

Effects of Covid-19 Pandemic on FinTech Ecosystem

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ABSTRACT

This research reviews material on how innovative payment systems and fintech sailed through the turbulent tides of the COVID-19 pandemic. To get important conclusions, a number of publications, journal papers, and other secondary data are gathered. The study's conclusions revealed that consumers' access to banking services and goods has been impacted by the Covid-19 problem in recent years. Aside from the unexpected but crucial impetus for digital adoption in financial services provided by the COVID-19 lockdowns, a number of additional factors have contributed to the growth story of FinTech. These elements include the government's push for a digital economy, the dependable and quick processing capacity of mobile devices, and the expansion and speed of internet connection. FinTech's ascent and expansion are further supported by the growing need for accessible financial services, rising client demands, and a fiercely competitive financial services industry. Numerous macroeconomic factors, including India's rapidly expanding economy with rising disposable income, a sizable population of unbanked and underbanked people, government and regulatory initiatives, an increasing number of young adults, improved internet access, smartphone penetration, and a rapidly expanding e-commerce marketplace, all contribute towards the growth of the Indian FinTech market. The result of study also signifies the difficulties faced by FinTechs during the pandemic. Some of the most important problems and difficulties include erratic adoption: uneven distribution among overbanked and underbanked segments; low financial literacy and awareness; increasing data security and privacy risk; rapid legislative updates; and geopolitical volatility. Technologies can help as COVID-19 spreads over the world and alters how people and businesses connect and conduct business by offering ways to maintain the appropriate social distance. By lowering reliance on cash-related transactions and the need for actual currency, fintech may help governments and providers quickly and safely engage vulnerable populations.

INTRODUCTION

FinTech includes mobile services for payments, transfers, loans, insurance, asset management, investments, and crowd funding [Puschmann, T. (2017), Bharadwaj, W., & Suri, T. (2019), Chen, M. A., Wu, Q., & Yang, B. (2019)]. FinTech applications in the financial services industry have seen three primary phases of development over the past few decades: internal digitization, provider digitization, and customer-oriented digitization (Puschmann, T. 2017). This transformation has brought up new opportunities, hazards, and regulatory considerations [Puschmann, T. (2017), Chen, M. A., Wu, Q., & Yang, B. (2019), Goldstein, I., Jiang, W., & Karolyi, G. A. (2019)]. The key areas of application for FinTech, considering these technological improvements, are investment and financing, payment and risk management, security of data and generating revenue, and consumer interface. [Puschmann, T. (2017), Chen, M. A., Wu, Q., & Yang, B. (2019)].

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The emergence of COVID-19 resulted in a hastening of the rate of digitization. The emergence of fintech in Asia was partly driven by the limited extent of financial inclusion in the region, as seen by the fact that less than 50% of individuals in several economies, possess traditional bank accounts. Fintech growth has been facilitated by the low penetration of insurance and wealth management financial services. This was further emphasized as a result of the pandemic. Due to the COVID-19 pandemic, both companies and governments were compelled to implement digital solutions to fulfill their jobs and achieve their goals.

During times of crisis, communities may have significant difficulties in accessing financial services. This study examines the use of FinTech apps in enhancing resilience within the COVID-19 epidemic. The study investigates the variables that influence the adoption of FinTech apps during the epidemic. The inherent agility of many fintech companies enabled them to quickly adjust to the epidemic, unhindered by the constraints of obsolete technology. In 2022, as economies prioritize economic recovery, fintech companies have been able to capitalize on the significant expansion of digital financial services and e-commerce, resulting in new prospects. The COVID-19 pandemic compelled financial companies to reassess their business strategies in order to advance in the future. The implementation of social distancing measures has led to a rise in the demand for neobanks across Asia. Additionally, traditional banks are showing a strong interest in partnering with fintech companies to offer digital financial services. Fintech providers have played a crucial role in mitigating the negative economic consequences of COVID-19, especially in Asia, where MSMEs and marginalised individuals have been disproportionately impacted. The heightened use of fintech throughout the pandemic has played a crucial role in sustaining the financial viability of numerous MSMEs, as financial services offered by fintech companies are characterized by swifter, more streamlined, and cost-effective processes compared to traditional banking. Moreover, the implementation of digital financial inclusion (DFI) has successfully enhanced families' ability to get financial services, hence mitigating the economic impact of COVID-19. The noteworthy influence of fintech during the pandemic in providing assistance to marginalised groups should be underscored, particularly owing to its contribution in enhancing digital financial inclusion, mitigating inequality, and fostering more equitable economic expansion. Thanks to the swift reaction of fintech during the beginning of the pandemic, people in distant villages were still able to access important financial services, including those pertaining to the distribution of government aid. Furthermore, fintech played a crucial role in offering significant assistance to the informal or "gig" economy, a sector that is commonly neglected by conventional financial services. COVID-19 brought attention to the requirements of individuals who are excluded from the conventional financial system. Fintech facilitates the connection for these individuals by engaging in productive partnerships with various financial institutions, governments, and the other economic sector.

The heightened use of fintech, especially throughout the pandemic, has underscored several crucial policy domains that warrant attention in order to optimize its influence on financial inclusion. A significant challenge arises from the different degrees of proficiency in digital and financial literacy across different countries. Insufficient proficiency in these domains may prevent economies and communities from capitalizing on the advantages of fintech. The Asia-Pacific region exhibits considerable diversity in terms of digital and financial literacy levels, resulting in variations in the adoption and utilization of digital financial services within the area. Therefore, it is crucial to address the shortcomings in digital and financial literacy. Lack of progress in the creation of online payment infrastructure and internet access are further obstacles that impede the impact of fintech on financial inclusion. Certain economies in Asia and the Pacific region exhibit a lower level of development compared to others, particularly in certain areas of Southeast Asia.

Ultimately, a deficiency in confidence in digital finance might contribute significantly, and this is intricately linked to apprehensions regarding data confidentiality and safeguarding consumer interests. This review paper offers valuable perspectives on these matters. As of July 2022, there is a noticeable increase in the expansion of fintech after the pandemic in worldwide. Fintech firms are continuing to be flexible and innovative, which is leading to more efficient services in various industries. In Asia, there exists a robust

feedback loop where the acceptance of fintech stimulates innovation, and conversely, innovation drives the adoption of fintech. This paper is expected to provoke discussions among policy makers regarding these challenges, as well as encourage new paths of research on the consequences of fintech.

LITERATURE REVIEW

Researchers globally have conducted empirical studies during the Covid-19 pandemic to analyse its influence on company performance. This perspective is supported by an Empirical Study (Anh & Gan, 2021) which claims that the financial sector in the stock market has had the most significant repercussions during the Covid-19 epidemic. The study undertaken by Demirguc Kunt, Pedraza, and Claudia (2020) presented empirical evidence of the subpar performance of the banking sector throughout the Covid-19 epidemic. Experts have calculated that the combination of Covid-19 transmission and government-imposed lockdown measures has resulted in a notable surge of approximately 24 to 31 percent in the download rate of financial mobile applications in these nations. The empirical study conducted by Alber and Dabour (2020) across 10 countries from March to June 2020 revealed a correlation between social distancing measures and the impact on digital payment systems. Hence, the rapid expansion of digital payments, particularly facilitated by fintech, necessitates prompt action from the regulatory authorities.

The findings of the study conducted by Fu and Mishra (2020), which analyzed mobile app data from 71 nations, revealed significant benefits for well-established fintech over "BigTech" providers during the crisis time. The results also indicate that the combination of enterprises and existing digital payment systems is more efficient in reducing the adverse economic effects of COVID-19.

The study conducted by Vasenska et al. (2021) provided a comprehensive understanding of the fintech that exhibits greater competitiveness compared to the conventional banking sector amidst the Covid-19 crisis. Utilizing fintech for financial transactions results in a risk mitigation strategy. Furthermore, engaging in financial transactions with fintech might result in cost savings by safeguarding customer funds. Another area of study focuses on the repercussions of the pandemic on different industries, specifically the economic sector in India (Nasution, Erlina, & Muda, 2020). The pandemic has had a significant effect on MSMEs, as discussed by Thaha (2020). It has also impacted the field of education, particularly in terms of learning, as highlighted by Mansyur (2020). Additionally, Thorik (2020) has examined the policies implemented in India, to address the spread of COVID-19. Additional studies have explored the safety and security measures for consumers of fintech lending services (Hidayat, Alam, & Helmi, 2020). Moreover, studies have been conducted on the regulatory framework pertaining to fintech lending, as well as the creation of operational financing solutions for MSME. These efforts have positioned fintech lending as a convenient and efficient alternative for financing in different sectors (Putri Rusadi, F. A. R & Benuf, 2020).

Objectives

- To investigate the impact of the COVID-19 pandemic on Indian financial services' capacity to adopt innovative financial technologies.
- To examine how FinTech ecosystem has developed the resilience for the established financial system, specifically during CoVID pandemic.

EVOLUTION OF FINTECH IN INDIA

India having a population over 1.3 billion, is embarking on a transformative and revolutionary Tech-Finance partnership. The collaboration between technology and finance is advancing, simultaneously improving operations. Fintech is primarily the integration of technology into the field of finance, providing more efficient financial solutions compared to conventional institutions. Fintech first started its activities inside the financial industry. Over the last several years, this sector has seen substantial expansion, including the insurance and asset management industries. Presently, Fintech companies are analysing customer behaviour patterns using advanced technologies like artificial intelligence (AI) and machine learning (ML). India has seen significant progress in financial technology within the banking and finance sector. For India, a nation heavily reliant on

cash transactions, this is a significant stride towards establishing a society that operates without physical currency. The introduction of a variety of financial technology services and software has revolutionized the manner in which individuals conduct their everyday transactions and manage their finances. The NASSCOM study on Indian startups has recognized the Fintech sector as one of the most promising areas in the ecosystem with significant growth potential. According to Mukewar and Community (2020), while wallets suffered a decline as a result of UPI, lending Fintechs and Insuretech companies experienced growth and success.

The Indian Fintech business has primarily emphasized the customer-oriented aspect of banking, resulting in a significant surge in the adoption of mobile wallets, applications, and other technological solutions specifically tailored for consumers. Only a limited number of startups have prioritized the development of banking back-end systems and processes.

The Nasscom-KPMG report indicates that the Fintech software and services sector in India had an estimated value of over \$8 billion in 2016. It is projected to expand by 1.7 times by the year 2020. According to the report, the Indian Fintech sector had a transaction value of over \$33 billion in 2016. It is projected to increase to \$73 billion by 2020, with a CAGR of 22% over the course of five years.

According to Accenture (Mandavia, M, 2020), investments in the Indian fintech sector increased by almost 100% from \$1.9 billion in the previous year to \$3.7 billion in 2019. This growth has positioned India as the third largest fintech hub globally, following only the United States(USA) and the United Kingdom(UK).

RESULTS AND DISCUSSIONS

This section explores the impact of the Covid epidemic on the implementation of financial technology (FinTech), including statistical data, as well as its benefits and drawbacks. We have examined Statista's statistical data on the monthly downloads and growth of the leading financial applications, as well as their transformations during the epidemic.

The graph illustrates a notable surge in financial app downloads during the Covid pandemic in comparison to prior years. This indicates that Covid has exerted a favorable influence on the advancement of FinTech, leading to a quick growth in financial app downloads.

The utilization of FinTech and internet platforms has significantly influenced global business recuperation amidst the pandemic. The worldwide spread of the Covid-19 pandemic and the following enforcement of governmental actions have significantly impacted the economic growth and development strategies of both developed and developing nations. The main factor behind this issue is the substantial disruption of supply chains, closure of firms, disruptions in travel and transportation, and a decline in worldwide demand for goods and services. These factors have contributed to a worldwide economic slowdown. Nevertheless, the impact of the epidemic on various firms varies, as seen by the fact that the top 100 corporations have witnessed a surge of almost \$25 billion in value.

It is clear that many businesses have suffered adverse effects during the Covid period, however there are a few firms that have benefited from it. Amidst the COVID-19 pandemic, many methods have been devised to enhance the adoption of digital technology. The objective is to minimize the adverse impacts of the crisis and offer alternative means to sustain economic activity during this period. Despite the belief that COVID-19 will eventually pass and be remembered as a historical epidemic, the efforts used to combat it have introduced a new era in the utilization of digital technologies. Countermeasures have altered the operational procedures of businesses and influenced the behavior of customers.

A poll conducted by McKinsey Company (2020) found that 75% of those who started using digital payment methods for the first time during the epidemic stated their desire to continue using these methods even once the situation returns to normal. According to the World Trade Organisation (2020), online e-commerce

platforms have significantly grown since the start of the epidemic. Organizations and firms in underdeveloped nations have made investments in digital transformation to ensure the ongoing success of their business operations. Entities such as educational organisations, banks, financial assistance providers, and home delivery solutions for food, clothes, and medicine have made substantial investments in digital transformation. The crisis generated a substantial expansion in the realm of information technology (IT) and its associated sectors. The worldwide economic expansion during the last two decades is closely linked with globalisation, which may be divided into two major components. The initial classification pertains to digital technology, encompassing internet connectivity, digital financial transactions, online commerce, and electronic currency. The second category concerns the actual movement of people, goods, and services. The use of short-term steps to contain the spread of COVID-19 may impede globalization, however their detrimental effect on the global economy is evident. Global economic growth may be impeded by disruptions to tourist and international flights, as well as restrictions on commerce in products and services. The user's text is empty. Nevertheless, the heightened utilisation of materials from the first group might somewhat offset the effects of the second category. While several studies have assessed the economic repercussions of COVID-19 in relation to the loss in GDP, there is a worldwide pattern of growing acceptance and utilisation of Fintech, which comprises digital transfers, electronic money, and electronic commerce. Jonathan Fu and Mrinal Mishra examine the impact of the Covid-19 epidemic on digital banking and the adoption and use of FinTech in 71 countries. Moreover, it was shown that companies that were integrated into existing digital payment systems were better equipped to withstand the negative economic effects of the epidemic.

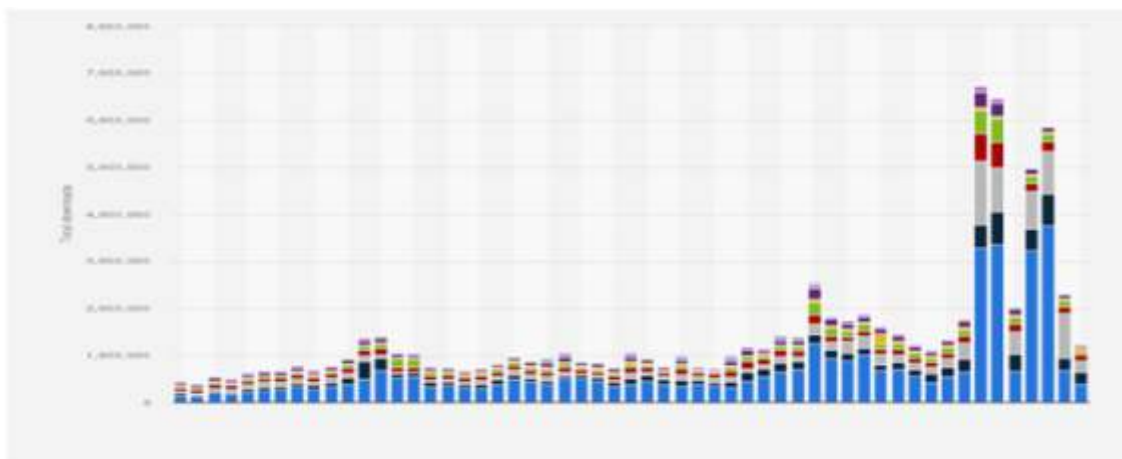


Figure 1: Global monthly downloads of financial applications 2017-2021. (<https://www.statista.com/>)

McKinsey research indicates that the adoption of digital technologies in emerging market countries can lead to substantial reductions in banks' annual expenses for customer service. These cost reductions include a decrease of 65-75% in expenses related to opening and maintaining accounts, a decrease of 40-60% in expenses related to cash issuance, and a decrease of 90-95% in expenses related to bank transfers.

From a regulatory perspective, the inclusion of digital financial services helps decrease the amount of physical money in the economy and plays a crucial role in controlling inflation. An analysis of Global Findex statistics indicates that the pace at which basic financial services are adopted does not consistently correspond to their degree of use, especially in the context of remote work. Typically, in the majority of affluent nations, less than 50% of the population make use of a smartphone or the Internet to connect to a bank account.

CONCLUSION

Although Covid-19 has had detrimental effects on both the economy and public health, it has also spurred the growth and broad use of financial technology, permanently equipping many individuals with the necessary skills to utilize them. The emergence of FinTech has undeniably introduced convenience, although it is not devoid of drawbacks. With the recent surge of FinTech, numerous established and rising enterprises have transformed their services into digital formats and incorporated provisions for financial services.

Consequently, individuals began utilizing these services that offer convenience to them. However, conventional enterprises, corporations, and financial institutions that have not yet included digitalization in their operations are at a disadvantage. Individuals employ the strategy that is most convenient for their needs. They may be reluctant to visit a physical store for purchasing, interact with a salesman, or endure lengthy queues at banks for obtaining loans, repaying them, or accessing other services. Hence, it is imperative for every bank, firm, or organization to employ financial technologies. The pace of time is accelerating, with the emergence of new competitors, and the growth of FinTech is now even more rapid. It will undeniably be beneficial for all individuals.

Additionally, we have the option to divide it by 2. Phase 1 encompasses a range of financial technologies, whilst Phase 2 focuses on more advanced blockchain technologies. The epidemic has resulted in significant harm, although it has also fostered the circumstances for the advancement and dissemination of FinTech.

The utilization of Financial Technology (FinTech) during the pandemic has resulted in the digitalization of a majority of businesses. The utilization of Financial Technology (FinTech) has undergone transformation amongst the pandemic. Due to the Covid pandemic, individuals accustomed to the conventional system may find internet purchases and financial transactions challenging, but they are compelled to adapt. They recognized the convenience of FinTech and persisted in its usage long after the pandemic era.

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