

THE ROLE OF DIGITAL PAYMENT ADOPTION IN MEDIATING THE EFFECT OF FINANCIAL LITERACY, PERFORMANCE EXPECTANCY, EFFORT EXPECTANCY, AND DIGITAL LITERACY ON SMES PERFORMANCE

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ABSTRACT

This study examines the mediating role of digital payment adoption in the relationship between financial literacy, performance expectancy, effort expectancy, and digital literacy on the performance of small and medium-sized enterprises (SMEs). By integrating the Unified Theory of Acceptance and Use of Technology 2 (UTAUT-2) and financial literacy frameworks, this research provides empirical insights into how SMEs leverage digital payment systems to enhance financial management and business sustainability in Indonesia. Using Structural Equation Model Partial Least Squares (SEM-PLS), data were collected from 240 SMEs in Kuningan, West Java. The results indicate that digital literacy and performance expectancy significantly influence the adoption of digital payments, which in turn enhances SMEs performance. However, effort expectancy and financial literacy do not have a significant impact on digital payment adoption. Moreover, digital payment adoption is found to mediate the relationship between digital literacy and performance expectancy on SMEs performance. These findings highlight the importance of digital literacy and perceived usefulness in driving SMEs digitalization. Therefore, policymakers and financial institutions should focus on enhancing digital literacy programs and promoting the benefits of digital payments to accelerate SMEs adoption. Future research should expand the geographical scope and consider external factors such as government regulations and technological infrastructure.

Keywords: *Digital Payment, The Effect Of Financial Literacy, Performance EXPECTANCY, Effort EXPECTANCY, Digital Literacy Smes Performance*

1. INTRODUCTION

Micro, Small, and Medium Enterprises (MSMEs) play a crucial role in supporting Indonesia's economic growth, especially in regions such as Kuningan Regency, which is undergoing rapid development in trade and service sectors. SMEs also play a crucial role in Indonesia's economy, particularly in job creation and economic empowerment following the 1997 financial crisis [1]. Their contribution is substantial, accounting for approximately 61% of the national Gross Domestic Product (GDP) [2]. Additionally, SMEs significantly impact employment by absorbing around 97% of the total workforce [3]. Beyond job creation, SMEs also provide economic opportunities for many individuals, including those in rural areas.

However, SMEs owners still face difficulties in effective financial management, often leading to losses and changes in business types each year. [4] stated that proper financial management is highly relevant to the financial challenges faced by SMEs. Financial behavior involves how individuals manage, utilize, and treat their financial resources. Those with good financial literacy tend to be more efficient in financial management, including budgeting, expense efficiency, cost control, investment, and commitment to timely debt repayment [4]. The Financial Services Authority [5] defines financial literacy as the knowledge, confidence, and skills that influence attitudes and behaviors in improving decision-making quality and financial management.

In addition to financial literacy, the adoption of financial technology also plays a crucial role in enhancing financial management effectiveness. Data from the West Java Representative Office of Bank Indonesia shows that QRIS transactions in West Java reached IDR 90.86 trillion, with a transaction volume of 873.36 million as of September 2024. The number of QRIS merchants in the province totaled 7.5 million, accounting for approximately 21% of the national total. Previous studies have found that the use of e-commerce and e-payment significantly impacts SME performance, particularly in increasing sales and customer satisfaction [2]. Therefore, examining the impact of digital payment adoption on SME performance in West Java is relevant to understanding how this technology can support SMEs growth and sustainability.

The low adoption of digital payments poses a significant barrier to transactional efficiency and reduces the competitiveness of local businesses. According to [6], digitalization of financial systems, including digital payments, contributes significantly to improving efficiency, financial inclusion, and economic stability. Nevertheless, many MSMEs fail to fully comprehend these benefits due to limited financial and digital literacy. Moreover, business actors' perceptions of ease of use and expected performance (performance and effort expectancy) also influence their technology adoption decisions [7].

Several studies have examined the factors influencing the adoption of digital technology in the business sector. The Technology Acceptance Model (TAM) and other theories, such as Social Cognitive Theory (SCT) and the Innovation Diffusion Theory (IDT), have been widely used to understand user behavior toward technology [8]. However, these models primarily focus on the relationship between user attitudes and behavior, providing limited explanations regarding the impact of the technological environment on the adoption of digital payment systems in the SMEs context.

To address these limitations, the Unified Theory of Acceptance and Use of Technology 2 (UTAUT-2) was developed as a more comprehensive model and has been validated by various empirical studies [7]. This model includes factors such as performance expectancy, effort expectancy, and digital literacy, which are considered relevant in explaining SMEs' adoption of technology. Previous studies have found that performance expectancy and effort expectancy significantly influence SMEs' decisions to adopt digital payment systems [9].

However, prior research has shown mixed findings regarding the impact of digital literacy on digital payment adoption. Some studies indicate that digital literacy enhances digital technology adoption [10], while others suggest that external factors, such as infrastructure availability and government support, play a more significant role than digital literacy itself [11]. Therefore, this study aims to fill the research gap by examining the effects of financial literacy, performance expectancy, effort expectancy, and digital literacy on SMEs performance, mediated by digital payment adoption.

This study integrates the Unified Theory of Acceptance and Use of Technology 2 (UTAUT-2) with the financial literacy framework, an approach rarely explored in previous research. Most prior studies have primarily focused on technological factors in digital payment adoption, such as performance expectancy, effort expectancy, and social influence [7], without considering how financial literacy influences decision-making. Some studies, such as those by [7], emphasize that trust, perceived risk, and user experience play crucial roles in digital payment adoption but do not examine the impact of financial literacy. Therefore, this study investigates the role of financial literacy in SMEs' decisions to adopt digital payments by incorporating it into the UTAUT-2 model. The findings indicate that financial literacy does not significantly influence digital payment adoption, contradicting previous studies that suggest financial understanding enhances engagement in digital financial services [12]. Instead, digital literacy and performance expectancy are found to play a more significant role in SMEs' adoption of digital payment technology. Thus, this study provides a more comprehensive approach to understanding digital payment adoption by highlighting digital literacy as the key factor, rather than solely focusing on technological aspects or financial knowledge.

This study is crucial as it investigates how financial literacy, digital literacy, performance expectancy, and effort expectancy influence MSME performance through the mediating role of digital payment adoption. Unlike previous research, this study aims to explore not only direct relationships between variables but also the mediation mechanisms that have rarely been addressed in prior literature. Earlier studies have tended to focus on partial aspects. For example, [13] examined the influence of financial literacy on individual behavior but not specifically on MSME actors. [6] reviewed the adoption of digital payment systems from a technological standpoint without linking it to business performance.

Meanwhile, the UTAUT2 model by [7] has been widely used to assess technology acceptance but has yet to integrate literacy factors as contextual variables, especially within the Indonesian MSME setting.

This study aims to fill a gap in the literature that has primarily focused on the direct impact of financial literacy on SME performance or technology adoption, but has not thoroughly examined the mediating role of digital payment adoption in the relationship between different types of literacy and SME performance, particularly in local contexts such as Kuningan Regency. Most previous studies, such as those conducted by [13], place financial literacy as a primary predictor of financial behavior and financial technology adoption. However, the findings in this study show that digital literacy plays a more significant role, whereas financial

literacy does not have a substantial mediating effect on the use of digital payments.

Another gap that this study attempts to address is the limited integrative exploration between UTAUT2 variables (performance expectancy and effort expectancy) and literacy variables in the context of SMEs in non-urban areas. Previous research adopting the UTAUT2 model has typically been conducted in large industries or urban areas with established digital infrastructure, as seen in studies by [14]. Therefore, the main contribution of this study is to show that expectations about technology performance remain relevant in motivating digital adoption in the SME sector, but expectations of ease of use are not significant—a finding that diverges from previous results and emphasizes the importance of considering local characteristics in technology adoption analysis.

2. LITERATURE REVIEW

According to [15], financial literacy is defined as an individual's knowledge and understanding of financial concepts and risks, applied in decision-making to improve financial well-being. In the context of SMEs, financial literacy includes basic knowledge of financial record-keeping, cash management, financial planning, and the use of digital financial products [12]. A study by [16] found that low financial literacy is one of the main payment systems. Two primary variables in this model are Performance Expectancy (PE) and Effort Expectancy (EE). Performance Expectancy refers to the extent to which an individual believes that using technology will enhance their performance [14]. In the SMEs context, PE relates to the perception that digital payment systems can improve transaction efficiency, accelerate payment receipt, and expand market access [18]. Effort Expectancy refers to users' perceptions of how easy a technology is to use. Previous research has shown that the easier a technology is to use, the higher its adoption rate [19]. In the SMEs context, if digital payment systems are perceived as user-friendly and do not require advanced technical skills, business owners are more likely to adopt them [11].

According to [20], digital literacy encompasses the skills to understand, evaluate, and effectively use digital technology. A study by [21] found that a high level of digital literacy positively correlates with the adoption of internet-based technology among SMEs. [22] emphasized that SMEs with strong digital skills adapt more quickly to financial technology changes, including the use of digital wallets and e-payments. With the

causes of small and medium-sized business failures. Meanwhile, their research also emphasizes that improving financial literacy can encourage the adoption of financial technology and enhance SMEs competitiveness.

The Unified Theory of Acceptance and Use of Technology (UTAUT), developed by [17], is one of the key theories in explaining the factors influencing technology adoption, including digital increasing digitalization of the financial sector, SMEs ability to understand and utilize digital technology is a key factor in maintaining their competitiveness in the market. The study conducted by [23] in the Technology Acceptance Model (TAM) explains that technology acceptance is influenced by perceived ease of use and perceived usefulness. Research by [22] indicates that digital payment systems can enhance SMEs operational efficiency by reducing reliance on cash and speeding up transactions. Additionally, a study by [24] found that the use of digital payment systems also contributes to increased financial transparency, which ultimately leads to improved business performance.

2.1 Hypothesis Formulation

This study aims to analyze the relationship between various factors influencing the performance of SMEs using the Structural Equation Modeling Partial Least Squares (SEM-PLS) method. The independent variables in this research include financial literacy (X1), performance expectancy (X2), effort expectancy

(X3), and digital literacy (X4). Financial literacy refers to the level of understanding and ability of individuals or SMEs actors in managing finances [25], which is hypothesized to have a direct impact on SMEs performance as well as the adoption of digital payment systems. Performance expectancy and effort expectancy refer to perceptions of the ease of use and benefits of digital payment technology, while digital literacy serves as a supporting factor in the utilization of digital services by SMEs.

The mediating variable in this study is the adoption of digital payment systems, which acts as a bridge linking the influence of independent variables on SMEs performance (Y1). Thus, this research is expected to provide comprehensive insights into how these factors interact in enhancing the adoption of digital payment technology and improving SMEs performance.

2.1.1 The Influence of Financial Literacy on the Adoption of Digital Payment Systems and SMEs Performance

Previous research by [13] indicates that individuals with higher financial literacy levels have better capabilities in managing business finances, optimizing investments, and mitigating financial risks, ultimately leading to a positive impact on business performance. Additionally, a study conducted by [26] found that financial literacy plays a significant role in enhancing the profitability and competitiveness of SMEs. On the other hand, financial literacy also influences the adoption of digital payment systems. According to Williamson (1998), individuals with better financial literacy tend to have a greater understanding of financial technology and are more open to digital innovations, including digital payment systems. This finding is further supported by Grohmann et al. (2018), who demonstrated that financial literacy enhances the adoption of technology-based financial services, such as mobile banking and digital payments.

Therefore, it can be assumed that financial literacy not only has a positive impact on MSME performance but also drives the adoption of digital payment systems, which, in turn, can improve operational efficiency and market access for SMEs.

H1: Financial literacy has a positive effect on MSME performance.

H2: Financial literacy has a positive effect on the adoption of digital payment systems

2.1.2 The Influence of Performance

Expectancy on the Adoption of Digital Payment Systems

The Unified Theory of Acceptance and Use of Technology (UTAUT) explains that performance expectancy is one of the key factors influencing technology adoption. Performance expectancy refers to the extent to which individuals believe that using a particular technology will enhance their performance. In this context, performance expectancy is defined as the belief of SMEs actors that adopting digital payment systems can improve operational efficiency, accelerate transaction processes, and enhance customer experience. Therefore, the third hypothesis (H3) states that performance expectancy has a positive effect on the adoption of digital payment systems. This finding aligns with previous studies, which have shown that performance expectancy is a significant determinant in technology adoption decisions [27].

However, prior research has also found that in the context of mobile banking in Bangladesh, performance expectancy did not significantly influence the intention to adopt technology among certain user groups. Instead, it played a more significant role in actual technology usage when supporting conditions were available. This suggests that in some cases, other factors, such as effort expectancy or social influence, may have a more dominant impact on technology adoption intentions.

H3: Performance expectancy has a positive effect on the adoption of digital payment systems.

2.1.3 The Influence of Effort Expectancy on the Adoption of Digital Payment Systems

According to the Unified Theory of Acceptance and Use of Technology (UTAUT), effort expectancy is one of the key factors influencing technology adoption. Effort expectancy measures the extent to which users perceive a technology as easy to understand and use. SMEs that find digital payment systems easy to operate are more likely to adopt them, which subsequently enhances transaction efficiency and expands market reach. Therefore, the fourth hypothesis (H4) states that effort expectancy has a positive effect on the adoption of digital payment systems, acting as a mediating variable. This finding is supported by research indicating that ease of use is a crucial factor in technology adoption decisions [8].

H4: Effort expectancy has a positive effect on the adoption of digital payment systems.

2.1.4 The Adoption of Digital Payment Systems Mediates the Influence of Performance Expectancy and Effort Expectancy on MSME Performance

A study conducted by [28] found that the adoption of digital payment systems, such as QRIS, is significantly influenced by performance expectancy and effort expectancy. In the context of SMEs, high performance expectancy indicates that the greater the business owners' confidence in the benefits of digital payment technology in improving business efficiency, the higher their intention to adopt it.

The adoption of digital payment systems has been widely discussed as a crucial innovation that can enhance SME performance, particularly in the digital era. This system enables SMEs to improve operational efficiency, expand market access, and provide customers with a more seamless and convenient payment experience. According to [28], digital payment adoption increases transaction volume, accelerates cash flow, and enhances overall financial management, ultimately leading to improved SME performance.

However, not all studies support this perspective. For instance, research by Singh et al. (2020) found that adopting digital payment systems does not always have a positive impact on MSME performance. In cases where MSMEs have low digital literacy or limited technological infrastructure, digital payment systems may instead increase operational costs and introduce additional complexities. Thus, while strong evidence supports the benefits of digital payment adoption, these conflicting findings highlight the need to consider moderating factors such as technological readiness and MSMEs' managerial capacity when analyzing the impact of digital payment systems on business performance.

H5: The adoption of digital payment systems mediates the influence of performance expectancy and effort expectancy on MSME performance.

2.1.5 The Influence of Digital Literacy on the Adoption of Digital Payment Systems and SMEs Performance

According to research by [29], digital literacy enables SMEs owners to access market information more easily, enhance operational efficiency, and expand business networks through

digital platforms, ultimately having a positive impact on business performance. Additionally, a study by [30] found that SMEs with higher levels of digital literacy are more likely to adopt digital technologies, including digital payment systems, to improve transaction efficiency and customer satisfaction. Another study by [31] also discovered that digital literacy plays a crucial role in accelerating the adoption of financial technology among SMEs, as it facilitates the understanding and utilization of innovative digital services. Thus, digital literacy not only contributes to improving SMEs performance but also accelerates the adoption of digital payment systems, which have become an essential component of the modern business ecosystem.

H6: Digital literacy has a positive effect on the adoption of digital payment systems.

H7: Digital literacy has a positive effect on SME performance.

3. RESEARCH METHODOLOGY

This study employs the Structural Equation Modeling (SEM) method to analyze the factors influencing digital payment adoption and its impact on SMEs performance. SEM was chosen because it can analyze complex relationships between latent variables, both directly and indirectly, within a single integrated analytical model.

3.1. Approach and Analytical Tools

The SEM method in this study is conducted using Partial Least Squares-Structural Equation Modeling (PLS-SEM). PLS-SEM is chosen for its advantages in analyzing models with limited samples, non-normally distributed data, and exploratory models [23]. This analysis is performed using Smart PLS 4 software, which enables simultaneous testing of structural and measurement models.

3.2. Population and Sample

The population in this study consists of MSME actors in Kuningan, West Java, who have adopted digital payments in their business operations. The research sample consists of 240 MSMEs, selected using purposive random sampling. This technique ensures that the chosen respondents have active businesses, have been operating for at least one year, and have access to digital technology. This sample size meets the minimum standard for SEM analysis, which

requires 5–10 times the number of indicators in the model [24].

3.3. Variable Measurement and Research Instruments

This study utilizes a structured questionnaire to measure variables adapted from previous research, using a 5-point Likert scale (1 = strongly disagree, 5 = strongly agree). The variables used in this study include:

3.3.1. Independent Variable:

1. Digital Literacy: Measured by indicators of the ability to use, understand, and utilize digital technology in business [25].
2. Effort Expectancy: Measured by the ease of use of digital payment systems [26].
3. Performance Expectancy: Measured by the benefits gained from digital payment

systems in improving business efficiency [14].

4. Financial Literacy: Measured by the understanding of financial management in business [27].

3.3.2. Mediation Variable:

1. Adoption of Digital Payment: Measured by the frequency and extent of digital payment method usage in business transactions [6].

3.3.3. Dependen Variable:

1. SMEs Performance: Measured by revenue growth, operational efficiency, and business competitiveness [28].

The indicators used for measurement in this study are presented in the following table (Table 1).

Table 1. Indicator of Each Variables

| Variable | No. | Statement | Reference |
|--------------------------|-----|---|-----------|
| Digital Payment Adoption | AP1 | I frequently use digital payment services in my daily life. | [32] |
| | AP2 | I rely on digital payment services for my financial transactions. | [32] |
| | AP3 | I recommend digital payment services to others. | [32] |
| Effort Expectancy | EE1 | I find the use of digital payment services easy to understand for my business needs. | [32] |
| | EE2 | My interaction with digital payment services feels simple and easy to use in business activities. | [32] |
| | EE3 | I find it easy to become skilled in using digital payment services to support business operations. | [32] |
| performance (SMEs) | KM1 | My sales continue to increase. | [32] |
| | KM2 | My market share is expanding. | [32] |
| | KM3 | My net income has increased. | [32] |
| Digital Literacy | LD1 | I feel confident in receiving or making payments online/cashless. | [33] |
| | LD2 | I can make online/cashless transactions without anyone's assistance. | [33] |
| | LD3 | I understand how to use applications or digital platforms (such as marketplaces, social media, or digital wallets) for my business. | [33] |

| | | | |
|------------------------|-----|--|------|
| | LD4 | I feel that using digital technology provides significant benefits to my business. | [33] |
| | LD5 | I have adequate access to digital devices (such as smartphones, computers, or tablets) to run my business. | [33] |
| Financial Literacy | LK1 | I regularly save to achieve long-term financial goals, such as funding education, buying a house, or preparing for retirement. | [34] |
| | LK2 | I set aside a portion of my monthly income for future needs. | [34] |
| | LK3 | I feel more satisfied saving for the future than spending it. | [34] |
| Performance Expectancy | PE1 | I find digital payment services beneficial in supporting my daily business activities. | [35] |
| | PE2 | The use of digital payment services increases my business productivity. | [35] |
| | PE3 | Digital payment services help me complete business tasks more efficiently. | [35] |

3.4. Data Analysis Techniques

This study employs two main stages in SEM-PLS: the measurement model assessment and the structural model assessment.

The evaluation of the SEM-PLS model in this study consists of two main stages: the measurement model and the structural model assessments. The measurement model evaluation aims to ensure the validity and reliability of the indicators for each latent variable through convergent validity, discriminant validity, and

reliability testing using composite reliability and Cronbach's alpha. Once validated, the structural model is assessed to examine the hypothesized relationships among latent variables using path coefficients and t-statistics (via bootstrapping), R-square (R^2) for explanatory power, effect size (f^2), predictive relevance (Q^2), and p-values to determine the significance of each relationship. These evaluations collectively ensure the robustness and predictive accuracy of the overall model.

4. RESEARCH RESULT

Based on the data analysis using SMART PLS, the results are as follows:

the validity and reliability of research instruments in measuring latent variables. Thus, Outer Model testing ensures that the research instruments used are valid and reliable before analyzing relationships between variables in the Inner Model,

The Outer Model testing in Structural Equation Modeling (SEM) aims to assess leading to accurate and credible research results. The following presents the results of the Outer Model testing. The results of the outer loading test is presented in Table 2 below.

Table 2. Outer Loading Values for Each Variable Indicator

| | Digital Payment Adoption | Digital Literacy | Effort Expectancy | SME Perform | Financial Literacy | Performance Expectancy |
|-----|--------------------------|------------------|-------------------|-------------|--------------------|------------------------|
| AP1 | 0.846 | | | | | |
| AP2 | 0.820 | | | | | |
| AP3 | 0.880 | | | | | |
| EE1 | | | 0.850 | | | |

| | | | |
|-----|-------|-------|-------|
| EE2 | | 0.829 | |
| EE3 | | 0.879 | |
| KM1 | | | 0.807 |
| KM2 | | | 0.810 |
| KM3 | | | 0.800 |
| LD1 | 0.760 | | |
| LD2 | 0.772 | | |
| LD3 | 0.818 | | |
| LD4 | 0.832 | | |
| LD5 | 0.772 | | |
| LK2 | | | 0.731 |
| LK3 | | | 0.937 |
| PE1 | | | 0.839 |
| PE2 | | | 0.873 |
| PE3 | | | 0.828 |

Based on the results of the factor loading analysis in SEM data processing, all indicators used to measure each construct demonstrate good validity. Digital Payment Adoption has high factor loadings, ranging from 0.820 to 0.880, indicating that indicators AP1, AP2, and AP3 effectively reflect the construct. The same applies to the Effort Expectancy construct, where all its indicators (EE1, EE2, and EE3) have factor loadings above 0.829, signifying that this construct has been well-measured.

In the SME Performance construct, the indicators KM1, KM2, and KM3 also demonstrate good validity, with loading values ranging from 0.800 to 0.810. Meanwhile, Digital Literacy, measured

using five indicators, has relatively strong factor loadings, ranging from 0.760 to 0.832, indicating that all indicators are sufficiently representative in measuring digital literacy. The Financial Literacy construct has two indicators, LK2 and LK3, with factor loadings of 0.731 and 0.937, respectively. Although LK2 has a lower loading value compared to LK3, it still falls within the acceptable range. Meanwhile, the Performance Expectancy construct, measured using three indicators, has high factor loadings ranging from 0.828 to 0.873, indicating that these indicators strongly represent the measured construct. Overall, all indicators in this model have factor loadings above 0.70, indicating good indicator valid

Table 3. Results of Construct Validity and Reliability Testing

| | Cronbach's Alpha | rho_A | Composite Reliability | Average Variance Extracted (AVE) |
|--------------------------|------------------|-------|-----------------------|----------------------------------|
| Digital Payment Adoption | 0.806 | 0.810 | 0.886 | 0.721 |
| Digital Literacy | 0.851 | 0.854 | 0.893 | 0.626 |
| Effort Expectancy | 0.814 | 0.829 | 0.889 | 0.727 |
| SMEs Performance | 0.730 | 0.730 | 0.847 | 0.649 |
| Financial Literacy | 0.718 | 0.809 | 0.826 | 0.706 |
| Performance Expectancy | 0.803 | 0.808 | 0.884 | 0.717 |

Based on the results of construct reliability and validity testing using Cronbach's Alpha, rho_A, Composite Reliability (CR), and Average Variance Extracted (AVE), it can be concluded that all constructs in this model exhibit good reliability and validity. The Cronbach's Alpha values for all constructs exceed 0.70, indicating adequate internal consistency among the indicators within each construct. Digital Literacy has the highest Cronbach's Alpha value at 0.851, while Financial Literacy has the lowest at 0.718, yet it remains within the acceptable threshold. Additionally, the Composite Reliability (CR) values for all constructs exceed 0.80,

indicating excellent reliability, making these constructs suitable for further analysis.

Furthermore, convergent validity tested through AVE demonstrates satisfactory results, with all constructs having values above 0.60. The highest AVE value is found in Effort Expectancy (0.727), while the lowest is in Digital Literacy (0.626), still indicating that the indicators within each construct explain a substantial amount of variance. Thus, this model exhibits strong reliability and convergent validity, making it suitable for the next stages of analysis, such as discriminant validity testing and examining the relationships between variables in the research model.

Table 4. Discriminant Validity Test Results

| | Digital Payment Adoption | Digital Literacy | Effort Expectancy | SME Perform | Financial Literacy | Performance Expectancy |
|-----------------------------|--------------------------------|---------------------|----------------------|----------------|-----------------------|---------------------------|
| Digital Payment Adoption | 0.849 | | | | | |
| Digital Literacy | 0.713 | 0.791 | | | | |
| Effort Expectancy | 0.577 | 0.605 | 0.853 | | | |
| SMES Performance | 0.566 | 0.517 | 0.450 | 0.806 | | |
| Financial Literacy | 0.210 | 0.219 | 0.281 | 0.243 | 0.841 | |
| Performance Expectancy | 0.624 | 0.629 | 0.748 | 0.464 | 0.363 | 0.847 |

Based on the discriminant validity analysis using the Fornell-Larcker method, it can be concluded that the research model demonstrates adequate discriminant validity. Discriminant validity is assessed by comparing the square root of the Average Variance Extracted (AVE), displayed in bold along the diagonal, with the correlations between constructs outside the diagonal. Each construct has a square root of AVE greater than its correlation with other constructs, indicating that each construct explains more variance in its own indicators than the variance shared with other constructs. For example, Digital Payment Adoption has a square root of AVE of 0.849, which is higher than its correlation with other constructs, such as Digital Literacy (0.713) and Effort Expectancy (0.577). A similar pattern is observed for Effort Expectancy (0.853), SMEs Performance (0.806), Financial Literacy (0.841), and Performance Expectancy (0.847), each of which has a higher

value compared to its correlation with other constructs.

However, there are relatively high correlations between certain variables, such as Digital Payment Adoption and Digital Literacy (0.713), as well as Performance Expectancy and Effort Expectancy (0.748), which may indicate a strong relationship between these constructs. Nevertheless, overall, these results demonstrate that each construct has adequate discriminant validity, making them suitable for analyzing the relationships between variables in this study.

Next, the inner model testing is conducted. Inner Model testing in Structural Equation Modeling (SEM) aims to evaluate the structural relationships between latent variables in the research model. This test ensures that the relationships between constructs in the model have strong predictive power and align with the underlying theory. Several key indicators in Inner Model testing include R-squared (R^2), which

measures the predictive power of independent variables on the dependent variable, Path Coefficient (β), which assesses the significance of relationships between variables, as well as Effect Size (f^2) and Predictive Relevance (Q^2), which

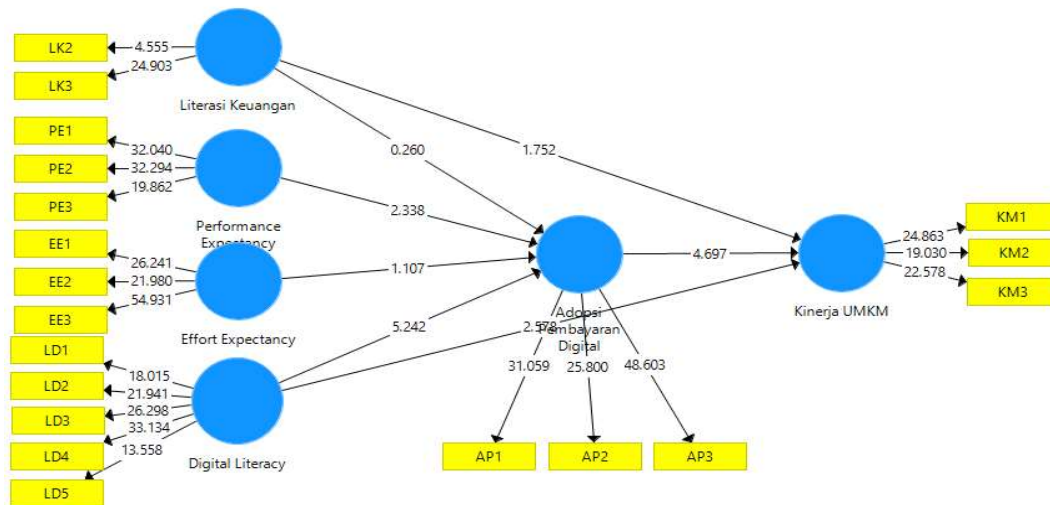
evaluate the impact and predictive relevance of the model. Additionally, significance testing using t-statistic and p-value is conducted to determine whether the relationships in the model are statistically significant.

Table 5. R-Square Test Results

| | R Square | R Square Adjusted |
|--------------------------|----------|-------------------|
| Digital Payment Adoption | 0.563 | 0.556 |
| SMEs Perform | 0.359 | 0.351 |

Based on the analysis of R-Square (R^2) and Adjusted R-Square, it can be concluded that this research model has a fairly good predictive ability. Digital Payment Adoption has an R^2 value of 0.563, meaning that 56.3% of the variance in Digital Payment Adoption can be explained by the independent variables in the model, while the remaining 43.7% is influenced by other factors outside the model. This value indicates that the

variables in the model provide a relatively strong contribution in explaining Digital Payment Adoption. Meanwhile, SMEs Performance has an R^2 value of 0.359, indicating that 35.9% of the variance in SME Performance can be explained by the variables used in the model, while 64.1% is influenced by other factors not included in this study.



Picture 1. The Developed Full Model

Based on the structural model diagram shown, the T-Values indicate the significance of each path between variables. The path from *Digital Literacy* to *Digital Payment Adoption* shows the highest T-Value of 5.242, suggesting a very strong and significant influence. This is followed by the path from *Performance Expectancy* to *Digital Payment Adoption* with a T-Value of 2.338, which is also statistically significant. The effect of *Effort Expectancy* on *Digital Payment Adoption* is less significant, with a T-Value of 1.107, falling below the commonly accepted threshold of 1.96.

Similarly, *Financial Literacy* has the weakest influence on *Digital Payment Adoption*, with a T-Value of 0.260, indicating an insignificant effect. Meanwhile, *Digital Payment Adoption* has a significant impact on *MSME Performance*, with a T-Value of 4.697. Overall, the analysis highlights that *Digital Literacy* is the most influential factor in encouraging the adoption of digital payments, which in turn significantly enhances the performance of MSMEs. Specifically, an explanation of each path will be presented in the table and discussion below:

Table 6. Direct Path Coefficient Test Results

| | Original Sample (O) | Sample Mean (M) | Standard Deviation (STDEV) | T Statistics (O/STDEV) | P Values |
|--|---------------------------|-----------------------|----------------------------------|-----------------------------|-------------|
| Digital Payment Adoption -> SMEs Perform | 0.388 | 0.387 | 0.083 | 4.697 | 0.000 |
| Digital Literacy -> Digital Payment Adoption | 0.509 | 0.517 | 0.097 | 5.242 | 0.000 |
| Digital Literacy -> SMEs Perform | 0.216 | 0.219 | 0.084 | 2.578 | 0.010 |
| Effort Expectancy -> Digital Payment Adoption | 0.094 | 0.090 | 0.085 | 1.107 | 0.269 |
| Financial Literacy -> Digital Payment Adoption | -0.014 | -0.009 | 0.055 | 0.260 | 0.795 |
| Financial Literacy -> SMEs Perform | 0.115 | 0.121 | 0.065 | 1.752 | 0.040 |
| Performance Expectancy -> Digital Payment Adoption | 0.239 | 0.234 | 0.102 | 2.338 | 0.020 |

Based on the statistical analysis table provided, the following is the interpretation of each relationship between variables based on the Original Sample (O), T-Statistics, and P-Values:

1. Significant Relationship (P-Value < 0.05)

The following relationship is statistically significant, meaning the independent variable has a significant impact on the dependent variable.

- 1) Digital Payment Adoption → SMEs Performance (O = 0.388, T = 4.697, P = 0.000).

Result: Digital payment adoption has a positive and significant effect on SMEs performance

- 2) Digital Literacy → Digital Payment Adoption (O = 0.509, T = 5.242, P = 0.000)

Result: Digital literacy has a positive and significant effect on digital payment adoption. The higher the level of digital literacy, the greater the likelihood that SME will adopt digital payments.

- 3) Digital Literacy → SMEs Performance (O = 0.216, T = 2.578, P = 0.010)

Result: Digital literacy also has a direct impact on improving SME performance.

- 4) Financial Literacy → SMEs Performance (O = 0.115, T = 1.752, P = 0.040)

Result: Financial literacy has a positive effect on SMEs performance. This indicates that better financial

understanding can enhance business performance.

- 5) Performance Expectancy → Digital Payment Adoption (O = 0.239, T = 2.338, P = 0.020)

Result: Performance expectancy has a positive and significant effect on digital payment adoption. If MSME owners believe that digital payments will improve efficiency, they are more likely to adopt them.

2. Non-Significant Relationship (P-Value > 0.05)

The following relationships are not statistically significant, meaning the independent variable does not have a strong enough impact on the dependent variable.

- 1) Effort Expectancy → Digital Payment Adoption (O = 0.094, T = 1.107, P = 0.269)

Result: Effort expectancy does not have a significant effect on digital payment adoption. This means that the ease of use of digital payment systems is not the primary factor driving adoption.

- 2) Financial Literacy → Digital Payment Adoption (O = -0.014, T = 0.260, P = 0.795)

Result: Financial literacy does not have a significant effect on digital payment adoption. This indicates that financial understanding is not a

key factor in SMEs decision to adopt digital payments.

Table 7. Results of Indirect Path Coefficient Testin

| | Original Sample (O) | Sample Mean (M) | Standard Deviation (STDEV) | T Statistics ((O/STDEV)) | P Values |
|--|---------------------|-----------------|----------------------------|--------------------------|----------|
| Digital Literacy -> Digital Payment Adoption -> SMEs Performance | 0.197 | 0.198 | 0.051 | 3.895 | 0.000 |
| Effort Expectancy -> Digital Payment Adoption -> SMEs Performance | 0.037 | 0.036 | 0.036 | 1.020 | 0.308 |
| Financial Literacy -> Digital Payment Adoption -> SMEs Performance | -0.006 | -0.002 | 0.022 | 0.255 | 0.798 |
| Performance Expectancy -> Digital Payment Adoption -> SMEs Performance | 0.093 | 0.091 | 0.045 | 2.074 | 0.039 |

Significant Mediation Relationship (P-Value < 0.05)

The following relationships have a significant impact on SMEs performance through digital payment adoption:

1. Digital Literacy → Digital Payment Adoption → SMEs Performance (O = 0.197, T = 3.895, P = 0.000)
Interpretation: Digital literacy indirectly enhances MSME performance through digital payment adoption. This indicates that the higher the level of digital literacy, the greater the likelihood of SMEs adopting digital payments, ultimately improving their performance.
2. Performance Expectancy → Digital Payment Adoption → SMEs Performance (O = 0.093, T = 2.074, P = 0.039)
Interpretation: Performance expectancy has an indirect impact on MSME performance through digital payment adoption. This means that if SMEs entrepreneurs believe that digital payments can improve efficiency, they are more likely to adopt them, which in turn positively affects their business performance.

Non-Significant Mediation Relationship (P-Value > 0.05)

The following relationships are not statistically significant, meaning the independent variables do not have a strong enough indirect effect on SMEs performance through digital payment adoption:

1. Effort Expectancy → Digital Payment Adoption → SMEs Performance (O = 0.037, T = 1.020, P = 0.308)
Interpretation: Effort expectancy does not have a significant indirect impact on MSME performance. This indicates that the ease of using digital payments is not a primary factor driving MSME performance improvement through the adoption of this technology.
2. Financial Literacy → Digital Payment Adoption → SMEs Performance (O = -0.006, T = 0.255, P = 0.798)
Interpretation: Financial literacy does not influence SMEs performance through digital payment adoption. This suggests that having good financial knowledge does not necessarily encourage SMEs to adopt digital payments as a tool to enhance their business performance.

The findings of this study indicate that digital literacy and performance expectancy are the main factors driving the adoption of digital payments by SMEs. These results align with the study conducted by [36] in the Unified Theory of Acceptance and Use of Technology (UTAUT), which states that performance expectancy is one of the key determinants in technology adoption. SMEs owners who believe that using digital payments can improve operational efficiency and profitability are more likely to adopt them.

Furthermore, digital literacy plays a significant role in digital payment adoption, as evidenced by previous studies. According to research by [37], SMEs with strong digital literacy skills are more likely to adopt financial technology because they can operate applications, understand the benefits, and overcome potential technical challenges. The study by [38] further supports this argument, stating that the adoption of digital technology in small businesses is highly influenced by the digital capabilities of business owners or managers.

On the other hand, the findings of this study show that effort expectancy and financial literacy do not have a significant influence on digital payment adoption. This finding supports the research by [27], which found that in the context of financial technology adoption, ease of use (effort expectancy) has less influence compared to the benefits users obtain (performance expectancy). This is because modern digital payment systems are designed with intuitive and user-friendly interfaces, making effort expectancy less relevant.

Additionally, low financial literacy does not appear to hinder the adoption of digital payments, contradicting some previous studies that suggest financial understanding plays a role in the decision to use digital financial services [12]. However, in the context of SMEs, financial literacy is often more focused on business financial management rather than the selection of payment methods. Thus, even if an entrepreneur has good financial knowledge, it does not necessarily encourage them to use digital payment systems.

Furthermore, this study confirms that digital payment adoption contributes to improving SMEs performance. This is consistent with research conducted by [39], which states that digital payment systems enhance market access, speed up transactions, and improve financial transparency. SMEs that adopt digital payments can serve customers more quickly and efficiently, increasing customer satisfaction and accelerating business cash flow turnover.

Another finding indicates that digital literacy and performance expectancy also have a significant indirect influence on SMEs performance through digital payment adoption. This supports the Technology Acceptance Model (TAM) developed [23], which states that perceived usefulness of a technology contributes to its acceptance, ultimately impacting user productivity. In other words, SMEs with a high level of digital literacy are more likely

to adopt digital payments, which in turn enhances operational efficiency and business performance.

As an implication of this study, SMEs owners should enhance their digital literacy to optimize the use of digital payment technology for business development. Additionally, policymakers and digital financial service providers should strengthen training programs and awareness campaigns regarding the benefits and positive impacts of digital payments on business growth to encourage wider adoption among SME.

5. CONCLUSION

The results of the study show that the adoption of digital payments significantly improves the performance of MSMEs in Kuningan Regency. This is in line with the findings of Wamba et al. (2020) which states that digitalization can increase the efficiency and competitiveness of small businesses. Digital literacy has been shown to be a dominant factor driving the adoption of this technology, as well as having a direct influence on improving the performance of MSMEs. This shows that the ability of business actors to understand and use technology is crucial in supporting digital transformation, as emphasized by Park et al. (2019).

Interestingly, effort expectations (ease of use) and financial literacy do not have a significant effect on the adoption of digital payments. This may be due to the level of familiarity of MSMEs with technology which is already quite high, so that ease is no longer the main determining factor, as also found by Alalwan et al. (2017). However, financial literacy still has a positive effect on MSME performance, as explained by Lusardi and Mitchell (2017), that financially competent business actors are able to make better business decisions, although they are not necessarily motivated to adopt digital payment systems.

This study not only presents new information on the role of digital literacy and performance expectations on MSME performance through the adoption of digital payments, but also offers best practices that can be adopted by policy makers and MSME actors. These best practices include the importance of strengthening digital literacy as a primary strategy rather than relying solely on increasing financial literacy, as well as an educational approach that focuses on the practical benefits of technology for business, not just on the technical ease of use. This strategy can be applied in MSME training aimed at increasing operational efficiency and competitiveness through transaction digitalization..

This finding suggests that policy and training approaches that emphasize strengthening digital literacy are more likely to increase technology adoption in the MSME sector than simply providing information about the benefits or ease of use. In the context of the UTAUT2 model (Venkatesh et al., 2012), it appears that perceptions of the benefits of technology are more decisive in determining adoption decisions than perceptions of ease. Thus, this study contributes to a new understanding of the importance of integrating digital literacy into MSME empowerment strategies in the digital era.

The results of the analysis show that digital payment adoption significantly mediates the relationship between digital literacy and MSME performance, with a high significance value ($p < 0.001$). This means that MSMEs with high digital literacy tend to be able to utilize digital payment systems effectively, which ultimately improves their business performance. This is reinforced by the findings of Park et al. (2019) which emphasizes that digital literacy not only opens access to technology but also increases the ability to use it to achieve efficiency and innovation in small and medium businesses. Strong digital literacy allows MSMEs to understand the benefits of digital technology strategically, not just operationally. Meanwhile, performance expectancy also shows a significant mediation effect through digital payment adoption. This means that when business actors believe that the use of technology will increase productivity and profits, they are more motivated to adopt digital systems and gain performance benefits. This is in accordance with the UTAUT2 theory by Venkatesh et al. (2012) which emphasizes that expectations of performance results are the main determinants in the adoption of new technology. This finding is also in line with the study of Alalwan et al. (2017) which shows that perceptions of the usefulness of technology are more important than perceptions of ease of use in the context of digital system adoption by non-technical users.

In contrast, effort expectancy and financial literacy did not show a significant mediation effect, indicating that even though business actors have financial literacy or find the system easy to use, this is not enough to encourage optimal use of digital payments to improve business performance. This may be due to external factors such as limited infrastructure, lack of incentives, or even cultural resistance to new technologies. Lusardi and Mitchell (2017) also noted that financial literacy tends to influence savings behavior and long-term planning, but does not always encourage engagement with

financial technology. Thus, a more comprehensive and integrated intervention is needed that combines digital literacy, direct benefit-based training, and infrastructure support.

Based on the research findings and identified limitations, several recommendations can be made. For MSMEs, improving digital literacy should be a priority to better prepare them for adopting digital payment technology and enhancing their competitiveness. For government and financial institutions, more comprehensive education and training programs on digital literacy and the benefits of digital payments for MSMEs are needed to encourage wider and more effective adoption of this technology. For future research, it is recommended to expand the geographical scope of the study and consider external factors such as regulations, user trust, and technological barriers in the analytical model. Additionally, digital payment service providers are encouraged to continuously improve the ease of use and convenience of their payment systems to make them more appealing to SMEs entrepreneurs, especially those who are still hesitant to adopt this technology. With the right strategies, SMEs are expected to adapt more quickly to digital technological advancements and strengthen their competitiveness in the digital economy era.

6. FUTURE RESEARSH

This study makes a significant contribution to the development of literature in the field of MSME digital transformation, especially in the context of developing countries such as Indonesia that are still facing the digital divide. New knowledge created in this study is the finding that digital literacy has a strong mediating influence on MSME performance through the adoption of digital payments, while financial literacy and effort expectations do not play a significant role in the mediation pathway. This challenges the general assumption in previous literature that often emphasizes the importance of financial literacy as the main driver of financial technology adoption. In addition, this study also broadens the understanding of the application of the UTAUT2 model in the context of MSMEs, by showing that performance expectations have a greater impact than ease expectations in influencing technology adoption decisions.

This finding highlights the need for a more contextual approach in the implementation of digital transformation, where perceptions of the practical benefits of technology are more decisive than perceptions of technical convenience, especially in

the informal and micro-scale sectors. This provides a new direction for policy designers and MSME facilitators to emphasize functional benefits in digital literacy programs, rather than simply introducing technology technically.

Following up on the conclusions that have been put forward, this study confirms that digital literacy and performance expectations are key factors in driving the adoption of digital payments that have a direct impact on MSME performance. However, the low significance of financial literacy and performance expectations opens up new space for further exploration of other non-technical and non-functional factors that can influence technology adoption decisions, such as digital culture, trust in the system, or even local regulations. This indicates that technology adoption in the MSME sector is not only a matter of individual capabilities, but is also influenced by the digital ecosystem that surrounds it.

An important gap that has not been fully answered in this study is how contextual factors such as gender, age of business actors, micro-business scale, and access to digital infrastructure interact with key variables in influencing technology adoption. In addition, the lack of exploration of

longitudinal dynamics—how changes in digital literacy and habits over a certain period of time affect adoption patterns and impact business performance—is another gap that needs to be filled by further research. This study is still cross-sectional, so it cannot capture changes in behavior over time or the influence of ongoing policies.

AUTHORS CONTRIBUTION

Fatimah Almunawwaroh contributed to the conceptualization of the study, formulation of the problem, collection of field data, statistical analysis, and writing the initial draft of the article.

Rindang Widuri was responsible for the literature review, instrument validation, interpretation of the results, preparation of the theoretical framework, and revision and editing of the final manuscript.

Both authors actively discussed together in formulating conclusions and developing further research directions.

REFERENCES

- [1] A. Munthe, M. Yarham, and R. Siregar, "Peranan UMKM terhadap perekonomian Indonesia," *J. Ekon. Bisnis, Manaj. dan Akunt.*, vol. 2, no. 3, pp. 593–614, 2023.
- [2] A. C. Sari and H. H. Adinugraha, "Implementation of QRIS-Based Payments Towards the Digitalization of Indonesian MSMEs Arum Candra Sari Hendri Hermawan Adinugraha Abstrak Background The Covid-19 pandemic that occurred in 2019 has become the biggest challenge for every country in the world," *Ekon. SYARIAH J. Econ. Stud.*, vol. 5, no. 2, 2021, [Online]. Available: <http://dx.doi.org/10.30983/es.v5i2.5027>
- [3] T. J. Chemmanur, M. B. IMERMAN, H. RAJAIYA, and Q. YU, "Recent Developments in the Fintech Industry," *J. Financ. Manag. Mark. Institutions*, vol. 8, no. 1, pp. 1–31, 2020, doi: 10.1142/S2282717X20400022.
- [4] E. N. Anisyah, D. Pinem, and S. Hidayati, "Pengaruh literasi keuangan, inklusi keuangan dan financial technology terhadap perilaku keuangan pelaku UMKM di Kecamatan Sekupang," *Manag. Bus. Rev.*, vol. 5, no. 2, pp. 310–324, 2021, doi: 10.21067/mbr.v5i2.6083.
- [5] A. Grohmann, T. Klühs, and L. Menkhoff, "Does financial literacy improve financial inclusion? Cross country evidence," *World Dev.*, vol. 111, pp. 84–96, 2018, doi: 10.1016/j.worlddev.2018.06.020.
- [6] P. K. Ozili, "Impact of digital finance on financial inclusion and stability," *Borsa Istanbul Rev.*, vol. 18, no. 4, pp. 329–340, 2018, doi: 10.1016/j.bir.2017.12.003.
- [7] V. Venkatesh, J. y. . Thong, and X. Xu, "Consumer Acceptance and Use of Information Technology: Extending the Unified Theory of Acceptance and Use of Technology by Viswanath Venkatesh, James Y.L. Thong, Xin Xu :: SSRN," *MIS Q.*, vol. 36, no. 1, pp. 157–178, 2012, [Online]. Available: https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2002388
- [8] V. Venkatesh, J. Y. L. Thong, and X. Xu, "Unified Theory of Acceptance and Use of Technology: A Synthesis and the Road Ahead by Viswanath Venkatesh, James Y.L. Thong, Xin Xu :: SSRN," *J. Assoc. Inf. Syst.*, vol. 17, no. 5, pp. 328–376, 2016, [Online]. Available:

- https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2800121
- [9] P. P. Patil, N. P. Rana, Y. K. Dwivedi, and H. M. J. Abu-Hamour, "The role of trust and risk in mobile payments adoption: A meta-analytic review," *Proc. 22nd Pacific Asia Conf. Inf. Syst. - Oppor. Challenges Digit. Soc. Are We Ready?, PACIS 2018*, vol. 3, pp. 193–210, 2018.
- [10] A. Raman and Y. Don, "Preservice teachers' acceptance of learning management software: An application of the UTAUT2 model," *Int. Educ. Stud.*, vol. 6, no. 7, pp. 157–164, 2013, doi: 10.5539/ies.v6n7p157.
- [11] N. K. Singh, G. P. Sahu, N. P. Rana, P. P. Patil, and B. Gupta, *Critical success factors of the digital payment infrastructure for developing economies*, vol. 533. Springer International Publishing, 2019. doi: 10.1007/978-3-030-04315-5_9.
- [12] A. Lusardi and O. S. Mitchell, "The economic importance of financial literacy: Theory and evidence," *J. Econ. Lit.*, vol. 52, no. 1, pp. 5–44, 2014, doi: 10.1257/jel.52.1.5.
- [13] A. Lusardi and O. S. Mitchell, "The economic importance of financial literacy: Theory and evidence," *J. Econ. Lit.*, vol. 52, no. 1, pp. 5–44, 2014, doi: 10.1257/jel.52.1.5.
- [14] V. Venkatesh, J. Y. L. Thong, and Xin Xu, "The Unified Theory," *MIS Q.*, vol. 36, no. 1, pp. 157–178, 2012.
- [15] S. J. Huston, "Measuring Financial Literacy," *J. Consum. Aff.*, vol. 44, no. 2, pp. 296–316, 2010, doi: 10.1111/j.1745-6606.2010.01170.x.
- [16] George Candiya Bongomin Okello, Joseph Mpeera Ntayi, John C Munene, and Charles Akol Malinga, "The relationship between access to finance and growth of SMEs in developing economies: financial literacy as a moderator," *Rev. Int. Bus. Strateg.*, vol. 27, no. 04, 2017.
- [17] V. Venkatesh and F. D. Davis, "Theoretical extension of the Technology Acceptance Model: Four longitudinal field studies," *Manage. Sci.*, vol. 46, no. 2, pp. 186–204, 2000, doi: 10.1287/mnsc.46.2.186.11926.
- [18] D. Q. Chen, D. S. Preston, and M. Swink, "How the use of big data analytics affects value creation in supply chain management," *J. Manag. Inf. Syst.*, vol. 32, no. 4, pp. 4–39, 2015, doi: 10.1080/07421222.2015.1138364.
- [19] T. Zhou, Y. Lu, and B. Wang, "Integrating TTF and UTAUT to explain mobile banking user adoption," *Comput. Human Behav.*, vol. 26, no. 4, pp. 760–767, 2010, doi: 10.1016/j.chb.2010.01.013.
- [20] A. Aviram and Y. Eshet-Alkalai, "Towards a theory of digital literacy: three scenarios for the next steps," *Eur. J. Open, Distance E-Learning*, vol. 9, no. 1, pp. 1–16, 2006.
- [21] T. Rahayu, S. Syafril, I. S. Wekke, and R. Erlinda, "Teknik Menulis Review Literatur Dalam Sebuah Artikel Ilmiah," no. September, 2019, doi: 10.31227/osf.io/z6m2y.
- [22] D. Moreira-Santos, M. Au-Yong-Oliveira, and A. Palma-Moreira, "Fintech Services and the Drivers of Their Implementation in Small and Medium Enterprises," *Inf.*, vol. 13, no. 9, 2022, doi: 10.3390/info13090409.
- [23] F. Davis, "Perceived Usefulness, Perceived Ease of Use, and User Acceptance of Information Technology," 1989.
- [24] A. M. Sahi, H. Khalid, A. F. Abbas, and S. F. A. Khatib, "The evolving research of customer adoption of digital payment: Learning from content and statistical analysis of the literature," *J. Open Innov. Technol. Mark. Complex.*, vol. 7, no. 4, 2021, doi: 10.3390/joitmc7040230.
- [25] M. Enterprises and S. Yakob, "Financial Literacy and Financial Performance of Small and Financial Literacy and Financial Performance of Small and Medium-sized Enterprises," vol. 15, no. 1, 2021, doi: 10.21002/seam.v15i1.13117.
- [26] Madaniyah Nur Aisyah Putri and Hwihanus Hwihanus, "Pengaruh Literasi Keuangan Terhadap Kinerja Dan Keberlangsungan UMKM Di Kota Surabaya," *MASMAN Master Manaj.*, vol. 2, no. 1, pp. 78–89, 2023, doi: 10.59603/masman.v2i1.276.
- [27] T. Oliveira, M. Thomas, G. Baptista, and F. Campos, "Mobile payment: Understanding the determinants of customer adoption and intention to recommend the technology," *Comput. Human Behav.*, vol. 61, no. 2016, pp. 404–414, 2016, doi: 10.1016/j.chb.2016.03.030.
- [28] M. G. Pangestu, "Behavior Intention Penggunaan Digital Payment QRIS Berdasarkan Model Unified Theory of Acceptance and Use of Technology (UTAUT) (Studi pada UMKM Sektor Industri Makanan & Minuman di Kota

- Jambi),” *J. Ilm. Manaj. dan Kewirausahaan*, vol. 1, no. 1, pp. 29–37, 2022, doi: 10.33998/jumanage.2022.1.1.23.
- [29] U. S. Thatthasrani and W. Jianguo, “Do Digital Finance and the Technology Acceptance Model Strengthen Financial Inclusion and SME Performance?,” *Inf.*, vol. 13, no. 8, 2022, doi: 10.3390/info13080390.
- [30] R. Kariadinata, R. P. Yaniawati, H. Sugilar, and D. Riyandani, “Learning Motivation and Mathematical Understanding of Students of Islamic Junior High School Through Active Knowledge Sharing Strategy,” *Infin. J.*, vol. 8, no. 1, p. 31, 2019, doi: 10.22460/infinity.v8i1.p31-42.
- [31] L. Hopkins, “Partial least squares structural equation modeling (PLS-SEM) An emerging tool in business research,” 2016, doi: 10.1108/EBR-10-2013-0128.
- [32] M. H. Azman Ong, M. Y. Yusri, and N. S. Ibrahim, “Use and behavioural intention using digital payment systems among rural residents: Extending the UTAUT-2 model,” *Technol. Soc.*, vol. 74, no. June, p. 102305, 2023, doi: 10.1016/j.techsoc.2023.102305.
- [33] A. K. Abdulkareem and R. M. Ramli, “Does Digital Literacy Predict E-government Performance An Extension of DeLone & McLean Information System Success Model,” *Electron. Gov. an Int. J.*, vol. 17, no. 1, p. 1, 2021, doi: 10.1504/eg.2021.10034963.
- [34] C. B. Lontchi, B. Yang, and K. M. Shuaib, “Effect of Financial Technology on SMEs Performance in Cameroon amid COVID-19 Recovery: The Mediating Effect of Financial Literacy,” 2023, doi: <https://doi.org/10.3390/su15032171>.
- [35] A. Ismail, H. Madrah, and Y. Ismail, “Mediating Role of Career Development in the Relationship between Career Program and Personal Outcomes,” *Makara Hum. Behav. Stud. Asia*, vol. 17, no. 1, p. 43, 2013, doi: 10.7454/mssh.v17i1.1806.
- [36] M. S. Featherman and P. A. Pavlou, “Predicting e-services adoption: A perceived risk facets perspective,” *Int. J. Hum. Comput. Stud.*, vol. 59, no. 4, pp. 451–474, 2003, doi: 10.1016/S1071-5819(03)00111-3.
- [37] J. Kádárová, L. Lachvajderová, and D. Sukopová, “Impact of Digitalization on SME Performance of the EU27: Panel Data Analysis,” *Sustain.*, vol. 15, no. 13, 2023, doi: 10.3390/su15139973.
- [38] R. A. Rahadi, “ADOPTION OF E-PAYMENT TO SUPPORT SMALL MEDIUM ENTERPRISE PAYMENT SYSTEM: A CONCEPTUALISED MODEL,” pp. 32–41, 2019.
- [39] T. Dahlberg, N. Mallat, J. Ondrus, and A. Zmijewska, “Past , present and future of mobile payments research: A literature review,” vol. 7, pp. 165–181, 2008, doi: 10.1016/j.elerap.2007.02.001.