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Research paper

Customer Perception Towards Digital Banking Services In Tiruchirappalli District- A Study

Ms. R. Sundaralakshmi [1] *, Dr. N. Rajamannar [2]

[1] Ph.D. Full Time Research Scholar, PG & Research Department of Commerce, Urumu Dhanalakshmi College, Affiliated to Bharathidasan University, Tiruchirappalli- 19, Tamil Nadu, India
[2] Associate Professor & Research Supervisor, PG & Research Department of Commerce, Urumu Dhanalakshmi College, Affiliated to Bharathidasan University, Tiruchirappalli- 19, Tamil Nadu, India
**Corresponding author E-mail: sundaralakshmi1326@gmail.com*

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Abstract

In today's world, advanced information technology is crucial for the future growth of financial services, with the banking sector undergoing greater changes than other groups of financial providers. The rising reliance on mobile services and the internet as innovative channels for conducting financial dealings and global trade demands on digital banking security to protect against fraudulent activities. As digital banking continues to grow across India, understanding regional customer perception is crucial for enhancing service offerings and customer engagement. The research examines various dimensions such as ease of use, security, accessibility, convenience, and trust in services for digital banking, such as mobile applications, internet banking, and electronic wallets. Advances and rapid evolution in Information and Communication Technology (ICT) have led to substantial transformations across nearly all areas of life. In the banking sector, this shift has given rise to digital banking, also known as internet banking, which has now begun to supplant conventional banking methods. Digital banking. This research contributes to banking adoption and offers recommendations for banks to more effectively of their clients in the region. This study aims to analyse customer viewpoints on digital banking in the Tiruchirappalli district, exploring factors that influence customer attitudes, adoption, and satisfaction with digital banking platforms.

Keywords: *Customer Perception; Convenience; Digital Banking; Satisfaction; Technological Reliability.*

1. Introduction

In recent years, digital banking services have become a fundamental part of the financial ecosystem, transforming the way customers interact with their banks. With the rise of smartphones, internet access, and advanced technology, conventional banking offerings have evolved into digital platforms offering a range of services, from basic account management to complex financial transactions. These services, commonly accessed through mobile apps or web platforms, allow customers to perform banking activities remotely without visiting a physical branch.

In today's digital age, digital banking has emerged as a critical tool for the delivery of financial services, offering convenience, speed, and efficiency to customers. With advancements in technology and the increasing penetration of the internet, the banking industry has been fundamentally transformed. Public sector banks, in particular, have adapted to this trend by offering various online banking services, enabling customers to perform a wide range of transactions without physically visiting bank branches. These services include online fund transfers, utility bill payments, account management, loan applications, and even investment services. As customers increasingly engage with digital platforms, their perceptions of these services play a significant role in shaping their banking experience. Understanding customer perceptions of online banking services in public sector banks is vital for enhancing service delivery, customer satisfaction, and long-term growth in the financial sector. However, the success of digital banking largely depends on customer perception, which encompasses factors such as ease of use, trust, security, and satisfaction with the services. The Tiruchirappalli (Trichy) district, located in Tamil Nadu, represents a unique blend of urban and semi-urban areas. Known for its educational institutions, growing industries, and cultural heritage, Tiruchirappalli has witnessed an increase in digital banking adoption in recent years. However, the perception of customers in this district remains an understudied area, particularly given the region's demographic diversity, socio-economic conditions, and varying levels of digital literacy.

This study aims to explore customers' perception towards digital banking services in Tiruchirappalli district, focusing on key factors such as awareness, usage patterns, satisfaction levels, and challenges faced. It also examines how characteristics of the population, including age, job, level of education, and financial status, influence perceptions and adoption of digital banking services. Furthermore, the study seeks to identify barriers, including security concerns, lack of trust, and technological literacy, that hinder the effective utilization of digital banking.

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Understanding customer perceptions in a semi-urban region like Tiruchirappalli is crucial for financial organizations to create better strategies, improve service delivery, and bridge the digital divide. By tackling these concerns, the research seeks to add to the expanding collection of studies on digital banking adoption in India and provide actionable insights for banks and policymakers to improve the accessibility and effectiveness of digital financial services.

This researcher explores customer perception towards digital banking services in the Tiruchirappalli district. By examining the attitudes, preferences, and experiences of customers using these digital platforms, the research will provide insights into the factors that influence customer satisfaction and acceptance of online banking services. Understanding customer perceptions is crucial for public sector banks to improve their online banking offerings, enhance customer trust, and remain competitive in the digital banking space.

Digital Banking Trends in Tiruchirappalli

- Digital banking has experienced significant expansion in Tiruchirappalli, especially in recent years. Factors such as the widespread availability of cost-effective smartphones, enhanced internet access, and government initiatives such as the Digital India campaign have contributed to heightened awareness and adoption among the local population. Urban centers are at the forefront of this trend, while semi-urban and rural areas are gradually following suit as banks and financial institutions implement outreach programs. The period following the COVID-19 pandemic marked a considerable transition towards online transactions, as customers opted for digital banking solutions to mitigate health risks associated with in-person banking.
- Mobile banking applications have emerged as the favoured option for numerous customers in Tiruchirappalli, providing both convenience and accessibility. Prominent banks, including SBI, ICICI, HDFC, and Indian Bank, have improved their mobile platforms to serve a varied clientele. Commonly utilized services include money transfers, payment of bills, account balance inquiries, and funding monitoring. The younger demographic, in particular, values the user-friendly interfaces and round-the-clock availability of these applications.
- The Unified Payments Interface (UPI) has revolutionized the field of digital transactions. in Tiruchirappalli. Dominant platforms such as Google Pay, PhonePe, and Paytm provide fast and secure payment solutions. The ease of use of UPI, along with its compatibility across various banks, has established it as the preferred choice for both peer-to-peer and merchant transactions. Furthermore, even small vendors and customers in rural areas have embraced UPI, leading to a decrease in dependence on cash transactions.
- Internet banking remains a vital channel, especially for customers handling more complex or large-scale transactions. Customers prefer internet banking portals for services such as applying for loans, managing fixed deposits, generating account statements, and accessing detailed account analytics. This platform appeals to professionals and businesses in Tiruchirappalli who seek robust and secure banking solutions.
- Digital wallets are becoming more prevalent for minor transactions, including mobile top-ups, utility bill settlements, and online shopping. Although urban regions have widely accepted platforms such as Paytm and Amazon Pay, users in rural areas are slowly beginning to utilize these wallets for utility payments and cashless transactions. The presence of cashback incentives and discounts has also contributed to the increased adoption of digital wallets among younger consumers.
- Rural and semi-urban areas in Tiruchirappalli are beginning to see a rise in digital banking adoption. Government programs advancing financial inclusion initiatives, like the Pradhan (PMJDY), have encouraged the use of basic digital services. Banks are actively organizing literacy programs to educate rural populations about mobile banking, UPI, and other digital tools. However, challenges like inconsistent internet connectivity and limited digital literacy still persist
- Fintech startups are significantly influencing the transformation of the digital banking environment in Tiruchirappalli. Enterprises that provide AI-based financial advisory services, automated payment solutions, and tailored financial offerings are increasingly appealing to technology-oriented consumers. Partnerships between traditional banks and fintech companies are also expanding the variety of digital services on offer.
- Security attributes like biometric verification, dual-factor verification, and fraud alerts have boosted customer confidence in digital banking platforms. Banks in Tiruchirappalli are also prioritizing customer education on cybersecurity, which has contributed to increased trust in online transactions.

The key aspects that influence how customers perceive digital banking services:

1) Convenience and Accessibility

- 24/7 Availability: One of the main advantages of digital banking is the ability for clients can log into their accounts and carry out transactions at any moment, without the limitations of physical banking hours. This flexibility significantly enhances the customer experience, leading to positive perceptions.
- Ease of Use: The simplicity and user-friendliness of mobile banking apps or websites are crucial. If digital banking platforms are intuitive and easy to navigate, customers are more likely to view them favourably. On the other hand, complex or clunky interfaces can lead to frustration and negative perceptions.

2) Security and Trust

- Data Protection: Concerns about data breaches and online fraud are prevalent when it comes to digital banking. A customer's perception of a bank's security protocols significantly impacts trust in its digital services.
- Privacy: Customers are increasingly concerned about how banks collect and use their personal information. Strong privacy policies and transparent data handling practices help to reassure customers, fostering a sense of security and confidence in digital banking services.

3) User Experience and Features

- Personalization: Customers appreciate digital banking services that offer tailored experiences, such as personalized financial insights, budgeting tools, or recommendations based on their spending habits. Features like these enhance the perceived value of the service.
- Transaction Speed: The speed and efficiency of transactions are crucial in shaping perceptions. Quick transfers, instant payments, and real-time updates contribute positively to customer satisfaction.
- Multi-Channel Integration: Digital banking services that are integrated across various platforms (mobile, online, ATM) and allow for seamless switching between channels are perceived more favourably by customers.

4) Customer Support

- Availability of Support: Even though digital services are intended to be self-service, customers still expect robust customer support options, especially when encountering problems. Accessible and responsive customer support (through chatbots, live chat, or phone support) is crucial for positive perceptions.
- Self-Service Features: Many digital banking platforms offer features like FAQs, video tutorials, and troubleshooting guides that allow customers to resolve issues independently. Easy access to these resources can improve satisfaction.

5) Innovation and New Services
- Advanced Features: Customers tend to perceive banks positively if they continually innovate and introduce new, useful features. For instance, services like mobile check deposit, instant loan approvals, AI-powered financial advice, and digital wallets are often appreciated.
- Future Readiness: Customers tend to perceive banks positively if they continually innovate and introduce new, useful features. For instance, services like mobile check deposit, instant loan approvals, AI-powered financial advice, and digital wallets are often appreciated.

6) Cost and Fees
- Low or No Fees: Customers are more likely to have a positive perception of digital banking services that offer lower fees for transactions, account maintenance, and other services. Many customers appreciate the cost savings that digital platforms provide compared to traditional banking methods.
- Transparent Fee Structures: Clear and transparent fee structures without hidden charges also contribute positively to customers' views of digital banking services.

7) Reliability and Stability
- System Downtime: Frequent outages or service interruptions negatively impact customer perception. Customers expect digital banking platforms to be reliable and stable, with minimal downtime.
- Error-Free Transactions: Digital banking services that are prone to errors, like incorrect transaction records or delays in payments, can cause frustration and harm the bank's reputation.

8) Digital Literacy
- Technological Comfort: Customer perceptions are also influenced by their level of comfort with technology. Older generations or individuals with lower digital literacy may have concerns about using online banking services. Offering training, tutorials, or customer support specifically targeting these groups can help improve their perceptions.

9) Brand Reputation
- Established Trust: Customer views on digital banking services are often influenced by the reputation of the bank itself. Banks with a long-standing reputation for trustworthiness and good service are more likely to receive positive feedback for their digital offerings.
- Peer Recommendations: Word of mouth and peer recommendations also play a significant function in influencing viewpoints. Positive reviews and recommendations from friends, family, or online communities can boost customer confidence in digital banking platforms.

Key Variables for Using Digital Banking Services

1) Awareness Level: Customers' knowledge about digital banking services.
2) Usage Patterns: Frequency and types of services used.
3) Perceived Ease of Use: How user-friendly customers find the digital banking platforms.
4) Trust and Security: Customers' perception of the safety and security of digital banking services.
5) Customer Satisfaction: Overall satisfaction with the digital banking services provided.
6) Awareness Campaigns: Banks should increase awareness through advertising, workshops, and training, especially in rural areas, to improve digital literacy.
7) Security Enhancements: Strengthening security protocols, offering two-factor authentication, and educating customers on safe digital banking practices will help increase trust.
8) Customer Support: Banks should offer 24/7 customer support and provide simple troubleshooting guides for customers facing issues with digital banking.
9) User-Friendly Platforms: Banks should work on making their digital platforms more intuitive, especially for older or less tech-savvy customers.

Digital platforms can vary, but generally include the following:

1) Mobile Banking Services
- Account Management: Checking account balances, moving funds between accounts, and reviewing transaction history.
- Bill Payments: Paying utility bills, insurance premiums, taxes, and loan EMIs directly through the mobile app.
- Mobile Recharges: Prepaid mobile recharges and DTH recharges.
- Fund Transfer: Transferring money to other bank accounts (NEFT, IMPS, RTGS, UPI, etc.).
- Loan Services: Applying for personal loans, home loans, and educational loans directly via mobile banking.
- Instant Bank Statement: Downloading statements for a specific period.

2) Internet Banking Services
- Online Account Access: Viewing account details, transaction history, and balances.
- Fund Transfers: Transferring funds across banks using NEFT, RTGS, IMPS, and UPI, and sending money to other accounts.
- Bill Pay: Paying electricity, water, broadband, and other bills online.
- Investment Options: Managing investments in Fixed Deposits (FD), Mutual Funds, and Recurring Deposits (RD).
- Tax Payments: Making income tax payments, filing returns, and accessing Form 26AS.
- Fixed and Recurring Deposit Services: Opening and managing FDs and RDs online.
- Credit Card Payments: Paying credit card bills and checking credit card statements.

3) UPI (Unified Payments Interface)
- Peer-to-Peer Transfers: Transferring money instantly to anyone with a UPI ID, using mobile numbers or virtual payment addresses.
- Merchant Payments: Paying for goods and services directly at stores or online via UPI QR codes.
- Bill Payments: Paying utility bills, mobile recharges, and insurance premiums through UPI.
- Request Money: Asking for money from individuals or businesses using UPI.

4) ATM and Debit/Credit Card Services
- ATM Withdrawals: Withdrawing cash from ATMs linked to the customer's account.
- Card Transactions: Shopping online or in physical stores using debit/credit cards.
- Contactless Payments: Making payments through contactless debit/credit cards and mobile wallets.
- Card Management: Blocking/unblocking cards, changing PIN, and managing card settings via the mobile app.

5) Digital Wallets and e-Wallet Services
- Wallet Recharge: Adding funds to a digital wallet (like Paytm, Phone Pe, Google Pay) for transactions.

- Payments: Making payments for goods, services, and online purchases using e-wallets.
- Money Transfer: Sending money to others through the wallet app, linked to bank accounts or UPI.
- Cash back and Discounts: Earning cashback, rewards, or discounts on payments made through digital wallets.

6) Mobile and Online Loan Applications
- Personal Loan Application: Applying for loans directly via mobile apps or online banking portals.
- Home Loans and Car Loans: Requesting loans for home and car purchases.
- Micro-loans: Getting small-ticket loans through mobile platforms without extensive documentation.
- Loan Management: Monitoring loan details, repayments, and interest status via apps.

7) Online Insurance Services
- Buying Insurance Policies: Purchasing life, health, or motor insurance directly via digital banking services.
- Premium Payments: Making premium payments for insurance policies online.
- Claim Status: Checking the status of insurance claims and viewing policy details.

8) E-commerce and Investment Services
- Stock Market Investments: Investing in and trading stocks, mutual funds, and other securities through online trading platforms.
- Digital Gold and Crypto: Investing in digital gold or cryptocurrencies via online banking apps.
- Wealth Management Services: Consulting investment advisors, managing portfolios, and accessing wealth management tools online.

9) Digital Banking Statements and Alerts
- Transaction Alerts: Receiving real-time alerts for account activity, balance updates, or suspicious transactions.
- E-Statements: Downloading electronic versions of account statements, tax-related documents, and loan statements.
- SMS and Email Notifications: Receiving personalized banking offers, updates, and promotional messages.

10) Customer Support and Assistance
- Chat bots and AI Assistance: Interacting with AI-powered chatbots for resolving queries and issues on mobile apps or websites.
- Online Customer Service: Reaching out to customer support via live chat, email, or telephone assistance.
- Grievance Redressal: Registering complaints, tracking issue resolution, and accessing self-help resources online.

11) Digital Banking Security Features
- Two-Factor Authentication (2FA): Using additional security layers for login and transactions.
- Biometric Authentication: Fingerprint, facial recognition, or iris scan for accessing banking services.
- Cardless ATM Withdrawals: Withdrawing money from ATMs without using a physical card by generating a QR code or using mobile numbers.
- Fraud Prevention: Alerts and preventive measures for detecting and reporting suspicious activities.

12) Digital Account Opening and KYC
- Instant Account Opening: Opening savings, current, or NRE accounts online without visiting a bank branch.
- E-KYC: Completing Know Your Customer (KYC) verification online using Aadhaar, PAN, or other digital IDs.

Importance of Understanding Customer Perceptions in Digital Banking

Customer perception refers to how customers view, interpret, and form opinions about a product, service, or organization based on their experiences, interactions, and the information they receive. In the context of digital banking, understanding customer perceptions is critical for several reasons:

1) Enhancing Customer Satisfaction
- Digital banking is customer-centric: Customer satisfaction is a key metric for the success of any banking service. Understanding how customers perceive digital banking features, such as ease of use, accessibility, and security, allows banks to fine-tune their services to meet customer expectations.
- Improved user experience: Insights into customer perceptions help banks design intuitive user interfaces and seamless functionalities that align with customer preferences.

2) Identifying Barriers to Adoption
- Overcoming scepticism: Despite the rapid adoption of digital banking, some customers may be reluctant due to concerns about privacy, security, or technological barriers. Understanding these concerns allows banks to address them effectively through education and improved safeguards.
- Bridging the digital divide: In regions like Tiruchirappalli District, variations in technological literacy or internet access can influence adoption. Studying perceptions can help identify and mitigate these barriers.

3) Improving Service Delivery
- Targeted solutions: By analysing feedback and perception data, banks can introduce targeted improvements, such as faster transaction times, better customer support, and personalized offerings.
- Real-time problem resolution: Understanding customer pain points enables banks to address issues proactively, improving overall service delivery.

4) Strengthening Customer Trust and Loyalty
- Building trust in technology: Trust is a cornerstone of banking, and customer perception heavily influences trust in digital platforms. Transparency, robust security, and consistent service quality build confidence in digital banking systems.
- Enhancing loyalty: Satisfied customers are more inclined to remain faithful to a financial institution and recommend its services to others. Understanding perceptions can help strengthen these relationships.

5) Adapting to Changing Customer Needs
- Dynamic expectations: Customer needs and preferences evolve with technological advancements. For instance, the rise of mobile banking and AI-driven chat bots reflects a shift in customer expectations. Banks must stay informed about these changes to remain competitive.
- Personalization: Gaining insights into customer perceptions allows banks to offer tailored solutions that meet specific customer needs, improving the overall experience.

6) Driving Competitive Advantage
- Differentiation in a competitive market: With multiple banks offering digital services, understanding customer perceptions helps a bank stand out by offering unique, customer-centric features.

- Attracting new customers: Positive customer perceptions can attract potential users who value modern, efficient, and customer-friendly services.

7) Supporting Strategic Decision-Making

- Data-driven strategies: Insights into customer perceptions provide valuable data for making strategic decisions about product development, marketing, and service delivery.
- Resource allocation: Banks can prioritize investments in areas that matter most to customers, such as enhancing mobile app features or expanding customer education programs.

8) Encouraging Financial Inclusion

- Reaching underserved populations: In districts like Tiruchirappalli, where a portion of the population may still rely on traditional banking, understanding perceptions can guide efforts to bring more people into the formal banking system through digital channels.
- Empowering rural communities: By identifying challenges specific to rural customers, banks can design services that promote digital banking literacy and accessibility.

9) Mitigating Risks

- Addressing cybersecurity concerns: Negative perceptions around data breaches or online fraud can deter customers. Understanding these fears enables banks to implement and communicate robust security measures.
- Reducing customer churn: Awareness of dissatisfaction allows banks to intervene before customers switch to competitors.

Review of literature

- Mehta and Kapoor (2025) highlighted that after 2024, public sector banks saw an increase in online banking adoption due to aggressive digitalization efforts and the launch of government-backed digital campaigns. Despite this growth, adoption was still slower in semi-urban and rural areas due to technological barriers and insufficient internet infrastructure. The study noted that customer perception in these regions remained cautious, driven by a lack of digital literacy and concerns about the reliability of online services.
- Goyal and Kapoor (2025) found that public sector banks still struggled to compete with private sector banks in terms of overall customer experience. While they had made strides in offering basic online banking functions, public sector banks were perceived as lacking the advanced digital services, such as real-time financial analytics and automated customer support, that private sector banks offered.
- Agarwal and Saxena (2024) surveyed customer satisfaction with digital banking services in public sector banks and found that while basic functions were generally well-received, issues with responsiveness, user interface, and technical glitches continued to affect satisfaction. Customers were more satisfied with mobile apps and simplified processes, but still found private banks superior in terms of real- time support and service speed.
- Sharma & Singh (2021) studied the evolution of digital banking and highlighted its importance in modern banking ecosystems. The authors emphasized how digital banking reduces operational costs for banks while enhancing customer convenience. This provides a foundation to understand why digital banking services have become crucial in both urban and semi-urban settings.
- Kumar and Singh (2021) highlighted that public sector banks witnessed a surge in mobile banking usage after 2020. However, they lagged in terms of offering the seamless experiences provided by private banks, particularly in urban areas. Digital literacy remained a challenge for some segments, leading to uneven adoption rates across customer groups.
- Gupta & Yadav (2020) explored customers' perceptions of digital banking in metropolitan areas and found that ease of use, convenience, and 24/7 availability were key factors influencing customer satisfaction.
- Bhatti et al. (2020) suggested that customers' perceptions are influenced by how banks address security concerns, with customers favouring services that implement enhanced security protocols such as two-step verification and biometric authentication,
- Mollah et al. (2020) demonstrated that customers have a favourable view of digital banking services that are cost-effective or free from hidden charges. The transparency of pricing and ease of access to financial services through digital channels also positively influence customer perceptions. However, when customers face high transaction fees or unexpected charges, their perception of digital banking services tends to sour. Banks that offer value-added services without excessive fees or complex fee structures tend to improve their customer perception.
- Tiwari et al. (2019) shows that perceived privacy and security are crucial for building customer loyalty. When customers perceive that their personal data is well-protected and that online transactions are secure, they are more likely to embrace digital banking services.
- Alalwan et al. (2017) found that the ease of use, reliability, and interface design of mobile banking apps were important determinants of customer satisfaction. Customers expect digital banking platforms to be intuitive, fast, and responsive, with minimal technical difficulties. The study indicated that a user-friendly interface, easy navigation, and personalized services led to higher satisfaction and positive perceptions of digital banking.

Statement of the problem

Nowadays, all banks and financial institutions introduce various modes of payment, receipt, and deposit through internet banking services. The researcher was keen to find out how extensively customers were utilizing services provided by the banking or financial sectors. Customer perception plays a vital role in the financial industry. To enhance customer contentment and elevate service standards, it is important to understand customer perception regarding digital banking and to determine the elements that affect this perception. This is identified as a problem statement. The success of banking institutions is critical to customer satisfaction, yet their ability to improve banking products and services is often hindered. The customer experience index has decreased. When banking sector marketing executives fail to understand which products and services to promote for consumer and client satisfaction, they occasionally make errors. A significant challenge is that certain areas of the banking sector lack clarity on how to improve service quality. Furthermore, the ability of banks to innovate and improve their digital banking products and services is often hindered by operational inefficiencies, slow adoption of new technologies, and a lack of clarity about customer expectations.

Objectives of the study

1) To enhance the digital banking facilities offered by the banks in the Tiruchirappalli district.
2) To measure the customer satisfaction in digital banking services in the Tiruchirappalli district.
3) To evaluate the awareness of digital banking among the customer services of banks in the Tiruchirappalli district.
4) To Analyse factors influencing digital banking adoption and usage.

Scope of the Study

Currently, banking operations are entirely automated. Customers can perform their banking tasks from home via the internet, which enhances customer service. This project will examine customer perceptions regarding information privacy, ease of use, efficiency, responsiveness, reliability, and convenience. This analysis will help bankers pinpoint the areas where they fall short and need to enhance their services to better serve their customers customer services.

Limitations of the study

The research on customer perspectives regarding digital banking services in the Tiruchirappalli District seeks to offer important insights into customers' opinions about digital banking. However, several limitations should be considered when interpreting the findings, which may not reflect the experiences of digital banking users in other urban or rural areas across India. Regional differences in infrastructure, access to technology, and cultural factors may influence how digital banking is perceived, limiting the applicability of the study's findings to other regions.

Research Gap

Research often focuses on general digital banking perceptions, but it doesn't differentiate between various channels like mobile banking apps, internet banking, or digital wallets. Different digital banking platforms (e.g., mobile apps, USSD codes or web portals) might be perceived differently by customers in Tiruchirappalli. Exploring these perceptions can help banks improve each platform based on specific customer preferences. Exploring how customers in Tiruchirappalli perceive these different channels, considering factors like ease of use, security concerns, service reliability, and personal preferences, can provide critical insights for banks. By understanding these platform-specific perceptions, banks can tailor their services, offer targeted improvements, and enhance customer satisfaction for each channel. This can lead to more efficient service delivery, higher customer adoption rates, and ultimately more satisfied and loyal customers, as the bank's digital platforms meet the unique needs of different customer segments.

Research methodology

Research methodology indicates a structured approach to addressing problems. It can be understood as the science of examining what is carried out using scientific methods. The method applied in this research involves descriptive analysis. This technique, which is also referred to as statistical analysis, outlines the information and features related to the demographic or occurrence being examined. A convenient selection technique was used to gather primary data. The selected sample comprised 284 individuals. Participants were selected from Trichy District. A structured questionnaire served as the research instrument. The questionnaire contained inquiries that addressed different facets of customer perceptions regarding digital banking services.

Data Collection

The data utilized consists of is made up of both primary and secondary.

Primary data: Primary data refers to information gathered anew and for the first time, thereby being original in nature. In this study, the questionnaire method is employed.

Secondary data: Secondary data, on the other hand, pertains to information that has already been collected by others and has undergone statistical processing.

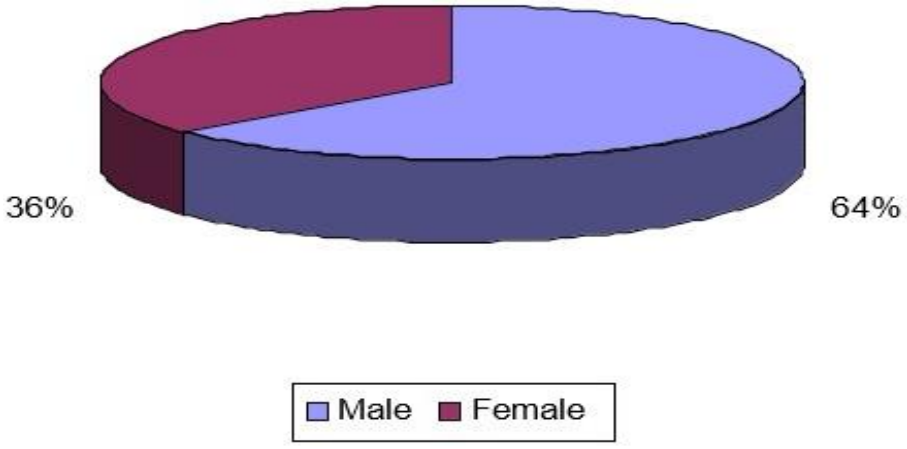
Sampling: The selected sample comprised 284 individuals. Participants were selected from Trichy District.

2. Tools Used for Analysis

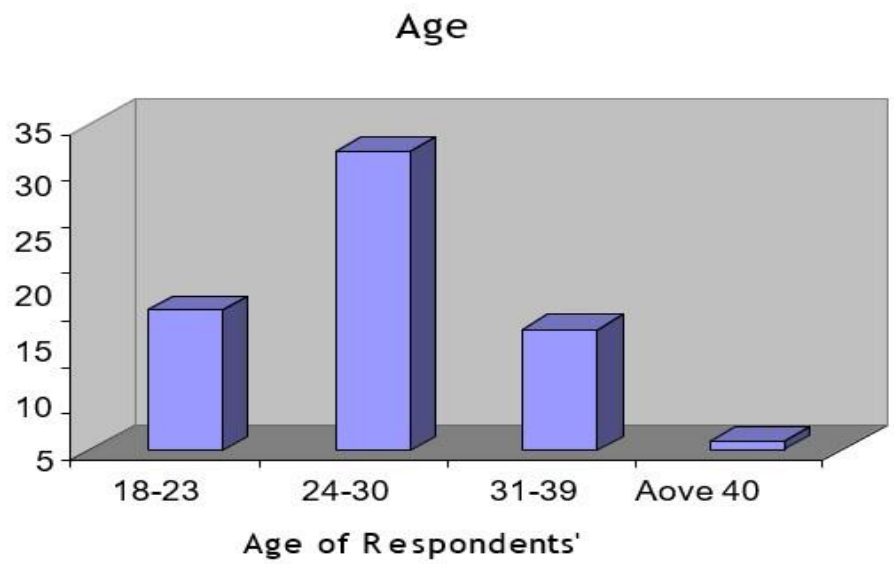
The data analysis was conducted using statistical tools, Percentage analysis, & Chi-Square tests to evaluate associations (e.g., age and security confidence). These tools were applied using software capable of handling tabular data and producing p-values to determine statistical significance. The analysis also involved calculating frequencies and percentages to summarize respondent profiles and preferences, ensuring a robust quantitative framework for interpreting the findings.

Sample Profile

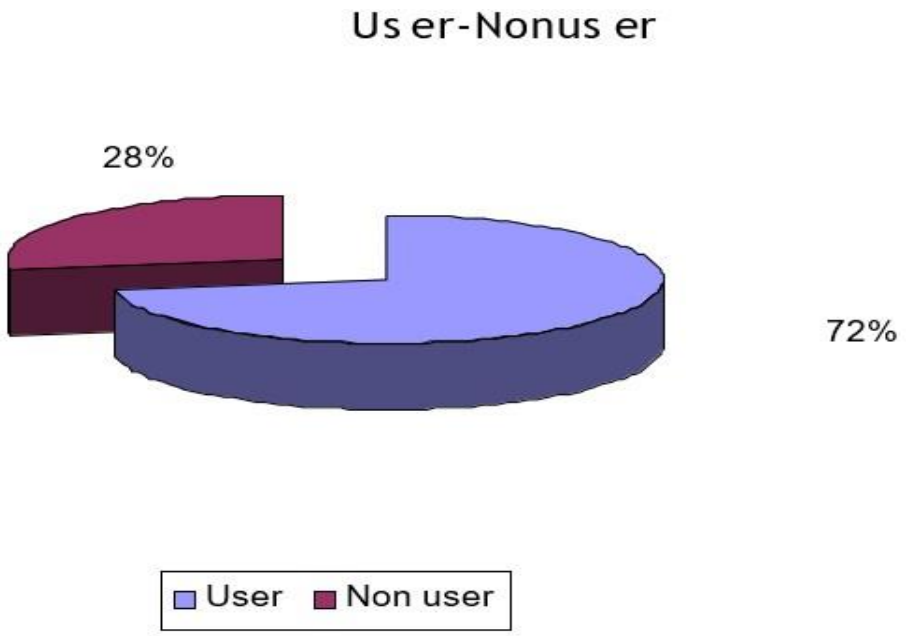
The total respondents 64% were males and 36% were females. Gender 64% 36% Male Female



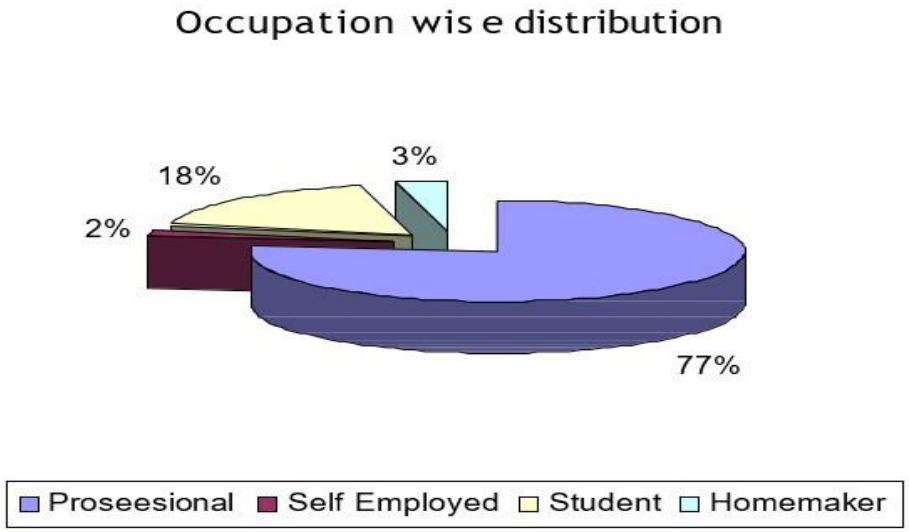
Out of total respondents' 77% were professionals and 18% respondents were studying.



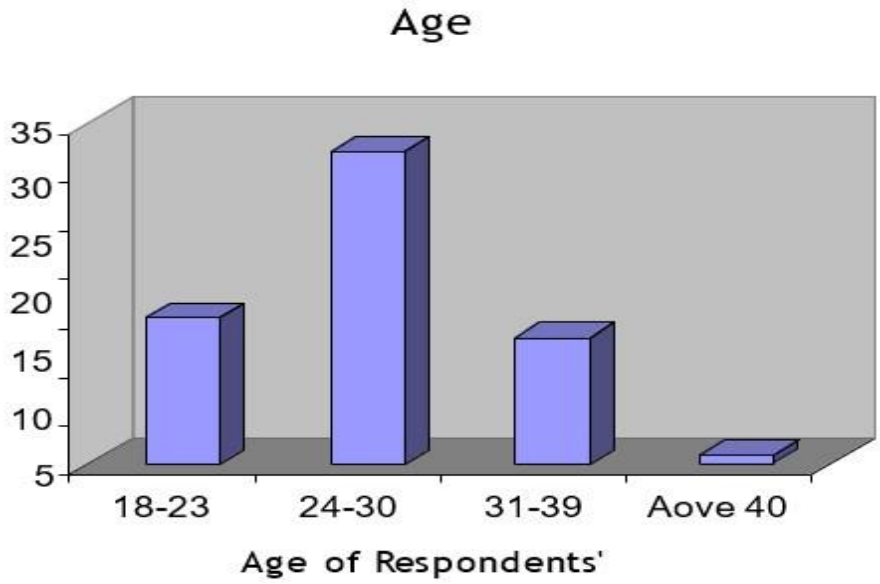
The chart below depicts the respondents classification based on user and non user criteria. Out of total respondents' 44 respondents were internet banking users' and 14 were non users.



Most of the respondents belongs to the age group of 24-30, while 18-23 and 31-39 age group respondents were almost equal in number.



Out of total respondents' 77% were professional and 18% respondents were studying.



3. Data Analysis and Interpretation

H0: There is no meaningful connection in the relationship between gender and service.
H1: There is a meaningful connection in the relationship between gender and service.

Table 1.1: Chi-Square

Case Processing Summary	Cases Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
GEN *service	160	100.0%	0	0.0%	160	100.0%
GEN* info. Checking	160	100.0%	0	0.0%	160	100.0%
GEN*Bal. Enquiry	160	100.0%	0	0.0%	160	100.0%
GEN*payments	160	100.0%	0	0.0%	160	100.0%

GEN *SERVICE			service Ext. Satisfied	Satisfied	Neutral	Total
GEN	Male	Count	40	58	0	98
		Expected Count	38.0	58.8	1.2	98.0
	Female	Count	22	38	2	62
		Expected Count	24.0	37.2	.8	62.0
Total		Count	62	96	2	160
		Expected Count	62.0	96.0	2.0	160.0

Chi-Square Tests	Value	df	Asymptotic Significance(2-sided)
Pearson Chi-Square	3.468[a]	2	.177
Likelihood Ratio	4.102	2	.129
Linear-by-Linear Association	1.066	1	.302
Nof Valid Cases	160		
2cells (33.3%) have expected countlessthan5.The minimum expected countis.78.			

Interpretation
The table value is 5.991, while the calculated value is 3.468. Since the calculated value is lower than the table value, we accept the null hypothesis (H0). Therefore, there is no significant correlation between gender and service.
H0: There exists no significant relationship between gender and information checking.
H1: There is a significant relationship between gender and information checking.

Table 1.2: GEN * Info. Checking

Chi-Square Tests	Value	df	Asymptotic Significance(2-sided)
Pearson Chi-Square	6.663[a]	3	.083
Likelihood Ratio	6.986	3	.072
Linear-by-Linear Association	.010	1	.921
No of Valid Cases	160		

Interpretation
Two cells (25.0%) have an expected count of less than 5, with the minimum expected count being 0.39. The table value is 7.815, while the calculated value is 6.663. Since the calculated value is less than the table value, we accept the null hypothesis (H0). This indicates that there is no significant relationship between gender and information checking.

For the relationship between profession and requests, we have the following hypotheses:

- H0: There is no significant relationship between profession and requests.
- H1: There is a significant relationship between profession and requests.

Table 1.3: PROF * Requests

Crosstab						
			Requests Strongly agree	Agree	Neutral	Total
PROF	Govt. employee	Count	0	46	0	46
		Expected Count	8.6	33.6	3.7	46.0
	Private employee	Count	8	38	10	56
		Expected Count	10.5	41.0	4.6	56.0
	Businessmen	Count	14	15	0	29
		Expected Count	5.4	21.2	2.4	29.0
	House wife	Count	6	0	0	6
		Expected Count	1.1	4.4	.5	6.0
	student	Count	2	18	3	23
		Expected Count	4.3	16.8	1.9	23.0
Total		Count	30	117	13	160
		Expected Count	30.0	117.0	13.0	160.0

Chi-Square Tests			
	Value	df	Asymptotic Significance(2-sided)
Pearson Chi-Square	69.906[a]	8	.000
Likelihood Ratio	72.903	8	.000
Linear-by-Linear Association	1.497	1	.221
N of Valid Cases	160		
8cells (53.3%) have expected count less than 5.The minimum expected count is 49.			

Interpretation
Table value (15.507) Calculated value (69.906). The calculated value is greater than the table value.H0 is rejected. There is a significant relationship between profession and request handling.
H0: There is no significant relationship between profession and Request.
H1: There is a significant relationship between profession and Request.

Table 1.4: AGE * Difficulty

Crosstab						
			Difficulty often	Rarely	Never	Total
AGE	18-25yrs	Count	0	42	4	46
		Expected Count	2.3	39.7	4.0	46.0
	26- 30yrs	Count	4	51	0	55
		Expected Count	2.8	47.4	4.8	55.0
	31-40yrs	Count	4	45	10	59
		Expected Count	3.0	50.9	5.2	59.0
Total		Count	8	138	14	160

Chi-Square Tests			
	Value	df	Asymptotic Significance(2-sided)
Pearson Chi-Square	16.416[a]	6	.012
Likelihood Ratio	18.120	6	.006
Linear-by-Linear Association	.703	1	.402
N of Valid Cases	160		
0cells (0.0%) have expected count less than 5. The minimum expected count is 8.05.			

Interpretation
Table value: 12.592 Calculated value: 16.416
Since the calculated value exceeds the table value, we reject H0.
There is significant relationship between age and privacy of information.

4. Conclusion

Digital banking services in Tiruchirappalli are perceived positively, with many customers appreciating their convenience and efficiency. However, to maximize adoption and customer satisfaction, banks must address security concerns, improve customer support, and focus on increasing digital literacy across all segments of society. This specific study has been carried out to assess customers' views Online banking in Trichy is examined in this research. The analysis showcases the particular mindsets and behaviours of clients concerning online banking. Based on the findings of the research, several recommendations have been suggested. The majority of respondents viewed internet banking as a secure, convenient, and dependable method of conducting transactions. This research design provides a clear and structured approach to studying customer perceptions towards digital banking services in Tiruchirappalli District. By combining both numerical and descriptive approaches, this design aims to ensure comprehensive data collection, reliability, and the ability to derive meaningful insights. The outcomes of this study will help banks and financial institutions improve their digital services and cater more effectively to customer needs. The outcomes of the survey indicated that a majority of the participants Online banking is seen as convenient by them. In addition, many respondents also expressed a positive view regarding the privacy and reliability features of internet banking. These findings primarily imply

that customers have a favourable perception of internet banking. While many earlier studies have addressed this factor concerning internet banking, this particular research contributes to the field by providing a deeper understanding of customers' perceptions of privacy, security, and convenience in relation to internet banking.

Findings

- Findings from a survey. Having most of the male participants and most being above 20 in age could indicate certain demographics or preferences within your surveyed population. Depending on the context of your survey and what you're trying to understand or analyse, these findings could be significant in interpreting your results. Are you looking to delve deeper into this data or need help with anything specific related to your survey?
- These findings could be useful for understanding the demographics of your respondents and interpreting the results of your survey. Depending on the objectives of your survey, you may want to consider how these demographic factors could influence the responses you've collected.
- Most of the people surveyed express confidence in the bank's commitment to not misusing their personal information.
- The majority of respondents sustain an impartial position regarding the acceptance of financial security and confidentiality provisions; however, most agree on the high reliability of the current systems.
- A large percentage of those surveyed agree on their acceptance of the truthful information provided by the bank and its affiliates. Conversely, most respondents remain neutral regarding the unique delivery of services offered by the bank.
- Most respondents demonstrate a favourable acceptance level towards the bank's responsiveness in handling issues and support for new system enhancements. In contrast, many respondents are neutral about the bank's excellence in displaying account balances. Still, most agree regarding the acceptance of credit card account information provided by the bank.
- Most of the participants convey acceptance of the bank's excellence in enabling online viewing of digital checks. Additionally, most respondents agree that the bank keeps its promises to deliver services within the specified timeline.
- Most respondents also agree with the notion of the bank delivering services correctly on the first attempt, as well as their capacity to find solutions for customer issues.
- Most respondents agree with the bank's ability to process transactions and manage customer details without errors.
- Internet banking has brought numerous advantages to the banking sector, such as improved efficiency in the value chain, generation of revenue, brand enhancement, and strengthening business relationships with customers.
- The study indicates that to utilize digital banking services, customers need to possess some familiarity with the internet and computer usage. Those who are beginners or infrequently use the internet and computers find the service process challenging.

Suggestions

- The study's objectives are explicitly outlined, encompassing the analysis of customer satisfaction, the identification of challenges, and the evaluation of factors that influence perceptions of digital banking.
- A concise introduction to digital banking and its significance in Tiruchirappalli will be provided, emphasizing its growth and impact on the local economy.
- A review of existing literature will be included to underscore trends and identify research gaps regarding customer perceptions of digital banking.
- A structured questionnaire will be utilized, incorporating a mixture of Likert scale items and open-ended inquiries to collect both quantitative and qualitative information.
- The study will take into account variables such as ease of use, security, customer trust, satisfaction, and potential barriers, including lack of awareness or technical skills.
- Statistical tools will be employed for data analysis, utilizing approaches like descriptive statistics, correlation studies, and chi-square tests to uncover patterns and relationships.

Scope for Future Research

Future studies may concentrate on the relationship between digital literacy and the acceptance and effective use of digital banking. A deeper exploration of the challenges faced by different demographics (such as older generations, rural populations, or less tech-savvy individuals) could help banks design better educational programs and tailored services. Research could focus on understanding the behavioural patterns of customers who frequently use digital payments and their level of trust in these systems. This could include a deeper look at the psychology behind customers' willingness to adopt digital banking and their concerns regarding fraud and transaction errors.

References

[1] Arora, A., & Sharma, R. (2022). "Consumer Perception towards Digital Banking: A Study of Indian Customers." *Journal of Banking and Finance*, 40(3), 78-91.
[2] Bhupendra Kaur Saluja, Dr.VivekSharma, Juhi Naik. (n.d.). The Study of Customer Perception towards Banking Services of Banks in Indore Region. Altius Shod Journal of Management & Commerce.
[3] Chaudhary, V. & Mehta, S. (2020). "Digital Banking and Customer Experience: Evidence from Tier 2 Cities in India." *International Journal of Bank Marketing*, 38(4), 423-440.
[4] Dr. Pinky Insan, Sapna kumari. (2012). Customer Perception toward Internet Banking: A Studyof Sirsa City.IOSR Journal of Business and Management,52-59.
[5] Gupta, R., & Dhingra, M. (2020). "Security Concerns in Digital Banking: A Study of Indian Bank Customers." *Journal of Information Security*, 9(5), 315-330.
[6] Keneddy Okiro, Jack Ndungu. (2013). The Impact Of Mobile and Internet Banking On Performance Of Financial Institution in Kenya. European ScientificJournal,9.

[7] Kharis.(2013).The Effectiveness OfE-Banking Environment In Consumers Life: An Empirical Study (POLAND).Polish Journal Of Management Studies,8,110-119.
[8] Komwut Unyathanakorn, Nopadol Rompho.(2014). Factors Affecting Customer Satisfaction in Online Banking service. Journal Of Marketing Development and Competiveness, 8.
[9] Madhusree, S. (2019). Factors affecting the adoption of digital banking services in India: An empirical analysis. International Journal of Management, 10(5), 35-49.
[10] Patel, P., & Patel, S. (2020). Adoption of Digital Banking: A Case Study of Indian Banks. In Proceedings of the International Conference on Digital Transformation and Innovations in Banking (pp. 45-55).
[11] Rajesh, A. (2021). "A Study on the Impact of Digital Banking Services on Customer Satisfaction in South India." Ph.D. Dissertation, University of Madras.
[12] Ravi, R., & Sasi, R. (2018). Customer perception and satisfaction towards mobile banking services: A study with special reference to urban users. Journal of Management and Technology, 14(3), 121-137.
[13] Sakshi Arora, Swati Mishra (2020), "A review of customer satisfaction in rural and urban areas with special reference to banking technology", International Journal Economics and Management Volume 8 Issue 1, January-2020.
[14] Srinivasan, V., & Kumar, S. (2021). "Exploring the Determinants of Digital Banking Adoption: A Study in Tamil Nadu." *Asian Journal of Finance & Accounting*, 13(2), 105-120.
[15] V. Maheswari, M. Meenakumari (2020), "Consumer Satisfaction Towards Mobile Banking Services of S In Tiruchirappalli Town - BI A Study", Mukt Shabd Journal, Volume IX, Issue IV, April/2020
[16] https://www.rbi.org.in/Scripts/BS_ViewBulletin.aspx
[17] https://www.ibef.org/industry/indian-banking.aspx
[18] https://rjhssonline.com/HTMLPaper.aspx?Journal
[19] https://www.onlineresearchjournals.com/ajbe/art/62.pdf
[20] https://turcomat.org/index.php/turkbilmat/article/view/6091
[21] Garg, R., & Jain, P. K. (2020). Service Quality and Customer Satisfaction in Banking: Insights from India.
[22] Kochhar, A. (2019). Digital Banking: The Future of Banking in India. New Delhi: Bloomsbury India.
[23] KPMG (2021). The Future of Digital Banking: Trends and Consumer Behaviour.
[24] Panda, M. (2020). Digital Banking and Customer Satisfaction. New Delhi: SAGE Publications.
[25] Rathore, A. (2021). Financial Services and Technology: A Handbook for Digital Banking.