technology. This can lead to improved services, individualized products, and equitable collaboration between users of mobile banking technology and the technology itself, which ensures compatibility with the digital age.

#### 5.4 5.4. Recommendations

- **Security and Privacy:** Prioritize strong security methods: advanced protection, unique codes, and customer verification. Inform customers of boosted confidence.
- **User-Friendly Design:** Focus on intuitive app design: clear layouts, easy navigation. Encourage usage and enjoyment.
- **Highlight Benefits:** Create informative content, ads, and guides for mobile banking advantages. Educate on benefits, security, and time-saving. Address common concerns.
- **Customer Engagement:** Strengthen ties with rewards, special programs, and incentives for regular mobile banking. Foster long-term satisfaction.
- **Ongoing Security:** Invest in robust measures: security plans, codes, protect data, and transactions. Communicate for trust.
- **Adapt to Changes:** Stay updated with digital advancements. Listen to feedback, observe usage, make regular updates. Meet evolving customer needs.

**References**

- Alsmadi, A.A. *et al.* (2022) 'Twenty Years of Mobile Banking Services Development and Sustainability: A Bibliometric Analysis Overview (2000–2020)', *Sustainability*, 14(17), p. 10630. Available at: <https://doi.org/10.3390/su141710630>.
- Bala, T. *et al.* (2021) 'Service Quality and Customer Satisfaction of Mobile Banking during COVID-19 Lockdown; Evidence from Rural Area of Bangladesh', *Open Journal of Business and Management*, 9(5), pp. 2329–2357. Available at: <https://doi.org/10.4236/ojbm.2021.95126>.
- Bruscia, K.E., 2005. Data analysis in qualitative research. *Music therapy research*, 2, pp.179-186.
- Arch, L., 2020. Effective bank regulation: seven guiding principles. *Journal of Financial Regulation and Compliance*.
- Tam, C. and Oliveira, T., 2017. Literature review of mobile banking and individual performance. *International Journal of Bank Marketing*, 35(7), pp.1044-1067.
- Hassan, M. (2022) *Research Approach - Types Methods, Research Method*. Available at: <https://researchmethod.net/research-approach/> (Accessed: 23 February 2023).
- Heywood, F., 2002. Adaptations: key evidence for managers. *Journal of Integrated Care*, 10(5), pp.13-17.
- Indeed (2022) *What Is Research Methodology? (Why It's Important and Types)*, *Indeed Career Guide*. Available at: <https://www.indeed.com/career-advice/career-development/research-methodology> (Accessed: 22 February 2023).
- IVY Panda (2021) *Research Philosophy: Importance and Types - 834 Words | Research Paper Example, Free Essays*. Available at: <https://ivypanda.com/essays/research-philosophy-importance-and-types/> (Accessed: 23 February 2023).
- Jansen, D. (2021) 'Saunders' Research Onion Explained (+ Examples)', *Grad Coach*, 26 January. Available at: <https://gradcoach.com/saunders-research-onion/> (Accessed: 25 February 2023).

- Kelly, A.E. (2019) 'Survey on Customer Satisfaction, Adoption, Perception, Behaviour, and Security on Mobile Banking', 9(259).
- Kirti (2022) 'What is Research Approaches ? | Meaning and Types of Research Approaches', *Top4u*, 30 January. Available at: <https://www.toppers4u.com/2022/01/what-is-research-approaches-meaning-and.html> (Accessed: 23 February 2023).
- Iovino, F. and Tsitsianis, N., 2020. The methodology of the research. In *Changes in European energy markets* (pp. 79-95). Emerald Publishing Limited.
- Magusiak, D. (2023) *Research strategy, CEOpedia | Management online*. Available at: [https://ceopedia.org/index.php/Research\\_strategy](https://ceopedia.org/index.php/Research_strategy) (Accessed: 23 February 2023).
- Mazumdar, M. (2022) 'Ethical considerations in research every author should know | Ethical Considerations in Conducting Research – Researcher.Life', 18 March. Available at: <https://researcher.life/blog/article/ethical-guidelines-for-researchers/> (Accessed: 25 February 2023).
- McCombes, S. (2019) *Sampling Methods | Types, Techniques & Examples, Scribbr*. Available at: <https://www.scribbr.com/methodology/sampling-methods/> (Accessed: 25 February 2023).
- Murshed, F. and Zhang, Y., 2016. Thinking orientation and preference for research methodology. *Journal of Consumer Marketing*.
- Nagar, N. and Ghai, E., 2019. A Study of Bank Customer's Reliability towards Electronic Banking (E-Banking) Channel's. *Int. J. Manag. Stud*, 6, p.34.
- Pamplona, F. (2022) 'What is Methodology in Research and How Can We Write it?', *Mind the Graph Blog*, 3 August. Available at: <https://mindthegraph.com/blog/what-is-methodology-in-research/> (Accessed: 25 February 2023).
- Potgieter, S. (2022) *LibGuides: Research Support: Research Methodology*. Available at: <https://libguides.wits.ac.za/c.php?g=693518&p=4914913> (Accessed: 24 February 2023).

- Pérez, A. and Rodríguez Del Bosque, I., 2015. Customer responses to the CSR of banking companies. *Journal of Product & Brand Management*, 24(5), pp.481-493.
- De Waal, A. and Frijns, M., 2009. Working on high performance in Asia: the case of Nabil Bank. *Measuring Business Excellence*.
- Spens, K.M. and Kovács, G., 2006. A content analysis of research approaches in logistics research. *International journal of physical distribution & logistics management*.
- Taherdoost, H., 2016. Sampling methods in research methodology; how to choose a sampling technique for research. *How to choose a sampling technique for research (April 10, 2016)*.
- Theoryhub (2023) *TheoryHub - Academic theories reviews for research and T&L*. Available at: <https://open.ncl.ac.uk/theories/1/technology-acceptance-model/> (Accessed: 26 February 2023).
- University of Reading (2023) *Research data defined*. Available at: [https://www.reading.ac.uk/research-services/Research data management/About research data management/Research data defined](https://www.reading.ac.uk/research-services/Research%20data%20management/About%20research%20data%20management/Research%20data%20defined) (Accessed: 25 February 2023).
- Wodo, W., Stygar, D. and Blaskiewicz, P., 2021, July. Security Issues of Electronic and Mobile Banking. In *SECRYPT* (pp. 631-638).
- Yin, L.-X. and Lin, H.-C. (2022) 'Predictors of customers' continuance intention of mobile banking from the perspective of the interactivity theory', *Economic Research-Ekonomska Istraživanja*, 35(1), pp. 6820–6849. Available at: <https://doi.org/10.1080/1331677X.2022.2053782>.
- Yu, J. and Nuangjamnong, C. (2022) 'The Impact of Mobile Banking Service on Customer Satisfaction: A Case Study of Commercial Banks in China » UIJRT'. Available at: <https://uijrt.com/paper/the-impact-of-mobile-banking-service-on-customer-satisfaction> (Accessed: 22 February 2023).