FINTECH: FRAUD IN FINTECH FROM THE PERSPECTIVE OF INDIVIDUAL USERS

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Abstract

The coming together of financial services and digital technology, has transformed how financial services are delivered and consumed. In this digital and intelligent age, repetitive, time-consuming, and redundant duties are now handled by computers, freeing up finance experts' time for higher level, more profitable analysis and research. Fintech is the future, which covers a large scope for not only Finance professionals' but also experts of different sector. Fintech initiatives have highlighted a significant restructuring in the management of financial offerings by challenging the traditional financial institutional framework's fundamental existence. The exponential growth in Fintech usage points to greater financial inclusion and progress. This study sheds light on the concept of fintech and risk of fraud attached to its advancements. The research papers that emphasise the perception of Individual users towards Fintech Fraud in Kerala. The results point to a substantial relationship between the Fintech usage and its risk between different age groups. Fintech is transforming the financial sector landscape rapidly and is blurring the boundaries of both financial firms and the financial sector but at cost of increased fraud cases.

Key words:- Fintech, Fraud, Digital transformation, Perception, Competitive advantage.

As the term suggests, FinTech is the confluence of financial and technology. Technology has always had an impact on the financial sector, with developments altering how it functions. Consider, wire transfers or the advent of ATMs as two examples of important advancements. FinTech is described as "technologically enabled financial

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innovation that could result in new business models, applications, processes or products with an associated material effect on financial markets and institutions and the provision of financial services" (Financial Stability Board, 2021)

FinTech is mostly focused on innovation that results from technological improvements and has its impact on the financial industry's service pillar. With the purpose of promoting financial offerings with the supremacy of technology, finance and information technology are combined. Financial services had evolved into a mostly digital sector that rely on electronic exchanges between financial institutions, players in the financial market, and clients all over the world. FinTech offers a lot of potential and a wide range of development options, thanks to the advancement of big data, cloud computing, artificial intelligence, and block chain. (Gomber et al., 2017, pp. 538–545)

The scope of FinTech activities started from mobile payments, money transfers, peer-to-peer loans, and crowd funding, spreading to the latest world of block chain, crypto currencies, and robot-investing. Start-up firms with new technology are racing to fill the gaps in the customer experience left by traditional firms in all these aspects. The financial sector has benefitted from innovative and more cost-effective products as a result of the automation of many financial processes, including lending, asset management, portfolio advisory, and payment systems. Lower financial intermediation costs and better consumer products could be the outcome of the deployment of innovative methodologies. FinTech facilities, for instance, may serve to improve the interface between financial clients and their service providers and better assess the creditworthiness of loan applicants.

FinTech promotes the expansion of the financial sector. In order to lessen information asymmetry, using FinTech it will be simpler to gather and evaluate data in the financial market. Artificial intelligence and big data-based trading and investment techniques can reinvent the financial market's price discovery mechanism and increase transaction speed, fostering the market's liquidity and boosting its efficiency and stability. It helps the regulators to effectively analyse and prevent systemic risks in the financial market. By integrating big data and artificial intelligence, FinTech also lowers staff duplication and labour expenses.(Li & Xu, 2021, pp. 2–3) The development and use of FinTech enables more people, to access financial services more easily and affordably while also sharing more reform outcomes. For instance, mobile payments in our nation aid in the economic and financial development.

FinTech promotes financial innovation, profitability, and risk management. Moreover, FinTech can enhance the conventional business model by lowering operating costs, enhancing customer service effectiveness, bolstering risk management capabilities, and developing more customer-focused business models for consumers, increasing overall competitiveness. (Panchal and Krishnamoorthy 25–39; Brynjolfsson et al. 473–77;Wang and Zhang 2–10). FinTech innovations are an integral part of business strategy for the financial and banking industry. Financial institutions that

strategically take advantage of the adoption process can benefit from FinTech developments. This results in increased performance and increased competition in the existing market. (Momaya, 2020, pp. 5–8;Dash & Sharma, 2022, pp. 163–165). The ACCA research highlights 10 positions for certified public accountants in the FinTech industry and demonstrates how their contributions and skill sets benefit the companies they represent.(ACCA, 2022)

The organization plays a vital role in ensuring the successful and effective adoption of technological change by employees, existing systems, and processes by effective change management of technology implementation. Effective training of customers, employees, and stakeholders is necessary to increase stakeholder's flexibility, which is required for FinTech adoption related changes. (Simoes & Esposito, 2014, pp. 326–341). The management will decide if the adoption of innovation and technology will take place gradually in phases or if a comprehensive project overhaul in favour of innovation and technology will take place. It includes references to open and transparent communication, which is essential when managing change strategically. In order to prevent resistance to change from individuals for whom the technology was originally created and employed, effective communication is of the utmost importance.(R. Dwivedi &Momaya, 2003, pp. 26–31)

2. Significance of Study

FinTech fraud can also lead to substantial economic losses, affecting individuals, businesses, and governments. By examining the exposure of individual user towards fraud, researchers can help policymakers and organizations develop strategies to mitigate its effects. FinTech fraud can have far-reaching social implications.

3. Statement of the Problem

Even though there are lot of tools to mitigate the risk due to FinTech Fraud, the volume of cases being registered are in rise. Most of the time policies are framed from the perspective of corporates, government and other institutions, there are limited studies that focus on individuals perspective towards risk of fraud.

4. Objectives of the Study

1. To understand FinTech and its development in finance sector.
2. To evaluate individual FinTech users perception about their exposure to FinTech fraud risk.

5. Scope of the Study

Understanding the level of exposure to risk of fraud between different age group is necessary, to decide on the intensity and effective method with which the awareness about risk due to fraud is to be communicated among different age group.

6. Methodology

For this study both primary and secondary data were used. Primary data for the study were collected from FinTech users in Kerala. Snowball sampling technique was used to carry out the survey and google forms were distributed to obtain the primary data. Previous

researches, articles, and books were referred for secondary data.

7. Literature review

7.1 FinTech and its Advancements

A number of cutting-edge, developing technologies are the driving forces behind FinTech, an acronym for financial technology. A number of new business models, technological advancements, and product and service innovations have a big impact on the financial industry and the availability of financial services. It has gained widespread attention due to its benefits in increasing operational effectiveness, effectively lowering operating costs, upending established industry structures, erasing boundaries between industries, facilitating strategic disintermediation, opening up new doors for entrepreneurship, and decentralizing access to financial services (Loubere, 2017, pp. 9–18); (Radoviæ-Markoviæ et al., 2019, pp. 2–6); (Carvalho et al., 2021);(Paulet & Mavoori, 2020, pp. 25–29)). Some examples of FinTech services in finance sector include digital cash, digital currency, digital payments, digital invoicing, crypto-currency, digital mortgage, digital remittance, digital investment, digital leasing, cash management, digital advising, digital factoring, digital insurance, crowd funding, digital lending. The foundation of the future of FinTech lies in purposeful, coordinated efforts from the part of employees and organisations to enhance the framework conditions linked to customer trust, regulation, and scalability.(Anne-Laure, 2020, pp. 59–72).

The connection between FinTech and competitiveness has been the subject of numerous research. (Wang & Zhang, 2022, pp. 100–128;P. Dwivedi et al., 2021, pp. 130–138). Technology adoption is significantly influenced by competitive advantage. Competitive advantage has demonstrated a favorable link with product usage intentions (Joshi et al.,6-15). The researchers presented conclusively demonstrates that users' attitudes are significantly influenced by the technology's competitive advantage. (Lu et al., 2011, pp. 92–96; Rhodes et al., 2008, pp. 256–258;Kamukama et al., 2011, p. 163;Shih & Fang, 2004, pp. 215–219).In order to achieve effective objectives in the financial sector as a result of the development of technology proper communication about the technology and continuous monitoring, management, and control of financial services is necessary. (Fernando et al., 2018, pp. 285–288).

7.2 FinTech and Fraud

The FinTech sector has grown as a result of the digital age, providing users with easily accessible and practical financial solutions. FinTech has unfortunately become one of the main targets of fraud, which has also continuously innovated. FinTech professionals are aware that fraud is a growing concern. (Pandiya et al.,2003; Pratiwi et al., 2022)Risk and compliance teams must prioritise a prevention and detection strategy that will keep their businesses and clients safe from new risks as the number of fraud cases rises.(Abdul-Rahim et al., 2022; Basrowi et al., 2019).

Five major types of FinTech Fraud include:

- ***Social engineering*** - Social engineering is when criminals trick

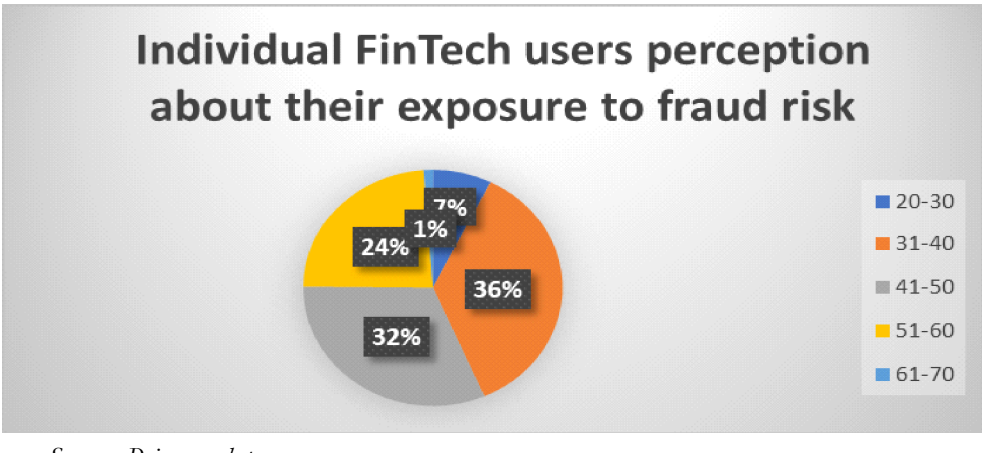
their victims into disclosing private information (such account passwords) or sending money in ways that are difficult to track down, including through real-time payments or crypto-currency.

- ***Presentation attacks*** - A presentation attack happens when a fraudster impersonates another person to access their online accounts by using their physical characteristics or biometric information, such as a phoney fingerprint or photo.
- ***Synthetic identity fraud*** - In order to circumvent identity verification procedures while applying for financial accounts, fraudsters often blend legitimate personal information, such a social security number, with fictitious information, like a new name or date of birth. Children, the elderly, and those without housing are the most typical victims of this kind of fraud since they are less likely to utilise credit or keep track of their credit history.
- ***Account Takeover*** - Account takeover (ATO) occurs when fraudsters use techniques like credential stuffing, password alterations, or email changes to access financial accounts. ATO fraud caused $11 billion in damages in 2022.
- ***Payments (ACH) fraud*** - Bad actors that have access to bank account information may commit ACH fraud by using the transactions to forcibly withdraw (debit) money from the accounts.

The Associate of Finance Professionals reports that 82 per cent of organizations reported payment fraud occurrences in 2018. According to Forbes, identity fraud cost financial institutions $56 billion in losses in 2020.

Figure I

Individual FinTech users perception about exposure to fraud risk while using FinTech tools



Source: Primary data

8. Data Analysis

8.1.General Findings

Total of 180 responses were received, out of which 177 responses were taken into consideration. The sampling data had a validity rate of approximately 0.68.

In response to question, 36 per cent of respondents in the age group of 31-40 years consider themselves to be highly exposed to fraud from using FinTech tools. 32 per cent of respondents were in the age group of 41-50 years of age. Only a small minority (1 per cent) in the age group of 61-70 years strongly agree with the statement that they are exposed to fraud while using FinTech tools. This illustrates that younger generation are at a higher risk of exposure to fraud, due to frequent usage of FinTech tools in their daily life. Individuals at the age group of 61-70 years and 20-30 years are more vigilant and their usage is limited to few transactions.

8.2.Correlation Matrix

Table I

Correlation between Age and Usage frequency of FinTech Tools

	Age	Usage
Age	1	
Usage	-0.7567795	1

Source: Primary data

The data shows a negative correlation between age and Usage frequency of FinTech Tools. This illustrates that as the age increases the usage of FinTech tools decreases. This shows a withdrawal attitude towards technology usage as the age increases, as they are more comfortable to have personal assistance due to high risk of fraud.

Table II

Correlation between Risk of Fraud and Usage frequency of FinTech Tools

	Usage	Risk
Usage	1	-
Risk	0.96082719	1

Source: Primary data

The table illustrates a strong positive correlation between risk of fraud and usage frequency of FinTech tools. Thus as the usage increases, individuals are more exposed to fraud and risk of loss as there might be an increased tendency of ignorance to details. Daily usage makes the process easy and flexible thus leading to higher ignorance of details.

9. Limitation

The sample size was too small, it was only collected over a short period of time. Since snowball sampling was used it did not cover all regions.

10. Conclusion

Block-chain, big data, machine learning, artificial intelligence, and the digital economy have all advanced in ways that help FinTech develop. In any industry, top management is crucial to managing technological change and innovation. Top management plays an important role in managing technological change, innovation and providing protection against fraudulent activity.

A reliable system for detecting and preventing fraud should be able to identify

fraudulent transactions and flag them for further investigation. Fraud detection and prevention are continual tasks. The FinTech industry is expanding with the release of cutting-edge solutions that employ artificial intelligence to detect and prevent fraud, much like how con artists constantly come up with new ways to scam financial institutions. Despite the best intentions and efforts of fraud prevention programmes and cyber security procedures, malicious actors are constantly looking for vulnerabilities on the internet to exploit. One such instance is social engineering, where the objective is to manipulate individuals. The strongest line of defence against this menace is education and awareness. The early detection of malware and harmful bots that could infect your servers or data, however, is equally important. By protecting sensitive client data, businesses must maintain a constant state of alertness in combating fraud.

Findings of the study propose that the risk of loss due to fraudulent practices are high among age group of 30-60 years. Increased daily usage and ease of handling the tool makes individuals less alert about the fraudulence. There is higher chance that they might ignore the awareness messages and get involved. Aged people are more comfortable towards face to face assistance as they want to avoid the risk of loss and are more comfortable with personal assistance. High level of awareness among the youth is necessary as they are the most prone victims.

Research support the necessity of financial regulation in the FinTech industry. As so many advancements are taking place at rapid pace there is a challenge for financial regulators to achieve improve supervision, reduce finance risk and increase network security. Data security and privacy are crucial issues in the development of FinTech, hence studies have been done that suggest approaches to data-based processes, like strong authentication features. (Burke & Greenglass, 2001, p. 95)

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