

## **SWOT Analysis of Financial Technology in the Banking Industry of South Sulawesi: Banking Survey in South Sulawesi**

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**Abstract:** This study aims to analyze financial technology using SWOT analysis in the banking industry in South Sulawesi. The type of research used in this study is a qualitative research method with a descriptive approach. The research will describe the SWOT analysis Financial Technology for the banking industry in South Sulawesi. Qualitative research aims to obtain a complete picture of a thing according to the human perspective studied. Financial Technology, which is implemented provides strengths, weaknesses, threats, opportunities for the banking world simultaneously so that bankers must improve information technology infrastructure in order to collaborate with financial technology. Further research is expected to be able to analyze the entire territory of Indonesia, due to time constraints, this study is only limited to one province in Sulawesi, namely South Sulawesi Province. The SWOT method analyzes internal strengths and weaknesses as well as opportunities and threats. SWOT is a simple way to estimate the best way to do a strategy.

**Keywords:** SWOT Analysis, Financial Technology

### **Introduction**

The financial services industry, especially the banking industry, is seen as a pioneer sector in the use of information technology (IT) (BARRAS, 1986, 1990) in recent years. The digital economy has a significant impact on development in Indonesia. The report from Oxford Economics (2016) mentions the existence of Information and Communication Technology (ICT) contributing significantly to the Gross Domestic Product (GDP) and the number of jobs in Indonesia.

The quality of banking services in Indonesia is expected to increase significantly, in order to be able to reach the entire community, but in fact, the quality of banking services in Indonesia is currently still lacking in accessing the community, especially between regional districts. The financial presence of technology or financial technology, which has several advantages, one of which is able to reach all levels of society, including remote areas, which are difficult to reach by bank's financial technology also serves personally and reaches out to people who have not been able to access banking services at all.

According to (Romanova & Kudinska, 2016) in the modern economy, the financial services industry has become one of the key contributors to the country's domestic products. Financial technology has become an integral part of banking, and currently, banks have begun to compete with financial services that face increasing competition from non-financial institutions. As a result, traditional banks begin to lose some of their shares. Financial technology development has a big impact on banks, because many information-based banking products and therefore can be purchased from different financial service providers. On the other hand, modern methods of data analysis and IT allow many individuals to choose digital financial services. Increased potential threats to the banking industry can be easily identified, lack of intensive knowledge of products/services (payments, simple deposit products, account flows, and consumer credit). But timely collaboration with financial technology companies can help banks create new opportunities.

The Financial Services Authority (OJK) continues to encourage the financial services industry such as banking to be able to synergize with the financial technology industry (Financial technology) so that these two industries can grow together and not compete for market share. However, what is happening now is that most of the financial sector (banking) sector actors remain silent seeing financial technology grow and develop (Christine, CNN Indonesia).

According to McKinsey CONSULTING: BANKS that follow and use the latest technology will be able to increase net profit by 45%. While banks that do not follow and do not use them will experience a 35% decrease in net profit.

According to Wonglimpiyarat (2017) in his research shows the systemic characteristics of financial technology-based innovations in the banking industry, both on a global scale and in Thailand. The analysis shows that systemic characteristics of the innovation process are the result of the interaction between innovation complexity and the ability of innovators to manage innovation. Deep implications on the systemic nature of innovation provide a trend and direction for the development of financial technology-based innovations in the banking industry.

Financial technology (or financial technology) is seen as one of the technologies that will revolutionize the financial services industry. Financial technology is the latest financial service as a solution for integrated IT users. Financial technology payment innovations offer a new landscape in the digital age of the financial industry.

According (Thompson, Shim and Shin, 2017), that financial technology provides a platform for banks and non-banks to facilitate easier and affordable cross-network transfers and payment services. The above phenomenon also occurs in South Sulawesi, because the people of South Sulawesi already use the internet and financial technology can be accessed by using a Smartphone, thus encouraging researchers to conduct research on financial technology SWOT Analysis in the banking world of South Sulawesi.

According to (Australian Government: Productivity Commission, 2016: 15) the term disruptive innovation was introduced by Clayton M. Christensen in 1997. He said that disruptive innovation is a form of disturbance carried out by newcomers in various aspects of life. Newcomers compete with old established companies. These newcomers use the principle of disruption in making the products they want and can accept on the market.

In terms of innovation, two concepts are quite popular; sustaining innovation and disruptive innovation. The first concept describes innovations that do not create new markets but make changes in existing markets by providing better value so that they can compete with others. The concept of disruptive innovation explains changes in business and technology that improvise products or services in ways that the market never thought of being for. In the technology industry, both concepts are aware of being unconsciously able to determine the future of the company. On the one hand, because technology and business relations can influence each other, technology can change business processes and can also change how technology develops, on the other hand, because consumer expectations for technology are high and increasing. Christensen (1997).

Chanche Hang et al (2013) says that Annoying Innovation (DI) is a process in which service products are rooted in applications initially at the bottom of the market, and then relentlessly move up, finally displacing stable competitors. According to Utterback and Acce, disruptive innovation theory has also been extended from its original formulation to more general strategies for market expansion. Meanwhile, Maitrayee Ghosh (2017) stated: "Annoying innovation is technology that transforms conventional business models into new business models as expected consumption and can provide greater value through a low-cost economy, consequently the presence of various services and products with more attractive and affordable prices in all circles, the phenomenon of technological innovation has brought the world to change faster than before, but the old players need not worry there are many strategies that can be taken by the incumbent, one of which is to innovate so that they can survive with the disruptors.

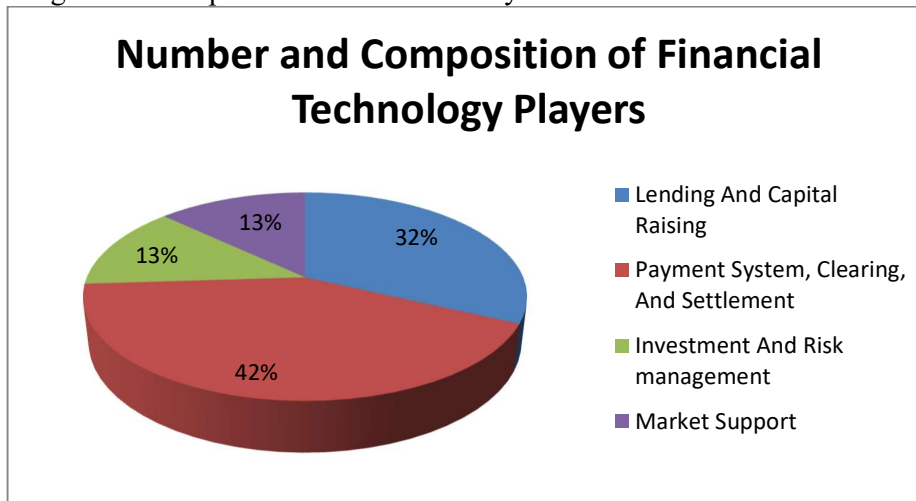
The revolution expanded and has spread to mobile internet that is easily accessible to all walks of life because everyone has held cellphones/smartphones respectively. In Indonesia, the beginning of the development of financial technology has a somewhat different context from the international world, namely not because of the financial crisis of 2008.

According Channel, 2016 the development of financial technology in Indonesia is also based on the needs of consumers, customers, merchants. The nature of financial technology is indeed very user-centric, so it focuses more on its users. If you look at the user side, especially in the financial field, there are many problems that can be solved with the presence of financial technology, for example, they want to find a new payment method that is safe, easy, inexpensive, but not in the form of cash. Because they have an alternative to just from credit and debit cards, then there emerged financial technology that offered a new payment system or instrument, for example in the form of e-money, e-wallet, etc.

Overall investment in financial technology globally has begun to crawl up to triple its value in the past five years, while this investment value into financial technology for the first nine months of 2015 has reached \$ 3.5 recorded throughout 2014.

At present, the development of financial technology takes place at a rapid pace supported by rapid digital penetration in Indonesia. The total financial technology transactions in Indonesia in 2017 were predicted to reach 18.6 billion US dollars, up 24.6% compared to the condition in 2016. This was in line with the acceleration in the number of financial technology players who had exceeded 180 actors or grew by more than 65% compared to the number of perpetrators at the end of 2016. Total e-commerce transactions are estimated to reach 6.96 billion US dollars in 2017 or up 23% compared to transactions in 2016. These positive performances are supported by the rapid penetration of digital technology in Indonesia as the number of class population increases medium. Internet users in Indonesia reach 88.1 million people, or 34% of the total population where 6.41 million of them are active users. The growth of mobile phone and internet users is estimated to reach 8% per year and is estimated to touch 113.5 million people in 2022. As we see the diagram below:

Diagram 1. Composition of Financial Players



Source: Bank Indonesia

In 2017 there are certainly several things that must be improved and developed from financial technology companies in Indonesia. So that the quality of service to clients and customers is better the first is the problem of human resources (HR). According to AJISATRIA, human resource problems in financial technology companies are caused by not many workers in the financial sector who do not understand technology and vice versa. In addition, information technology (IT) Infrastructure in Indonesia should be further strengthened in order to support the company's journey.

Financial technology in the future, for example, must be provided a reliable application system, such as Mobile Application, Web application, robotics, big data analytics, good network connections (broadband internet, 4G, GOOGLE BALLON), cheap and capable data centers (co-location, MANAGED service, cloud computing, valid resident identity (electronic KIP), and strong authentication techniques (Channel, 2016).

Financial technology is a startup company that offers new innovations for banking and financial companies, capital markets, financial data analytics, ETC, (SKAN, LUMB, MASOOD, & Conway, 2014).

According to the Accenture Report and UK Business Insider, Financial Technology global investment has skyrocketed in recent years to reach 15 billion USD in 2015 (compared to 4.05 billion USD in 2013). (ARNER, BARBERIS, & Buckley, 2015) Financial technology is a noun associated with companies that use modern innovative technologies (for example, software) to enable the provision of financial services, in a broader sense, financial technology seen as a new market that combines finance and technology and replaces traditional financial structures with new technology-based processes (Hochstein, 2015).

There are several financial technology classifications, namely:

1. Crowd funding and Peer to Peer Lending

In this classification, financial technology is useful as a mediation that finds investors (fund owners) with fund seekers (entrepreneurs). Crowd funding mass financing or joint venture, and peer to peer lending. Some examples of financial technology startups in this classification are UangTeman.com and TemanUsaha.com for examples of loans in the form of debt, Wifest.com and Kitabisa.com for examples of mass financing, Koinworks.com and Danadidik.com for examples of peer to peer lending, Kredivo.com and ShootYourDream.com for examples of credit card installments.

2. Market Aggregator

The portal that collects financial data to be presented to users, acts as a comparison of financial products. Users are free to choose the best financial products that are in accordance with what they want.

3. Risk and Investment Management

It is a financial planner in digital form in other words, you will be helped to find out your financial condition and make financial planning easily and quickly.

Here you no longer need to contact a financial planner, but only need to open the application on your smartphone and fill in the relevant data to find out the right financial plan for your needs.

4. Payment, Settlement, and Clearing

In this classification the focus of technological innovation is on payment methods such as payment gateways and e-wallets, payment gateways are a bridge between customers and e-commerce (online buying and selling stores) that are focused on payment systems.

SWOT Analysis. According to (GLAISTER & FALSHAW, 1999) SWOT analysis is an acronym of several components, namely: Strengths, Weaknesses, Opportunities, and Threats. Case analysis is another term often used for SWOT analysis. The basic concept of the SWOT analysis approach, it seems very simple, as stated by (SUN TZU 1992), that if we have known the strengths and weaknesses of ourselves, and our opponents, then we can know that we are the winners. Likewise, in the current development, SWOT analysis can not only be used to carry out battle strategies but also can be used to plan business strategy planning. According to Mercer (1991), SWOT analysis, that is, a strategic plan that determines what strengths can be used to build; what weaknesses must be covered; what opportunities can be captured; and which threats must be defended, so that the direction and goals of the company can be achieved clearly and a decision can be taken immediately and all the changes in dealing with competitor's.

According to (Nair & Prasad, 2000); SWOT analysis has also been carried out by government agencies to analyze expansionary regional projects such as offshore power in the Indian state of

KERALA. Travel and Transportation system to India (VIJAYARAGHAVAN, 1995), ZHONGGUANCUN, Science Park in China (XIAOMIN, 2000); entrepreneurship in Japan (Helms, 2003), and the competitiveness of Spanish industry (AHIJADO, BEGG & Mayes, 1993).

Strengths Financial Technology.

1. Ease in utilizing large-scale financial service data access and ease of transaction anytime and anywhere.
2. The ability to reach groups of people who are not served by financial institution offices, especially in remote areas that are difficult to reach by the internet network.
3. Can improve financial literacy for the government, people can enjoy financial services easily, cheaply and quickly. While for Financial Technology investors can enjoy the benefits of the business produced. The most important thing is to improve the welfare of the community because of the ease of accessing financial or capital sources.

Weaknesses Financial technology.

1. Requires an internet connection that supports both in terms of access speed and stable server in sending data files, because financial transactions will take place smoothly when internet access does not experience interference.
2. Community knowledge of financial technology is relatively low enabling them to not be able to get maximum access to financial services. so that financial technology services need to socialize the use of financial technology.
3. Inequality of access to financial services due to uneven information technology infrastructure between urban areas and regions, causing difficulties for people to conduct financial transactions online so that financial services cannot be felt to the maximum.
4. The emergence of online crime such as wiretapping, burglary, and cybercrime in financial transactions, making people hesitant to conduct online transactions.
5. Lack of attention to risk management, every business entity has a business risk. This is less noticed by some founders of financial technology. Whereas by knowing the risks that might be caused, the company knows how to handle or minimize the risks that arise.
6. Not too trusted by the public. We all know the weaknesses of digital technology, especially in INDONESIA. There are lots of irresponsible hackers who take data for their personal interests. This makes many people less confident with digital technology, especially for people who have experienced it.

Financial Technology business opportunities are growing because of the many conveniences offered to customers by these business people. Financial technology will help create an inclusive financial industry. The presence of financial technology will help people who are still UNBANKABLE, whose numbers are still large. So, this industry has great potential to develop in Indonesia. The presence of financial technology will cause banks to digitize and automate in order to facilitate more practical services. People also need more modern banking services. This encourages banks to prioritize technology-based services. Therefore, banks can collaborate with financial technology to facilitate financial services.

The threat of cybercrime in Indonesia is in the fastest growing connection in the world. But unfortunately, Indonesia ranked first with the highest number of cybercrimes in the world and ranked second in the world regarding hacking crimes. The closer the relationship between technology and financial services, where financial activities can be carried out anytime and anywhere, the greater the threat of a more sophisticated threat of crime. There is no more vulnerable sector exposed to this threat than the financial services sector and especially financial technology. Although the most common cybercrime is related to malware (virus) but the most worrying is the crime associated with financial transactions such as fictitious transactions, carding (the use of other credit cards), fraud in the marketplace, which of course will lead to financial technology. The risk of this can result in loss of customer confidence which is precisely the main basis of future financial growth in technology.

Source: ([www.kompas.com](http://www.kompas.com)).

### Research Methodology

The type of research used in this study is a qualitative research method with a descriptive approach. This qualitative research can be used to understand the meaning behind the visible data, for example by in-depth interviews so that clear patterns will be found. The research conducted will illustrate SWOT Financial Technology analysis for the banking industry in southern Sulawesi. Qualitative research aims to obtain a full picture of a matter according to the human perspective studied.

In this study, the locations of the research were banks in South Sulawesi. The reason for taking the location of the study was because banks became the most vulnerable industry to the presence of technological financial developments.

Although the bank industry is mutually integrated from the center, researchers want to see how the financial technology develops in southern Sulawesi.

Primary and secondary data and research Informants. The main source of information is that people are considered more aware of research problems or actors who are directly involved with research problems. In this study, the subjects/informants of the study were:

1. Information technology section / field
2. Director/ MANAGER.
3. Customer service / marketing that handles banking services or handles business services for banking products (part of commercial banking).

Researchers conduct field studies to obtain primary data through a structured interview process according to the research instruments that have been prepared. There are 15 (fifteen) people who are willing to be informants representing 15 (fifteen) banks operating in the city of Makassar, South Sulawesi. The composition is like the following table.

Table 1: Characteristics of Informants

No.	NAME	Bank	OCCUPATION
1.	M S	BNI	CS
2.	L N	DANAMON	IT
3.	A S	BRI	CS
4.	M L I	BTN	MENAGER
5.	A S	BTPN	MANAGER
6.	S R	Mega	IT
7.	T N	MANDIRI	IT
8.	R C	PERMATA	CS
9.	H T	BCA	IT
10.	C A	SULSEBAR	Manager
11.	S G	BUKOPIN	CS
12.	AN	CIMB NIAGA	CS
13.	L G	PANIN	Manager
14.	P	EKONOMI	IT
15	I D H	BEI	CS

Source: Primary Data 2018

According to the source [www.sulselprov.go.id](http://www.sulselprov.go.id), there are 47 (forty-seven) banks operating in South Sulawesi. Especially in the city of Makassar, 30% of banks have been selected as research objects. With a variety of positions and adequate experience, the informants are eligible to fill in and explain the research instrument. From the results of observations and interviews, the perspective of the informants (Bankers) is not all the same due to the consideration of symbols such as educational specifications and work experience of each informant that greatly influence the meaning or interpretation of bankers about financial technology.

## **Result and Discussion**

By using in-depth interviews and observations, this study tries to uncover the paradigm of bankers towards SWOT financial technology which is the latest phenomenon in banking information technology. The focus of this research is the banking industry in South Sulawesi, especially the city of Makassar, how they see the strengths, weaknesses, threats, and opportunities of financial technology. The concept of financial technology is a form of application of financial technology to improve the efficiency of operational activities and the quality of bank services to its customers because the use of financial technology is in line with the growing need for online-based financial services and the use of internet media for digital data access.

**Strength of Financial technology In the Eyes of Bankers.** Financial technology that will be implemented in banking institutions makes it easy for customers to access financial services and of course, the presence of financial technology is a separate innovation for customers, where the presence of this technology brings customer experience to a higher level through financial transactions. Furthermore, because currently banks have not been able to reach all remote areas, and operational costs have become economical. Financial technology strongly supports and facilitates service activities for customers, reduces work and saves time. And with the existence of financial technology, the public does not need to go to the branch office because all financial services can be accessed.

**Weaknesses of Financial technology in the eyes of bankers.** Financial technology requires a strong internet network connection, if the connection is weak, the public will feel dissatisfied, uneven communication technology infrastructure, financial technology can increase the crime of cyber-crime, so people must be smart and careful, in choosing financial services. If you choose the wrong financial technology service, it will cause a loss for the customer. For this reason, the regulator needs to be socialized, and support from the Government to support this latest technology service.

**Financial technology Opportunities in the eyes of bankers.** There is an opportunity to increase company revenue by collaborating in the financing system for start-up companies that still need guidance in terms of capital as well as providing opportunities for customers who are beyond the reach of the bank. This application can handle jobs such as fund transfers, payments, capital loans, loans, to asset management, and has an impact on the increasingly low operational costs. Customers are increasingly comfortable in transactions supported by digital banking. Better technological infrastructure will further support and improve the quality of banking services.

**Financial technology Refers to Bankers.** There are threats that affect the reduction of employees. And the presence of financial technology further strengthens collaboration such as FLAS sale and E-pay (BRI). Collaboration is the answer to the threat brought by financial technology collaboration provides the power of maximum synergy for the banking world.

## **Conclusion**

The Financial Technology implemented provides strengths, weaknesses, threats, opportunities for the banking world simultaneously to make bankers must improve information technology infrastructure in order to collaborate with financial technology. In turn, it will make improvements to the banking world services so that COSTUMER will gain the latest experience in digital banking services.

The presence of financial technology is still relatively new and relevant literacy studies are still limited because it is necessary to increase literacy and in-depth scientific studies and the best thoughts, inputs and breakthroughs so that the development of digital technology together with existing financial institutions can synergize by collaborating professionally and profitably between the parties involved.

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