THE ADOPTION OF CLOUD ACCOUNTING BY MSMES: THE ROLE OF DIGITAL VISION AND ITS IMPACT ON ECONOMIC SUSTAINABILITY

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ABSTRACT

This study draws on the Technology-Organization-Environment (TOE) framework to investigates how digital vision, serving as a proxy for intention, influences the adoption of cloud accounting. Furthermore, it evaluates the consequent effect of this adoption on the economic sustainability of culinary Micro, Small, and Medium Enterprises (MSMEs) in the Yogyakarta Special Region. Using convenience sampling, a total of 163 culinary MSMEs that have adopted cloud accounting applications and digital payment methods were selected as the sample. The results of the study, analyzed using the SEM-PLS (Structural Equation Modeling - Partial Least Squares) technique, indicate that relative advantage, competitive pressure, and vendor support have a positive effect on digital vision. Moreover, digital vision drives MSMEs to adopt cloud accounting, which positively impacts economic sustainability. The organizational dimensions of top management support and organizational readiness were found to have no effect on the digital vision of MSMEs in the culinary sector. These findings have significant implications for MSME practitioners, the government, and cloud accounting vendors to support MSME sustainability.

Keyword: digital vision; MSMEs; sustainability; TOE framework

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1. INTRODUCTION

The sustainability of Micro, Small, and Medium Enterprises (MSMEs) in Indonesia is a critical issue within the context of the national economy growth. MSMEs serve as the backbone of the economy, supporting economic growth, job creation, and poverty alleviation. MSMEs are a business sector that is experiencing significant growth in the business world, making a positive contribution to the Indonesian economy (Purniawan *et al.*, 2019). According to research (As Sajjad *et al.*, 2020), MSMEs have a strategic role in the Indonesian economy because they are able to absorb large numbers of workers. However, in a rapidly evolving digital era, MSMEs face challenges in adapting to dynamic technological changes. The impact

of technology on organizations, business environments, and governance has become a key factor determining competitiveness and business sustainability (Zhang & Aumeboonsuke, 2023). The technology that is popularly used by MSMEs along with the increasing use of digital money is FinTech. Prior study show that perceptions of the benefits and trust in digital payment technology play an important role in determining the attitudes and intentions of MSMEs to adopt digital technology (Amalia & Purwantini, 2021). Besides that, one of the most significant recent developments in supporting MSME sustainability is the adoption of cloud-based technologies, including cloud accounting. This technology has proven to enhance operational efficiency, streamline financial data management, and support faster and more accurate decision-making (Kartikasary *et al.*, 2023; Oke *et al.*, 2023). Cloud accounting, with its ability to simplify accounting processes and reduce operational costs, can be a crucial factor for MSMEs to thrive amid increasingly competitive economic challenges (Sastararuji *et al.*, 2022).

The culinary sector MSMEs play a vital role in economic growth, particularly in Yogyakarta, which ranks as the 10th largest in the culinary MSME sector in Indonesia (Angelia, 2022). The culinary sector accounts for 60% of the total MSMEs in Yogyakarta, with approximately 341,000 MSMEs (Herawati, 2023). According to data from Amazon Web Services, only around 29% of MSMEs have adopted cloud systems in general, including applications like cloud storage and accounting tools. Although 75% of MSMEs have switched to digital, this digitalization mainly only covers online sales, marketing, and payment processes, not utilizing cloud technology, especially cloud accounting. In fact, the potential for increased productivity is projected to reach 140% with the use of cloud technology (Septiani, 2023). If this potential is further optimized, especially through cloud accounting adoption, financial performance improvements that support business sustainability can be achieved.

The culinary sector MSMEs operate in a highly competitive business environment. Consumer trends and changing customer preferences are crucial factors for business continuity and sustainability. MSMEs that can adapt to market changes, innovate, and deliver fast and efficient services are more likely to survive. Market pressures and shifting consumer behaviour, particularly in terms of online ordering, digital payment methods, and the use of cloud-based applications for operational management, drive MSMEs to adopt new technologies, especially cloud accounting for their business sustainability.

An organization's digital vision becomes a critical element that encourage MSMEs to adopt technological innovation in their business. Digital vision refers to the extent to which an organization has a strategic outlook toward the long-term implementation of digital technologies (Niemand *et al.*, 2021). MSMEs with a strong digital vision tend to be more proactive in adopting technological innovations and better equipped to navigate challenges in a digital environment. With a clear vision, MSMEs can leverage digital technologies to enhance competitiveness and extend their business lifespan. Prior studies provided empirical evidence indicating that digital vision, conceptualized as intention, plays a significant role in driving technology adoption. This relationship is shaped by antecedent factors grounded in the Technology-Organization-Environment (TOE) framework (Rawashdeh & Rawashdeh, 2023). Therefore, it is crucial to investigates the influence of technological, organizational, and environmental dimension on digital vision and the adoption of cloud accounting (Semuel *et al.*, 2018).

Prior study has examined the adoption of cloud accounting by MSMEs in Kuningan Regency based on the TOE (Technology, Organizational, Environmental) framework (Hamzah *et al.*, 2023). However, this study did not explore its impact on MSME sustainability. Research in the context of developing countries, grounded in the TOE framework, was conducted by Lutfi (2022) on MSMEs in Jordan. The findings of Al-Sharafi *et al.* (2023) provided empirical evidence that the integration of cloud accounting into MSMEs' business operations can enhance

their sustainability performance. Nevertheless, studies that connect digital vision with the technological, organizational, and environmental dimensions in cloud accounting adoption remain limited. Rawashdeh & Rawashdeh (2023), investigated the technological, organizational, and environmental dimensions in relation to organizational performance, measured through the balanced scorecard, using digital vision.

Building on previous research (Rawashdeh & Rawashdeh, 2023), this study incorporates the **bandwagon effect** within the environmental context and focuses on the culinary sector. A significant portion of MSMEs in the culinary sector adopt new technologies, including cloud accounting, due to external factors such as competitive pressure or social influence. The concept of the bandwagon effect, where organizations are inclined to adopt technology because they observe other organizations doing so, can be a critical factor in technology adoption decisions. Therefore, this study seeks to provide a comprehensive examination of how technological, organizational, and environmental dimensions—incorporating the bandwagon effect—shape the digital vision toward cloud accounting adoption, and how these factors ultimately influence the economic sustainability of culinary MSMEs in Yogyakarta. . The findings are expected to contribute significantly to the development of more effective and sustainable digitalization strategies for MSMEs and serve as a reference for policymakers in supporting digital transformation in the MSME sector.

2. LITERATURE REVIEW

2.1 Cloud Accounting

Cloud accounting refers to an internet-based accounting system that enables users to access accounting software and data via cloud services. Unlike traditional accounting software installed locally on computers, cloud accounting utilizes external servers, providing more flexible and real-time access (Smith & White, 2020). Cloud accounting has become a significant trend influencing various business sectors, particularly accounting, in the fast-paced era of digitalization. Commonly referred to as cloud-based accounting, this system utilizes cloud technology infrastructure to store, manage, and process a company's financial information. Micro, Small, and Medium Enterprises (MSMEs) significantly impact the global economy. They are key sources of employment, income, innovation, and economic growth. Nevertheless, MSMEs typically possess limited resources and less sophisticated technological capabilities compared to larger enterprises (Zhang *et al.*, 2022). As a result, the adoption of technologies such as cloud accounting, along with innovations like artificial intelligence (AI) and blockchain, can provide significant advantages for MSMEs.

2.2 TOE Framework

The Technology-Organization-Environment (TOE) framework outlines how firms adopt and implement technological innovations by considering influences from technological, organizational, and environmental contexts (Tornatzky *et al.*, 1990). TOE theory is used as a framework to analyze factors that influence technology adoption, including the implementation of social media (Handayani & Mahendrawathi, 2019) and adoption cloud accounting (Lutfi, 2022). Within the TOE model, the technological context (T) pertains to the attributes of the technology available for adoption by an organization, as well as the organization's existing technological conditions. These conditions can manifest in both tangible forms, such as the equipment owned, and intangible forms, such as the methods or processes currently employed. The organizational context (O) encompasses the organization's structure, the presence of processes that foster innovation—such as informal communication and strategic actions by top management—and the availability of internal resources for further utilization. Meanwhile, the environmental context (E) involves factors like market structure and characteristics, external support for technology adoption, and government regulations. These three contexts within the

TOE framework are believed to interact with one another, influencing technological innovation and decision-making processes, which subsequently affect the dynamics of technology adoption (Tornatzky *et al.*, 1990). These factors encompass the characteristics of the technology, the organizational context in which it is adopted, and the external environment surrounding the organization. Information Technology (IT) plays a critical role in facilitating enterprise digital transformation, which has emerged as an unavoidable trend and a key driver of MSMEs' sustainable development. However, financial constraints, technological barriers, and a lack of skilled talent pose significant challenges, making digital transformation a difficult endeavor for Micro, Small, and Medium Enterprises (MSMEs) (Sulaiman *et al.*, 2021). Accordingly, it can be inferred that technological, organizational, and environmental factors play a role in influencing digital vision, which shapes cloud accounting adoption strategies and ultimately impacts organizational performance.

2.3 Technological context

2.3.1 Relative Advantage

Relative Advantage can be defined as "the degree to which an innovation is perceived as better than the idea it replaces"(Al-Sharafi *et al.*, 2023). Organizations tend to adopt new technologies that demonstrate substantial benefits and a clear impact on achieving strategic and operational goals (Khayer *et al.*, 2020). Cloud accounting, utilizing cloud-based systems to connect employees to their work environment, delivers multiple benefits compared to traditional manual accounting, such as reducing costs, enhancing scalability, increasing flexibility, supporting mobility, and enabling resource sharing (Sastararuji *et al.*, 2021). Relative advantage is directly related to the Technological dimension in the TOE framework theory because if it is more highly adopted by the organization it will offer real benefits compared to existing alternatives. For example, if a new system is more cost-effective or increases customer satisfaction, the organization will be more motivated to adopt it (Khayer *et al.*, 2020). When MSMEs understand and feel the benefits relative advantage of using cloud accounting, they are more motivated to develop a strong digital vision. By utilizing relative advantage as the main motivation and building a strong digital vision, MSMEs can accelerate their digital transformation, increase competitiveness, and open up greater growth opportunities. This shows that relative advantage has a positive relationship with digital vision as in previous research by (Rawashdeh & Rawashdeh, 2023).

H_1 : Relative advantage has a direct positive effect on digital vision.

2.3.2 Compatibility

Compatibility is defined as the degree to which a new technology aligns with the existing technological infrastructure and prevailing business practices within an organization. In the context of cloud accounting adoption, compatibility includes the technology's ability to integrate with existing accounting systems and adapt to users' habits and business needs (Hamzah *et al.*, 2023). Compatibility indicates that it plays a crucial role in the technology adoption process, as organizations are more likely to accept new technology that is consistent with their established practices and systems (Lutfi *et al.*, 2017). In the context of technology adoption based on the Technology-Organization-Environment (TOE) framework, *compatibility* refers to how well a new technology aligns with an organization's existing values, needs, and infrastructure. The higher the degree of alignment, the more likely stakeholders (particularly top management) are to view the new technology as a relevant and beneficial solution. When a cloud accounting platform is perceived to fit seamlessly with current systems, processes, and MSME culture, both management and operational teams are better able to recognize the concrete added value of the technology. Consequently, this encourages the formation of a more optimistic and focused digital vision. This shows that compatibility has a

positive relationship with digital vision as in previous research by (Rawashdeh & Rawashdeh, 2023).

H_2 : Compatibility has a direct positive effect on digital vision.

2.4 Organizational context

2.4.1 Top Management Support

Top management support is a crucial factor in the successful adoption and integration of new technologies such as cloud accounting. It involves providing the necessary resources, steering the organization's vision, and fostering an environment conducive to change (Khayer *et al.*, 2020). In the context of SMEs, top management support becomes even more significant due to resource constraints and reliance on swift decision-making. Al-Sharafi *et al.* (2023) found that top management support positively contributes to organizational readiness for cloud accounting and helps to overcome potential barriers during the implementation process. Top management, as a part of organization dimension in the TOE framework, support influences the decision to adopt new technologies. They play a role in providing resources, such as budget and infrastructure, to implement the technology (Al-Sharafi *et al.*, 2023). Top management is responsible for formulating strategic directions and setting priorities that will be followed by all parts of the company. When top management is committed to the development of digital technology, a vision of the digital future (digital vision) will be formed more clearly. Prior study shows that top management support has a positive relationship with digital vision (Rawashdeh & Rawashdeh, 2023).

H_3 : Top Management support has a direct positive effect on digital vision.

2.4.2 Organizational Readiness

Organizations that provide greater support to their staff in adopting accounting technology tend to see improvements in operational performance, as employees feel more effectively empowered (Khayer *et al.*, 2020). Organizational readiness has a close relationship in the context of technology implementation in the TOE framework, if the organization is ready (with a culture of innovation, supportive leadership, and adequate infrastructure), then technology adoption will be smoother (Rawashdeh & Rawashdeh, 2023). This also implies that the implementation of technology must be accompanied by adequate training for MSMEs to ensure that all users can understand and utilize technology effectively. Organizational readiness refers to the readiness of the organization to implement the changes needed to achieve the digital vision, such as the ability of MSMEs to learn, innovate, and overcome obstacles. Previous study shows that organizational readiness has a positive relationship with digital vision (Rawashdeh & Rawashdeh, 2023).

H_4 : Organizational Readiness has a direct positive effect on digital vision.

2.5 Environmental context

2.5.1 Competitive Pressure

Competitive pressure is defined as the drive felt by companies to adapt to changes in the business environment, primarily in response to competitors' actions (Rawashdeh & Rawashdeh, 2023). Prior study (Hamundu *et al.*, 2020) was highlighted that competitive pressure is a key factor influencing the intention of Micro, Small, and Medium Enterprises (MSMEs) in Indonesia to adopt cloud accounting. When MSMEs feel pressure from competitors to innovate and enhance operational efficiency, they are more likely to consider adopting new technologies such as cloud accounting. Competitive pressure is one of the main factor in the environmental dimension of the TOE framework, if competitors adopt certain

technologies to increase efficiency or provide added value to customers, organizations feel compelled to follow suit in order to remain competitive (Al-Sharafi *et al.*, 2023). The relationship between competitive pressure and digital vision is very close, especially in the context of digital transformation and technological innovation in the modern era of MSMEs. When competitors adopt new digital technologies, it will provide a clear direction to deal with pressure, create competitive advantages for local MSMEs, and ensure that their businesses remain relevant in a changing market (Hamundu *et al.*, 2020). This shows that competitive pressure has a positive relationship with digital vision as in previous research by (Rawashdeh & Rawashdeh, 2023).

H_5 : Competitive pressure has a direct positive effect on digital vision.

2.5.2 Vendor Support

Vendors play a crucial role in the adoption process of cloud accounting in MSMEs. Their support goes beyond merely providing software; it also includes essential after-sales services to assist organizations in implementing new technology. Vendors that offer adequate technical support can help reduce the barriers MSMEs face in adopting cloud accounting, such as technical issues and the need for employee training (Rawashdeh & Rawashdeh, 2023). The relationship between vendor support and the TOE framework in the environmental context is able to support organizations in understanding and utilizing adopted technologies such as market competition or regulatory pressures that can encourage organizations to choose vendors with a good reputation in supporting the latest technology (Khayer *et al.*, 2020). Vendor support is related to the MSMEs digital vision which reflects long-term goals in digital transformation, such as improving customer experience, accelerating business processes, or creating new innovations. This shows that vendor support has a positive relationship with digital vision as in previous research by (Rawashdeh & Rawashdeh, 2023).

H_6 : Vendor support has a direct positive effect on digital vision.

2.5.3 Bandwagon Effect

The bandwagon effect is a social phenomenon where individuals or organizations tend to follow actions, decisions, or trends that others have already adopted. Hossain & Rahman (2020) explain that this effect encourages organizations to adopt digital technologies due to external pressures and industry peers' actions. When MSMEs notice competitors or similar businesses adopting new technologies successfully, they are more likely to create a proactive digital vision to remain competitive. This observation aligns with the environmental component of the TOE framework, which emphasizes external factors' role in technology adoption (Lutfi *et al.*, 2017). Moreover, Zhang & Li (2018) emphasize that companies often follow technology trends initiated by others, even when they do not fully assess the risks or their needs. This social pressure drives MSMEs to realize the strategic significance of digital transformation and integrate initiatives like cloud accounting into their long-term vision.

H_7 : Bandwagon effect has a direct positive effect on digital vision.

2.6 Digital Vision and Cloud Accounting

A digital vision is crucial as it serves as a roadmap for SMEs in adopting technologies like cloud accounting. It enables organizations to set clear objectives and align technological adoption with broader business goals, such as boosting operational efficiency, increasing customer satisfaction, or improving financial management. Empirical findings Rawashdeh & Rawashdeh (2023) indicates that the adoption of cloud accounting has a significantly positive impact on organizational performance. By leveraging cloud-based accounting systems, MSMEs can enhance operational efficiency, expedite access to financial information, and

improve the accuracy of financial reports (Moniruzzaman & Rahman, 2023). This demonstrates that cloud accounting functions not only as a technical tool but also as a support for a broader digital vision within the context of an organization's digital transformation.

H_8 : Digital vision has a direct positive effect on cloud accounting adoption.

2.7 Cloud Accounting and Economic Sustainability

The adoption of cloud accounting technology helps MSMEs reduce IT infrastructure costs. With cloud-based systems, MSMEs do not need to make significant investments in purchasing hardware like servers or expensive software, as these services are offered through more flexible and affordable subscription models. This cost-saving is crucial for MSMEs, particularly in the culinary sector, which often operates with thin profit margins. By managing expenses more efficiently, MSMEs can allocate resources to more productive activities, such as marketing or product development. Rawashdeh & Rawashdeh (2023) found that operational cost savings through the use of cloud accounting technology significantly contribute to the financial stability of MSMEs, ultimately strengthening their economic sustainability.

H_9 : Cloud accoounting has a direct influence on economic sustainability.

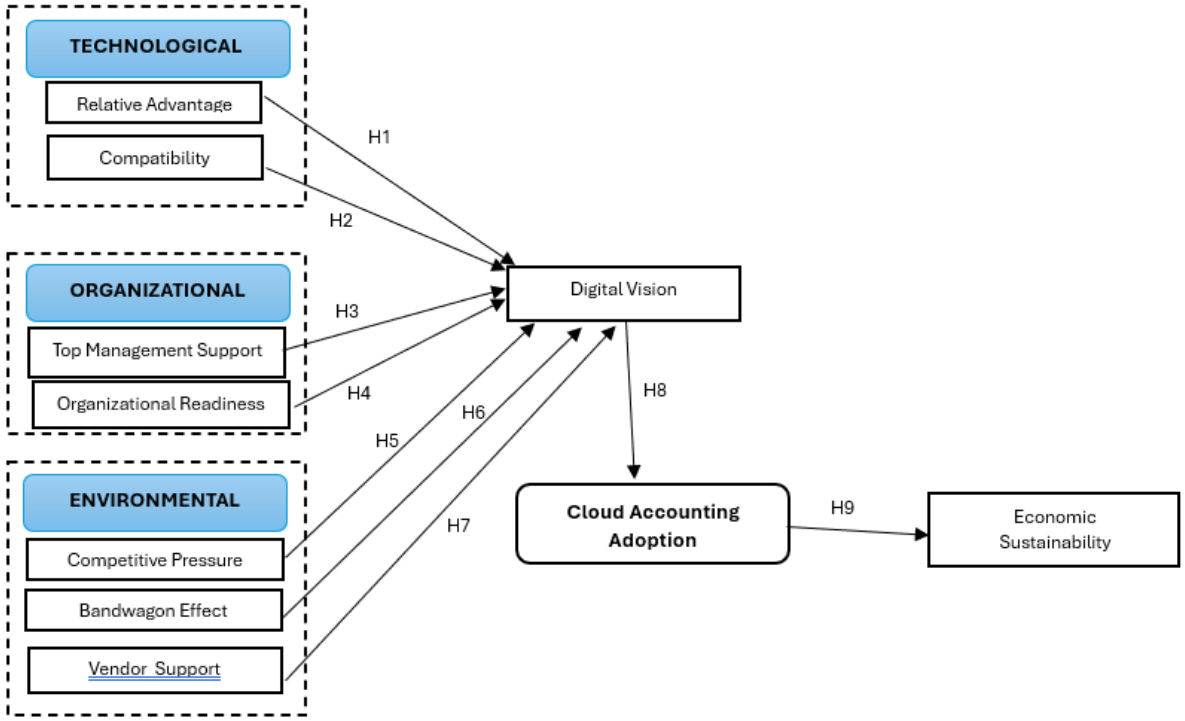

Figure 1. Research framework

3. RESEARCH METHOD

3.1 Research Design

A survey technique is applied in this study to gather data, with the primary objective of measuring individuals' perceptions toward the adoption of cloud accounting services. This quantitative descriptive research uses primary data, obtained directly from respondents. The research stages involve collecting data, processing it with statistical analyses, and interpreting the findings (Blumberg *et al.*, 2014).

3.2 Sampling

The population in this study consists of MSMEs in the food and beverage sector within the Yogyakarta region. The sample comprises MSME owners or managers. A non-probability sampling technique was employed using the convenience sampling method. Convenience sampling was chosen to facilitate the researcher in easily obtaining respondents. The sample will be provided with a questionnaire as an instrument to measure their perceptions regarding cloud accounting adoption. Data was collected using survey techniques by distributing questionnaires which were answered directly by respondents (Blumberg *et al.*, 2014).

3.3 Measurement of variables

This study consists of ten variables. The measurement items for the variables were adopted from previous research with minor adjustments to fit the context of cloud accounting adoption for MSMEs. Each construct within the TOE framework is measured using a 5-point Likert scale, detailed as follows: (1) Strongly Disagree (STS); (2) Disagree (TS); (3) Neutral (N); (4) Agree (S); (5) Strongly Agree (SS). The measurement for each variable is as follows: relative advantage (5 items), compatibility (3 items), top management support (4 items), organizational readiness (5 items), competitive pressure (3 items), bandwagon effect (3 items) that adopted from Aligarh *et al.*, (2023), vendor support (3 items) (Hamzah *et al.*, 2023; Kinyua, 2016), digital vision (Niemand *et al.*, 2021) and economic sustainability (Jayashree *et al.*, 2021).

3.4 Data analysis

The model in this research is analyzed using SEM-PLS (Structural Equation Modeling-Partial Least Squares) with the support of SmartPLS 4 software. According to (Hair *et al.*, 2014), SEM-PLS is particularly effective for managing small sample sizes and complex models. The analysis involves evaluating both the measurement model (outer model) and the structural model (inner model).

3.4.1 Measurement Model

The evaluation of the measurement model involves assessing validity and reliability. Validity testing consists of convergent and discriminant validity. Convergent validity assesses the degree to which indicators of the same construct are correlated. In reflective constructs, this validity is measured through the loading factor and Average Variance Extracted (AVE), calculated by summing the squared standardized loadings and dividing it by the total number of indicators. Based on the rule of thumb, the loading factor is expected to be above 0.7, while the AVE value should be greater than 0.5. (Hair *et al.*, 2014).

To assess discriminant validity, the AVE values of the constructs are compared with the squared correlation between the constructs being tested. Discriminant validity determines the uniqueness of a construct relative to others. For the validity to be confirmed, the square root of the AVE must exceed the correlations between constructs, and cross-loadings must remain minimal (Hair *et al.*, 2014).

The reliability test is used to determine the consistency of measurement results when the same phenomenon is measured two or more times using the same instrument. The rule of thumb for testing reliability is to meet the criteria for composite reliability and Cronbach's alpha values above 0.7, although a value of 0.6 is still considered acceptable (Hair *et al.*, 2014).

3.4.2 Structural Model

The structural model in this study aims to predict causal relationships between latent variables. To evaluate the model, the R-Square (R^2) value is used, where a higher R^2 indicates a better model fit. This study employs PLS-SEM (Partial Least Squares- Structural Equation Modeling) as its principal analytical method to test the proposed hypotheses, incorporating the bootstrapping procedure to assess the statistical significance of path coefficients. Through this

resampling approach, the standard errors of the estimated coefficients can be more accurately determined, allowing for robust inferences regarding the presence or absence of significant relationships among the constructs in the model.The significance level of the hypothesis testing is determined by the path coefficient values in the inner model. According to the rule of thumb, the t-statistic should exceed 1.64 for a one-tailed hypothesis test with a 5% alpha level (Hair *et al.*, 2014).

4. RESULTS AND DISCUSSION

Respondent Profile

In this study, 230 questionnaires were directly distributed to respondents, resulting in 163 valid responses, achieving a response rate of 70 percent. Detailed characteristics of respondents can be seen in table 1.

Table 1.Respondent Profile

No	Respondent Characteristics		Number	
1	Gender	Male	86	53%
		Female	77	47%
2	Age	20-29 years	119	73%
		30-39 years	28	17%
		40-49 years	13	8%
		>49 years	3	2%
3	Education	High School equivalent	108	66%
		Diploma (D3)	9	6%
		Bachelor's Degree (S1)	48	29%
		Master's Degree (S2)	2	1%
4	Position	MSME Owner	48	29%
		MSME Manager	115	71%
5	Duration of Using Cloud-based Accounting Information Systems	< 6 months	54	33%
		6 months – 1 year	40	25%
		1 year – 3 years	45	28%
		>3 year	24	15%
6	Monthly Revenue	Rp1.500.000 – Rp6.000.000	31	19%
		Rp6.000.000 – Rp15.000.000	37	23%
		Rp15.000.000 – Rp100.000.000	39	24%
		Rp100.000.000 – Rp150.000.000	46	28%
		>Rp150.000.000	10	6%
7	Frequently Used Cloud Accounting Products	QuickBooks	26	16%
		Moka POS	41	25%
		Majoo	38	23%
		Buku Warung	11	7%
		Qasir	3	2%
		Google sheets	15	9%
		Wave	10	6%
		Olsera	2	1%
		Kasir Pintar	17	10%

Measurement Model Testing (Validity and Reliability Tests)

Based on the convergent validity and reliability assessments, all items fulfilled the required standards. The findings indicated that the loading factors for all retained variable items exceeded 0,7; and the Average Variance Extracted (AVE) surpassed 0,5. Additionally, the reliability analysis showed that the composite reliability and Cronbach's alpha values for every construct were above 0,7. Therefore, it can be concluded that the variables used in this research are valid and reliable (Table 2).

Table 2. Convergent Validity and Reliability Testing

Variable	Construct Items	Standardized Loading	Cronbach's Alpha	AVE	Composite Reliability
Economic Sustainability	EcS1	0,878	0,921	0,759	0,940
	EcS2	0,865			
	EcS3	0,865			
	EcS4	0,894			
	EcS5	0,853			
Cloud Accounting	ADOP1	0,896	0,936	0,796	0,951
	ADOP2	0,864			
	ADOP3	0,922			
	ADOP4	0,912			
	ADOP5	0,866			
Relative Advantage	RA1	0,910	0,916	0,749	0,937
	RA2	0,877			
	RA3	0,843			
	RA4	0,883			
	RA5	0,810			
Compatibility	COMPA1	0,897	0,915	0,797	0,940
	COMPA2	0,913			
	COMPA3	0,913			
	COMPA4	0,848			
Top Management Support	TMS1	0,855	0,898	0,767	0,929
	TMS2	0,878			
	TMS3	0,915			
	TMS4	0,854			
Organizational Readiness	ORR1	0,845	0,892	0,699	0,921
	ORR2	0,881			
	ORR3	0,802			
	ORR4	0,764			
	ORR5	0,883			
Competitive Pressure	CP1	0,888	0,871	0,795	0,921
	CP2	0,915			
	CP3	0,873			
Vendor Support	VS1	0,864	0,886	0,815	0,929
	VS2	0,931			
	VS3	0,912			
Bandwagon Effect	BE1	0,819	0,851	0,772	0,910
	BE2	0,899			
	BE3	0,916			
Digital Vision	DV1	0,903	0,931	0,783	0,947
	DV2	0,877			
	DV3	0,893			
	DV4	0,891			
	DV5	0,858			

Table 3. Discriminant Validity Testing: Fornell-Larcker Criterion

Variabel	Band-wagon Effect	Cloud Accounting Adoption	Comp Pressure	Compatibility	Digital Vision	Economic Sustainability	Organizational Support	Relative Advantage	TMS	Vendor Support
Bandwagon Effect	**0,879**									
Cloud Accounting Adoption	0,679	**0,892**								
Comp Pressure	0,836	0,711	**0,892**							
Compatibility	0,608	0,665	0,607	**0,854**						
Digital Vision	0,767	0,822	0,755	0,640	**0,885**					
Economic Sustainability	0,737	0,801	0,738	0,651	0,807	**0,871**				
Organizational Support	0,723	0,750	0,760	0,647	0,700	0,729	**0,836**			
Relative Advantage	0,581	0,707	0,596	0,788	0,699	0,635	0,591	**0,865**		
TMS	0,734	0,711	0,731	0,641	0,710	0,704	0,801	0,646	**0,876**	
Vendor Support	0,771	0,774	0,701	0,675	0,766	0,745	0,751	0,610	0,708	**0,903**

Structural Model Testing (Hypothesis Testing)

The results of the structural model testing show that the R^2 value for the digital vision is 74,2%, cloud accounting adoption is 67,5%, while for economic sustainability, the R^2 value is 64,2%. This indicates that the research model has a good fit. Based on the statistical testing results, out of the nine hypotheses proposed as antecedents to the intention to use cloud accounting through digital vision and its impact on economic sustainability, five hypotheses were supported significantly. The digital vision MSMEs is directly influenced by relative advantage, competitive pressure, and vendor support. Meanwhile, economic sustainability is influenced by the intention to use cloud accounting and digital vision as mediator. However, the organizational dimensions, i.e. top management support and organizational readiness, were not statistically significant toward digital vision.

This study provides empirical evidence that the main driver of creating digital vision in MSMEs is vendor support of technology used. The environment dimension plays a crucial role in the digital vision in MSMEs, particularly the vendor support, with a path value of 0.263, which has a significant positive effect on digital vision with a p-value of 0.000 < 0.004, thus supporting H6. Competitive pressure (0.192), which is also part of the environmental dimension in the TOE framework, has a significant positive effect on digital vision with a p-value of 0.000 < 0.043, supporting H5. Furthermore, in the technological dimension, relative advantage has positive effect on digital vision, with a p-value of 0.007, thus H1 was supported.

The detailed results of hypothesis testing using bootstrapping can be seen in Table 4 and Figure 1.

Table 4. Hypothesis Testing Results

Hypothesis	Path Coefficient	Probability	Remark
H1: RA → DV	0,199	0,007**	Significant
H2: COMPA → DV	0,137	0,062*	Not Significant
H3: TMS→ DV	0,060	0,589	Not Significant
H4: OR→ DV	-0,029	0,781	Not Significant
H5: CP→ DV	0,192	0,043**	Significant

Hypothesis	Path Coefficient	Probability	Remark
H6: VS→ DV	0,263	0,004**	Significant
H7: BE→ DV	0,179	0,090	Not Significant
H8: DV → CAA	0,822	0,000***	Significant
H9: CAA → ES	0,801	0,000***	Significant

Source: data processing results (2024)

Description: RA= relative advantage; COMPA= compatibility; TMS= top management support; OR= organizational readiness; CP= competitive pressure; VS= Vendor Support; BE= bandwagon effect; DV= digital vision; CAA= cloud accounting adoption; ES= economic sustainability. *p-value<0,1; **p-value<0,05; ***p-value<0,000

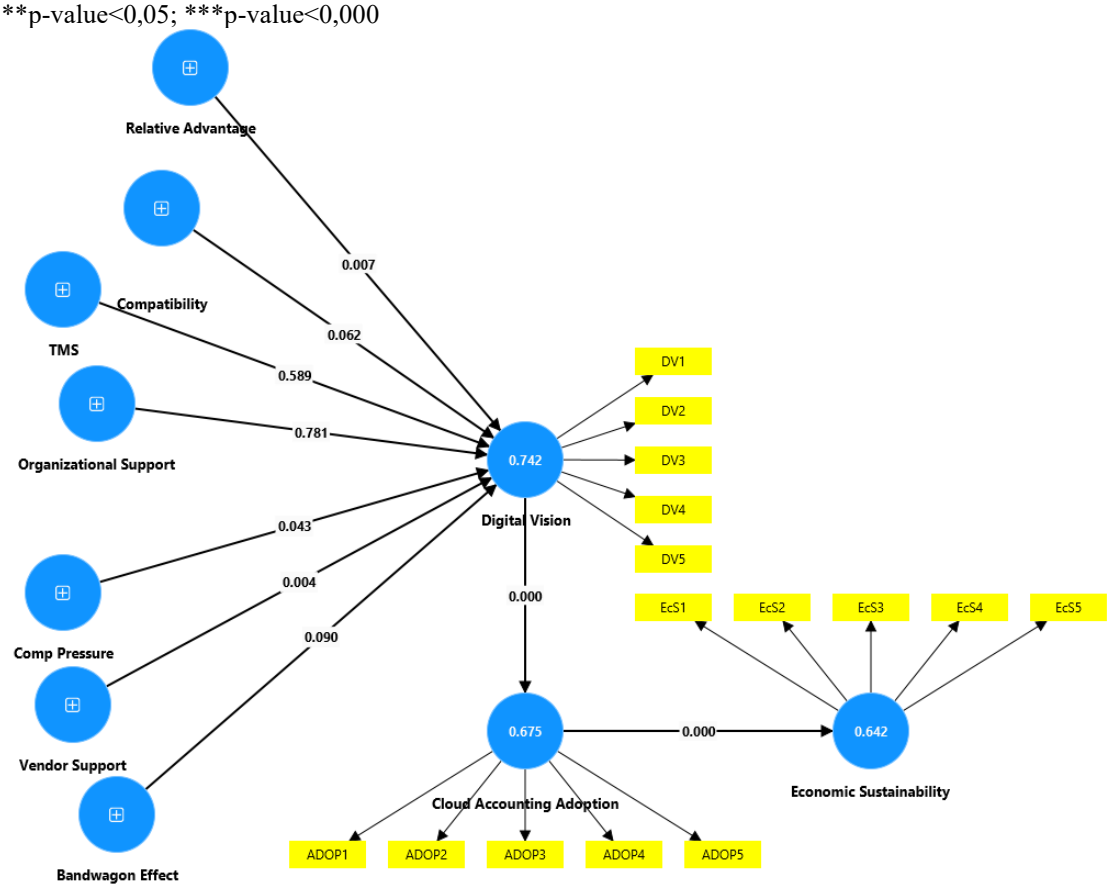

Figure 2. Hypothesis Testing Results
Source: primary data processed (2024)

Discussion

This study found empirical evidence that relative advantage, competitive pressure, and vendor support have a positive effect on MSMEs' digital vision which then encourages the adoption of cloud accounting technology. The use of cloud accounting has been proven to have an effect on increasing economic sustainability (Jayashree *et al.*, 2021) as measured by reducing energy consumption costs and purchasing costs for office materials/equipment, increasing better product/service offerings to customers, increasing returns on financial assets and expanding market share.

Vendor support has strong impact on digital vision. Particularly for micro enterprises, there is often a lack of experience in adopting digital technologies like cloud accounting or cloud-based POS systems. Vendor support plays a crucial role by providing training, technical assistance, and system updates that help MSMEs overcome technological challenges. This support boosts the confidence of MSME operators in using technology and encourages them to develop a more strategic digital vision. Gangwar *et al.* (2015) found that vendor support is

a key factor driving the successful adoption of technology in small and medium enterprises. With strong technical support from vendors, MSMEs feel more prepared to fully utilize the technology, which in turn strengthens their digital vision. Culinary MSMEs face significant challenges in adopting digital technology, particularly due to limited resources and low digital literacy. Vendors that actively provide technical support, innovative updates, and easily accessible services enable MSMEs to leverage digital technologies without needing in-depth knowledge of these technologies. Therefore, vendor support directly contributes to the development of digital vision by overcoming the barriers faced by MSMEs. These findings stand in contrast to earlier studies, which did not uncover empirical evidence concerning the effect of vendor support on digital vision (Rawashdeh & Rawashdeh, 2023).

Competitive pressure was found to have a positive direct effect on digital vision. In the culinary sector, particularly among MSMEs in major cities in Indonesia, technology adoption has become a strategic necessity rather than an option. Competitors who adopt technology more swiftly can easily outpace businesses that fall behind in innovation. Competitive pressure pushes MSMEs to create a digital vision focused on digital transformation to tackle market challenges and maintain their competitiveness.

The findings also indicate that compatibility has no impact on digital vision. The culinary sector is often driven by rapid changes in consumer preferences and competitor innovations, making the primary focus of digital vision development not just on the alignment of technology with existing systems, but on the need to remain relevant and competitive in the market. For example, culinary MSMEs might adopt digital technologies even if they are not fully compatible with existing processes due to the pressure from competitors who have successfully implemented similar innovations.

The organizational dimension (i.e. top management support and organizational readiness) have no significant effect on digital vision. In this study, the sample is primarily composed of micro-scale businesses. In the context of micro-businesses, MSME owners often have complete control over operations, financial management, and strategic decisions. As a result, top management support may not be a significant factor influencing digital vision, since decision-making at the top level is typically handled directly by the owner with minimal internal coordination required. MSMEs tend to focus more on operational aspects that are directly related to business continuity, while technological innovation or digital strategy development is often not a top priority. Many culinary MSMEs in Indonesia are not yet fully aware of the importance of a digital vision for long-term business continuity. While organizational readiness may be in place, such as access to technology or internal support, MSME owners may not understand how digital technology can be used strategically.

Moreover, bandwagon effect have no effect on digital vison. MSMEs, especially in the culinary sector, tend to focus on daily operations and immediate profits. While the bandwagon effect suggests that companies follow trends due to the success of competitors, in many cases, MSMEs prioritize decisions based on immediate profits rather than strategically following the flow of digital technology. Many MSME owners are more interested in quick solutions that can immediately affect their daily income rather than focusing on developing a long-term digital vision. Although MSMEs in Indonesia have begun to adopt technology, their primary motivation is often immediate operational efficiency or response to consumer demands, rather than to build a comprehensive digital vision (Rahayu & Day, 2017). This indicates that the adoption of technology that occurs due to competitive pressures (bandwagon effect) is not always integrated into a long-term digital strategy.

This study shows that digital vision has a positive effect on cloud accounting adoption. Digital vision reflects a company's long-term view of implementing digital technologies to achieve business goals. When MSMEs have a clear digital vision, they are more open to new technologies that can help them achieve these goals. In this case, cloud-based AIS is seen as

an effective tool to improve efficiency, transparency, and accuracy in their financial management. A strong digital vision enables MSMEs to integrate this technology as part of their digital transformation strategy. The results of this research are consistent with the prior research (Rawashdeh & Rawashdeh, 2023).

This study finds empirical evidence that cloud accounting adoption has a positive effect on economic sustainability, confirming previous research. Cloud accounting offers several benefits that enhance business efficiency, reduce costs, and improve transparency, all of which contribute to economic sustainability (Jayashree *et al.*, 2021; Al-Sharafi *et al.*, 2023). For culinary MSMEs, cloud accounting enables more efficient and automated financial management. This system allows for real-time transaction recording, inventory management, and financial reporting, minimizing manual errors and accelerating decision-making. As a result, MSMEs can save time and effort, allowing them to focus on other business growth strategies. From an economic sustainability perspective, this operational efficiency helps MSMEs sustain themselves longer with limited resources.

Consistent with the TOE framework, this study confirms that the technology dimension—specifically relative advantage—and the environmental dimensions—namely competitive pressure and vendor support—provide a direct influence on digital vision, which in turn promotes the adoption of cloud accounting, while also demonstrating that digital vision, serving as a proxy for intention, mediates these TOE dimensions in driving technology adoption.

5. CONCLUSION

This study investigates the factors influencing the digital vision of SMEs using the TOE (Technological-Organizational-Environmental) framework, which subsequently drives the adoption of cloud accounting among food and beverage SMEs in the Yogyakarta region. The research provides empirical evidence that relative advantage, competitive pressure, and vendor support positively influence the digital vision of SMEs. Furthermore, a strong digital vision has been shown to encourage SMEs to adopt cloud accounting applications, which in turn significantly enhances their economic sustainability. The mediation role of digital vision in the TOE framework is critical in ensuring that SMEs adopt cloud accounting in a manner that aligns with their long-term goals. The presence of a robust digital vision provides clarity, enhances decision-making, and ensures that the adoption of cloud technology positively impacts organizational performance. Without a clear vision, even strong TOE factors like organizational readiness may not lead to successful adoption. Therefore, digital vision is not only a mediator but also a driver of strategic technological adoption that supports economic sustainability and competitive advantage. This study is limited to the culinary sector, so caution should be exercised when generalizing the findings. Future research could explore other sectors, such as retail, manufacturing, and services, to identify differences in digital vision. Additionally, individual characteristics of owners/managers, such as innovativeness, could be considered as moderating factors in cloud accounting adoption.

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