Journal of Contemporary Issues in Business and Government Vol. 28, No. 1, 2022
https://cibgp.com/

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

ROLE OF FINTECH AS A BUSINESS INNOVATION ECOSYSTEM- AN EMPIRICAL STUDY

Harikumar Pallathadka, Laxmi Kirana Pallathadka*

Manipur International University, Imphal, Manipur, India

*laxmikirana@miu.edu.in

Abstract

This paper analyses the advent of Fintech in the established ecosystem of businesses. There are ongoing innovations in the business environment, and Fintech has played a significant role in it. The fusion of digital technology and financial services has given rise to a concept called Fintech (Agarwal & Zhang, 2020). The ecosystem consisting of businesses flourishing in innovation is seen to adapt to Fintech to get a competitive advantage over other firms. The length and breadth of companies are rapidly widening with the emergence of Fintech. It gives rise to a centrally managed organization that has replaced the hierarchal system and turned into a fresh model. The disruption created by Fintech has helped many businesses to flourish by facilitating an innovative business ecosystem within their premises. There is little work associated with the role of Fintech in the ecosystem of businesses in evolution and development concerning pathbreaking innovative solutions. This study has tried to capture the essential aspects of Fintech and its application in several businesses and its innovative environment (Lee & Shin, 2018). It clarifies that the research about disruptive innovations and the creative environment in businesses is the need of the hour and deserves more attention than the present scenario. A sample of 189 people working in different financial sectors was surveyed to know the different roles and significance of Fintech as a Business Innovation Ecosystem in the financial sector. "Mean and t-test" was applied to analyze the data and results. It is found that Fintech is playing a significant part as a Business Innovation Ecosystem in the financial sector.

Key Words- Fintech, innovation, business, financial services, models, competitive advantage, ecosystem

Introduction

The evolving concept of Fintech is quite valuable for businesses. It is the application of technology in financial services, and it can inspire individuals with a lot of innovative products. For instance, lending money via person to person, crowdfunding, e-wallets, KYC processes are some of the services lying in the Fintech domain and are availed by people in

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

their everyday usages (Varga, 2017). Financial technologies have been in the market for quite some time now. However, digital solutions have brought several disruptions to the existing systems regarding cost, time and effort saving, and usable information. These technological disruptions have made the processes smoother, cost-efficient, and created a pathway for new business models. Financial services are in tremendous use because of lesser transaction costs and a considerable amount of information exchange (Gomber *et al.*, 2018).

The Fintech products are suited to individuals' needs. They are customized according to different purposes allowing users to purchase products from their preferred range of products. Economic forces still impact various factors in the digital era. Factors such as scope, scale, and economy network exist in different Fintech services, entailing activities related to funding and compliance, customer acquisition, capital, and information.

This study deals with the role of Fintech affecting certain economic conditions in a business environment and has an impact on the value chain entailing innovations and new developments. The factors which affect such changes in and around a business ecosystem led to valuable insights for the leaders and analysts for harnessing the best outputs of Fintech and at the same time eradicating the risks encountered while making innovations for thriving in the market (Enriques & Ringe, 2020). The attention is mainly given to technological and economic aspects. The business leaders understand that the industry needs innovative solutions for gaining a competitive advantage. Therefore, they are in a continuous process of harnessing the advantages of Fintech as they know it has a wide variety of products and services comprising of several sub-divisions that makes use of various economic structures and technologies.

Fintech has made its services accessible to large businesses (Weichert, 2017). It has provided an additional benefit by controlling the perimeters and increasing rivalry amongst competing enterprises. It has consistently given the **most outstanding** services for asymmetrical data, vying for market structure and financial intermediation on a global scale. The trick is to use innovation to stay up with the rising and evolving patterns in FinTech trends. It must be promoted from all directions, across and beyond, to guarantee that policymakers can consider **people's requirements and desires** and maintain an inclusive environment characterized by financial stability, consumer protection, and integrity. Fintech may result in a victory since it offers long-term advantages ideal for a creative company environment.

Literature Review

Financial services are disrupted by digital innovation. The new developments in financial services such as insurance technology, crypto-assets, marketplace lending, and others have shown a sparkling image in and around the globe. Fintech has already presented a positive and successful demeanor in the retail industry in the previous era. It has provided smooth access and convenient usage for different sectors that have lightened the burden of users dealing with an overwhelming amount of data. The digital innovations entailing AI, RPA, Cloud Services, Machine Learning, Ledger technologies, and so are developing the financial markets (Gejke, 2018). Many new enterprises have flourished in this digital era with the aid

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

of Fintech by applying their services to meet customer demands. The large multi-national companies have reported that Fintech is an essential technology that has conformed to the businesses' strategic requirements. There is a possible growth seen with the continuous use of Fintech in innovative ecosystems.

The banks view that the gaps in digitization must be closed (Tornjanski et al., 2015). The areas such as customer offerings, product segmentation, and development must be catered to. They must compete with large Fintech firms and enormous enterprises about technology as they have made their entry into the Fintech domain. Banks fear such massive competition because these innovations and developments have made the market very competitive and diverse. It has also created an inclusive and efficient ecosystem wherein there is more amount of concentration. Colossal competition and vast inclusion have been introduced by innovation mostly in areas that are prone to development and consist of emerging markets. It is said that Fintech has played a vital role in the lesser developed financial system areas (Demertzis et al., 2018). It has shown positive results and creates opportunities for other firms to grow simultaneously.

Nonetheless, the hidden financial issues associated with intermediation, along with innovation, may concentrate the attention of both traditional and new providers of monetary administrations. Monopolistic or anti-competitive behaviors by massive invention phases are being researched at present. As financial services move toward similar innovation-driven designs, business leaders grapple with the prospect of regulating, directing, and administering a region that new competitors and business plans increasingly describe; and to address similar challenges to financial dependability, monetary integrity, reasonable competition, and consumer rights protection, including data privacy (Meng et al., 2021). The pandemic in the current scenario has led to a digital revolution. The most critical need for the hour is connectivity, and digital awareness as the physical meetups and communication between the service providers and consumers had come to a halt. This was important because the transactions had to be done online for most businesses. Even after the post covid situation, the companies are likely to follow the new methods. For example, individuals and businesses have already done huge transactions via digital payment methods during the pandemic (Vasenska et al., 2021). This has significantly accelerated the use of e-commerce for buying different products, which has served as an advantage for technology firms and their activities about finance. The countries bound with strict rules during the pandemic have seen colossal revenue growth, especially in the financial firms, as the residents had downloaded the financial apps in huge numbers. The load on the central bank has seen a relative growth as transactions related to digital currencies have also seemed to speed up.

In several other industries, the centralization of activities within financial services has surpassed the significant agents and challenges related to non-aligned information to align the interests and check the actions. This has brought about trustworthy data challenges within different teams. There is close coordination among teams when the information is centralized, and anyone can find the real-time status of allocated funds. The execution of payments and financial boards can be clubbed together to confirm whether funds are available before any

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

transaction occurs. This is advantageous to giant firms because they must take big decisions related to funding transfers. The centralization of such processes makes it easier to participate in strategic decision-making.

Firms can build new products which cater to investments in response to the market situation with the help of trading, sales, and underwriting (Rajapathirana & Hui, 2018). Although technology has been in the financial industry for quite some time now, several loopholes and restrictions still lie in the operations of businesses. Since many financial services were cleared by the end of the twentieth century, the new era of digitization and innovation was already a great hit in the business world. Certain transactions had to be done via checks and cash, and some of the products and services had to be procured employing papers and done in person. Otherwise, the world was already seeing an upsurge in the innovation ecosystem.

Specific tasks, such as regularly engaging and talking with customers, required physical presence. These operations necessitated the establishment of fundamental infrastructures, such as organization branches and automated machinery. Consumers who wanted to connect with and do business with other businesses via their banks were had to pay a high fee in total, and the procedure was also lengthy. This also included danger because wire transfers were involved. Individuals have long been concerned about their privacy. Even after implementing digital payment and dematerialized securities, the connection remained restricted. Institutions were required to get a license, and banks were required to pay a brokerage fee to participate in a network of transactions (Beirovi et al., 2017).

Data processing and storage remained an issue for organizations, and it necessitated the construction of massive data centers to house the flood of information that was flooding the world. As a result, the data obtained was restricted due to the inability to preserve it appropriately. The analysis and sharing of data were issues for organizations' cross-functional teams. Data analysis is critical because it lays the path for innovation and fosters the development of a learning organization as a whole. Technological advancements have resulted in improved connection, data processing, and storage capacity, all of which have benefited business (Chen et al., 2016)

The digital age ushered in mobile and internet technologies, enabling people to transmit critical data and connect remotely, with companies, or directly with customers. Mobile technology has aided in enhancing, improving, and efficiency of product and service delivery. These advancements have created room for collecting massive amounts of data that can be distilled down to the most pertinent information to generate more new insights. It benefited from the development of new business analysis methodologies and models.

The globe has shrunk as the connection has improved, and enormous amounts of time have been saved. Since communication improved with the advancement of technology, data volumes rose proportionately, as they are proportional to one another. Data processing entails organizing, analyzing, and verifying information using various tools and methods, including artificial intelligence, machine learning, and robotic process automation (Kim, 2019). The data is computationally sorted to provide significant insights applicable to organizations'

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

creative ecosystems. The massive amount of data contains vital information. This massive amount of data is often referred to as Big Data. It has four critical characteristics: diversity, velocity, truthfulness, and volume. This data has expanded in usage due to the digitization of corporate processes. It demands cost-effective storage and very high computing power to remain relevant for industry advancements to occur.

Big data arises from several sources, mainly from intelligent devices and locations, social networks, and information related to delivery while the big enterprises perform logistics operations. Sales data from the stores and other networks associated with payments also plays a role in gathering data. This data is helpful for pathbreaking innovative solutions, especially in the financial services domain. This is also advantageous for flourishing businesses to improve credit facilities, analysis, performance efficiency, product design, risk management, consumer services, etc. For instance, "trusting social" considers all the call records to develop credit scores. "Tenda Pago" uses the order information from the consumer products for working on capital loans.

Data is the primary force that propels an economic organization. The advancement of technology in inventions has resulted in the emergence of new business models. Cloud computing is one such example (Oztemel & Gursev, 2020). It allows enterprises to connect to data centers located in remote locations and provides a cost-effective method of storing massive amounts of data. The opportunity exists in adhering to the fundamental needs, which include identifying the best infrastructure, minimizing additional expenditures, and providing adequate services. Innovation satisfies all business requirements. Fintech's acceptance as a strategic tool has increased globally.

Another outcome of technological growth has been shown above. It was one of the platform-based business concepts. FinTechs, prominent specialists, and, shockingly, some incumbents have gradually shifted their focus to acting as "matchmakers" between diverse customers and providers on their platform (Zetzsche et al., 2020). These companies impact the network of people and organizations and their ability to collaborate quickly and efficiently, identify business stakeholders, and package and distribute various digital and physical goods and services.

These platforms are essentially two-sided or multi-sided marketplaces that benefit from network effects that increase the incentive for each participant as the number of other members increases. The financial crisis spurred the growth of the fintech system; it served as a reminder to people of how seriously financial institutions handled a large portion of their clientele. Instead of working for traditional banks, the graduates shifted their focus to innovation. The ability of the UK to nurture open financial frameworks and linked innovation is another critical component of economic prosperity. The United Kingdom is ranked fourth on the Global Entrepreneurship and Development Index (GEDI) (Nguyen, 2019). Controllers in an emerging and ever-increasing FinTech center have started setting up devoted FinTech and innovation units inside their premises to take on FinTech improvements with a more engaged group. These units are set up with specialists who have a profound knowledge of

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

business models based on FinTech services and the fundamental innovations empowering them with solutions, just as a careful comprehension of public and worldwide regulatory and administrative systems.

To remain current with rapidly altering FinTech trends, development should be transmitted from inside and past to ensure controllers maintain their critical command of financial strength, consumer safety, and integrity (Kang, 2018). Controllers should anticipate that developing a business model would need industry commitment and regulations. While regulating growth, regulators are constantly faced with balancing conflicting requirements, such as market expansion and competition, with the financial framework's uprightness, security, and dependability.

The organizations are devoted to establishing a foothold in the commercial world by embracing FinTech and equipping themselves with the potential to advance in financial incorporation. Simultaneously, there is a situation in which awareness of the critical role of regulatory capabilities in the development of FinTech ecosystems grows. For example, various AFI countries, including Tanzania, the Philippines, and Kenya, are implementing a proportional number of administrative systems and using a "test and learn" mechanism to drive creative organizations. These techniques might be precursors to the "administrative sandbox" for FinTech that has been implemented in over thirty jurisdictions worldwide.

The objective of the study

1. To know the different Roles of Fintech as a Business Innovation Ecosystem.
2. To know the significance of Fintech as a Business Innovation Ecosystem in the financial sector.

Research methodology

A sample of 189 people working in different financial sectors was surveyed through a structured questionnaire to know the different roles and significance of Fintech as a Business Innovation Ecosystem in the financial sector. The nature of the study is empirical, and the data collection method used was random sampling. "Mean and t-test" was applied to analyze the data and get the results.

Findings of the study

Table 1 demonstrates the general profile of the respondents, which shows that a total of 189 people were surveyed to conduct the present study, of which 54.5% were male, and 45.5% were female. Among them, 30.2% were from the age group 27-32 yrs, 40.7% belonged to the age group 32-47 yrs, and the rest, 29.1%, were above 47 years of age. 25.9% of the respondents worked in the insurance sector, 28.1% were from the banking sector, 19.6% belonged to the corporate sector, and 26.4% worked in some other financial sectors.

Table 1 General detail of the respondents

Journal of Contemporary Issues in Business and Government Vol. 28, No. 1, 2022
https://cibgp.com/

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

Variables	No. of respondents	Percentage
Gender		
Male	103	54.5
Female	86	45.5
Total	**189**	**100**
Age		
27-32 yrs	57	30.2
32-47 yrs	77	40.7
Above 47 yrs	55	29.1
Total	**189**	**100**
Occupation		
Insurance sector	49	25.9
Banking sector	53	28.1
Corporate sector	37	19.6
Financial sector	50	26.4
Total	**189**	**100**

Table 2 Role of Fintech as a Business Innovation Ecosystem

SI. No.	Role of Fintech as a Business Innovation Ecosystem	Mean score	t value	Sig
1.	Fintech helps bring transparency to the blockchain and get a competitive advantage over other firms	3.13	1.94	0.03
2.	Fintech is reducing complexity and ambiguity in the insurance sector	3.97	12.02	0.00
3.	Fintech is enhancing opportunities and facilitating larger financial inclusions	3.39	5.46	0.00
4.	Fintech has helped many businesses to flourish by facilitating an innovative business ecosystem within their premises	3.17	2.26	0.01
5.	Fintech is helpful in "Data analytics" and enhances its offerings and capabilities	3.69	8.31	0.00
6.	Fintech innovation is contributing to giving a better customer experience that is affordable.	3.53	7.92	0.00
7.	Fintech innovation is offering fewer transaction costs along with a vast amount of information exchange	3.83	10.28	0.00
8.	Fintech provides better economic conditions to the business environment by involving innovations and new developments.	3.91	12.73	0.00
9.	Fintech helps in regulating the perimeters and elevating the competition among other firms	3.11	1.47	0.07
10	Fintech is working as matchmakers between various clients and suppliers on their platform	3.90	10.85	0.00

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

Table 2 shows the different Roles of Fintech as a Business Innovation Ecosystem. It is observed that Fintech is reducing complexity and ambiguity in the insurance sector with a mean score of 3.97, and Fintech is providing better economic conditions to the business environment by involving innovations and new developments with a mean score of 3.91. Fintech is working as a matchmaker between various clients and suppliers on their platform with a mean score of 3.90. Fintech innovation offers fewer transaction costs and a tremendous amount of information exchange with a mean score of 3.83. The respondent says that Fintech is helpful in "Data analytics" and enhances their offerings and capabilities with a mean score of 3.69. Fintech innovation contributes to a better customer experience, which is affordable with a mean score of 3.53. Fintech is enhancing opportunities and facilitating more extensive financial inclusions with a mean score of 3.39. Fintech has helped many businesses flourish by facilitating innovative business ecosystems within their premises, with a mean score of 3.17. It is also believed that Fintech helps bring transparency in the blockchain and get a competitive advantage over other firms with a mean score of 3.13. Fintech helps regulate the perimeters and elevates the competition among other firms with a mean score of 3.11. Further t-test was applied to check the impact of all statements in which the value in the significant column for the statements is below the significant value (0.05).

Conclusion

The relevance of Fintech and its role in the evolution of creative ecosystems has been discussed in this paper. Nations worldwide are placing a greater focus on the revolution brought about by Fintech and its role in the transformation of financial administrations. In certain jurisdictions, it has been used to advance financial incorporation. In contrast, it has been implemented in response to growing public demand for more creative financial administrations and improved user interfaces. Individuals from the AFI network monitor global trends that alter how financial administrations look and have highlighted controllers' responsibility to establish regional and territorial FinTech ecosystems in their countries (Gabor & Brooks, 2017). Financial inclusion is critical for assisting impoverished people and those who are burdened and indebted with their livelihoods—providing individuals with appropriate access to financial administrations or financial services, such as savings, insurance, payments, and credit. Also, it enables them to meet their financial obligations and build better prospects for their families while also contributing to overall financial development, improvement, and poverty reduction. As a result, the AFI's Digital Financial Services (DFS) Working Group has been working on the FinTech for Financial Inclusion workstream. Which believes that when combined with empowering policies, guidelines, and strategy, FinTech has the potential to advance financial inclusion in innovative ecosystems spanning the length and breadth of businesses worldwide.

The study concludes that Fintech serves various functions as a business innovation ecosystem, including reducing complexity and ambiguity in the insurance sector. It also improves economic conditions for businesses by incorporating innovations and new developments, acting as matchmakers between diverse clients and suppliers on their platform, and offering low transaction costs in exchange for massive data exchange. Additionally, it is

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

determined that Fintech, as a Business Innovation Ecosystem, plays a critical role in the financial sector.

References

1. Agarwal, S., &Zhang, J. (2020). Fintech, Lending, and Payment Innovation: A Review. *Asia- Pacific Journal of Financial Studies*, *49*(3), 353-367.
2. Bećirović, S., Plojović, Š., & Ujkanović, E. (2017). Mobile Network Operators as Banks–Opportunites and Threats. *TEM Journal*, *6*(3), 618.
3. Chen, N. S., Cheng, I. L., &Chew, S. W. (2016). Evolution Is Not Enough: Revolutionizing Current Learning Environments to Smart Learning Environments. *International Journal of Artificial Intelligence in Education*, *26*(2), 561-581.
4. Demertzis, M., Merler, S., &Wolff, G. B. (2018). Capital Markets Union and The Fintech Opportunity. *Journal Of Financial Regulation*, *4*(1), 157-165.
5. Enriques, L., &Ringe, W. G. (2020). Bank–Fintech Partnerships, Outsourcing Arrangements and The Case for A Mentorship Regime. *Capital Markets Law Journal*, *15*(4), 374-397.
6. Gabor, D., &Brooks, S. (2017). The Digital Revolution in Financial Inclusion: International Development in The Fintech Era. *New Political Economy*, *22*(4), 423-436.
7. Gejke, C. (2018). A New Season in The Risk Landscape: Connecting the Advancement in Technology with Changes in Customer Behavior to Enhance the Way Risk Is Measured and Managed. *Journal Of Risk Management in Financial Institutions*, *11*(2), 148-155.
8. Gomber, P., Kauffman, R. J., Parker, C., &Weber, B. W. (2018). On The Fintech Revolution: Interpreting the Forces of Innovation, Disruption, And Transformation in Financial Services. *Journal Of Management Information Systems*, *35*(1), 220-265.
9. Kang, J. (2018). Mobile Payment in Fintech Environment: Trends, Security Challenges, And Services. *Human-Centric Computing and Information Sciences*, *8*(1), 1-16.
10. Kim, J. B. (2019). Implementation Of Artificial Intelligence System and Traditional System: A Comparative Study. *Journal Of System and Management Sciences*, *9*(3), 135-146.
11. Lee, I., &Shin, Y. J. (2018). Fintech: Ecosystem, Business Models, Investment Decisions, And Challenges. *Business Horizons*, *61*(1), 35-46.
12. Meng, S., He, X., &Tian, X. (2021). Research On Fintech Development Issues Based on Embedded Cloud Computing and Big Data Analysis. *Microprocessors And Microsystems*, *83*, 103977.
13. Nguyen, H. T. T. (2019). Applying the Global Entrepreneurship Development Index Methodology to Assess the Entrepreneurship performance in Vietnam. *Current Politics and Economics of South, Southeastern, And Central Asia*, *28*(2/3), 307-345.
14. Oztemel, E., &Gursev, S. (2020). Literature Review of Industry 4.0 And Related Technologies. *Journal Of Intelligent Manufacturing*, *31*(1), 127-182.
15. Rajapathirana, R. J., &Hui, Y. (2018). Relationship Between Innovation Capability, Innovation Type, And Firm Performance. *Journal Of Innovation &Knowledge*, *3*(1), 44-55.

P-ISSN: 2204-1990; E-ISSN: 1323-6903
DOI: 10.47750/cibg.2022.28.01.039

16. Tornjanski, V., Marinković, S., Săvoiu, G., & Čudanov, M. (2015). A Need for Research Focus Shift: Banking Industry in The Age of Digital Disruption. *Econophysics, Sociophysics &Other Multidisciplinary Sciences Journal (ESMSJ)*, *5*(3), 11-15.
17. Varga, D. (2017). Fintech, The New Era of Financial Services. *Vezetéstudomány-Budapest Management Review*, *48*(11), 22-32.
18. Vasenska, I., Dimitrov, P., Koyundzhiyska-Davidkova, B., Krastev, V., Durana, P., &Poulaki, I. (2021). Financial Transactions Using FINTECH During the Covid-19 Crisis in Bulgaria. *Risks*, *9*(3), 48.
19. Weichert, M. (2017). The Future of Payments: How Fintech Players Are Accelerating Customer-Driven Innovation in Financial Services. *Journal Of Payments Strategy &Systems*, *11*(1), 23-33.
20. Zetzsche, D. A., Birdthistle, W. A., Arner, D. W., &Buckley, R. P. (2020). Digital Finance Platforms: Toward A New Regulatory Paradigm. *U. Pa. J. Bus. L.*, *23*, 273.
21. Pallathadka, H., Hari Leela, V., Patil, S., Rashmi, B. H., Jain, V., & Ray, S. (2021). Attrition in software companies: Reason and measures. *Materials Today: Proceedings*, XXXX. https://doi.org/10.1016/j.matpr.2021.05.596
22. Pallathadka, H., Ramirez-Asis, E. H., Loli-Poma, T. P., Kaliyaperumal, K., Ventayen, R. J. M., & Naved, M. (2021). Applications of artificial intelligence in business management, e-commerce, and finance. *Materials Today: Proceedings*, XXXX. https://doi.org/10.1016/j.matpr.2021.06.419
23. Pallathadka, L. K., & Pallathadka, H. (2020). Measurement of the Effectiveness of Moral Development Present in Business Ethics. *European Journal of Molecular & Clinical Medicine*, *07*(11), 2020.
24. Pallathadka, H., Pallathadka, L.K. (2022). Critical Analysis of Fintech as a Change Agent in the Financial Markets: A Quantitative Investigation. *Journal of Applied Science And Research*, 10 (1), 72-81.