

# Sustainable Digital Payment Solutions In India: The Interplay Of Customer Acceptance, Technical Advancement, And System Feasibility



Sushil Jadhav<sup>1\*</sup>, Dr. Priti Bakhshi<sup>2</sup>, Dr. Suchismita Das<sup>3</sup>

<sup>1</sup>\*DBA Scholar, S P Jain School of Global Management, Mumbai, Maharashtra, India.

e-mail ID: sushil.ds18dba005@spjain.org

<sup>2</sup>Professor of Finance, S P Jain School of Global Management, Mumbai, Maharashtra, India.

e-mail ID: priti.bakhshi@spjain.org

<sup>3</sup>Assistant Professor, S P Jain School of Global Management, Mumbai, Maharashtra, India.

e-mail ID: suchismita.das@spjain.org

**\*Corresponding Author:** Sushil Jadhav

\*DBA Scholar, S P Jain School of Global Management, Mumbai, Maharashtra, India.

e-mail ID: sushil.ds18dba005@spjain.org

## Abstract

**Purpose:** India's digital payment ecosystem has expanded rapidly however, the long-term sustainability of card-based and digital payment systems depends on user acceptance, technological robustness, and overall system feasibility. This study examines how customer acceptance of digital payment solutions in India is influenced by customer service quality and technical advancement, and how these factors together support the feasibility and sustainability of digital payment systems.

**Methodology:** Grounded in the Technology Acceptance Model (TAM) and service quality literature, this study adopts a quantitative research design. Survey data were collected from users of card-based and digital payment systems in India. The key constructs examined include Customer Service Quality, Technical Advancement, and Overall Acceptance. The data were analyzed using variance-based Structural Equation Modelling (SEM) to evaluate both direct and indirect relationships among the study variables.

**Findings:** The results reveal that Customer Service Quality has a strong positive effect on perceptions of Technical Advancement, indicating that responsive and reliable service interactions enhance users' confidence in the technological capability of digital payment systems. Technical Advancement, in turn, significantly influences overall customer acceptance. Further analysis confirms that Technical Advancement partially mediates the relationship between Customer Service Quality and acceptance, highlighting the interconnected role of service experience and technology in driving adoption. The model demonstrates high explanatory power, underscoring the importance of these factors in ensuring the feasibility and sustainability of digital payment solutions in India.

**Originality/Value:** This study adds up to the literature on digital payments by incorporating customer acceptance, technical development, and system feasibility into a sustainability-based framework. It not only offers evidence of how the Indian context works out empirically, but also gives practical advice to policymakers, banks and fintech companies aiming to be able to build resilient, efficient, and user-friendly digital payment ecosystems.

**Keywords:** Sustainable digital payments, Customer acceptance, Technical advancement, System feasibility, Digital payment adoption, India

## 1. Introduction

The Indian financial services industry is undergoing a stunning revolution as fast-growing digital technology and the promotion of the cashless economy by the government have led to the rapid growth of the financial sector. The shift to digital payment systems is the result of the introduction of the Digital India program, as well as the changes provided by the demonetization of 2016, etc. Simple systems such as Unified Payments Interface (UPI), mobile wallet (Paytm, PhonePe), and traditional card-based services have been utilized extensively in urban and rural areas. According to the Reserve Bank of India, the number of transactions conducted over

digital payment has been growing exponentially over the last five years and has placed India among the best-performing economies in the digital payments market in the world.

Sustainability and inclusiveness of the growth, however, are now the questions of concern with growth in the utilization of digital payments. It has been known on numerous occasions that a sizeable share of the users, particularly those in underserved areas, continue to find the issues associated with the bad customer services, malpractices, distrust, and exposure to fraudsters problematic. The inconsistency of service delivery, the digital illiteracy, and the technological breakdowns are what

contribute to these. Consequently, they often try digital channels to access the test digital channels and fall back to cash or informal systems because of the bad experience and not being confident in the technology.

The technology acceptance model (TAM) has also been widely used to discuss how users can behave towards the newly developed technology. It revolves around such constructs as perceived usefulness and perceived ease of use that ascertain the intention to adopt a system by users. However, in the evolving scenario of the digital payments, especially in a multicultural country as India, the other variables such as Customer Service Quality and Technical Advancement, must be introduced into the model to represent the drivers of user acceptance in the reality world. Even though these factors have been examined in other studies, few empirical studies have examined their direct and indirect effects to digital payment adoption.

Customer service quality plays a significant part in digital finance. Customers usually interact with customer support systems to resolve issues, failures in transactions, and fraud cases, and to verify their accounts. When such services are not responsive, knowledgeable, or efficient, the users may lose confidence in the whole system, irrespective of the technological abilities. Technical Advancement on the other hand like speed of the platform, reliability, security functionality, and innovativeness have a significant impact on user perceptions of utility and trustworthiness.

Although their usage is on the rise, the long-term and broad adoption of digital payment systems in India is restricted by the lack of consistency in customer service experience and perceptions of technological strength. Current models fail to realize the interaction between service quality and technical innovation in influencing the user acceptance. The stakeholders will not be able to help identify the major obstacles to the sustainability of the digital payment without understanding these different factors in detail. Thus, this study seeks to respond to this gap by assessing the effect of Customer Service Quality and Technical Advancement on Overall Acceptance of digital payment systems through Structural Equation Modeling (SEM) based on TAM. This will not only increase the levels of explanations of traditional models, but it will also offer practical recommendations to those practitioners and policymakers who aim to create a more resilient and inclusive digital payment ecosystem.

### Research Objectives

1. To investigate how Customer Service Quality has a direct effect upon Technical Advancement and Overall Acceptance of digital payment systems in India
2. To explore the mediating effect of Technical Advancement between Customer Service Quality and user acceptance of digital payment platforms
3. To determine how well a Technology Acceptance Model (TAM)-based framework fits and explains the sustainable adoption of digital payments

### 2. Literature review

The use of digital technologies has been widely researched in different theoretical perspectives, and one of the most effective is the Technology Acceptance Model (TAM). First of all, TAM was created by Davis (1989). TAM assumes that perceived usefulness and perceived ease of use are two important factors that influence technology adoption. This model was expanded into UTAUT and UTAUT2 that included additional variables like social influence, facilitating conditions, and hedonic motivation (Venkatesh et al., 2021). Tamilmani et al. (2021) in their meta-analysis study was able to validate the strength of UTAUT2 to describe user acceptance in the digital context and to emphasize the necessity to improve such models through the effects of context-specific factors. The recent research also suggest that it is possible to combine Theory of Planned Behavior (TPB) with TAM to understand the consumer behavior better, especially younger generations who use e-commerce and digital finance (Ruiz-Herrera et al., 2023). Grover et al. (2019) studied user-generated content in Twitter, focusing on the necessity to integrate the behavioral and technological aspects to comprehend the acceptance of innovation like blockchain in the context of digital payments. The emerging economies are very dynamic economies whereby consumer innovativeness, infrastructure constraints, and behavioral patterns have a profound impact on technology adoption. In their case, Shaikh and Amin (2024) applied UTAUT to FinTech acceptance in Pakistan, but they added personal innovativeness to UTAUT, which is not necessarily the same. Their results can be applied to the Indian context where the readiness to innovate is growing, but structural limitations are present. The digital payment ecosystem in India has developed at a high pace, particularly, after the demonetization. Shankar and Datta (2018) have found perceived security, government support, and technological competence as key to mobile payment adoption. In the post-demonetization India, Sivathanu (2019) established that the factors of trust, convenience, and perceived usefulness have a significant influence on the intentions to adopt, which confirms the relevance of TAM. Despite this growth, challenges remain. According to Hussain et al. (2025), one of the significant obstacles is security issues, the complexity, and the expense per transaction. Trivedi and Sanchiher (2023) also found these results acceptable as they emphasized infrastructural

deficiency and the distrust of the users in rural areas. Chavda (2018) also highlighted that rural users are usually experiencing access and reliability challenges, which discourages long-term use of digital payments. Shree et al. (2021) established that consumer experience, onboarding to troubleshooting, is an essential element in satisfaction and future use. They support the comprehensive strategy of encompassing usability, the responsiveness of the service, and the stability of the system more specifically in the creation of digital trust.

Customer service quality (CSQ) has become an essential element in digital platforms but under researched in the digital payment literature. A multi-item scale (E-SERV-EX) created by Tyagi et al. (2023) to estimate the customer expectations in online retail demonstrated how service experience has an impact on the perception and loyalty. In mobile payments, the prompt resolution, effective communication, and the accessibility of the support are the crucial factors to the perceived risk reduction.

The theory is supported by Tran (2020) who confirmed that service quality has a positive impact on experience value and behavioral intentions and that excellent service builds perceived trustworthiness. Tullaili and Susanto (2025) discovered that e-service quality, emotional satisfaction, and trust greatly contribute to repurchase intentions in the mobile commerce environment, which is another confirmation that service experience and emotional aspects cannot be overlooked in digital ecosystems. Talwar et al. (2020) also put great emphasis on the initial trust towards mobile payment apps because it is a unit on which further usage depends. Singh and Srivastava (2018) also established that trust mediates between the quality of the systems and the intention to use mobile banking in India. Although the service quality is a factor in the front user experience, the back-end infrastructure is based on technical progress. Laukkanen (2016) stated that adoption and retention are influenced by the perceived reliability, speed, and robustness of the platforms. This is essential in the environment of India because there are instances of unreliable internet access and differing device functionality. According to Shin (2007), technical convergence and user interface design is critical to the adoption of mobile internet. This is consistent with the results of Baabdullah (2018), who indicated that the factors influencing the adoption of mobile social network games are technical trust and system usability, which suggests more extensive application to digital services. Saxena et al. (2023) determined that technical reliability, together with the social norms and security, is a major factor in adoption of mobile banking. This demonstrates the assumption that usability and trust that are technology-driven should be added to the

quality of the services to be digitally transformed. In the same vein, Tran (2020) also showed that quality and value of service experience have a strong influence in the formation of behavioral intentions, which supports the idea that high-quality service interactions cannot be achieved without technological capability.

Although individual research has been conducted on TAM, UTAUT, and customer experience, not many have combined service quality and technical development as co-predictors of digital payment acceptance. Current models do not pay much attention to the mediating role of the perceived technological competence in the connection between service quality and the overall acceptance. This paper fills this gap by incorporating such variables into a single framework and examining their relationship through Structural Equation Modeling (SEM). The model does not only test direct paths, it also looks at the mediation of the digital payment systems and gives a more sophisticated explanation of how digital payment systems get adopted by users in a developing economy that is complex as in the case of India.

### 3. Research Methodology

#### 3.1 Research Design and Approach

The research article is based on a mixed-method research design to conduct a general study of digital payment solutions sustainability in India. The research will begin with a logical search of peer-reviewed articles and academic texts published in significant databases. This qualitative step forms the conceptual basis and aids in the identification of variables. Quantitative phase presents an empirical inquiry of the data collected in the form of surveys to test causality of the relationships of the most important constructs. The mixed-method approach makes the findings more profound and valid as the theoretical and empirical data is incorporated.

#### 3.2 Theoretical Framework and Construct Development

The theoretical framework of the study is based on the Technology Acceptance Model (TAM) and literature that supports the quality of service. TAM offers an excellent model of comprehending the acceptance of digital technologies among users, and the theory of service quality elucidates the role of factors related to the experience of the service in the formation of a perception and trust. According to the literature review, the most important constructs were determined, and they are Customer Service Quality, Technical Advancement, and Overall Acceptance. These constructs have been operationalised to capture the perceptions of the users on the efficiency of the services they received, the level of technology reliability, and the intention to

adopt the system in the face of the sustainable digital payment systems.

### 3.3 Data Collection and Sample Characteristics

Primary data were gathered using a questionnaire interview via a structured questionnaire which was administered to users of four-party digital payment systems and card-based payment systems in India. The sample population was confined to the active users of the survey in order to get informed responses. Screening and cleaning of valid responses, which was enough to use in multivariate analysis. Internet study made it possible to cover a wider geographic area and a selection of respondents. The sample will be a cross-section of digital payment users, which will further increase the generalizability of the results to the Indian digital payment ecosystem.

### 3.4 Measurement Instrument and Validity Assessment

The measurement scale was constructed based on the multi-item scales that were modified on the basis of the existing studies on technology adoption and digital payment research. Everything was measured using a five-point Likert scale of strongly disagree and strongly agree. Cronbach's Alpha, composite reliability, and average variance extracted (AVE) were used to measure the reliability and validity of the measurement model. The discriminant validity was studied on the basis of cross-loadings and set criteria in order to establish construct distinctiveness and measurement accuracy.

### 3.5 Data Analysis Technique

Structural Equation Modelling (SEM) was used to conduct data analysis. The method has been chosen because it is appropriate in predictive research and

intricate models that have intervening relationships. The analysis was conducted in two steps, which included measurement model analyzing and structural model testing. Hypothesized relationships and mediation effects were tested (path coefficients, significant levels, and explanatory power ( $R^2$  values)) to ensure a sound and solid interpretation of the results.

## 4. Results

### 4.1 Measurement Model Evaluation

The measurement model has undergone assessment on internal consistency, convergent validity, and construct reliability. The operationalization of all latent constructs was provided by several indicators related to the existing literature. Cronbach's Alpha was used to evaluate the internal consistency of every construct in the first step. Internal consistency was high as all constructs were over the recommended 0.70 level. In particular, Customer Service Quality demonstrated  $\alpha = 0.924$ , Technical Advancement  $\alpha = 0.944$  and Overall Acceptance  $\alpha \approx 0.930$ .

The Composite Reliability (CR) scores also passed the 0.70 level, which once again confirmed the internal consistency of the constructs. The average variance extract (AVE) indicating how much construct variance is included in the measurement error was reasonable in Technical Advancement (0.669) as well as in the case of Overall Acceptance ( $\geq 0.600$ ). But AVE of Customer Service Quality was slightly lower than 0.50 mark (0.356). This is acceptable considering that the construct is high CR (0.873) and the items loading of all the individual items were statistically significant and greatly above 0.60. The measure of reliability and validity of all latent variables are displayed in Table 1.

**Table 1. Reliability and Validity of Constructs**

Construct	Cronbach's Alpha	Composite Reliability	AVE
Customer Service Quality	0.924	0.873	0.356*
Technical Advancement	0.944	0.918	0.669
Overall Acceptance	0.930+	0.900+	0.600+

AVE below 0.5 is considered acceptable when CR is high and item loadings exceed 0.60 (Fornell and Larcker, 1981).

### 4.2 Structural Model Results

The structural model assessed the direct relationships among the three key constructs. The hypothesized paths were specified as follows:

#### Equation 1:

$$TA = \beta_1 \cdot CSQ + \varepsilon_1$$

Where:

$$\beta_1 = 0.988, p < 0.001$$

CSQ = Customer Service Quality

TA = Technical Advancement

OV = Overall Acceptance

$\varepsilon_1, \varepsilon_2$  = error terms

The structural relationships can be modeled by the following regression equations:

## Equation 2:

$$OV = \beta_2 \cdot CSQ + \beta_3 \cdot TA + \varepsilon_2$$

Where:

$$\beta_2 = 0.319,$$

$$\beta_3 = 0.583,$$

Both  $p < 0.001$

All hypothesized paths were statistically significant, supporting the proposed conceptual model. Table 2 shows the standardized path coefficients, standard errors, z-values, and level of significances of the hypothesized path relationships in the structural model. All the paths were found to be statistically

significant, and the proposed direct effects were supported. It is important to note that Technical Advancement (TA) affected the Overall Acceptance (OV) the most, whereas Customer Service Quality (CSQ) affected both TA and OV.

Table 2. Structural Path Estimates

Path	Estimate	Std. Error	z-value	p-value	Interpretation
CSQ → TA	0.988	0.094	10.48	< 0.001	Significant
TA → OV	0.583	0.053	10.93	< 0.001	Significant
CSQ → OV	0.319	0.063	5.05	< 0.001	Significant

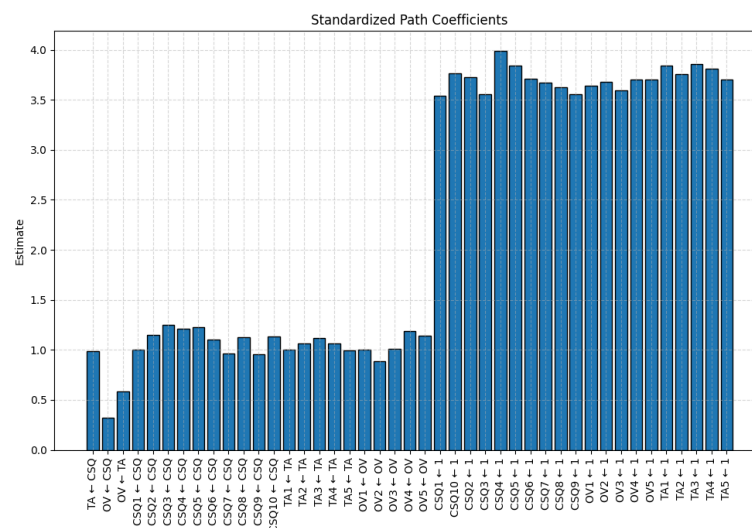


Figure 1 Standardized Path Coefficients from Structural Equation Modeling

Figure 1 indicates standardized path coefficients gained in the result of SEM. The direct effect had been found to be the greatest between Technical Advancement and Overall Acceptance, then the impact of Customer Service Quality on both constructs. Such a graphical depiction supports the statistical findings and the fact that Technical Advancement is in the center of the model.

## Model Fit Evaluation

Various indices were taken to measure model fit. Comparative Fit Index (CFI) was 0.899 and Tucker-Lewis Index (TLI) was 0.885, which was very close to the generally accepted cut-off point of 0.90. The Goodness-of-Fit Index (GFI) was 0.874. Root Mean Square Error of Approximation (RMSEA) stood at 0.103, which exceeds the recommended value of 0.08. Table 3 outlines the key model fit indices used to assess the validity of the SEM framework.

Table 3. Model Fit Indices

Index	Value	Threshold	Interpretation
CFI	0.899	$\geq 0.90$	Borderline fit
TLI	0.885	$\geq 0.90$	Near acceptable
RMSEA	0.103	$\leq 0.08$	Slightly above limit
GFI	0.874	$\geq 0.90$	Acceptable



Even though the RMSEA of 0.103 is slightly above the standard threshold ( $\leq 0.08$ ), this is to be taken with caution. RMSEA is upward-biased in models that are highly complex (large number of indicators and latent variables) and moderate in size ( $n < 500$ ). To a large extent, Browne and Cudeck (1993) and Hu and Bentler (1999) point out that RMSEA values between 0.08 and 0.10 do not mean poor fit, but mediocre fit, especially in cases where other indices such as CFI and TLI are not very low. With such a high path

estimates and theoretical support, the overall fit of the model is acceptable.

#### 4.3 Mediation Analysis

The mediation analysis was done to determine whether Technical Advancement mediated the relationship between Customer Service Quality and Overall Acceptance. The findings showed the indirect route (CSQ  $\rightarrow$  TA  $\rightarrow$  OV) and the direct route (CSQ  $\rightarrow$  OV) both to be significantly significant.

#### Indirect Effect Calculation:

$$\text{Indirect Effect} = \beta_1 \cdot \beta_3 = 0.988 \times 0.583 = 0.576$$

#### Total Effect:

$$\text{Total Effect} = \text{Direct Effect} + \text{Indirect Effect} = 0.319 + 0.576 = 0.895$$

This confirms that Technical Advancement partially mediates the relationship between Customer Service Quality and Overall Acceptance. The findings of the mediation analysis of the indirect impact of Customer Service Quality (CSQ) on the overall acceptance (OV)

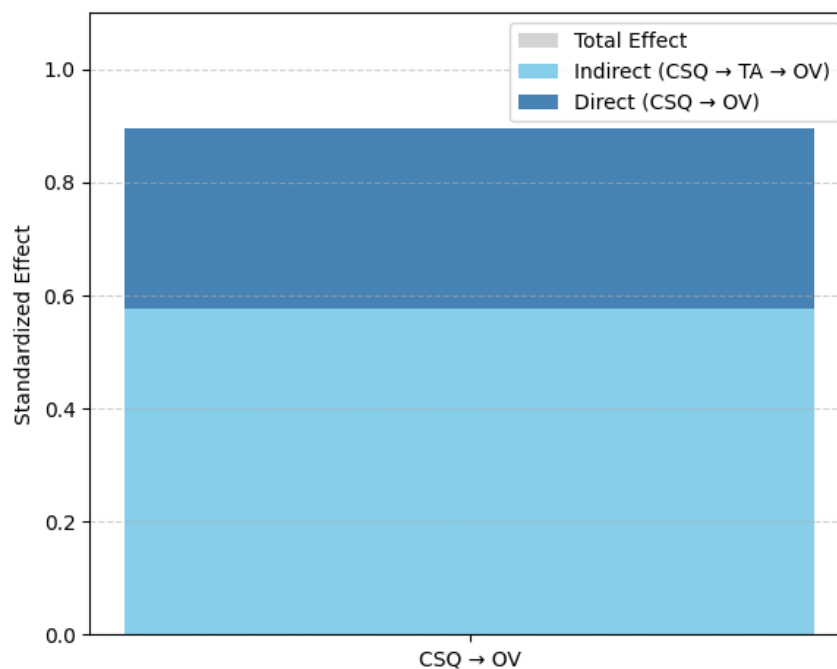
via Technical Advancement (TA) are shown in Table 4. There was a statistical significance in all path coefficients. The results prove that TA mediates the correlation between CSQ and OV to some extent, which supports dual mediation.

**Table 4. Mediation Model Results**

Path	Estimate	Std. Error	p-value	Result
CSQ $\rightarrow$ TA	0.988	0.094	< 0.001	Significant
TA $\rightarrow$ OV	0.583	0.053	< 0.001	Significant
CSQ $\rightarrow$ OV (direct)	0.319	0.063	< 0.001	Partial Mediation

These findings provide strong evidence that service quality enhances acceptance both directly and

through improved perceptions of technological advancement.



**Figure 2 Mediation Effect of Technical Advancement on the Relationship Between Customer Service Quality and Overall Acceptance**

Figure 2 demonstrates the breakdown of the overall effect into direct and indirect effects. The indirect effect through Technical Advancement (CSQ → TA → OV) plays an important role in the overall impact of Customer Service Quality on Overall Acceptance, which is a partial mediation.

### 5. Discussion

The findings have shown that Customer Service Quality and Technical Advancement play a significant role in Overall Acceptance of digital payment systems. Technical Advancement proved to be the most powerful predictor, and this fact shows the significance of the system functionality, reliability, and innovation. In addition, mediation analysis was able to verify that there is a partial mediation of Technical Advancement on the effect of Customer Service Quality on user acceptance. This implies that the adoption is indirectly influenced by service quality as it increases perception of technology. These findings verify the Technology Acceptance Model and emphasize its interdependence with the service experience and the perceived technological strength as the forces behind the adoption of digital payment, particularly in less developed markets, e.g., India.

Banks, fintech organizations, and policymakers who should persuade people to utilize digital payments can find the research helpful. Improving the Customer Service Quality such as responsiveness, issues resolution, and support can boost the level of trust that the users may have in the technology itself. In addition, it is necessary to invest in the plausible and desirable outlets since Technical Advancement was the most effective agent of acceptance. These teachings bring out the essence of a mixed approach where service and technology improvement interrelate with one another to transform the attitude of the users. Other areas that should be considered by policy makers in order to contribute sustainably and inclusively to sustainable and inclusive adoption include subsidy of infrastructural development and minimization of transaction costs particularly to the underserved and small traders. The results of the study are in line with the emerging body of evidence highlighting the importance of service quality, technological advancement, and trust in advancing the use of digital payments. As an example, Al-Qudah et al. (2024) established that the perceived innovativeness, convenience, and security were the major factors determining the adoption of digital payment systems by Generation Z. This is in line with the present study findings that Customer Service Quality (CSQ) and Technical Advancement (TA) are central in determining user acceptance by creating a better perception of ease and efficiency. On the same note, Haider et al. (2024) established that trust is an intervening factor in the relationship between the utilization of digital banking tools (e-banking, mobile banking, and e-wallets) and e-

payment adoption. Their results support the mediation analysis of the present study where Technical Advancement moderated the impact of CSQ on Overall Acceptance (OV) indicating that the trust and system reliability increase the desire of the user to adopt digital transaction. As part of an emerging market scenario, Ly and Ly (2024) found that perceived ease of use and usefulness as fundamental parts of the Technology Acceptance Model (TAM) have a significant contribution to digital payment behavior. This justifies the conceptual ground of the current study and confirms that the perception of users towards technological benefits are crucial in different socio-economic settings of the society. Moreover, Alrawad et al. (2023) established that the intention to adopt the NFC-based mobile payments was affected by trust and perceived risk significantly. Their work highlights the necessity to focus on the security issues and cultivate the technological trust which can be directly translated into the results of this research which points to the role of both the service quality and system sophistication in alleviating the perceived barriers and promoting the acceptance. In sum, these comparative studies confirm the effectiveness of the offered framework and emphasize the universality of the proposed idea of combining the experience of services and technical reliability to facilitate the rise of sustainable digital payment ecosystems. Though the study makes great contributions to the literature, its limitations like use of self-reported data and geographical coverage are an indication that future research is needed in larger and longitudinal contexts. However, the paper supports the idea that service and technological aspects should be combined to create sustainable and user-oriented digital payment systems in emerging markets such as India.

The present study can be expanded by the future research that focuses on digital payment adoption by various demographic groups, including rural and urban users or between age groups, to reveal more specific behavioral patterns. A longitudinal study is also required to comprehend the change in perceptions towards the quality of the services and technology. Also, it would be beneficial to incorporate other constructs such as perceived risk, user satisfaction, and regulatory support that would provide a more comprehensive picture of the sustainability of digital payments. Future research may methodologically compare variance-based SEM (PLS) to covariance-based SEM or machine learning methods to confirm the robustness of models and enhance their predictive accuracy when used in many situations.

### 6. Conclusion

The research examined what factors affect acceptance of digital payment systems in India, and how Customer Service Quality and Technical

Advancement affect the acceptance of these systems in Overall Acceptance. The results were based on the Technology Acceptance Model (TAM) and the literature on service quality, which demonstrated that the quality of service and the perceived technical progression play a significant role in influencing the acceptance of digital payment technologies by the user. Technical Advancement turned out to be the most powerful predictor that focused on the significance of reliable systems, efficient systems and innovative systems as the most significant predictors of user trust and adoption. Further, the findings indicated that Customer Service Quality correlates with a given degree to Overall Acceptance through Technical Advancement. It implies that though quality service experiences directly affect i.e. positively affect the user acceptance, the same experiences will affect the user perception of the technological capabilities of digital systems positively thus increasing user adoption intention. The proposed theoretical framework was acceptable and had a good explanatory power as supported by the structural model. The stakeholders, including banks, fintech firms, and policymakers, whose primary objective is to increase the rate of the use of digital payment among various categories of users, will be especially relevant to the lessons. The credibility, utility, and the inclusiveness could be greatly improved through the investment on responsive service mechanisms and powerful and convenient platforms.

## References

- Al-Qudah, A. A., Al-Okaily, M., Shiyyab, F. S., Taha, A. A., Almajali, D. A., Masa'deh, R. E., & Warrad, L. H. (2024). Determinants of digital payment adoption among Generation Z: An empirical study. *Journal of Risk and Financial Management*, 17(11), 521. <https://doi.org/10.3390/jrfm17110521>
- Alrawad, M., Lutfi, A., Almaiah, M. A., & Elshaer, I. A. (2023). Examining the influence of trust and perceived risk on customers intention to use NFC mobile payment system. *Journal of Open Innovation: Technology, Market, and Complexity*, 9(2), 100070. <https://doi.org/10.1016/j.joitmc.2023.100070>
- Baabdullah, A. M. (2018). Consumer adoption of Mobile Social Network Games (M-SNGs) in Saudi Arabia: The role of social influence, hedonic motivation and trust. *Technology in society*, 53, 91-102. <https://doi.org/10.1016/j.techsoc.2018.01.004>
- Browne, M. W., & Cudeck, R. (1993). *Alternative ways of assessing model fit*. In K. A. Bollen & J. S. Long (Eds.), *Testing structural equation models* (pp. 136–162). Sage.
- Chavda, V. (2018). An empirical study on factors affecting consumer adoption of mobile payments in rural area. *Sankalpa*, 8(1), 64-71.
- Fornell, C., & Larcker, D. F. (1981). *Evaluating structural equation models with unobservable variables and measurement error*. *Journal of Marketing Research*, 18(1), 39–50. <https://doi.org/10.1177/002224378101800104>
- Grover, P., Kar, A. K., Janssen, M., & Ilavarasan, P. V. (2019). Perceived usefulness, ease of use and user acceptance of blockchain technology for digital transactions—insights from user-generated content on Twitter. *Enterprise Information Systems*, 13(6), 771-800. <https://doi.org/10.1080/17517575.2019.1599446>
- Haider, A., Khan, M. A., Khoja, M., Alharthi, S., & Minhaj, S. M. (2024). The role of e-banking, mobile-banking, and e-wallet with response to e-payment and customer trust as a mediating factor using a structural equation modelling approach. *Journal of Infrastructure, Policy and Development*, 8(9), 6644.
- Hu, L. T., & Bentler, P. M. (1999). *Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives*. *Structural Equation Modeling: A Multidisciplinary Journal*, 6(1), 1–55. <https://doi.org/10.1080/10705519909540118>
- Hussain, S., Gupta, S., & Bhardwaj, S. (2025). Determinants inhibiting digital payment system adoption: an Indian perspective. *Qualitative Research in Financial Markets*, 17(4), 716-748. <https://doi.org/10.1108/QRFM-09-2023-0223>
- Laukkanen, T. (2016). Consumer adoption versus rejection decisions in seemingly similar service innovations: The case of the Internet and mobile banking. *Journal of business research*, 69(7), 2432–2439. <https://doi.org/10.1016/j.jbusres.2016.01.013>
- Ly, R., & Ly, B. (2024). Digital payment systems in an emerging economy. *Computers in Human Behavior Reports*, 16, 100517. <https://doi.org/10.1016/j.chbr.2024.100517>
- Ruiz-Herrera, L. G., Valencia-Arias, A., Gallegos, A., Benjumea-Arias, M., & Flores-Siapo, E. (2023). Technology acceptance factors of e-commerce among young people: An integration of the technology acceptance model and theory of planned behavior. *Heliyon*, 9(6).
- Saxena, N., Gera, N., & Taneja, M. (2023). An empirical study on facilitators and inhibitors of adoption of mobile banking in India. *Electronic Commerce Research*, 23(4), 2573-2604. DOI <https://doi.org/10.1007/s10660-022-09556-6>
- Shaikh, I. M., & Amin, H. (2024). Consumers' innovativeness and acceptance towards use of financial technology in Pakistan: extension of the



- UTAUT model. *Information Discovery and Delivery*, 52(1), 114-122. <https://doi.org/10.1108/IDD-08-2022-0080>
16. Shankar, A., & Datta, B. (2018). Factors affecting mobile payment adoption intention: An Indian perspective. *Global Business Review*, 19(3\_suppl), S72-S89. <https://doi.org/10.1177/0972150918757870>
  17. Shin, D. H. (2007). User acceptance of mobile Internet: Implication for convergence technologies. *Interacting with computers*, 19(4), 472-483. <https://doi.org/10.1016/j.intcom.2007.04.001>
  18. Shree, S., Pratap, B., Saroy, R., & Dhal, S. (2021). Digital payments and consumer experience in India: a survey based empirical study. *Journal of Banking and Financial Technology*, 5(1), 1-20. DOI <https://doi.org/10.1007/s42786-020-00024-z>
  19. Singh, S., & Srivastava, R. K. (2018). Predicting the intention to use mobile banking in India. *International Journal of bank marketing*, 36(2), 357-378. <https://doi.org/10.1108/IJBM-12-2016-0186>
  20. Sivathanu, B. (2019). Adoption of digital payment systems in the era of demonetization in India: An empirical study. *Journal of Science and Technology Policy Management*, 10(1), 143-171. <https://doi.org/10.1108/JSTPM-07-2017-0033>
  21. Talwar, S., Dhir, A., Khalil, A., Mohan, G., & Islam, A. N. (2020). Point of adoption and beyond. Initial trust and mobile-payment continuation intention. *Journal of Retailing and Consumer Services*, 55, 102086. <https://doi.org/10.1016/j.jretconser.2020.102086>
  22. Tamilmani, K., Rana, N. P., & Dwivedi, Y. K. (2021). Consumer acceptance and use of information technology: A meta-analytic evaluation of UTAUT2. *Information Systems Frontiers*, 23(4), 987-1005. DOI <https://doi.org/10.1007/s10796-020-10007-6>
  23. Tran, V. D. (2020). Assessing the effects of service quality, experience value, relationship quality on behavioral intentions. *Journal of Asian Finance, Economics and Business*, 7(3), 167-175.
  24. Trivedi, H., & Sanchiher, S. (2023). Challenges in digital payment adoption in India. *International Journal of Education, Modern Management, Applied Science & Social Science*, 5(2), 32-38.
  25. Tullaili, M., & Susanto, P. (2025). E-Service Quality, Trust, Emotions, and Forgiveness Drive Repurchase in M-Commerce. *Academia Open*, 10(1), 10-21070. DOI <https://doi.org/10.21070/acopen.10.2025.11162>
  26. Tyagi, V. K., Kumar, S., Gulyani, M., & Gahlawat, R. (2023). E-SERV-EX: A Multi-item Scale for Measuring Customer Expectations from the Online Retail Services. *NMIMS Management Review*, 31(2), 131-144. <https://doi.org/10.1177/0971102323119779>
  27. Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2021). *User acceptance of information technology: toward a unified view*. *MIS Q.* 2003; 27 (3): 425-78.