



Youth Financial Inclusion, Labor Force Participation and Economic Growth: A Comparative Study of India and the United States

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Abstract

This study examined the trends and relationships between youth financial inclusion, labor force participation, and economic growth in India and the United States between 2014 and 2024. It adopted a quantitative, comparative framework using secondary data to analyze patterns over time and cross-country differences. Data are sourced from the World Bank Global Findex Database, World Development Indicators, and ILOSTAT. Trends are analyzed for account and debit card ownership, male and female labor participation, and total youth LFPR. The findings from correlation analysis showed that while financial inclusion supports GDP growth universally, labor force dynamics shape the extent and manner of its impact, particularly in emerging economies. In India, there is a decline in total youth LFPR despite rising GDP and LFPR, and financial inclusion are negatively correlated. However, in the USA, financial inclusion and labor force participation reinforce each other, supporting sustained GDP growth. Thus, the impact of labor force participation on economic performance is context-specific: in India, low female participation moderates total youth engagement, whereas in the US, youth can simultaneously pursue education, participate in labor, and access financial services. These findings underscore that the interplay between youth financial inclusion and labor participation affects economic growth differently across countries, pointing to the need for tailored policy interventions.

Keywords: *Economic Growth, Financial Inclusion, India, Labor Force Participation, USA, Youth*

1. Introduction

In the wake of the Covid-19 pandemic, the role of youth financial inclusion as a factor in the well-being of citizens and stable economic development has been growing worldwide. Youth financial inclusion is increasingly recognized as a critical factor influencing economic stability and growth, particularly in relation to Gross Domestic Product (GDP). As young individuals navigate complex financial landscapes, their ability to make informed financial decisions directly impacts their contribution to the economy's labor force. Financial inclusion of young people is currently being seen as a key decision factor in determining economic stability and growth, especially in terms of Gross Domestic Product (GDP). With young people operating in the complicated financial environments, their ability to

make sound financial decisions directly impacts their productivity as labor forces. Financial literacy and inclusion of the youth can influence the economic outcomes both on the individual and macroeconomic scales. Financial inclusion, often referred to as accessibility and use of formal financial services is a critical aspect in economic growth, increasing participation of the labor force and GDP levels by creating better resource allocation, entrepreneurship and poverty. At the same time, it enables the participation of the young population in the labor market, thus playing a massive role in economic development as indicated by numerous studies in different parts of the world. Financial inclusion, particularly through owning a bank account, payment cards, facilitates economic growth by integrating individuals and firms into the financial system, thereby boosting consumption and investment, particularly in developing nations (Shaheen, 2025). Empirical data show that there is a positive correlation between financial inclusion and economic growth and the process of saving mobilization and access to credit are central drivers (Kalita & Deka, 2025). In Sub-Saharan Africa, sustainable economic growth has been linked with financial inclusion and the interrelationship between financial inclusion and growth has shown the presence of reciprocity (Adedokun and Aga, 2021). This is particularly high in developing areas where access to financial services is restricted, limiting economic opportunities. Digital financial inclusion has been revealed to improve the labor force participation of women especially in Africa. Females with access to digital financial services have better chances of participating in the labor market compared to those who depend on the traditional methods (Xia and Xu, 2025). In New Zealand, a significant rise in the labor force participation by women can have a significant effect on the GDP. In principle, by matching the levels of female participation with the leading OECD countries, GDP would rise by 1.0% (Bryant et al., 2004). Financial inclusion helps in mobilization of savings and accessing credits hence strengthening entrepreneurship and allocation of resources.

Youth financial inclusion has a significant effect on the labor force participation and GDP, both in the USA and India, which promotes economic growth and widens employment opportunities. In India, formal banking schemes have been found to increase the engagement in the employment schemes, especially in the marginalized groups through the establishment of schemes like the National Rural Employment Guarantee Act (NREGA) (Pratap et al., 2017). The increase in female labor force participation may profoundly increase the GDP since underutilization of women potential is an unutilized economic opportunity (Kumar, 2021). Financial literacy and fintech therefore play a crucial role in ensuring the young people are integrated into the labor market, entrepreneurship as well as curbing inequality against the disadvantaged youth (Amaghous, 2024).

The consequences of the Great Recession in the USA have placed a significant number of young people under the problem of high unemployment rates, and there is a strong need to strengthen financial inclusion and improve the integration of these people into the labor market (Allegretto, 2013). Formal accounts appear only in 44 percent of young people aged 18-25, versus 55 percent of older people, which represents a disproportion that impedes the engagement of young people on the labor market (Demirguc-Kunt et al., 2013). My Path Savings in the USA is an example of programs that combine financial education with workforce development by demonstrating that financial confidence and expanded labor force participation can be enhanced in low-income youth (Loke et al., 2016). The same can be noted in India, where digital financial inclusion allows young people to become more active in the labor market, as they can find more employment opportunities when they can access financial services (ELMASMARI & Amaghous, 2024). Financial inclusion is often linked to financial capability, focusing on access to financial services, and financial literacy, especially in the case of the economically disadvantaged young people (Johnson & Sherraden, 2007). In the USA, financial ability ranks high above general literacy with financial facilities being demanded. The poor young people are faced with obstacles in the form of financial information and financial access thus limiting their economic engagement. Economic crises have been associated with a lack of financial literacy as was the case in the U.S mortgage crisis and there is a need to have informed consumers to reduce risk (Ramakrishnan, 2011). Financial literacy and inclusion in India is defined by socio-economic factors, and education and employment have turned out to be a key factor (Bharucha, 2019).

In India, education and employment status were found to be strong predictors of financial literacy, suggesting that targeted educational programs could enhance financial knowledge and, consequently, economic participation. Only 27% of Indians are financially literate, which hampers economic growth potential (Jeevitha & Amaleshwari, 2023). While both countries recognize the importance of financial inclusion, the USA's approach focuses on capability and access, whereas India grapples with socio-economic barriers that limit financial education. This divergence highlights the need for tailored strategies to maximize the potential economic benefits of financial inclusion initiatives.

Thus, financial inclusion factors like owning a bank account and debit card have emerged as important determinants of economic well-being in both developed and developing economies. As global financial systems grow increasingly complex, the ability of young individuals to make informed financial decisions plays a central role in shaping long-term productivity, savings behavior, entrepreneurship, and national economic growth. Despite a growing body of literature examining financial literacy and macroeconomic outcomes, most studies focus on adult populations, leaving a significant gap in understanding how *youth* financial capability influences the labor force and national GDP growth. This gap is important because young people represent the future workforce and consumer base, and their financial competencies have long-run implications for investment patterns and economic stability. This study addresses this gap by analyzing the relationship between youth financial inclusion (particularly youth account ownership and debit card and labor force participation rate and GDP growth, using the United States and India as comparative case studies. These two countries offer contrasting economic structures, demographic trends, and financial education frameworks, making them ideal for examining how youth financial proficiency may correlate with macroeconomic performance. The main objective of this study is to examine whether higher youth financial inclusion levels are associated with stronger contributions to the economy and hence GDP growth levels, while also conducting a cross-country correlation analysis to provide insights that can guide policy interventions, educational reforms, and national development strategies.

2. Literature Review

An extensive review of literature has been conducted to understand the ongoing research in the field of financial inclusion. A study by Serhiichuk et al. (2025) focuses on the specifics of the impact of financial literacy on economic growth, stability, and economic inequality. The article applies a systematic approach to highlighting financial literacy issues in the context of economic growth, stability, and inequality. The methodology includes structural and functional analysis, methods of synthesis, and comparison. The article reveals a moderate direct positive correlation between financial literacy and the well-being of the population of countries, measured in GDP per capita at purchasing power parity. At the same time, the level of prosperity of a country's population has a lesser impact on the development of citizens' financial skills. A high level of awareness of macroeconomic indicators (inflation, purchasing power, interest rates) affects the ability of citizens to maintain a high level of financial well-being, plan savings, and avoid debt. Another study by Paşa et al. (2022) aims to analyze financial literacy as a driver of financial wellbeing and economic growth in three of the most recent EU Member States, namely Romania, Bulgaria, and Croatia. This study measures financial literacy as having the basic knowledge about investing, saving habits and macroeconomic concepts like inflation. Financial wellbeing is measured based on the ability to meet financial obligations and having a control over day-to-day finances and economic growth is measured using annual gdp growth %. The study used two-stage least-squares regression to test the hypothesis and cluster analysis for comparisons among countries. Conclusions of the research reveal the main differences between countries in terms of finance. Research by Mulyono (2023) aims to investigate the prevailing level of financial literacy amongst Indian youth, recognize the factors that drive their monetary decisions, and determine how ready they are for managing money within an emerging digital economy. With more financial instruments and platforms becoming readily available, the study also seeks to check if young people possess the requisite knowledge and skills with which to employ them effectively. Digital financial knowledge and skills are measured based on the ability to use

UPI apps (GPay, PhonePe, Paytm), online banking, digital wallets and online investment platforms. The results indicate that although the majority of young people are aware of electronic payment instruments, they do not know basic financial concepts such as budgeting, investing, and calculating interest. Respondents with formal financial education or guidance from families have exhibited more prudent money management skills. The research also identified a very high desire among youths to study finance, indicating that there is a very evident opportunity for schools and policymakers to introduce systematic financial literacy courses.

Another important study by Malang Indonesia et al. (2022), investigates the impact of financial literacy with economic growth with human capital in Thailand. This study investigates data at the start point year of 2000 to 2020 to generate "autoregressive vectors" that can be utilized for determining relationships among the variables human capital (HC), Financial Literacy (LC), and economic growth (GDP). This study uses a vector analysis method with a time period starting from 2000 to 2020 employs secondary World Bank data. The study found financial literacy has a significant impact in providing a production boost that has a direct impact on economic growth. Financial literacy has an important A study by Katnic et al. (2024), examines the association between financial literacy and economic stability in Montenegro, revealing that higher literacy levels correlate with better financial practices, increased savings, and responsible credit use, enhancing economic resilience and promoting sustainable development. This study employs a quantitative, survey-based approach to explore the association between financial literacy levels and measures of economic stability, including savings rates, active debt management, and access to financial products. Correlation analysis reveals that higher levels of financial literacy are associated with better financial practices, such as increased savings and responsible credit use, thereby enhancing economic resilience at the household level. Moreover, improved financial literacy contributes to sustainability by fostering long-term financial stability, reducing inequalities, and promoting inclusive economic growth. A bibliometric literature review by Amaghous (2024) aims to analyze the trends and findings of various recent research studies examining the role of financial inclusion through Fintech and financial literacy in enhancing the economic inclusion of young people. The results indicate that our subject has garnered significant attention in recent years, as financial inclusion, Fintech, and financial literacy have been identified as key determinants of youth integration into the labor market, particularly through entrepreneurship. Therefore, policymakers should consider these factors when developing their strategies, placing greater emphasis on disadvantaged youth, young women, and those with lower levels of education. However, other factors, such as political stability, economic conditions, and country-specific characteristics, also appear to have significant impacts. A study by Elmasmari and Amaghous (2024), examines the determinants of financial inclusion and FinTech in order to evaluate their effects on youth labor force participation in the MENA region. The World Bank's Global Findex 2021 database was used to perform probit estimations and propensity score matching. The results show that young people with higher education levels, higher incomes, mobile phones and internet access are more likely to be included in the traditional and digital financial systems. In addition, the factors hindering financial inclusion include a lack of documentation, religious constraints and the costs associated with financial services. Furthermore, examining the effect of financial inclusion and fintech reveals that having formal bank accounts and mobile money accounts, as well as savings, formal loans, and digital transactions have a significant impact on young people's participation in the labor force.

A study by Elouardighi and Oubejja (2023) analyzes the relationship between digital financial inclusion and women's labor force participation, as well as shedding light on the barriers to women's digital financial inclusion. The Probit model estimation methodology is used to examine empirical results. The findings reveal that financial inclusion via the digital channel is positively associated with women's labor force participation more than the traditional channel. A significant and positive impact of formal financial services channels on the level of women's participation in the labor market was uncovered. The research has shown that women face a variety of obstacles when it comes to accessing financial services, both through traditional channels and digital means. These barriers include nonvoluntary obstacles in traditional financial inclusion channels. However, as a woman's income level increases, the intensity of these barriers decreases. When it comes to digital financial inclusion, women often face a unique set of

obstacles. The emergence of digital financial inclusion has initiated a debate about whether it is the next frontier of sustainable economic growth, especially for developing economies.

The study by Amaliah et al. (2024), aims to verify these contentions by examining the impact of digital financial inclusion on sustainable economic growth. The empirical data between 2011 to 2020 was retrieved from Indonesia and was analyzed using the generalized method of movements (GMM) technique. The findings confirm that digital financial inclusion's proxies (automated teller machines and Debit) have a significant positive (strong) effect on GDP growth and a significant positive (moderate) effect on CO2 emissions. Increases in labor force participation could contribute towards closing the income gap between New Zealand and wealthier OECD countries. In another paper, Bryant et al. (2004) calculates the effect on GDP of hypothetical increases in employment from increased participation, taking into account the differences in productivity between new and existing workers. The results suggest that increasing the labor force participation of women aged 25-34 to the average, adjusted for paid maternity leave, of the top 5 OECD nations increases employment by 28,800 and generates an additional 12,15 million of GDP, making GDP 1.06,101 million of GDP, an increase of 5.1% more than it would otherwise have been. A study by Israel (2025) examines how financial inclusion (FNI) influences the socio-economic status and empowerment of rural youth entrepreneurs. Data for the study was collected using a cross-sectional questionnaire survey from 618 rural youth entrepreneurs across seven wards in the Iramba District of Tanzania. Subsequently, structural equation modelling (SEM) was employed to assess the impact of FNI on the socio-economic outcomes of rural youth entrepreneurs. The study findings reveal a significant positive effect of FNI on rural youth economic empowerment, social capital and networking, access to healthcare and social services, and overall standard of living. The results provide actionable insights for policymakers, financial institutions, and development agencies aiming to foster entrepreneurship in rural areas. It highlights the importance of creating youth-tailored financial products, improving digital infrastructure, and enhancing financial literacy to boost the socio-economic impact of FNI in rural areas.

The current literature has highlighted the positive correlation between financial literacy and youth financial inclusion and economic development; however, most empirical studies focus on adult populations or on individual countries. There have been significant loopholes in terms of youth-specific inclusion, gender inequality, and the usefulness of digital financial tools, especially in emerging markets. This paper will attempt to fill such gaps with a comparative analysis between India and the United States by explaining how youth financial inclusion and labor market participation interact to define the economic growth.

3. Methodology

This section explains the methodological approach used to examine trends and relationships between youth financial inclusion, labor force participation, and economic growth in India and the United States. The study adopts a quantitative, comparative framework using secondary data to analyze patterns over time and cross-country differences.

3.1 Objectives of the Study

1. To analyze trends in youth financial inclusion in India and the USA
2. To examine youth labor force participation patterns by gender and in total.
3. To compare GDP per capita dynamics across both countries.
4. To assess the relationship between financial inclusion, labor participation, and economic growth.

3.2 Research Design

The study adopts a quantitative research design based on secondary data. A longitudinal and cross-country comparative approach is used, based on the period 2014–2024. The time period used in the study is aligned with Global Findex survey waves and labor market data.

3.3 Description of Variables

Key study variables include GDP per capita, youth account ownership, youth debit card ownership, male and female youth labor force participation rates, and total youth LFPR. Data are sourced from the World Bank Global Findex Database, World Development Indicators, and ILOSTAT, covering selected years between 2014 and 2024.

3.4 Analytical Framework

The analysis integrates descriptive trend analysis using graphs with Spearman rank correlation to examine associations between GDP per capita, youth financial inclusion indicators, and total youth labor force participation. Given limited observations, correlations are interpreted as indicative of the direction and strength of relationships rather than causal effects.

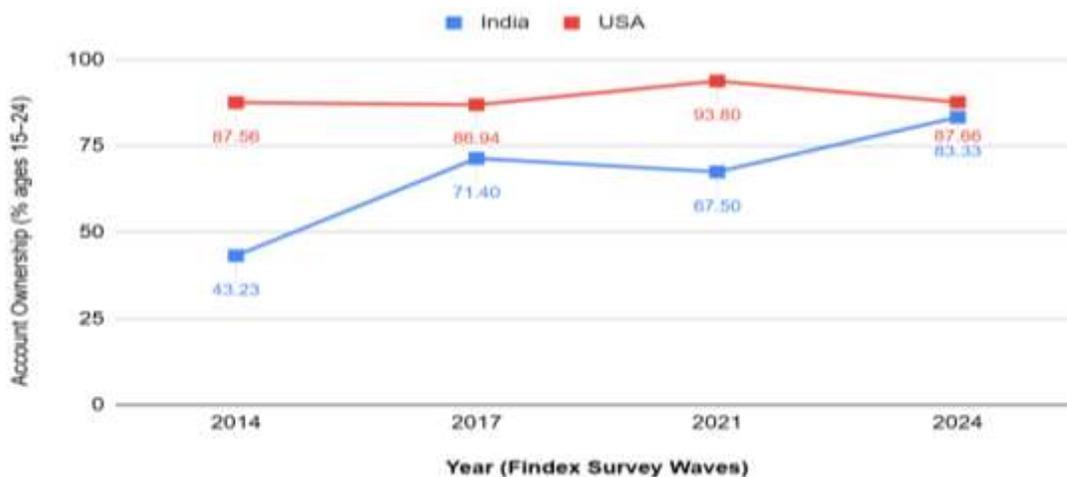
4. Results and Findings

This section presents the results on youth financial inclusion, labor force participation, and GDP per capita in India and the USA between 2014 and 2024. Trends are analyzed through account and debit card ownership, male and female labor participation, and total youth LFPR. Correlation analyses and cross-country comparisons highlight how financial access and economic participation interact, with attention to gender gaps and structural differences between the two countries.

4.1 Trends in Youth Financial Inclusion

4.1.1 Account Ownership

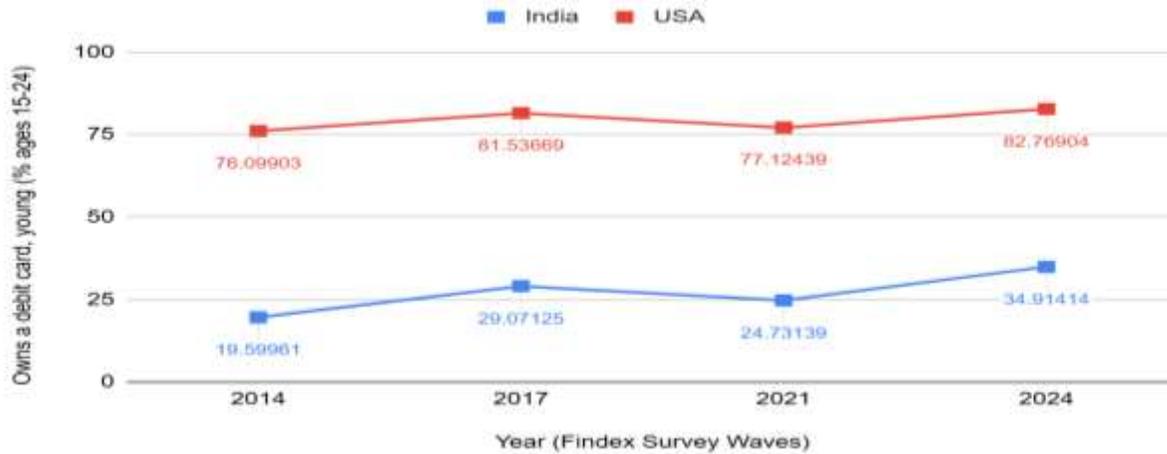
Figure 1: Youth Account Ownership (% ages 15-24)



The above graph shows the % of youth owning an account in India and USA in different years according to the findex survey waves. In the USA, the overall trend remained stable, with the percentage averaging around 88.97. Between the years 2017 and 2021, the percentage slowly increased from 88.94 to 93.80, after which it again became steady at 87.66%. In contrast, there was a significant rise in the percentage in India. There was a 65% increase between the years 2014 and 17, while between 2017 and 21 the percentage remained constant around 69.45%. Finally, it reached a peak of 83.33% in the year 2024.

4.1.2 Debit Card Ownership

Figure 2: Youth Debit Card Ownership (% ages 15-24)

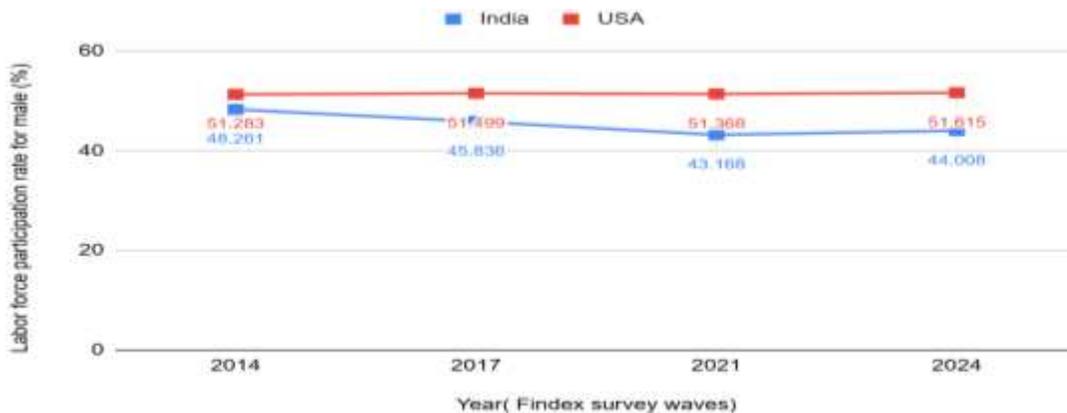


The above graph shows the percentage of youth that owns a debit card in the USA and India in 4 different years. In this, both the countries follow the same fluctuating pattern. The percentage in the USA always remained higher than that in India, having a difference of almost 50% in all the 4 years. Between 2014 and 17 and 2021 and 24, the percentages in both the countries rose gradually. However, between 2017 and 21, there was a slight decline, about 17.24%.

4.2 Youth Labor Force Participation

4.2.1 Male LFPR

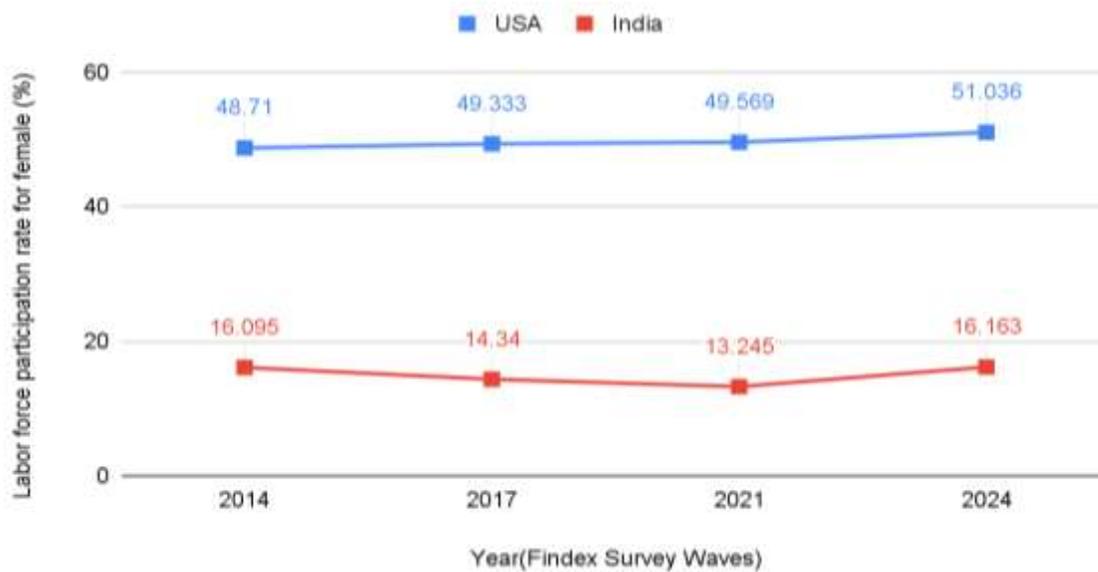
Figure 3: Labor Force Participation Rate for ages 15-24, male (%) (modeled ILO estimate)



The above graph shows the youth labor force participation rates for males in the USA and India in 4 different years. The rate always stayed higher in the USA than in India. In the USA, it remained more or less constant (51%) in all the 4 years while in India the rate varied every year. Between 2014 and 2021, the rate in India dropped from 48.261% to 43.168% . There was approximately a 2.32% rise in the rate, between 2021 and 2024.

4.2.2 Female LFPR

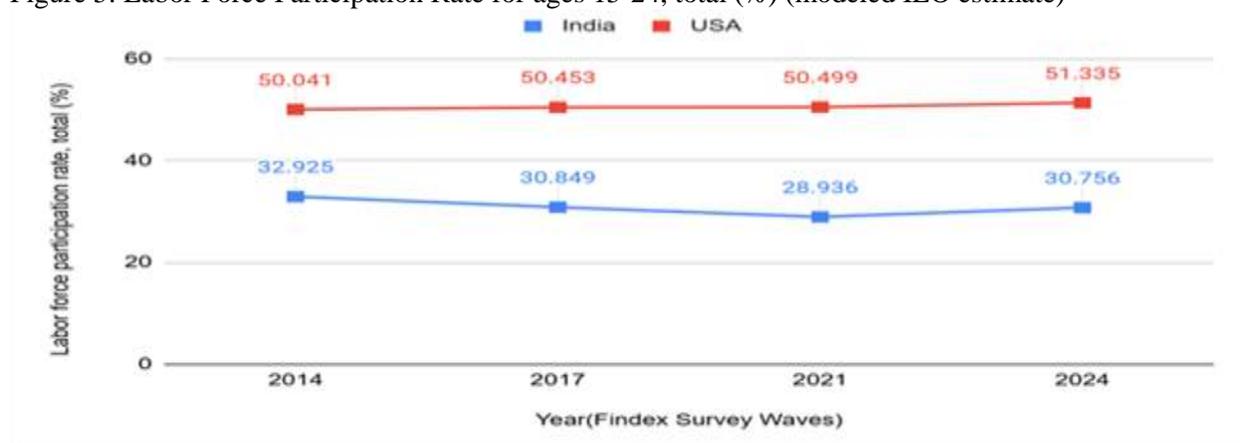
Figure 4: Labor Force Participation Rate for ages 15-24, female (%) (modeled ILO estimate)



The above line graph shows the youth labor force participation rates for females in the USA and India in 4 different years. The rate in the USA was always approximately 32% higher than the rate in India. Rates in both the USA and India were mostly consistent throughout the 4 years, except that there were slight variations. In the USA, the rate increased from 48.71% to 51.036% which is a 4.775% rise. In India, the rate initially declined from 16.095% to 13.245% but then between 2021 and 2024, it again rose up to 16.163%.

4.2.3 Total Youth LFPR

Figure 5: Labor Force Participation Rate for ages 15-24, total (%) (modeled ILO estimate)

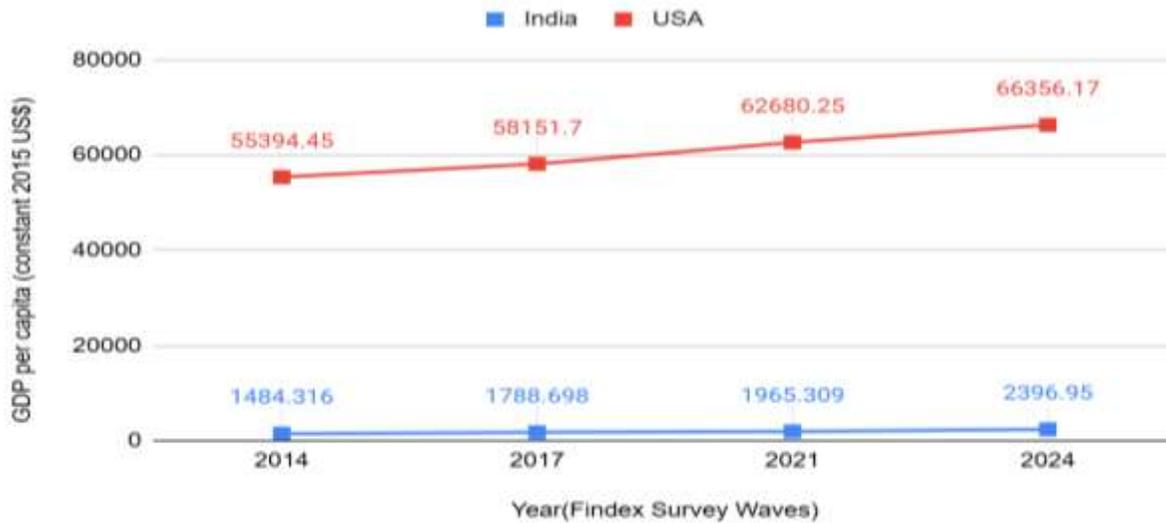


The above line graph shows the total labor force participation rate in India and the USA in 4 different years. The total participation rate was always higher in the USA than in India, with an approximate difference of 19.604%. For both the countries, the rate more or less remained constant- about

50.66% for the USA and . In India, the rate slightly decreased between 2014 and 2021, dropping from 32.925% to 28.936%. The next 3 years, there was a 6.291% rise in the rate.

4.3 GDP per capita dynamics

Figure 6: GDP per capita (constant 2015 US \$)



The above graph shows GDP per capita (in 2015 US\$) in India and the USA in 4 different years. There is a huge difference between the GDP levels in India and that of the USA. In India, the GDP mostly remained stable in all the 4 years, with an average of about 1908.73 US\$, while in the USA there was a significant rise in the GDP. Between the years 2014 and 2021, there was a 13.15% increase in the GDP per capita. From 2021 to 2024 there was a moderate rise in the GDP.

4.4 Correlation Analysis of Youth Financial Inclusion, Labor Force Participation and GDP

Spearman Rank Correlation has been conducted to understand the relationship between GDP per capita, and youth financial inclusion (account and debit card ownership) and total youth labor force participation (LFPR) over the period of 2014-2024 in India and the USA. The analysis shows how Financial Inclusion and Labor Force Participation interacts with economic growth within two contexts. Due to the limited number of annual observations, correlation coefficients indicate the direction and relative strength of association rather than precise estimates of effect size.

4.4.1 India

Table 1: Spearman Correlation Matrix for India (2014–2024)

Variable	GDP_pc	Account_youth	Debit_card_youth	LFPR_total
GDP_pc	1.00	0.80	0.80	-0.80
Account_youth	0.80	1.00	1.00	-0.40
Debit_card_youth	0.80	1.00	1.00	-0.40
LFPR_total	-0.80	-0.40	-0.40	1.00

The Spearman rank correlation shows that there is a strong positive relationship between gross domestic product per capita and the youth financial inclusion indicators in India and both the account ownership and the debit card ownership display a correlation of 0.80. On the other hand, the total youth labor force participation rate (LFPR) shows a negative relationship with the GDP per capita (ρ -0.80), which means that the increase in the economic output is accompanied by a slight drop in the labor force participation of the youth. The existence of moderate negative relationships between LFPR and financial inclusion (-0.40) indicates that despite the growing access to the financial services, a significant proportion of young people remains outside of the formal employment, which can probably be explained by further education or by participation in informal employment or work arrangements. These forces are significantly affected by low and unchanging female participation in labor (around 16 percent) and a slow decrease in men participation in labor. In this regard, the correlation matrix is a quantitative support of the trends demonstrated in the separate graphs of account ownership, debit card ownership, LFPR, and GDP.

4.4.2 USA

Table 2: Spearman Correlation Matrix for USA (2014–2024)

Variable	GDP_pc	Account_youth	Debit_card_youth	LFPR_total
GDP_pc	1.00	0.60	0.80	1.00
Account_youth	0.60	1.00	0.00	0.60
Debit_card_youth	0.80	0.00	1.00	0.80
LFPR_total	1.00	0.60	0.80	1.00

The association between gross domestic product per capita and indicators of youth financial inclusion in the United States is positive, with account ownership (0.60) and debit card ownership (0.80) positively correlated with economic growth. With a strong positive association with GDP (ρ =1.00), it can be seen that the youth labor force participation rate (LFPR) has consistently been high and unchanged (around 50-51%) over the period of operation. The existence of moderate positive correlations between LFPR and financial inclusion indicators (ρ =.60-0.80) indicates that financial inclusion of the youth can tend to lead to the employment of the youth to the workforce. These empirical results support the trend visualizations of the two variables individually in the United States and confirm coordinated pattern of growth in GDP and financial integration, as well as the steady high participation in work.

5. Discussion

The comparative study on youth financial inclusion, labor force participation and economic growth in the United States and India is able to point out convergent and divergent trends that depict the overriding socio-economic situations. The fact that the youth ownership of accounts continues to be higher in the United States compared to India explains the importance of financial literacy, access to extensive banking infrastructure and a well-developed regulatory environment. Conversely, the increase in the number of accounts in India between 2014 and 2024 indicates the influence of government programs like Pradhan Mantri Jan Dhan Yojana and the growth of digital financial services. Yet, this rise in financial access has yet to completely be reflected in better labor force participation implying that formal financial inclusion is not enough to make youth get job without other relevant educational and economic opportunities.

The changing status of debit card ownership in the two nations must be affected by technological advancement and the subsequent increase in the popularity of online payment systems, including UPI, Google Pay and Zelle. In spite of these changes, the United States has continued to have elevated rates of card ownership, which implies the presence of increased financial literacy, access to and utilization of formal financial instruments amongst young people. Contextual differences are also brought out by labor force participation trends. Youth in the United States with both genders are highly engaged, having equal access to education and financial literacy and formal employment. In India, continued low participation by females and a drop in male participation up to 2021 is an indicator of structural reasons, such as traditional gender roles, a lack of quality jobs and socio-economic factors. These are probably the reasons why there is a lack of connection between the increasing financial inclusion and the engagement of labor force in India.

These observations are supported by GDP per capita dynamics, as the United States has always had a higher and higher growing GDP as a result of productive incorporation of the youth in both labor markets and financial systems whereas India has a relative low GDP, which indicates a recurring problem in the areas of industrialization, human capital development and infrastructure. The negative correlation between youth LFPR and GDP in India is the same as that of an inverted U-shaped relationship between income and labor participation, which may suggest that with an increase in economic opportunities and the potential increase in youth investment in education, the temporary fall in formal workforce participation may be observed. In contrast, the United States experiences a close relationship between youth financial inclusion and labor participation which helps them to sustain their plateau stage which is the economic growth and constant employment participation.

These results have significant policy implications. In India, increasing the labor force participation of women and youth employment opportunities through specific financial literacy initiatives, skills development and equal access to formal employment opportunities may increase the beneficial impacts of financial inclusion on economic growth. In the United States, the findings indicate that the presence of strong financial literacy programs and convenient banking system supplements high levels of youth labor involvement that enhance economic productivity in general.

In general, this paper validates that young financial inclusion has a positive relationship with economic activity and GDP growth, but such an effect is mediated by labor market dynamics and socio-cultural influence. The cross-country variations underscore the necessity of context-specific measures of achieving the economic benefits of financial inclusion to maximize it especially in emerging economies. Such results are in line with previous research findings that have supported a positive correlation between financial literacy and inclusion and economic growth (Serhiichuk et al., 2025; Zaimovic et al., 2023; Amaghous, 2024) and showed that labor force participation and gender equality are still crucial factors in moderating this relationship.

6. Conclusion

This study examined the trends and relationships between youth financial inclusion, labor force participation, and economic growth in India and the United States between 2014 and 2024. It adopted a quantitative, comparative framework using secondary data to analyze patterns over time and cross-country differences. Trends are analyzed through account and debit card ownership, male and female labor participation, and total youth LFPR. The findings from trend analysis showed that while financial inclusion supports GDP growth universally, labor force dynamics shape the extent and manner of its impact, particularly in emerging economies. In India, there is a decline in total youth LFPR despite rising GDP and LFPR and financial inclusion are negatively correlated. However, in the USA, financial inclusion and labor force participation reinforce each other, supporting sustained GDP growth. Thus, the impact of labor force participation on economic performance is context-specific: in India, low female

participation moderates total youth engagement, whereas in the US, youth can simultaneously pursue education, participate in labor, and access financial services. These findings carry important policy implications for each country. In India, efforts to improve female labor force participation could enhance the benefits of financial inclusion and further support inclusive economic growth. In the United States, the alignment of high youth LFPR with financial inclusion suggests that policies promoting financial literacy and banking access complement an already robust youth labor market, reinforcing economic productivity. In this study, due to the limited number of annual observations, correlation coefficients only indicate the direction and relative strength of association rather than the precise estimates of effect size. With the availability of more data, more variables like financial literacy and financial inclusion parameters other than account and debit card ownership could be included and their impact on economic growth could be analysed.

References

- Adedokun, M. W., & Ağa, M. (2021). Financial inclusion: A pathway to economic growth in Sub-Saharan African economies. *International Journal of Finance & Economics*, 28(3), 2712–2728. <https://doi.org/10.1002/ijfe.2559>
- Allen, F., Demirguc-Kunt, A., Klapper, L., & Peria, M. S. M. (2016). The foundations of financial inclusion: Understanding ownership and use of formal accounts. *Journal of Financial Intermediation*, 27, 1–30. <https://doi.org/10.1016/j.jfi.2015.12.003>
- Amaghous, J. (2024). Financial inclusion, FinTech and financial literacy as catalysts for young people's economic inclusion: a bibliometric analysis. *IJDAM - International Journal of Digitalization and Applied Management.*, 1(2), 138–153. <https://doi.org/10.23882/ijdam.24136>
- Amaliah, I., Ali, Q., Sudrajad, O. Y., Rusgianto, S., Nu'man, H., & Aspiranti, T. (2024). Does digital financial inclusion forecast sustainable economic growth? Evidence from an emerging economy. *Journal of Open Innovation Technology Market and Complexity*, 10(2), 100262. <https://doi.org/10.1016/j.joitmc.2024.100262>
- Bryant, J., Jacobsen, V., Bell, M., & Garrett, D. F. (2004). Labor force participation and GDP in New Zealand. *SciSpace - Paper*. <https://scispace.com/papers/labor-force-participation-and-gdp-in-new-zealand-ih47ar0ttl>
- D, P. M., Das, D., & Kumar, N. A. (2024). Conceptualization of digital financial literacy. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.4673665>
- Demirgüç-Kunt, A., & Klapper, L. (2013). Measuring Financial Inclusion: Explaining Variation in Use of Financial Services across and within Countries. *Brookings Papers on Economic Activity*, 2013(1), 279–340. <https://doi.org/10.1353/eca.2013.0002>
- Elmasmari, H., & Amaghous, J. (2024a). Analysis of the impact of financial inclusion and FinTech on youth labor force participation in the MENA region. *Economics and Business Review/the Poznań University of Economics Review*, 10(4), 56–79. <https://doi.org/10.18559/ebr.2024.4.1668>
- Elouardighi, I., & Oubejja, K. (2023). Can Digital Financial Inclusion Promote Women's Labor Force Participation? Microlevel Evidence from Africa. *International Journal of Financial Studies*, 11(3), 87. <https://doi.org/10.3390/ijfs11030087>

- Goyal, K., & Kumar, S. (2020). Financial literacy: A systematic review and bibliometric analysis. *International Journal of Consumer Studies*, 45(1), 80–105. <https://doi.org/10.1111/ijcs.12605>
- Israel, B. (2025). From Exclusion to Empowerment: Financial inclusion as a catalyst for socio-economic development among rural youth entrepreneurs. *SRIWIJAYA INTERNATIONAL JOURNAL OF DYNAMIC ECONOMICS AND BUSINESS*, 459–478. <https://doi.org/10.29259/sjideb.v8i4.459-478>
- Johnson, E., & Sherraden, M. S. (2007). From financial literacy to financial capability among youth. *The Journal of Sociology & Social Welfare*, 34(3). <https://doi.org/10.15453/0191-5096.3276>
- Kalita, K., & Deka, U. (2025). THE NEXUS BETWEEN FINANCIAL INCLUSION AND ECONOMIC GROWTH- A REVIEW. *International Journal of Economics Business and Social Science Research*, 03(03). <https://doi.org/10.37602/ijebssr.2025.3305>
- Katnic, I., Katnic, M., Orlandic, M., Radunovic, M., & Mugosa, I. (2024). Understanding the Role of Financial Literacy in Enhancing economic stability and resilience in Montenegro: A Data-Driven Approach. *Sustainability*, 16(24), 11065. <https://doi.org/10.3390/su162411065>
- MalangIndonesia, S. J. N. T., Rusminingsih, D., & Damayanti, L. (2022). The role of financial literacy on economic growth and human capital in Thailand. *Tamansiswa Accounting Journal International*, 4(1), 52–57. <https://doi.org/10.54204/taji/vol412022008>
- Mulyono. (2023a). The impact of Digital Literacy on Fintech service usage through financial literacy. *E3S Web of Conferences*, 426, 02003. <https://doi.org/10.1051/e3sconf/202342602003>
- Paşa, A. T., Picatoste, X., & Gherghina, E. M. (2022). Financial Literacy and Economic Growth: How Eastern Europe is Doing? *Economics*, 16(1), 27–42. <https://doi.org/10.1515/econ-2022-0019>
- Paulson, H. M., Jr., Bowles, E., & Aspen Economic Strategy Group. (2019). *Expanding economic opportunity for more Americans: Bipartisan policies to increase work, wages, and skills* (M. S. Kearney & A. Ganz, Eds.). <https://www.economicstrategygroup.org/wp-content/uploads/2019/12/Expanding-Economic-Opportunity-for-More-Americans.pdf>
- Ralph C. Bryant on REPEC/IDEAS. (2004). <https://ideas.repec.org/f/pbr261.html>
- Ramachandran, R. (2011). Financial literacy - the demand side of financial inclusion. *SSRN Electronic Journal*. <https://doi.org/10.2139/ssrn.1958417>
- Serhiichuk, S., Grebeniuk, N., Nazarenko, T., Parshakov, V., & Chasnikova, O. (2025). *The role of financial literacy in economic development*. Dialnet. <https://dialnet.unirioja.es/servlet/articulo?codigo=9872520>
- Shaheen, R. (2025). Investigating the relationship between financial inclusion and CO2 emissions in G20 countries: a quantile-on-quantile approach. *Social Responsibility Journal*, 21(10), 2152–2172. <https://doi.org/10.1108/srj-01-2025-0055>
- Shan, L. H., Cheah, K. S. L., & Leong, S. (2023). Leading Generation Z's financial literacy through Financial Education: contemporary bibliometric and content analysis in China. *SAGE Open*, 13(3). <https://doi.org/10.1177/21582440231188308>



Xia, Y., & Xu, G. (2025). Can Digital Financial Inclusion Promote the Sustainable Growth of Farmers' Income?—An Empirical Analysis Based on Panel Data from 30 Provinces in China. *Sustainability*, 17(4), 1448. <https://doi.org/10.3390/su17041448>

Zaimovic, A., Torlakovic, A., Arnaut-Berilo, A., Zaimovic, T., Dedovic, L., & Meskovic, M. N. (2023). Mapping Financial Literacy: A systematic literature review of determinants and recent trends. *Sustainability*, 15(12), 9358. <https://doi.org/10.3390/su15129358>

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