# JBTI : Jurnal Bisnis : Teori dan Implementasi

Website: https://journal.umy.ac.id/index.php/bti/index Vol. 15 No. 2 (2024): August 2024, page: 195-209 DOI: https://doi.org/10.18196/jbti.v15i2.22333

# Application Regulation Finance to Business Process Management Through and Adaption Technology on Smes in Makassar City

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INFO	A B S T R AC T					
Article History	This research aims to examine variables related to the implementation of FinTech					
Received:	on SMEs in Makassar City using a quantitative research approach. Variables					
2024-05-14						
Revised:	studied are related to Financial Regulations, Adoption Technology, and Business					
	Process Management. The sampling technique in this research was stratified					
2024-06-27	sampling, dividing groups or categories, and then these categories were selected					
Accepted:	using simple random or systematic samples. All variables used use instruments					
2024-08-31	with several indicators and parameters that help the quantitative data analysis					
	process. Quantitative analysis calculations using statistical methods using the					
	software Structural Equation Model (SEM) PLS. The research results showed that					
	a direct relationship between technology and business process management had a					
	positive and significant effect. In contrast, FinTech had a positive and significant					
	effect on business process management, regulation finance, and the adoption of					
	technology. There was a direct influence between regulation finance's positive and					
	significant effect on FinTech as well as indirect influences. Regulation Finance					
	has a positive and significant effect on Business Process Management through					
	Adaptation Technology. However, Regulation Finance does not have a significant					
(CC) BY-NC-ND	effect on Business Process Management through FinTech.					
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under <u>Attribution-</u> NonCommercial-NoDerivatives	Keywords: Adoption Technology; Business Process Management; FinTech;					
4.0 International.	Regulation					

## INTRODUCTION

As one of the main centers of economic activity in Indonesia, Makassar City faces various challenges and opportunities in adopting FinTech innovation to support the growth of the SME sector (Sugandi, 2021). Small businesses are an important part of most developing economies and contribute to stable economic growth and employment (Thurik & Wennekers, 2004). According to data from the Ministry of Cooperatives, there are around 59.2 million SMEs in Indonesia. However, of this number, only around 3.79 million MSMEs have utilized the platform online to market their products and use the services of FinTech. In contrast to mature companies, small businesses face several disadvantages during their initial development period (Berger & Black, 2011). One of the main challenges they face is limited access to finance. In contrast to traditional finance, digital finance can offer new channels for relationships between debtors and creditors, mainly due to lower financial costs and less information asymmetry, and it can even increase efficiency by lowering costs (Khan et al., 2023).

The regulations governing SMEs in Indonesia are Law No. 20 of 2008. This law (UU) states that SMEs are categorized based on the size of their business. Business size categories are based on net assets (other than land and buildings where the business is located) and

turnover as regulated in Law No. 20 of 2008. Law no. 20 of 2008, the following is a quote which states that a small business is an entity that has the following criteria: 1) net worth of more than IDR 50,000,000.00 (fifty million rupiahs) up to a maximum of IDR 500,000,000.00 (five hundred million rupiah) excluding land and buildings where business premises are located; and 2) have annual sales of more than IDR 300,000,000.00 (three hundred million rupiah) up to a maximum of IDR 2,500,000,000.00 (two billion five hundred million rupiah). Meanwhile, what is called a Medium Enterprise is a business entity that has the following criteria: 1) net worth of more than IDR 500,000,000.00 (five hundred million rupiah) up to a maximum of IDR 500,000,000.00 (five hundred million rupiah) up to a maximum of IDR 10,000,000,000.00 (two billion five hundred million rupiah) up to a maximum of IDR 10,000,000,000.00 (two billion rupiah) excluding land and buildings place of business, and 2) has annual sales of more than IDR 2,500,000,000.00 (two billion five hundred million rupiah) up to a maximum of IDR 10,000,000,000.00 (ten billion rupiah) excluding land and buildings place of business, and 2) has annual sales of more than IDR 50,000,000,000 (fifty billion rupiah)."

In general, the difference between the two types of business lies in the amount of assets owned. The business process certainly lies in ability. Sincorá et al. (2018) stated that the survival and growth of organizations today depends on managing processes and the ability to effectively. The competitiveness of every company arises from the competitiveness of its business processes (Gošnik & Stubelj, 2022). When companies successfully carry out business process management (BPM), they can create higher-performance processes (Ramadhani & Mahendrawathi, 2019). Process management is a competitive advantage in improving organizational results (Sincorá et al., 2023). Business procedures supported by information technology are used to request customer reviews or to establish effective information technology (Handayani & Mahendrawathi, 2019). BPM has managerial and technical consequences that can enable increased productivity (van der Aalst, 2013). Every company must plan, organize, lead, and control its business processes (Gošnik & Stubelj, 2022). Thus, BPM becomes important in the process of improving SME performance.

Previous research examined the determinants of BPM. Martín-Navarro et al. (2023) found the importance of sharing knowledge in BPM systems. BPM is often associated with software to manage, control, and support operational processes (van der Aalst, 2013). New business models and technological concepts provide the basis for innovative solutions in finance (Gomber et al., 2017). Another part is that technology adaptation is an inseparable part of business processes. As found by Plugge et al. (2021) in facing change, organizations must manage and adapt the coherence of business services as a determinant of success. The use of information technology (IT) must be supported by resources, IT infrastructure, and organizational capabilities (Bharadwaj, 2000), which will lead to the ability to adapt technology to the organization. Business innovation must be supported by information technology, which is called digital innovation (Handayani & Mahendrawathi, 2019). Apart from that, financial technology (FinTech) provides added value to SME business movements. FinTech also eliminates or reduces financial intermediation costs (Murinde et al., 2022). FinTech companies offer new opportunities for incumbent companies to reach their younger, more tech-savvy clients (Gomber et al., 2017). FinTech has become an important tool in financial innovation (Kou, 2019), impacting business economics in areas such as revenue, costs, and margins (Schueffel, 2016). FinTech in business processes has an impact on efficiency in terms of time. However, the role of FinTech in business activities is still underutilized (Vives, 2017) by SMEs. The development dilemma facing conventional

finance needs to be overcome through a new type of financial model that is highly efficient and sustainable. The financial sector has strengthened its integration with information technology (Khan et al., 2023). The inclusive model of digital finance includes various companies that have adopted the system FinTech. Digital finance, with various new technologies, involves artificial intelligence (AI), such as Big Data (Khan et al., 2023). So far, FinTech startup offerings have been largely researched from a functional viewpoint (Gimpel et al., 2018). FinTech is unlike traditional financial instruments; it is more inclusive and provides new opportunities to overcome the financial constraints of SMEs.

Based on the results of previous research, BPM will produce performance. Process management is important in business development in general and in MSMEs in particular. However, the description of previous research focuses on the process management approach as a variable that determines business outcomes, not as a target variable. Therefore, research is needed that provides an overview of the determinants of the business process itself. However, research on the factors that drive BPM has not been fully conducted. Previous research looked separately at technology adoption and financial technology. Therefore, this study positions BPM as a target variable that will shape the collective adoption of technology and financial technology. In addition, this study includes financial regulation variables as an integral part of the MSME technology and FinTech adoption model. The novelty of this study is that it positions BPM as a target variable formed by the combination of technology and FinTech adoption and includes financial regulation as a variable that affects this adoption model. This research focuses on MSMEs in Makassar City and uses quantitative methods to analyze the effect of FinTech implementation on MSMEs. The variables to be studied include financial regulations related to FinTech, technology adoption, and Business Process Management.

### LITERATURE REVIEW

Many studies related to BPM and conducted by researchers and practitioners have been carried out in IT. Most studies are about the application of BPM with special interest in various small business sectors. A study of several small businesses in Australia found that implementing BPM in small businesses provides benefits from process documentation to support associations with stakeholders, training guides and as a reference source for staff, assisting in process design and improvement, and also assisting in developing information systems (Dallas & Wynn, 2014). In practice, the implementation of BPM is often faced with various obstacles. These inhibiting factors include organizational factors, technology (innovation), environment, resources, and poor understanding of BPM (Levy et al., 2001).

Contextual understanding relates to organizational goals, processes, organization, and environment that are needed to make BPM implementation effective and efficient (Schmiedel et al., 2014). The competitiveness of every company arises from the competitiveness of its business processes (Gošnik & Stubelj, 2022). BPM performance gets better when supported by technological performance. Understanding of technology and use of technology-based services such as FinTech increase the "acceleration" of SMEs.FinTech offers new opportunities for incumbent companies to reach their younger, more tech-savvy clients (Gomber et al., 2017). The history of FinTech began in 1866. Consumer International in 2017 divided the FinTech development period into three phases. The trans-Atlantic cable and the telegraph marked the first phase between 1866 and 1967 as a means of financial communication. Between 1967 and 2008, the second phase saw online banking and ATMs, where financial institutions began to incorporate information technology into financial products and services. The third phase, from 2008 onwards, was characterized by the adoption of high technology by new entrants with different characteristics, creating a new competitive landscape for financial institutions. As a form of business that is currently developing, FinTech is a major innovation and major progress in social science and technology, as well as the development of opportunities for forms of financial business that will encourage the improvement of financial business.

Meanwhile, compared to traditional financial services, FinTech-based financial services have greater flexibility, security, efficiency, and opportunities. FinTech characterizes the use of digital technologies such as the Internet, mobile computing, and data analysis to enable, innovate, or disrupt financial services (Gimpel et al., 2018). FinTech will have an impact on customer experience (Schueffel, 2016). The combination of technology and finance has resulted in breakthroughs in innovative financial product and service models (Kou, 2019). Thus, the position of FinTech is important in making the company's business processes successful.

In the technology readiness classification, users are divided into five segments: explorers, pioneers, skeptics, paranoid, and laggards. The explorer segment is characterized by the highest scores on contributor dimensions, such as optimism and innovation, and the lowest scores on inhibitor dimensions, which include discomfort and insecurity. Explorers tend to be quickly attracted to new technologies and are often the first group to adopt those innovations. On the other hand, laggards are the last group to adopt new technology, with the highest score on the inhibitor dimension and the lowest on the contributor dimension. The first two dimensions of technological readiness, optimism, and innovation, are "contributors" that can increase readiness to use technology while considering the other two dimensions of discomfort and insecurity, "inhibitors" that can suppress the level of technological readiness.

Parasuraman and Colby (2001) emphasized that technology readiness is a measure of perceptions or thoughts about technology and not a measure of someone's technological ability or capacity. The other three groups (pioneers, skeptics, paranoids) have more complex perceptions of technology. Pioneers are as optimistic and innovative as explorers, but at the same time, they will easily stop trying if they encounter discomfort and insecurity. Skeptics have low motivation to use technology but also have a small level of inhibition, so they need to be convinced beforehand about the benefits of using technology. For paranoids, technology is exciting enough, but they also consider the risk factors indicated by high levels of discomfort and insecurity (Parasuraman & Colby, 2001). Studies have shown that explorers and pioneers tend to adopt new technologies earlier than other types (Ling & Moi, 2007). Digital Finance encompasses a large number of new financial products, financial businesses, financial-related software, and new forms of customer communication and interaction delivered by companies and innovative financial service providers (Gomber et al., 2017).

### **RESEARCH METHOD**

This research used a quantitative approach with descriptive and explanatory research methods. This approach allows researchers to collect quantitative data that can be analyzed statistically to identify relationships and influences between variables. Data for this research was obtained through a survey using a questionnaire distributed to owners or managers of SMEs in Makassar City. Apart from that, the economic growth of Makassar City during 2023 and the development of the number of SMEs, had been collected. The population of this research is 19000 SMEs in Makassar City. Sampling was carried out using the Slovin technique with a standard error (e=10%), where the SME groups were divided based on certain categories. Random samples were taken from each group, and the samples in this study were 100 SME actors. Data analysis was carried out using the Partial Least Squares (PLS) Structural Equation Model (SEM) statistical method. PLS is used to test relationships between variables, both direct and indirect. This analysis includes testing parameter significance, construct validity, and identifying direct and indirect effects between variables with a standard error of 10%.

In this study, three main types of variables were analyzed: independent, mediating, and dependent variables (Table 1). The independent variables in this study were financial regulation and technology adoption, where financial regulation includes the level of compliance with regulations set by financial authorities and government support for the use of financial technology in MSMEs (Gomber et al., 2017; Wonglimpiyarat, 2017). The mediating variable in this study was financial technology (FinTech), which functions as a link between financial regulation and business process management. FinTech was measured through the level of adoption of financial technology by MSMEs, which includes the use of FinTech platforms, transaction speed, and operational efficiency resulting from the use of the technology (Schueffel, 2016; Zavolokina et al., 2016).

The dependent variable in this study was business process management (BPM), which reflects how business processes in MSMEs are improved or automated through the use of technology and financial regulation. BPM was measured through several indicators, such as business process efficiency, service quality, and business adaptability to changes in the external environment (Gošnik & Stubelj, 2022; Martín-Navarro et al., 2023). For each variable, these indicators are measured using a Likert scale, with a value range from 1 (strongly disagree) to 5 (strongly agree), to obtain quantitative data, which is then analyzed using a Structural Equation Model (SEM) based on Partial Least Squares (PLS) (Bharadwaj, 2000; Ramadhani & Mahendrawathi, 2019).

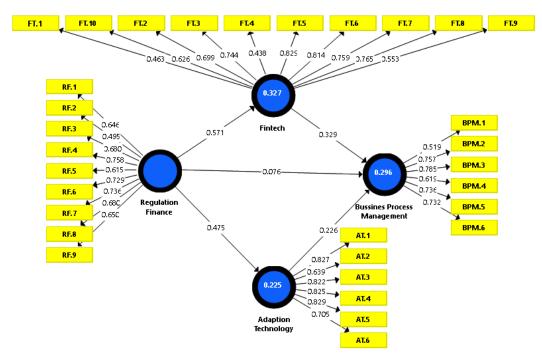
Finance regulation was the level of compliance of business actors with financial regulations from all policies and procedures implemented by standards set by the financial regulatory authority. FinTech is a financial technology platform that has been active and used by users in a certain region for some time, providing an overview of the adoption of financial technology in society. The level of technology adoption was the readiness of organizations to integrate technological innovation into their operations. Business process management is a business process that is improved or automated within a company over a certain period, reflecting the company's efforts to increase efficiency and productivity.

No.	Variable	Conceptual Meaning	Dimension	Survey Item
1	Financial Regulation	Level of compliance and support for	Government Support Regulatory Financial Policies	Using the service FinTech Using the service immediately
		financial	Financial Infrastructure	Recommending service FinTech
		regulations	Legal Regulation	Not knowing how to use FinTech
			Security and Trust	Likes conventional transactions
			Financial Innovation	The network often hampered the use of FinTech.
			Licensing and Certification	FinTech provides cost savings for consumers and companies.
			Financial Service Quality	FinTech provides future business prospects.
			Financial Service Quality	The database is used to promote products and services in the future.
2	FinTech Active Marketing Strategy financial		Marketing Strategy	FinTech improves the quality of service to customers
		technology platform used	Digital Technology	FinTech innovation pays attention to user needs.
		by users	<b>Operational Efficiency</b>	Business adaptation between clients
			Transaction Speed	Startup FinTech adjusts market segments.
			Industrial Revolution Impact	Digital-based system
			Device Integration	Digital transactions are more effective and efficient.
			Technology Infrastructure	Payment is in nature Time.
			Support for SMEs	The Industrial Revolution encouraged the use of FinTech.
			Transaction Security	Phone usage supports FinTech.
3	Business Process	Enhanced business	Cost Savings	Infrastructure FinTech development on various platforms
	Management	processes through	Business Opportunities	company startup FinTech supports the SME Buy and buy-and-sell transaction system
		FinTech	Data Utilization	Startup FinTech maintains transaction security.
			Service Quality	The government supports the use of services.
			User Needs Responsiveness	The government prepares regulations that benefit services.
			Business Adaptation	The government is preparing infrastructure to encourage services.
4	Technology	Readiness and	Active Usage	FinTech is registered with OJK
•	Adoption	acceptance of	Rapid Adoption	Relational and Partners FinTech proved safe.
		FinTech	Trust and Recommendations	InnovationFinTech prioritize trust
		technology	FinTech Knowledge	FinTech has been licensed.
			Transaction Preferences	FinTech provides adequate service.
			Infrastructure Availability	FinTech based on customer service

# RESULTS AND DISCUSSION

### **Convergent Validity**

In this research, validity and reliability testing were conducted for each latent variable, such as financial regulation, FinTech, adoption technology, and business process management software SmartPLS. An indicator on a reflective measure was considered valid if its loading value on the latent variable being measured was  $\geq 0.5$ . Suppose there was an indicator with a loading value of less than 0.5. In that case, the indicator must be eliminated or dropped because it shows that the indicator is not effective enough in measuring the latent variable accurately. The results of testing this measurement model are presented in Figure 1.



**Figure 1. Initial Test ModelOuter Loadings** 

Based on the initial test results in Figure 1, this research model shows the FT.1 indicator (0.463) in the FinTech variable with a factor loading value below 0.5, so it does not meet the valid requirements, and this indicator must be removed from the research model and the second stage of testing was carried out and obtained the following results in Figure 2.

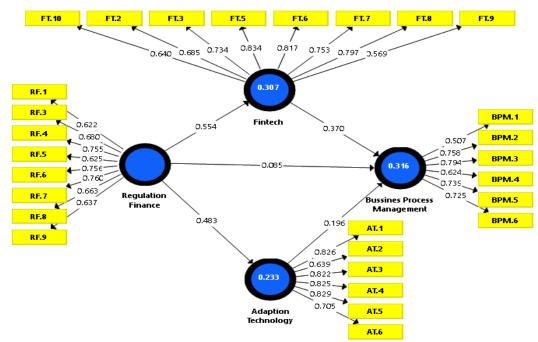


Figure 2. Second Level Test ModelOuter Loadings

The results of the analysis using SmartPLS are shown in Figure 2. The outer model or the correlation between the construct and the variable had met convergent validity because the indicators in this research model met the requirements loading factor, and each indicator was still above the minimum standard for the latent variable being measured, namely  $\geq 0.5$ .

The distribution of factor loading values, all of which were above 0.50, indicates that all loading factors are considered valid.

Variable regulation financial influencing variable adoption technology in the structural model had an  $R^2$  value of 0.226, which indicates that only 22.6% of the influence of the variable regulation financial to variable adoption technology while 31.0% was the influence of variables regulation financial to variables FinTech and 30.2% variable influence adoption technology and FinTech to business process management. The structural model of this research is presented in Figure 3.

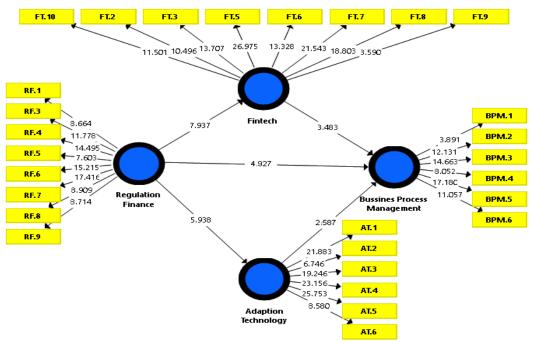


Figure 3. PLS Results DisplayBoothstrapping

Techniques were used bootstrapping, and the results can be seen in Table 2 to evaluate the significance of the model. The model image shows the t-statistic value of the relationship between variables, which will then be compared with the value table.

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Table 2. Path Coefficient							
	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (  O/STDEV  )	P Values		
Direct Influence							
Adaption Technology -> Bussines Process Management	0.240	0.246	0.104	2.300	0.022		
FinTech -> Bussines Process Management	0.375	0.389	0.093	4.049	0.000		
Regulation finance -> Adaption Technology	0.475	0.494	0.079	6.031	0.000		
Regulation finance -> Bussines Process Management	0.323	0.345	0.057	5.638	0.000		
Regulation finance -> FinTech	0.557	0.570	0.072	7.732	0.000		
Indirect Influence							
Regulation finance -> Adaption Technology -> Bussines Process	0.114	0.124	0.060	1.889	0.059		
Management Regulation Finance -> FinTech -> Bussines Process Management	0.209	0.221	0.059	3.554	0.000		

Table 2 shows that the adoption of technology has a positive and significant effect on business process management directly. The coefficient value 2.300, accepted with a 5% error rate, means that better technology than it affects the increased business process management with a correlation of 0.240 (24.0%). FinTech has a positive and significant effect on business process management directly on the coefficient value 4.049, accepted with a 5% error rate, meaning that the better the FinTech, the more influence it will increase business process management with a correlation of 0.375 (37.5%). Regulation finance has a positive and significant effect on adoption technology directly, with a coefficient value of 6.031, accepted with a 5% error rate, meaning that the better the FinTech, the more influence it will increase adoption technology with a correlation of 0.475 (47.5%). Regulation finance has a positive and significant effect on business process management directly on the coefficient value 5.638, accepted with a 5% error rate, which means the better FinTech then it affects the increase FinTech with a correlation of 0.323 (32.3%). Regulation finance has a direct and significant positive effect on FinTech on the coefficient value 7.732, accepted with a 5% error rate, which means the better FinTech then it affects the increase with a correlation of 0.557 (55.7%). Regulatory finance does not affect business process management through adaption technology indirectly, with coefficient values of 1.889, which is accepted with a 5% error rate. Variable adoption technology does not moderately influence regulation finance against business process management. Regulatory finance has a positive and significant effect on business process management through FinTech indirectly on the coefficient value 3.554, accepted with a 5% error rate, which means the mean is variable FinTech able to moderate influence regulation finance against business process management with a correlation of 0.209 (20.9%).

### Discussion

The research results showed that adaption technology successfully provides information to improve business processes. The results showed a direct and significant positive influence on technology adaptation and business process management. Technology is an important tool that supports company competitiveness in responding to rapidly changing business dynamics. Various methods have been attempted to make the work easier. The current technology-based industrial revolution has been integrated into business processes called information systems and developed in all aspects of business to support business process management. FinTech variables influence business process management. SMEs' carrying out their business activities is largely determined by financial aspects that support production and marketing functions. When adequate funds support the production aspect, it will have an impact on product availability and quality, which will then make it easier for the sector to market its products. Regulation finance has a direct and significant positive effect on the adoption of technology, business process management, and FinTech. These results have implications for technology adoption, which must have clear regulations in managing a financial system that is undergoing rapid transformation to create financial stability, financial security, consumer protection, market integration, competition, and safe market development.

Information technology monitors and reports regulatory compliance. Besides, SMEs in Indonesia demonstrated high business resilience during the economic crisis, largely

because they have a strong domestic market. BPS reported that 90-95% of businesses in Indonesia are SMEs. Regulation finance It is needed to support business expansion because the SME phenomenon is quite complex, one of which is financial limitations and difficulty in obtaining funding from external parties. Government support is very important in the transformation of FinTech SMEs because, in general, SMEs are hampered by financial problems. So that the financial capabilities used are generally focused on business operational activities or business processes and reduce investment in developing financial technology, government support must be financial regulation to help SMEs carry out transformation FinTech in business operations.

The more interesting results of this research relate to the indirect relationships created by the research model. Regulation finance indirectly influences business process management throughFinTech. FinTech can mediate financial policy on SME business process management because by using FinTech, keeping up with today's very dynamic business developments will run more effectively and efficiently. This condition shows the role of FinTech in developing business processes. However, this relationship was not found in Regulation finance to business process management through adaption technology. This result is an "anomaly" in SME business development, especially in financial policy. This condition can be seen in FinTech relationships, which can be a factor in business development. The explanation given for this relationship is that regulation is "not" something that can be mediated by technological adaptation. However, regulations are part of the business itself. So, the government must make financial policies that can directly impact SMEs.

The description of the research results is a guideline that regulation, technological adaptation, and financial technology can help improve business management processes. Regulations shape the future of business (banking case) (Murinde et al., 2022). In general, business process management (BPM) is a very "complicated" part because it includes all management activities such as planning, organizing, leading, and controlling business processes (Gošnik & Stubelj, 2022). Business Process Management (BPM) refers to the collection of concepts, methods, and techniques used to design, configure, implement, manage, and evaluate business processes (Martín-Navarro et al., 2023). In addition, BPM is often associated with the use of software that helps in managing, controlling, and supporting operational processes (van der Aalst, 2013). BPM aims to maintain efficiency, especially with adaptation to the use of social media (Handayani & Mahendrawathi, 2019). Organizations use BPM to increase organizational quality (Plesa & Prostean, 2018), helping organizational improvement (Kluza & Nalepa, 2017). With the tools used in business processes, the BPM model becomes easier to use because it allows users to have access to various actions, such as in project management (Plesa & Prostean, 2018). BPM's position is related to the use of technology and the availability of regulations governing the use of this technology to provide a sense of security regarding business services. So, BPM will contribute to business development with the help of technology.

Business progress is related to the business processes that occur. Apart from that, changes brought about by technological developments encourage business actors to adapt. Technological advances and innovation are driving these changes and bringing several strategic and operational challenges (Hennelly et al., 2019; Queiroz et al., 2020; Sincorá et

al., 2023). Information technology and business processes have equally important roles in driving business innovation (Handayani & Mahendrawathi, 2019). Good business adaptation makes the business produce better performance. The application of IT has a positive and significant impact on organizational performance (Bharadwaj, 2000). Organizational adaptability is a key predictor of business process reengineering performance (Nkurunziza et al., 2019) adaptation innovation to achieve competitiveness in the global market (Handayani & Mahendrawathi, 2019). The competitiveness of every company arises from the competitiveness of its business processes (Gošnik & Stubelj, 2022). Technology acceptance is widely used to innovate, eliminating unnecessary processes (Nkurunziza et al., 2019). This overview provides information about the importance of SMEs in adapting technology to support business processes. Therefore, SMES needs to be ready to adapt, especially to technological developments. Thus, SME business processes are maintained well.

Adaptation of service technology, such as digital-based financial services, is important for SMEs. FinTech provides new opportunities for individual empowerment, for example, by providing transparency and reducing costs (Zavolokina et al., 2016). The FinTech revolution is creating the ability to reliably reduce customer acquisition costs (Gomber et al., 2018). Digital finance helps SMEs provide business services. FinTech is closely related and linked to financial innovation (Zavolokina et al., 2016). In general, FinTech, as any technology that eliminates or reduces the costs of financial intermediation, refers to various financial technologies used to automate processes (Murinde et al., 2022). FinTech is becoming an important tool for participating in financial innovation and influencing financial markets (Kou, 2019). Innovative financial services are supported by technology and business models that accompany these services (Mention, 2019). Technology support plays an important role in the development of the business world. Business actors need to adapt technology to support their business processes. So, with the help of technology, SMEs can easily manage business processes.

An interesting relationship based on research results is that technological adaptation cannot be a mediation of financial regulations on BPM. A possible reason that can explain this relationship is that technological adaptation is part of a business's ability to adapt to environmental changes. Meanwhile, financial regulations are limited to regulating the use of technology. The main aim of regulations, in general, is to provide a sense of security to users of the technology. Compliance and regulatory issues in the financial industry have led to a combination of regulations and technology (Alt et al., 2018). Financial regulations generally separate consumer financial services markets (Gomber et al., 2018). The regulation focuses on regulating businesses using technology. However, it is different from financial technology. Financial technology "plays" a role in mediating between financial regulations and BPM. Governments around the world have designed policies and regulations to support FinTech development (Wonglimpiyarat, 2017). In general, the term FinTech comes from the words finance and technology and clearly indicates the market in which these companies conduct their business (Eickhoff et al., 2018). Financial regulations issued by the government can support the development of FinTech businesses, resulting in the development of business processes. Therefore, government regulations, especially those related to FinTech, support business development and have an impact on business processes.

### CONCLUSION

Financial regulations are essential to support SME business processes. Regulation is part of the development of your own business. Policy government directly and indirectly (via FinTech) could have an impact on SMEs. The regulation focuses on regulating businesses using technology. Financial regulations issued by the government can support the development of FinTech businesses, resulting in business processes. BPM's position is related to technology and the availability of regulations governing the use of this technology to provide a sense of security regarding business services. The research results showed that regulation finance, FinTech, and adoption technology have a direct and significant positive effect on business process management. Regulation finance had a positive and significant effect on FinTech and adoption technology directly. Regulation finance indirectly had a positive and significant effect on business process management through FinTech. However, an indirect relationship was not found in the regulation of finance's positive and significant effect on business process management through the indirect adaption of technology.

This study has implications for government policy as a regulator in making regulations that support the development of MSME business processes. Policies should be made more flexible, especially those related to external financing and regulations, to facilitate MSMEs in expanding their businesses. MSMEs can optimize business development when they receive direct assistance from the government. In addition, the business community can create more creative business process management for the MSME sector. Thus, MSMEs can increase the scale of their business. This research was conducted on MSMEs in Makassar City, South Sulawesi, Indonesia. Therefore, future research can expand the scope by adding a larger population distribution while adding other variables to encourage BPM.

The short duration of the study was insufficient to capture the long-term impact of technology adoption or changes in financial regulation on business process management, so further research is recommended: Conduct comparative research to compare the impact of technology and financial regulation on business process management in different countries or regions with different market conditions.

### REFERENCES

- Alt, R., Beck, R., & Smits, M. T. (2018). FinTech and the transformation of the financial industry. *Electronic Markets*, 28(3), 235–243. https://doi.org/10.1007/s12525-018-0310-9
- Berger, A. N., & Black, L. K. (2011). Bank size, lending technologies, and small business finance. *Journal of Banking & Finance*, *35*(3), 724–735. https://doi.org/10.1016/j.jbankfin.2010.09.004
- Bharadwaj, A. S. (2000). A Resource-Based Perspective on Information Technology Capability and Firm Performance: An Empirical Investigation. *MIS Quarterly*, 24(1), 169. https://doi.org/10.2307/3250983
- Dallas, I., & Wynn, M. T. (2014). Business Process Management in Small Business: A Case Study. In J. Devos, H. Landeghem, & D. Deschoolmeester (Eds.), *Information Systems* for Small and Medium-sized Enterprises (pp. 25–46). Springer. https://doi.org/10.1007/978-3-642-38244-4\_2

- Eickhoff, M., Muntermann, J., & Weinrich, T. (2018). What do FinTechs actually do? A Taxonomy of FinTech Business Models. *International Conference on Information Systems 2017*.
- Gimpel, H., Rau, D., & Röglinger, M. (2018). Understanding FinTech start-ups a taxonomy of consumer-oriented service offerings. *Electronic Markets*, 28(3), 245–264. https://doi.org/10.1007/s12525-017-0275-0
- 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. https://doi.org/10.1080/07421222.2018.1440766
- Gomber, P., Koch, J.-A., & Siering, M. (2017). Digital Finance and FinTech: current research and future research directions. *Journal of Business Economics*, 87(5), 537–580. https://doi.org/10.1007/s11573-017-0852-x
- Gošnik, D., & Stubelj, I. (2022). Business process management and risk-adjusted performance in SMEs. *Kybernetes*, 51(2), 659–675. https://doi.org/10.1108/K-11-2020-0794
- Handayani, S. F., & Mahendrawathi, E. (2019). Antecedent and Business Process Management Non-Technical Capabilities in Social Media Implementation for Micro, Small and Medium Enterprises: A Conceptual Model. *Procedia Computer Science*, 161, 1114–1121. https://doi.org/10.1016/j.procs.2019.11.223
- Hennelly, P., Srai, J., Graham, G., & Wamba, S. F. (2019). Reconfiguring business processes in the new political and technological landscape. *Business Process Management Journal*, 25(3), 386–390. https://doi.org/10.1108/BPMJ-06-2019-377
- Khan, I., Awan, S. A., Rizwan, M., Akram, M. A., Zia-ur-Rehman, M., Wang, X., Zhang, X., & Huang, L. (2023). Physiological and transcriptome analyses demonstrate the silver nanoparticles mediated alleviation of salt stress in pearl millet (Pennisetum glaucum L). *Environmental Pollution*, 318, 120863. https://doi.org/10.1016/j.envpol.2022.120863
- Kluza, K., & Nalepa, G. J. (2017). A method for generation and design of business processes with business rules. *Information and Software Technology*, 91, 123–141. https://doi.org/10.1016/j.infsof.2017.07.001
- Kou, G. (2019). Introduction to the special issue on FinTech. *Financial Innovation*, 5(1), 45. https://doi.org/10.1186/s40854-019-0161-1
- Levy, M., Powell, P., & Yetton, P. (2001). SMEs: Aligning is and the Strategic Context. Journal of Information Technology, 16(3), 133–144. https://doi.org/10.1080/02683960110063672
- Ling, L. M., & Moi, C. M. (2007). Professional Students' Technology Readiness, Prior Computing Experience and Acceptance of An E-Learning System. *Malaysian Accounting Review*, 6(1), 85–99.
- Martín-Navarro, A., Sancho, M. P. L., & Medina-Garrido, J. A. (2023). Determinants of BPMS use for knowledge management. *Journal of Knowledge Management*, 27(11), 279–309. https://doi.org/10.1108/JKM-07-2022-0537
- Mention, A.-L. (2019). The Future of Fintech. *Research-Technology Management*, 62(4), 59–63. https://doi.org/10.1080/08956308.2019.1613123

- Murinde, V., Rizopoulos, E., & Zachariadis, M. (2022). The impact of the FinTech revolution on the future of banking: Opportunities and risks. *International Review of Financial Analysis*, 81, 102103. https://doi.org/10.1016/j.irfa.2022.102103
- Nkurunziza, G., Munene, J., Ntayi, J., & Kaberuka, W. (2019). Business process reengineering in developing economies. *Innovation & Management Review*, 16(2), 118–142. https://doi.org/10.1108/INMR-03-2018-0010
- Parasuraman, A., & Colby, C. L. (2001). *Techno-Ready Marketing: How and Why Your Customers Adopt Technology*. The Free Press.
- Plesa, S., & Prostean, G. (2018). Business Process Management for Model Based Design Automotive Projects. *Procedia - Social and Behavioral Sciences*, 238, 313–322. https://doi.org/10.1016/j.sbspro.2018.04.007
- Plugge, A., Nikou, S., & Bouwman, H. (2021). The revitalization of service orientation: a business services model. *Business Process Management Journal*, 27(8), 1–24. https://doi.org/10.1108/BPMJ-02-2020-0052
- Queiroz, M. M., Wamba, S. F., Bourmont, M. De, & Bourmont, M. De. (2020). Blockchain adoption in operations and supply chain management: empirical evidence from an emerging economy. *International Journal of Production Research*, 59(20), 6087– 6103. https://doi.org/10.1080/00207543.2020.1803511
- Ramadhani, F., & Mahendrawathi, E. (2019). A Conceptual Model for the Use of Social Software in Business Process Management and Knowledge Management. *Procedia Computer Science*, 161, 1131–1138. https://doi.org/10.1016/j.procs.2019.11.225
- Schmiedel, T., vom Brocke, J., & Recker, J. (2014). Development and validation of an instrument to measure organizational cultures' support of Business Process Management. *Information & Management*, 51(1), 43–56. https://doi.org/10.1016/j.im.2013.08.005
- Schueffel, P. (2016). Taming the Beast: A Scientific Definition of Fintech. Journal of Innovation Management, 4(4), 32–54. https://doi.org/10.24840/2183-0606\_004.004\_0004
- Sincorá, L. A., Oliveira, M. P. V. de, Zanquetto-Filho, H., & Alvarenga, M. Z. (2023). Developing organizational resilience from business process management maturity. *Innovation & Management Review*, 20(2), 147–161. https://doi.org/10.1108/INMR-11-2021-0219
- Sincorá, L. A., Oliveira, M. P. V. de, Zanquetto-Filho, H., & Ladeira, M. B. (2018). Business analytics leveraging resilience in organizational processes. *RAUSP Management Journal*, 53(3), 385–403. https://doi.org/10.1108/RAUSP-04-2018-002
- Sugandi, E. A. (2021). *The Covid-19 Pandemic and Indonesia's Fintech Markets* (ADBI Working Paper Series). https://www.adb.org/sites/default/files/publication/728046/adbi-wp1281.pdf
- Thurik, R., & Wennekers, S. (2004). Entrepreneurship, small business and economic growth. *Journal of Small Business and Enterprise Development*, 11(1), 140–149. https://doi.org/10.1108/14626000410519173
- van der Aalst, W. M. P. (2013). Business Process Management: A Comprehensive Survey. *International Scholarly Research Notices*, 2013(1), 1–37. https://doi.org/10.1155/2013/507984

- Vives, X. (2017). *The Impact of Fintech on Banking*. European Economy: Banks, Regulation, and the Real Sector. https://european-economy.eu/2017-2/the-impact-of-fintech-on-banking/
- Wonglimpiyarat, J. (2017). FinTech banking industry: a systemic approach. *Foresight*, 19(6), 590–603. https://doi.org/10.1108/FS-07-2017-0026
- Zavolokina, L., Dolata, M., & Schwabe, G. (2016). The FinTech phenomenon: antecedents of financial innovation perceived by the popular press. *Financial Innovation*, 2. https://doi.org/10.1186/s40854-016-0036-7