DOI.https://doi.org/10.3126/ljbe.v13i2.85188
Vol. 13, No. 2 Journal homepage: www.nepjol.info/index.php/ljbe **December, 2025**

ISSN: 2091-1467 (Print) **The Lumbini Journal of Business and Economics** EISSN: 3102-0240
Peer Reviewed

Analyzing the Impact of Financial Technology (FinTech) on Financial Inclusion in Nepal

Ghanashyam Tiwari[1]

Article Info

Received:
11 October 2025

Revised:
26 October 2025

Accepted:
24 November 2025

Abstract

Purpose: *The use of technology has developed into an integral part of human life in today's world. Financial technological services have become a key driver of financial inclusion in the country. This study aims to examine the impact of various key factors on the enhancement of financial inclusion through FinTech services.*

Methods: *This study incorporated positivist philosophy, a descriptive and causal research design was considered and a survey was conducted among 200 bank customers in Gandaki province in Nepal. Proposed hypotheses were tested using Partial Least Squares Structural Equation Modeling (PLS-SEM) and descriptive results were analyzed using SPSS-26.*

Results: *The result shows that the behavioural intention, social trust and usability had a significant positive impact on financial inclusion. The Social influence does not show a significant impact on it. Results and findings indicate that the importance of customer motivation, trust in digital platforms and user-friendly technological applications promote inclusive financial involvement.*

Conclusions: *In the developing economies, digital transformation is essential to promote an inclusive financial system. The willingness to adopt technology, which is trustworthy and user-friendly are promotes an inclusive and impartial financial system. This study contributes to the literature on the incorporation of FinTech services in banks and financial institutions, as well as policy formulation to design user-centred and trustworthy digital financial services.*

Keywords: Behavioural intention, Financial inclusion, FinTech service, Social influence, Trust

JEL Classification: G21, O33, O16

I. Introduction

During the last decade, financial technology has remarkably emerged in financial services around the world. This altered the intricate and multifaceted global financial landscape,

[1]*Mr. Tiwari is a faculty member at School of Business, Pokhara University and PhD Scholar at Sikkim Manipal Institute of Technology, SMU India. He can be reached at ghanashyam@pusob.edu.np, https://orcid.org/0009-0008-0018-1274*

thereby significantly enhancing accessibility and availability of financial amenities for individuals and businesses. It has effectively extended the established confines of traditional banking institutions, thus fostering a greater degree of financial inclusion among diverse populations that were previously marginalized and excluded from formal financial systems (Asif et al., 2023; Ozili, 2018). Financial inclusion is explained as the customer's ability to connect to sustainable financial products and services. It comprises FinTech services and fundamental pillar of sustainable economic growth and strategies aimed at alleviating poverty in developing and emerging economies across the globe (Danladi et al., 2023; Liu & Walheer, 2022).

FinTech innovation encompasses the integration of various technological platforms, such as digital wallets, mobile banking, blockchain technology, and group lending mechanisms. It can foster low-income and middle-level income groups, small-scale enterprises, rural as well as urban communities to be involved in the formal economy in financial activities (Chang et al., 2020; Kindzeka, 2022). Such activities are designed to build the unique socio-economic realities and circumstances of diverse FinTech user groups (Dian & Kresna, 2020; Hussein, 2020). Digital financial services are beneficial in multiple aspects to the individual and businesses. It can reduce transaction costs, enhance operational efficiencies and become trustworthy for delivering tailored solutions. FinTech services have proven to be a significant catalyst for improving access to essential banking services in the emerging economies of India and Indonesia (Goswami et al., 2022). It facilitates the adoption of a digital payment system and promotes financial services in inclusive of gender consideration (Gupta & Kiran, 2024; Noor et al., 2020).

Prior empirical evidence indicates that the digital financial service plays an important role in financial inclusion. This can reduce the spread of income inequality while concurrently promoting sustainable growth by promoting their decisive credit facilities and special saving opportunities (Demir et al., 2022; Menza et al., 2024). In developing countries, the inclusive success of financial inclusion driven by FinTech depends upon the formation of a supportive policy framework. For this, it is required to establish a strong and reliable digital infrastructure for effective integration of comprehensive financial literacy programs to motivate and empower potential users of FinTech services (Durai & Stella, 2019; Laut & Jaya, 2019). It has become a tool for establishing sustainable and fair financial systems on a global scale (Odei-appiah & Adjei, 2021; Xi et al., 2022). Financial technologies change the overall financial system and the balance between technological innovation, implementing regulatory measures and ensuring customer protection.

Despite the promising benefits of FinTech in financial inclusion, a multitude of challenges continue to persist and pose significant obstacles. Prevailing digital devices, an essential risk associated with cybersecurity, uncertainties of the regulatory framework and other issues in adopting FinTech (Ediagbonya & Tioluwani, 2023). However, the introduction of FinTech services has incontrovertibly improved access to financial resources (Alina et al., 2025). This confirms that the readiness to adopt technology in financial services hinders the attainment of universal financial inclusion for all users (Nasution et al., 2022). Furthermore, a query remains while adopting FinTech services, that the overall financial stability and broader socio-economic development (Ozili, 2018). Consequently, it is of utmost importance and urgency to comprehensively understand how these innovative financial technologies impact inclusion outcomes in diverse contexts. The literature found that a relationship exists between technology and financial inclusion. But the majority of the studies predominantly concentrated on specific regional and technological dimensions, leaving substantial contextual and comparative gaps. In the study of India, Indonesia and Ethiopia found positive impact of digital financial services on financial inclusion and poverty alleviation (Asif et al., 2023; Goswami et al., 2022; Menza et al., 2024). A notable gap exists in a comprehensive and integrated understanding of how various technological innovations, including blockchain technology and mobile platforms to shape the inclusive financial ecosystem. However, the existing literature has largely focused on the economic consequences of the adoption of FinTech solutions (Danladi et al., 2023),

but has limited focus on the social, institutional, and policy-level determinants that are equally critical in shaping the landscape of financial inclusion (Alina et al., 2025). FinTech solutions have broadened access to a variety of financial products and services (Liu & Walheer, 2022). Additionally, there exists a dearth of empirical evidence that effectively links technological innovation with outcomes of inclusive growth, where infrastructure constraints, regulatory ambiguities, and barriers to digital literacy continue to be significant obstacles (Kindzeka, 2022; Nasution et al., 2022). By systematically addressing these articulated objectives, this study seeks to evaluate the role of FinTech services in the advancement of financial inclusion in the semi-urban area of Gandaki province of Nepal. This study can contribute to policy formulation and sustainable economic development through impartial financial activities. Furthermore, it can transform traditional financial services into digital financial services to support inclusive and sustainable financial development in the country.

II. Reviews

The use of financial technology in financial services is based on the Technology Acceptance Model (TAM) (Do et al., 2021), which can explain the technological services and service quality in the financial system. In FinTech services, TAM provides a valuable framework to measure the attitudes and intentions towards the customers (Magotra et al., 2018)the study has included a sample of 1201 banking customers residing in 12 different cities of India. Further, the relationship between customer value perception and technology adoption has been examined through the development of a model named Integrated Technology Adoption model by applying structural equation modelling approach. The results of the study highlight behavioural intentions towards technology adoption as the strongest predictor of value perception of the customers followed by their personal disposition towards technology adoption, perceived usefulness and perceived ease of use. Based on the findings of the study, probable courses of actions have been suggested to the banks for enhancing value perception of the customers regarding the latest banking technologies, thereby, ensuring long-term profitability and sustainability (Magotra et al., 2018). This provides an improved user experience, trust and perceived benefits to drive adoption of FinTech solutions, bridging the financial access gap and promoting inclusive financial growth. Financial inclusion is the access and ability of people and enterprises to effectively use financial services. Financial inclusion is commonly acknowledged as an important facilitator of sustainable and economic development (Danladi et al., 2023; Liu & Walheer, 2022). The access to financial services has been significantly increased by technological services through mobile banking services, digital wallets, blockchain applications and internet-based transactions (Chang et al., 2020; Hussein, 2020). It minimizes transaction cost, maximizes individual participation in digital finance, not only improving financial accessibility but also strengthening financial stability (Ozili, 2018). The empirical evidence from Ethiopia and India shows that digital financial solutions promote financial inclusion by providing accessible services for low-income customers (Asif et al., 2023; Menza et al., 2024).

Behavioural Intention and Financial Inclusion

Individual willingness to engage in the use of financial services can be defined as the behavioural intention. The prior literature confirms that behavioural intention to adopt FinTech services significantly predicts financial inclusion outcomes (Goswami et al., 2022; Gupta & Kiran, 2024). The adoption of digital banking intention among women workers enhanced their inclusion in the formal financial system, thereby reducing gender gaps (Gupta & Kiran, 2024). Furthermore, behavioural intention also mediates the relationship between financial literacy, technology adoption, and financial inclusion among the students (Sari et al., 2022). This evidence supports that strengthening users' positive attitudes and confidence towards digital financial devices is an important factor for expanding financial inclusion. Considering the literature following hypothesis has been developed:

H_1: Behavioural intention significantly impacts financial inclusion.

Social Influence and Financial Inclusion

The extent to which individuals' financial behaviour is shaped by social influence. Prior research indicated that the peers, family and social networks have emerged as major determinants of financial inclusion (Laut & Jaya, 2019). It is found that community norms, peer recommendations, and institutional trust can substantially influence the adoption of digital financial services among individuals (Odei-appiah & Adjei, 2021). In developing countries, word-of-mouth communication and social demonstration also often serve as a substitute for formal marketing or institutional outreach (Ediagbonya & Tioluwani, 2023). Social influences not only increase awareness and trust in FinTech solutions among users but also encourage uncertain users to transition from cash-based to digital financial practices (Durai & Stella, 2019). Based on the literature following hypothesis has been developed:

H_2: Social influence significantly impacts financial inclusion.

Social Trust and Financial Inclusion

Trust is the most important factor for any financial services and activities. It plays active role in encouraging financial inclusion by technological platforms. Users are more likely to adopt digital services when they are confident of their financial institutions, technology providers and the safety of online transactions (Demir et al., 2022; Wang et al., 2022). Social trust minimizes users' perceived risk associated with digital finance and strengthens their sense of security while using FinTech platforms (Hussein, 2020). Technological efficiency and users' trust are dependent factors of sustainable inclusion of digital ecosystems (Alina et al., 2025). For the developing economies, limited trust in digital systems remains a key barrier to financial participation, highlighting the importance of transparent policies and consumer protection frameworks (Danladi et al., 2023; Nasution et al., 2022). Based on the literature following hypothesis has been developed:

H_3: Social trust significantly impacts financial inclusion.

Usability and Financial Inclusion

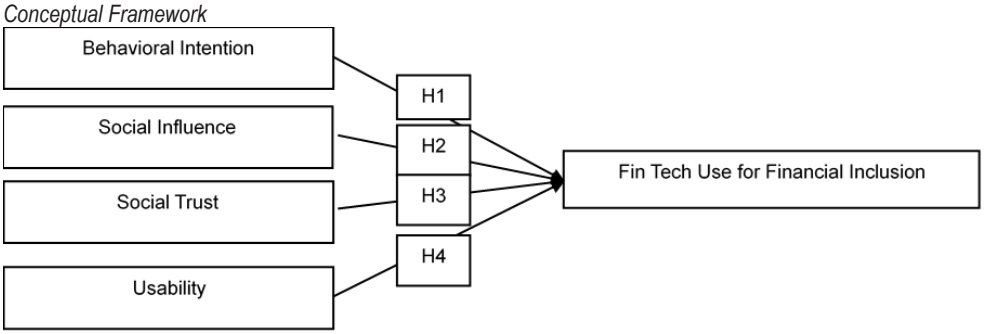
Usability is considered to be the perceived user-friendliness of digital financial services. Individuals' perceived use of technology and their decision to engage depend on the design and accessibility of technological platforms (Dian & Kresna, 2020; Kindzeka, 2022). Research evidence shows that when digital financial services are intuitive, accessible through mobile devices and supported by user education can improve financial inclusion (Goswami et al., 2022). Conversely, complex interfaces, poor network infrastructure and insufficient technical support discourage usage among rural or low-literacy populations (Liu & Walheer, 2022; Noor et al., 2020). Encouraging usability through simplified designs, local language support and customer training represents a key strategy for inclusive digital finance. Considering the literature following hypothesis has been formulated:

H_4: Usability significantly impacts financial inclusion.

The literature indicated that behavioural intention, social influence, social trust, and usability collectively determine the success of technological financial services in achieving financial inclusion. Gaps remain in understanding how these behavioural and social factors interact within developing economies facing infrastructure and literacy constraints. Therefore, this study seeks to empirically evaluate the combined effect of these determinants on financial inclusion, contributing to the evolving discourse on digital finance and inclusive development. Based on the available literature, the study used the conceptual framework shown in Figure 1.

Figure 1

Conceptual Framework



Note. Adapted from (Asif et al., 2023)

III. Methodology

This study employed a positivist research philosophy to quantify through empirical observation. This study employs a quantitative method, utilizing a descriptive and causal research design. The Technology Acceptance Model (TAM) served as the theoretical framework to analyze the impact of technological financial services provided by banks and financial institutions on financial inclusion in Nepal. The study is based in Gandaki Province, where responses are collected from a target sample of bank customers who adopt financial technology, including mobile and internet banking, as well as various applications that promote sustainable financial services. The target population in this study encompassed all bank customers in Gandaki Province, Nepal, who had access to or experience with fintech services offered by their respective financial institutions. The sample size was determined to be 200 respondents using Cochran (1977) formula at 7% margin of error.

$$n_0 = \frac{Z^2 \times p \times (1-p)}{e^2}$$

Where,

n_0 = Sample size

p= estimated proportion

e= margin of error

Z Desired confidence level

A convenience sampling technique was used to select the participants. Bank customers who are readily accessible and willing to respond to the questionnaire were included in the study, which helps to get appropriate responses (Etikan, 2016). The primary data were gathered by using a structured questionnaire. Validated scale questionnaires were used as the survey instrument, having a five-point Likert scale adapted from (Asif et al., 2023). Descriptive results were obtained by using the Statistical Package for the Social Sciences (SPSS). It includes the socio-demographic information of the respondents and frequency distribution, along with means and standard deviations. After that, the structural equation modelling was employed to validate the hypothesis by using Smart PLS. Inferential analyses, including correlation analysis and regression analysis, were performed to test hypothesized relationships supported by the TAM framework. This helps to assess the impact of fintech adoption on financial inclusion indicators. The reliability and validity of the data, Cronbach's alpha and Furnell Larker criteria for discriminant validity.

IV. Results and Discussion

This section includes results and analysis of data collected from the respondents. The results included demographic results, reliability, and validity of the data. The hypothesis testing results using the structural model are also presented with p-value and t-statistics of the results.

Table 1

Socio-demographic Statistics of Respondents

Respondents Demographic Information		
Age	Frequency	Percent
16-20	57	28.50
21-30	76	38.00
31-40	62	31.00
41 and above	5	2.50
Gender		
Male	112	56.00
Female	88	44.00
Education		
School Level	46	23.00
Bachelor Level	94	47.00
Master and above	62	31.00
Occupation		
Employed	127	63.50
Unemployed	28	14.00
Students	45	22.50
Monthly Family Income		
Lower than Rs. 40,000	8	4.00
Rs. 40,001- Rs. 60,000	42	21.00
Rs.60,001-Rs.80,000	117	58.50
Rs. 80,001 and above	33	16.50
Total	200	100.00

Table 1 presents socio-demographic characteristics of the 200 respondents who participated in the study. The results show that the majority of participants were young adults, indicating a relatively youthful sample. Specifically, 38% of respondents were between 21 and 30 years, followed by 31% in the 31–40 age group. About 28.5% were between 16 and 20 years old, while only 2.5% were aged 41 years and above. This distribution suggests that technological financial services are predominantly utilized by younger generations, who are generally more receptive to digital innovations. In terms of gender, 56% and 44% of male and female respondents, respectively, reflect a fairly balanced representation. The educational background of participants revealed that nearly half (47%) held a bachelor's degree, 31% had completed a master's degree or higher, and 23% had attained education up to the school

level. This indicates that the majority of respondents were relatively well educated, which may contribute to their familiarity and confidence in using digital financial tools.

Regarding occupation, most participants (63.5%) were employed, followed by students (22.5%) and unemployed individuals (14%). This occupational structure suggests that working individuals are more actively engaged with technological financial services, likely due to their greater exposure to formal financial systems and income flows. The monthly family income of the respondents shows that 58.5% earned between Rs. 60,000 and Rs. 80,000, while 21% earned between Rs. 40,000 and Rs. 60,000. Furthermore, 16.5% had incomes above Rs. 80,000, and just 4% earned below Rs. 40,000. The economically active group of respondents with having moderate income level have dominant participation in accessing digital platforms in the research.

Descriptive Results

Table 2

Descriptive Results of the Variables

Symbol	Variables	Mean	Std. Deviation
BI	Behavioural Intention	4.258	0.655
SI	Social Influence	3.998	0.646
ST	Social Trust	4.232	0.627
UB	Usability	4.172	0.623
UF	Use of FinTech for Financial Inclusion	4.262	0.712

Table 2 presents the descriptive results of the variables used in the study. The mean values fall between 3.99 to 4.26 and the standard deviation between 0.623 to 0.712. The average values of the variables reflected above 3 and the standard deviation does not exceed 0.712. The descriptive results of Usefulness (UF) had the highest mean score (M = 4.26, SD = 0.71), suggesting that respondents generally perceived financial technology as highly useful. This was closely followed by Behavioral Intention (BI) (M = 4.26, SD = 0.66) and social trust (ST) (M = 4.23, SD = 0.63), implying that participants demonstrated a strong intention to use and were satisfied with the technology. The usability (UB) showed a relatively high mean (M = 4.17, SD = 0.62), reflecting positive perceived benefits from its use. Social Influence (SI) showed the lowest mean value (M = 4.00, SD = 0.65), indicating that while social factors play a role, they may be less influential compared to personal perceptions of usefulness and satisfaction.

Table 3

Construct Reliability and Validity

Constructs	α	rho_A	CR	AVE	VIF
Behavioural Intention	0.752	0.869	0.837	0.58	3.784
Social Influence	0.814	0.831	0.888	0.726	2.929
Social Trust	0.643	0.724	0.805	0.588	2.504
Usability	0.707	0.798	0.838	0.643	2.713
Use of FinTech for Financial Inclusion	0.831	0.888	0.897	0.746	

Table 3 shows the results of the reliability and validity of the data for the study constructs. The reliability of the data was measured through Cronbach's Alpha (α), rho A, and composite reliability (CR). The validity of the data was measured through the variance inflation factors (VIF) of the constructs to check multicollinearity issues.

The results indicated that the Cronbach's alpha value ranged between 0.643 to 0.831. Reliability results indicate that all constructs meet the recommended limits of Hair et al. (2019), signifying acceptable to good internal consistency. The value of the composite reliability of all constructs ranged between 0.805 to 0.897 and rho A is above 0.7, confirming the internal consistency. The rho_A coefficients, which offer a further accurate reliability estimation in partial least squares structural equation modelling (PLS-SEM), further supported the robustness of the measurement model, with all values exceeding 0.70. Similarly, convergent validity is measured with average variance extracted (AVE) for all constructs having a value more than 0.5 and ranging between 0.58 to 0.746, showing above 50% of variance in the indicators was explained by their respective latent variables. The given results confirm that the measurement items are adequately converging on their intended constructs. Furthermore, multicollinearity issues were checked by calculating VIF in each construct. The VIF values range from 2.504 to 3.784, which were less than required benchmark of 0.5. suggesting the absence of multicollinearity issues among the predictor variables. The results confirm that all the constructs used in the study found a satisfactory level of reliability, convergent validity and VIF levels. The constructs used in independent variables of behavioural intentions, social influences, social trust, and usability and dependent variables of the use of FinTech for financial inclusion are consistent and sound for structural equation analysis.

Table 4

Discriminant Validity at Furnell-Larker Criteria

Constructs	BI	SI	ST	US	FI
Behavioural Intention (BI)	0.795				
Social Influence (SI)	0.762	0.852			
Social Trust (ST)	0.724	0.608	0.767		
Usability (US)	0.728	0.69	0.716	0.802	
Use of Fintech for Financial Inclusion (FI)	0.754	0.687	0.737	0.749	0.864

Table 4 reflects the discriminant validity results using Furnell-Larker criteria of the constructs. Under this criterion, the square root of average variance extracted for each construct is shown in diagonal in bold font. This value is compared against the inter-construct correlations. The results indicate that the square roots of the AVE values for all constructs are greater than their respective inter-construct correlation coefficients. Specifically, the diagonal values BI (0.795), SI (0.852), ST (0.767), US (0.802), and FI (0.864) are all higher than their corresponding off-diagonal correlations. These results indicated that the discriminant validity of the constructs are satisfactory level. It suggested the constructs are empirically distinct and able to explain unique aspects of the theoretical framework. The correlation coefficient between the constructs falls between 0.608 to 0.762, indicating moderate to strong correlations among constructs and they are not collinear. The constructs used in the study of behavioural intention, usability and social trust values are above 0.7, indicating higher correlation and social influences indicated moderate correlation among the constructs. This result explains the individual intention to use FinTech adoption and their perception of usability and trust of technological issues are strong contributors to financial inclusion in the study area. Overall, the discriminant validity results of the constructs reflected conceptual differences and theoretical coherence to meet validity requirements for the PLS-SEM model. The outer loadings of each item of the constructs are reflected in Figure 2.

Figure 2

Outer Model Reflection in the Chart

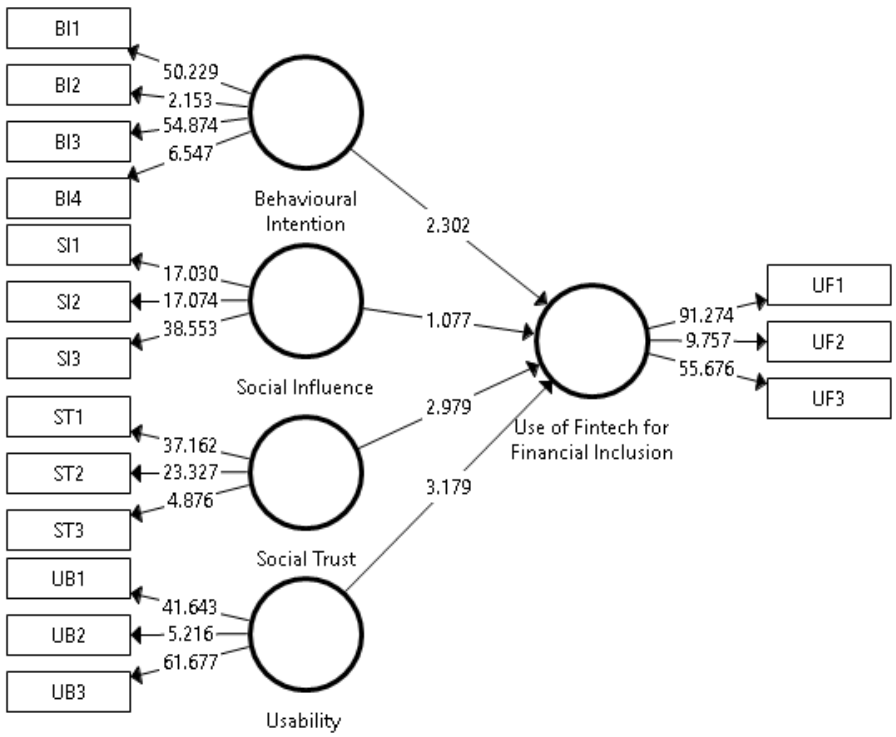


Table 5

Structural Model

Path	(O)	(M)	(STDEV)	T Statistics	P Values
Behavioural Intention -> Use of Fintech for Financial Inclusion	0.243	0.24	0.106	2.302	0.021
Social Influence -> Use of Fintech for Financial Inclusion	0.127	0.133	0.118	1.077	0.282
Social Trust -> Use of Fintech for Financial Inclusion	0.280	0.286	0.094	2.979	0.003
Usability -> Use of Fintech for Financial Inclusion	0.283	0.277	0.089	3.179	0.001

Note. O= Original Sample, M= Sample mean, STDEV= Standard Deviation

The relationship between the constructs used and their impact on use of FinTech for financial inclusion is shown in Table 5. This reflects the relationship and impact of behavioural intention, social influence, social trust and usability on the use of FinTech service for financial

inclusion. For this construct, path coefficients, sample means, standard deviations, t-statistics and p-values were considered to measure the relationship, strength and significance of hypotheses by Partial Least Squares Structural Equation Modelling (PLS_SEM).

PLS-SEM results reflected that the behavioural intention of FinTech service has a significant positive impact on the use of FinTech for financial inclusion (β = 0.243, t = 2.302, p = 0.021). This result signifies that the individual's willingness to use technological financial services significantly contributes to the engagement of financial services in the nation. Similarly, social trust (β = 0.280, t = 2.979, p = 0.003) and usability of FinTech service (β = 0.283, t = 3.179, p = 0.001) show a significant positive impact on the use of FinTech for financial inclusion. These findings enable trust in the digital financial system, digital service provider, ease of use and compatible user-friendly digital technology are significant drivers for the use of FinTech for financial inclusion. Higher trust and user-friendly FinTech services are decisive drivers of an inclusive financial system. In contrast, the social influence of digital financial services did not show a significant impact and relationship with FinTech-based financial inclusion in the study area (β = 0.127, t = 1.077, p = 0.282). It suggested that family, peer suggestions and influences and social pressure may not noticeably motivate and influence users to adopt digital financial services. These results may differ in geographical situations, level of awareness for users, and societal status and condition. The result of the structural model confirms that the behavioural intention, social trust and usability are major predictors for the use of FinTech in financial inclusion.

Discussion

This study provides significant insights to empower financial inclusion in developing economies with the empirical study of identifying major determinants of financial inclusion through FinTech services. This can contribute to banks and financial institutions, policymakers and related stakeholders as an important literature. The results and findings confirm that the behavioural intention, social trust and usability are significant predictors for use of FinTech for financial inclusion, but social influence did not have a relation to it in developing nations. The study formulated four distinct hypotheses to analyze the impact of FinTech services of banks and financial institutions on the use of FinTech for financial inclusion in Nepal.

H_1: Behavioural intention impacts financial inclusion.

The study found a significant positive impact of individuals' behavioural intention on the use of FinTech in financial inclusion. It confirms that the willingness of digital technology users has a positive impact on the inclusive financial system, which supports the formulated hypothesis in the study. This result aligns with the prior literature, which emphasizing the importance of users' motivation and intention in technology adoption (Asif et al., 2023; Gupta & Kiran, 2024). Similarly, the research findings in India and Indonesia of that individuals with a strong intention to use digital transactions are more likely to adopt digital financial services, which contribute to positive financial outcomes in the country Goswami et al., 2022; Sari et al., 2022). This supports and satisfies the results that the behavioural intention of unwillingness to use technological services is a major determinant of financial inclusion.

H_2: Social Influence impacts financial inclusion

The second hypothesis was formulated as the social influences have a significant impact on the use of FinTech for financial inclusion. The results on the social influence of digital financial services did not show a significant impact or relationship with FinTech-based financial inclusion. The findings of the study contradict the results of Asif et al. (2023) and Goswami (2022), who concluded that the social influences positively impact the use of FinTech for financial inclusion in India. The findings also differ from the findings of societal pressure can encourage FinTech adoption (Ediagbonya & Tioluwani, 2023; Odei-appiah & Adjei, 2021). The perception differences may be varied as per their education level, awareness in financial services and societal incomes on FinTech adoption (Demier et al., 2022). The level of awareness in FinTech services may be the reason for differences in the prior literature in

this study.

H_3: Social trust impacts financial inclusion

The third hypothesis was formulated to measure the impact of social trust on the use of FinTech in financial inclusion. After analyzing the data results show a significant positive impact of social trust in the digital financial system on the use of FinTech for financial inclusion. It confirms the higher trust in financial institutions. FinTech services and service providers increase the use of FinTech for financial inclusion. This finding is consistent with Demir et al. (2022), Hussein (2020) and Asif et al. (2023) that trust enhances users' perceptions of security, reduces perceived risks, and strengthens the credibility of financial technologies and develops an inclusive financial system

H_4: Usability impacts financial inclusion.

To analyze the impact of FinTech service usability on the use of FinTech for financial inclusion fourth hypothesis was formulated. The findings show that the user-friendly FinTech service positively impacts on use of FinTech for financial services, and the hypothesis is statistically accepted. The findings of the study, supported by prior literature, highlight the role of user-friendly design and accessibility in promoting financial inclusion (Dian & Kresna, 2020; Kindzeka, 2022). When digital financial services are intuitive, easy to navigate, and compatible with users' technological capabilities (Liu & Walheer, 2022). The combined significance of behavioural intention, trust, and usability supports the view that technological innovation alone is insufficient without user confidence and functional design (Alina et al., 2025; Danladi et al., 2023).

Data analysis found that the behavioural intention, social trust and usability are major predictors among the study variables for financial inclusion. Social influence found no effect on the use of FinTech for financial inclusion. Intentions, trust and compatible technology matter to motivate for use of FinTech in financial inclusion. Promotion of inclusive digital finance requires not only technological advancement but also efforts to build trust, enhance user experience, and cultivate behavioural engagement among potential users.

V. Conclusion and Implications

This study was conducted using a scientific approach of research using descriptive and causal research design in the Gandaki province of Nepal to evaluate the determinants factors for the use of FinTech services for financial inclusion. The study employed a quantitative approach with having majority of respondents economically active group. It examines the impact and relationship between FinTech services provided by banks and financial services on the use of FinTech for financial inclusion in Nepal. The result concluded that the major determinants of the use of FinTech for financial inclusion are behavioural intention, social trust and usability. The social influence did not show the impact on the use of FinTech for financial inclusion. The people are motivated to adopt the FinTech services with trustworthy devices and service providers, user-friendly technology and willingness to use digital services. Finally, the findings indicate that behavioural intention, social trust, and usability significantly enhance the adoption of FinTech for financial inclusion, while social influence does not have a significant effect. Service providers, policymakers and stakeholders should consider that the motivation, confidence in digital platforms, and behavioural intention are critical drivers of financial participation for achieving targets of the inclusive financial system in the country. It can reinforce the importance of human-centred design and trust-building in digital finance initiatives

This study contributes practical and academic literature in developing economies. Practically, banks and financial institutions and policymakers should consider the major determinants of FinTech users for financial inclusion and a participatory financial system in the country. The policymakers and financial institutions should prioritize user-friendly digital platforms, foster trust in FinTech services, and develop programs that encourage positive behavioural

intention toward digital finance. By addressing these factors, digital financial services can reach underserved populations more effectively, promoting inclusive economic growth and bridging the financial access gap. In the academic context, the findings of the study contribute to the understanding of how behavioural, social, and usability factors jointly influence financial inclusion through technological services using the TAM model. It can be addressed the influencing factors for digital financial services can reach underserved populations more effectively, promoting inclusive economic growth and bridging the financial access gap. This study was constrained to quantitative approaches while confining the results. Further study and addressing the qualitative aspects, longitudinal data, and other different methodological approaches with geographical differences in cross cross-sectional study can address further and novel findings.

References

Alina, I., Maria, A., Fatima, R., & Car, R. (2025). Exploring the landscape of financial inclusion through the lens of financial technologies : A review. *Finance Research Letters*, *72*(6). https://doi.org/10.1016/j.frl.2024.106500

Asif, M., Khan, M. N., Tiwari, S., Wani, S. K., & Alam, F. (2023). The impact of Fintech and digital financial services on financial inclusion in India. *Journal of Risk and Financial Management*, *16*(2). https://doi.org/10.3390/jrfm16020122

Chang, V., Baudier, P., Zhang, H., Xu, Q., Zhang, J., & Arami, M. (2020). How blockchain can impact financial services – The overview, challenges and. *Technological Forecasting & Social Change Journal Homepage*, *January*.

Cochran, W. G. (1977). *Cochran_1977_Sampling Techniques.pdf* (pp. 1–428).

Danladi, S., Prasad, M. S. V., Modibbo, U. M., Ahmadi, S. A., & Ghasemi, P. (2023). Attaining sustainable development goals through financial inclusion: Exploring collaborative approaches to fintech adoption in developing economies. *Sustainability (Switzerland)*, *15*(17), 1–14. https://doi.org/10.3390/su151713039

Demir, A., Pesqué-cela, V., Altunbas, Y., & Murinde, V. (2022). Fintech, financial inclusion and income inequality : A quantile regression approach. *The European Journal of Finance*, *28*(1), 86–107. https://doi.org/10.1080/1351847X.2020.1772335

Dian, B., & Kresna, R. (2020). The effect of financial inclusion and financial technology on the effectiveness of the Indonesian monetary policy. *ECONSTOR*, *21*(1), 230–243. https://doi.org/10.3846/btp.2020.10396

Do, C. T., Le, T. T., & D. Le, H. (2021). SERVQUAL Model application on assessing quality of deposit service: Case study from joint stock commercial bank for investment and development of Vietnam - Hai Ba Trung branch. *International Journal of Research and Review*, *8*(11), 337–349. https://doi.org/10.52403/ijrr.20211142

Durai, T., & Stella, G. (2019). Digital finance and its impact on financial inclusion. *Journal of Emerging Technology and Innovative Journal*, *6*(1), 122–127.

Ediagbonya, V., & Tioluwani, C. (2023). The role of fintech in driving financial inclusion in developing and emerging markets: issues, challenges and prospects. *Technology Sustainability*, *2*(1), 100–119.

Etikan, I. (2016). Comparison of convenience sampling and purposive sampling. *American Journal of Theoretical and Applied Statistics*, *5*(1), 1. https://doi.org/10.11648/j.ajtas.20160501.11

Goswami, S., Sharma, R. B., & Chouhan, V. (2022). Impact of financial technology (Fintech) on financial inclusion (FI) in rural India. *Universal Journal of Accounting and Finance*, *10*(2), 483–497. https://doi.org/10.13189/ujaf.2022.100213

Gupta, M., & Kiran, R. (2024). Sectoral comparison of sustainable digital financial inclusion of women workforce with the mediation of digital banking adoption intention: An empirical analysis. *SAGE Open*, *14*(2), 1–24. https://doi.org/10.1177/21582440241258288

Hair, J. F., Risher, J. J., Sarstedt, M., & Ringle, C. M. (2019). When to use and how to report the results of PLS-SEM. *European Business Review*, *31*(1), 2–24. https://doi.org/10.1108/EBR-11-2018-0203

Hussein, H. (2020). The impact of financial technology on financial inclusion : The case of Egypt. *Journal of Economics and Finance*, *11*(6), 35–51. https://doi.org/10.9790/5933-1106023551

Kindzeka, M. A. (2022). Digital technologies and financial inclusion in Sub-Saharan Africa. In *Digital technologies and financial inclusion in Sub-Saharan Africa* (WP/22/034).

Laut, I. M., & Jaya, M. (2019). The impact of financial inclusion on public financial services education through financial technology in Sleman Regency, Indonesia. I. *Esensi: Jurnal Bisnis Dan Manajemen*, *9*(2), 155–174. https://doi.org/10.15408/ess.v9i2.13576

Liu, F., & Walheer, B. (2022). Financial inclusion, financial technology, and economic development : A composite index approach. *Empirical Economics*, *3*(63), 1457–1487.

Menza, M., Jerene, W., & Oumer, M. (2024). The effect of financial technology on financial inclusion in Ethiopia during the digital economy era. *Cogent Social Sciences*, *10*(1). https://doi.org/10.1080/23311886.2024.2309000

Magotra, I., Sharma, J., & Sharma, S. K. (2018). Investigating linkage between customer value and technology adoption behaviour: A study of banking sector in India. *European Research on Management and Business Economics*, *24*(1), 17–26. https://doi.org/10.1016/j.iedeen.2017.11.001

Nasution, L. N., Pembangunan, U., Budi, P., & Sadalia, I. (2022). Investigation of financial inclusion, financial technology, economic fundamentals and poverty alleviation in ASEAN-5: Using SUR Model. *Abac Journal*, *42*(3), 132–147.

Noor, M., Fourqoniah, F., & Aransyah, M. F. (2020). Investigation of financial inclusions, financial literacy, and financial technology in Indonesia. *Jurnal Perspektif Pembiayaan Dan Pembangunan Daerah*, *8*(3), 257–268. https://doi.org/10.22437/ppd.v8i3.9942

Odei-appiah, S., & Adjei, J. (2021). Fintech use, digital divide and financial inclusion. *Kennesaw State University*, 0–12.

Ozili, P. K. (2018). Borsa _ Istanbul review impact of digital finance on financial inclusion and stability. *Borsa Istanbul Review*, *18*(4), 329–340. https://doi.org/10.1016/j.bir.2017.12.003

Sari, D. E., Selviana, E. A., Nadia, B., & Asila, F. (2022). The effect of financial literature and financial technology on financial inclusion among accounting students. *International Journal of Social Science and Business*, *6*(3), 310–315.

Wang, M., He, Y., Zhou, J., & Ren, K. (2022). Evaluating the effect of Chinese environmental regulation on corporate sustainability performance: The mediating role of green technology innovation. *International Journal of Environmental Research and Public Health*, *19*(11). https://doi.org/10.3390/ijerph19116882

Xi, B., Wang, Y., & Yang, M. (2022). Green credit, green reputation, and corporate financial performance: evidence from China. *Environmental Science and Pollution Research*, *29*(2), 2401–2419. https://doi.