

The Effect of E-commerce, Social Media and Digital payment on Increasing Revenue of Micro, Small and Medium Enterprises (MSMEs) in Mataram City

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ABSTRACT

This study examines the impact of e-commerce, social media, and digital payments on enhancing the revenue of Micro, Small, and Medium Enterprises (MSMEs) in Mataram City. These three variables were chosen because of their role in expanding markets, increasing customer interaction, and facilitating financial transactions. Data were gathered from 118 MSME participants via surveys and analyzed utilizing the Partial Least Squares (PLS) approach. The findings indicate that e-commerce, social media, and digital payment positively and significantly influence the income of MSMEs. Where E-commerce can support marketing efficiency, social media increases product visibility, and digital payments facilitate transactions and increase operational efficiency.

INTRODUCTION

A country's economic growth is strongly influenced by economic development at the regional level. Meanwhile, regional economies are usually supported by small and medium-scale economic activities. Micro, Small, and Medium Enterprises (MSMEs) are the foundation of the economy at both regional and national levels. (Aprilyan et al., 2022). According to data from Kamar Dagang dan Industri (KADIN) Indonesia (2023), the role of MSMEs is very significant in supporting Indonesia's economic growth, with a contribution of 99% of the total business units. In 2023, the quantity of MSME participants in Indonesia approximated 66 million. Micro, Small, and Medium Enterprises (MSMEs) contribute 61% to Indonesia's Gross Domestic Product (GDP), amounting to IDR 9,580 trillion, and employ around 117 million individuals, representing 97% of the national workforce.

The significant role of MSMEs in the digital era demands effective strategies to increase competitiveness and revenue. The development of digital technology offers great opportunities for MSMEs to expand their market and increase their income. Many factors affect the increase in MSME income such as capital, financial literacy, length of business, social competence, labor, length of business, personal financial attitudes, organizational readiness and so on. However, this research only focuses on discussing three variables, namely E-commerce, Social Media and Digital payment. These three variables were chosen because they have a direct impact on expanding market reach, increasing interaction with customers, and facilitating financial transactions, all of which are important for increasing MSME revenues in the digital era.

The first factor that drives the increase in MSME revenue is e-commerce. Based laporan Kementerian Perdagangan Republik Indonesia (2024), The Gross Merchandise Value (GMV) of e-commerce in Indonesia will reach more than USD 62 billion by 2023, with 58.63 million users and a penetration rate of 21.56%. The progression of the digital realm, particularly in e-commerce, has favorably influenced MSMEs by enabling entrepreneurs to innovate in business development. Numerous studies have investigated the effect of e-commerce on increasing revenue but the empirical results are inconclusive and there are inconsistencies in the results, where there are several researchers including : Achira et al. (2023); Ami et al.(2023); Ayunda et al. (2023); Fatma et al. (2024); Gao et al. (2023); Titasari, H. I. (2024); Kilay et al. (2022); Pratami et al. (2023); Arniyasa, P. Y. P., & Karmini, N. L.(2023); Usman, & Supriyati, D. (2023); Aprilyan et al. (2022) confirms the relationship between e-commerce and income generation while others imply there is no relationship between e-commerce and income generation. (Agnesia & Saputra, 2022; Ferliansyah & Wijaya, 2024; Setiawati & Pirdaus, 2024; Wahdia & Rintasari, 2023).

The second factor influencing the rise in MSME income in the digital age is social media. Most MSMEs utilize e-commerce platforms, but 56.3% of people prefer to sell on social media platforms like Facebook, Instagram, and TikTok. according to INDEF research (Datakata.co.id., 2023). Social media has potential functions in business, such as identifying customers, facilitating two-way communication, and sharing information to understand customer

preferences. Several studies have examined that social media has an effect on increasing revenue such as: Agnesia & Saputra (2022); Emilia (2023); Ferliansyah & Wijaya (2024); Gontur et al. (2023); Mudjahidin et al. (2024); Setiawati & Pirdaus (2024). Conversely, there are findings indicating that social media does not positively impact the income of MSMEs. (Wahdia & Rintasari, 2023). Research by Kembang et al. (2021) found that the insufficient positive impact of social media on enhancing MSME income is attributed to the inadequate competence of human resources in understanding information technology, especially in content management for promotional activities and product sales through social media.

The third factor influencing the increase in revenue is digital payment. Currently, around 32 million merchants, most of whom are MSME players, have registered as QRIS users, with total transactions reaching Rp 32.86 trillion (Antaranews, 2024). In addition, Digital payment has a positive impact by reducing the burden of manual administration, allowing businesses to focus more on product innovation, marketing, and improving service quality. Numerous research have demonstrated that digital payment influences revenue enhancement, such as Amelia (2023); Evita, Tripermata, & Anggraini (2024); Fatma et al. (2024); Titasari H I (2024); Kilay et al. (2022); Shanshabilla et al. (2023) There are also results stating Digital payment does not positively impact the income of MSMEs as reported by Candra & Pabulo (2021) dan Rosmawati et al (2023) in their research, stating that although 94% of MSME players understand the importance of using Digital payment, only 36.67% have adopted the system. This shows that although there is a high awareness of digital payments, their use does not directly increase MSME revenues, and many businesses are still more comfortable using cash payment methods.

The development of digital technologies, including e-commerce, social media, and digital payment systems, offers substantial opportunity for Micro, Small, and Medium Enterprises (MSMEs) to enhance competitiveness and revenue. Numerous research have demonstrated a favorable correlation among these three characteristics and heightened MSME income, existing empirical results still show inconsistencies in results. This study seeks to examine the correlation between e-commerce, social media, and digital payment and their impact on increasing MSME income in Indonesia. In addition, the novelty of this research lies in combining the three variables in one digital technology study that has never been done by previous researchers. The study's conclusions are anticipated to offer practical insights for MSME entrepreneurs and stakeholders in developing more effective ways to enhance competitiveness in a more competitive market. as well as being an important reference for future studies on the role of digital technology in the development of MSMEs.

LITERATURE REVIEW

Technology Acceptance Model (TAM) Theory

The Technology Acceptance Model (TAM) is a framework designed to elucidate the processes by which people accept and implement technology. The

Technology Acceptance Model (TAM) was conceived in 1986 by Fred Davis in his doctoral dissertation, "A Technology Acceptance Model for Empirically Testing New End-User Information Systems." TAM is utilized in diverse technological domains, encompassing mobile technology, social media, and the Internet of Things (IoT). The Technology Acceptance Model (TAM) is a behavioral paradigm employed extensively to examine the process of information technology adoption. (Aprilyan et al., 2022). The development of the TAM model conducted by Gahtani (2001) enhanced the TAM model by incorporating the intensity variables of behavioral intention to utilize and actual system utilization to create a technology acceptance variable (Ayem & Wahidah, 2022). TAM helps understand how MSMEs' perceptions of the benefits and convenience of technology influence their decisions to adopt e-commerce, social media, and digital payments, and the impact on increasing their income.

Hypothesis Development

The Effect of E-commerce on Increasing MSME Revenue

E-commerce encompasses diverse commercial operations involving customers, producers, service providers, and intermediate traders through the internet network. E-commerce encompasses all types of commercial transactions involving the exchange of products or services via electronic means. (Yusvita Aprilyan et al., 2022). In the context of e-commerce, perceived usefulness refers to the extent to which MSMEs feel that the use of e-commerce will improve their performance, particularly in terms of revenue. Referring to the TAM theory, MSMEs that feel that e-commerce improves their business performance and simplifies operations will experience an increase in revenue. E-commerce helps MSMEs in expanding the market, increasing product visibility, and simplifying the transaction process, all of which contribute to increased revenue. This is supported by the findings of research conducted by Achira et al. (2023); Ami et al. (2023); Ayunda et al. (2023); Fatma et al. (2024); Gao et al. (2023); Titasari, H. I. (2024); Kilay et al. (2022); Pratami et al. (2023); Arniyasa, P. Y. P., & Karmini, N. L. (2023); Usman, & Supriyati, D. (2023); Aprilyan et al. (2022) that E-commerce has a positive and significant effect on increasing MSME revenue, so from the description above, the following hypothesis can be outlined:

H1 = E-commerce has a positive effect on increasing MSME revenue

The Effect of Social Media on Increasing MSME Revenue

Social media marketing is a crucial component of digital marketing that entails engaging and communicating with customers via a company's platform or through social media channels like as Facebook, Twitter, and Instagram, in addition to publisher sites, blogs, and forums. (Jasri t al., 2022) The Technology Acceptance Model (TAM) posits that the primary determinants of technology adoption are perceived ease of use and perceived utility. In the context of social media, perceived usefulness reflects the extent to which MSMEs feel that using social media can improve their performance, especially in terms of revenue. Social media is considered effective if it can increase product promotion, attract new customers, and strengthen relationships with existing customers. This is supported by the results of research conducted by Agnesia & Saputra (2022);

Emilia (2023); Ferliansyah & Wijaya (2024); Gontur et al. (2023); Mudjahidin et al. (2024); Setiawati & Pirdaus (2024) that social media has a positive and significant effect on increasing MSME revenue, so from the description above, the following hypothesis can be outlined:

H2 = Social Media has a positive effect on increasing MSME revenue

The effect of digital payment on increasing MSME revenue

Digital payments in MSMEs serve not merely as a transactional instrument, but as a strategic support that amalgamates marketing, sales, and customer service. The utilization of digital payments in MSMEs is significant for both sellers and purchasers for transaction execution and the provision of payment information (Evita et al., 2024) Within the Technology Acceptance Model (TAM) framework, perceived ease of use and perceived usefulness are essential determinants of technology acceptance. In the context of digital payment, perceived usefulness reflects the extent to which MSMEs feel that the use of digital payment methods can improve their performance, especially in terms of revenue. Digital payment is considered useful if it can simplify transactions and increase customer satisfaction. MSMEs that feel the benefits of using digital payments in simplifying the transaction process and increasing customer satisfaction will experience an increase in revenue. Digital payments provide an efficient and convenient way to make payments, which can increase transaction volumes and, ultimately, MSME revenues. This is supported by the results of research conducted by Amelia (2023); Evita et al. (2024); Fatma et al. (2024); Titasari H I (2024); Kilay et al. (2022); Shanshabilla et al. (2023) that Digital payment has a positive and significant effect on increasing MSME revenue, so from the description above, the following hypothesis can be outlined:

H3 = Digital payment has a positive effect on increasing MSME revenue

METHODOLOGY

This research is associative in nature and employs a quantitative methodology (Damayanti & Sujana, 2024; Hidayah & Nurabiah, 2024; Intan Berlianawati, Nurabiah, & Ridhawati, 2024; Najati, Pituringsih, & Animah, 2017; Nurhikmah, Bambang, & Nurabiah, 2024; Pratama, Animah, & Nurabiah, 2023; Ramadhan & Nurabiah, 2024; Sari, Husnaini, & Nurabiah, 2023; Suryana, L, & Nurabiah, 2022; Tatian, Nurabiah, Ridhawati, & Thao, 2024; Yuardi Aprilian, Anggun Hilendri Lestari, & Nurabiah, 2023; Yusuf & Sani, 2018). Sugiyono (2018) states that , associative research seeks to ascertain the relationship between two or more variables. This research was conducted on MSMEs in Mataram City, West Nusa Tenggara, Indonesia, with a population of 33,967 MSMEs (Lombok Post, 2024). The employed sample strategy was purposive sampling. by selecting MSMEs that use e-commerce, social media, and digital payment registered in the Gofood application with a total of 458 MSMEs using e-commerce. Respondents in this study are owners or managers of MSMEs, who have direct knowledge related to digital technology in their business. The data utilized is primary data, acquired via a questionnaire. The questionnaire employs a Likert scale to assess

respondents' attitudes, views, and perceptions. The data analysis method employs Partial Least Squares (PLS) utilizing SmartPLS 4.0 software.

Table 1. Research Instrument

No	Variable	Indicator	Scale	Reach
1.	<i>E-commerce</i> (X1)	1. Marketing or marketing (X1.1) 2. Services performed (X1.2) 3. Ease of transaction (X1.3) 4. Capital (X1.4) 5. Ease of access (X1.5)	Likert	(Fitroh A L,2020)
2.	Social Media (X2)	1. Ease (X2.1) 2. Trust (X2.2) 3. Information Quality (X2.3)	Likert	(Hardiansyah, 2023)
3.	<i>Digital payment</i> (X3)	1. Perceived Ease of Use (Persepsi kemudahan penggunaan) (X3.1) 2. Perceived Usefulnes (Pesepsi manfaaf) (X3.2) 3. Perceived Credibility (Persepsi Kemaan) (X3.3) 4. Sosial Influence (X3.4) 5. Behavior Intention (X3.5)	Likert	(Riska,2022)
4	Increasing MSME Revenue (Y)	1. Business capital (Y1.1) 2. Sales turnover (Y1.2) 3. Business profit (Y1.3) 4. Labor (Y1.4) 5. Business branches (Y1.5)	Likert	(Aprilyan et al., 2022)

Source: Data (2024)

RESEARCH RESULT

The questionnaires were distributed to 120 MSME players who were identified as the research sample. Of this total, 118 questionnaires were successfully returned and processed. The minimum number of participants in this study was calculated using the Slovin formula with a margin of error of 10%, yielding a requisite minimum of 97 respondents. With the number of questionnaires returned reaching 118 respondents, the data obtained has met the minimum number criteria for further analysis.

Frequency Distribution of Respondent characteristics

The frequency distribution of respondent characteristics in this study, derived from interview results, is presented in Table 2 below:

Table 2: Frequency distribution of respondent characteristics

Variable	Frequency	Percentage
Gender		
female	74	63%

male	44	37%
Total	118	100%
Age of Respondents		
18 – 25 Years	22	19%
26 - 35 Years	61	52%
36 - 45 Years	30	25%
46 – 55 Years	4	3%
56 Years and Above	1	1%
Total	118	100%
Last Education		
High School/Vocational School	53	45%
DIPLOMA	19	16%
S1	45	38%
S2	1	1%
Total	118	100%
Type of Business		
Culinary	112	95%
Fashion	4	3%
Trade	2	2%
Total	118	100%
Business Address		
Ampenan sub-district	8	7%
Cakranegara sub-district	12	10%
Mataram sub-district	59	50%
Sandubaya sub-district	3	3%
Sekarbela sub-district	14	12%
Selaparang sub-district	22	19%
Total	118	100%

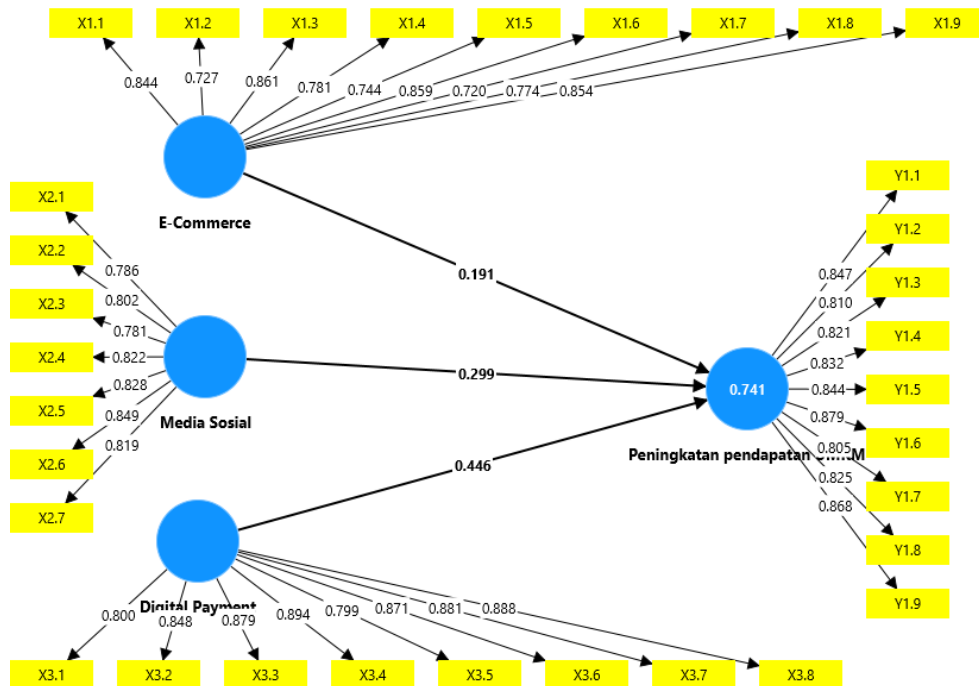
Source: Data Processing Results (2024)

Respondent characteristics show that the majority of participating MSMEs are female (63%), with the largest age group between 26-35 years old (52%). A large proportion of respondents possessed a high school or technical school education (45%). and a bachelor's degree (38%), reflecting that MSME players in Mataram City are mostly from the productive age group and have educational backgrounds that support their businesses. Most MSMEs are engaged in the culinary sector (95%) and located in Mataram Sub-district (50%), indicating the dominance of the culinary sector in Mataram City as an economic center for business actors.

Convergent Validity

Convergent validity in the measuring model is assessed through the correlation between the item or indicator score and its construct score (loading factor). The loading factor for each indication must exceed 0.7. This value represents the contribution or weight of each indicator to the measurement of the

variable it represents. The test results in this study include 4 variables and 33 indicators, which are presented in the following table:



Source: SmartPLS data processing results (2024)

Figure 1. Partial Least Square (PLS) Model Schematic

Based on the analysis results, the loading factor values of all instruments have met the convergent validity criteria, which are more than 0.7. Thus, all indicators used in this study are declared valid. However, in the initial test, there were several question items that had a loading factor value below 0.7, namely questions related to ease of access to using online applications (X1.10), friends' recommendations in using digital payments (X3.2), the wide range of digital payment applications (X3.4), and increasing labor productivity through e-commerce, social media, and digital payments (Y.4). These items have been excluded from the analysis to ensure the instrument used meets the validity criteria.

Discriminant Validity

Discriminant validity is assessed by cross-loading results, which evaluate if each variable possesses adequate discriminant validity. This test is conducted by juxtaposing the loading factor value of the primary construct with the loading factor values of other constructs. A variable demonstrates strong discriminant validity when its loading value on the primary construct exceeds its loading value on alternative constructs. The outcomes of cross-loading testing in this investigation are displayed in the subsequent table:

Table 3. Cross-loading Results

	X1	X2.	X3	Y1
X1.1	0.844	0.474	0.537	0.476
X1.2	0.727	0.427	0.534	0.446
X1.3	0.861	0.569	0.658	0.664
X1.4	0.781	0.548	0.595	0.553
X1.5	0.744	0.585	0.751	0.659
X1.6	0.859	0.576	0.637	0.630
X1.7	0.720	0.495	0.529	0.506
X1.8	0.774	0.530	0.561	0.550
X1.9	0.854	0.566	0.632	0.683
X2.1	0.598	0.786	0.672	0.573
X2.2	0.565	0.802	0.705	0.638
X2.3	0.493	0.781	0.594	0.545
X2.4	0.595	0.822	0.631	0.663
X2.5	0.518	0.828	0.592	0.653
X2.6	0.523	0.849	0.630	0.682
X2.7	0.529	0.819	0.654	0.651
X3.1	0.722	0.555	0.800	0.685
X3.2	0.614	0.729	0.848	0.662
X3.3	0.676	0.644	0.879	0.730
X3.4	0.719	0.749	0.894	0.734
X3.5	0.530	0.686	0.799	0.685
X3.6	0.620	0.642	0.871	0.682
X3.7	0.684	0.681	0.881	0.762
X3.8	0.681	0.708	0.888	0.729
Y1.1	0.680	0.709	0.724	0.847
Y1.2	0.540	0.672	0.677	0.810
Y1.3	0.618	0.628	0.735	0.821
Y1.4	0.606	0.586	0.635	0.832
Y1.5	0.584	0.686	0.701	0.844
Y1.6	0.669	0.646	0.743	0.879
Y1.7	0.610	0.640	0.685	0.805
Y1.8	0.596	0.624	0.671	0.825
Y1.9	0.605	0.658	0.646	0.868

Source: SmartPLS data processing results (2024)

Table 3 demonstrates that the loading value for each indication on its respective variable exceeds that of the other variables, which indicates that each indicator dominantly measures the intended latent variable.

Composite Reliability

A construct is categorized as reliable if the Cronbach's alpha and composite reliability values are more than 0.6, while the Average Variance Extracted (AVE) value is said to be valid if it exceeds 0.5. If all the results of testing the reliability and validity of the construct meet these criteria, the analysis stage can proceed to testing the structural model (inner model).

Table 4. Construct Reliability and Validity Results

	Cronbach's alpha	Composite reliability (rho_a)	Composite reliability (rho_c)	Average variance extracted (AVE)
X1	0.928	0.935	0.940	0.637
X2	0.914	0.917	0.932	0.661
X3	0.949	0.950	0.957	0.737
Y1	0.947	0.947	0.955	0.701

Source: SmartPLS data processing results (2024)

Based on table 4. the results of testing Cronbach's alpha and composite reliability show a value of > 0.7 , and the Average Variance Extracted (AVE) value > 0.5 . This indicates that all variables in this study are declared reliable.

Analysis of Structural Model Test Results (Inner Model)

In the bootstrapping technique, testing is carried out with a significance level of 5% (0.05). Hypothesis testing uses a one-way (one-tailed) approach with a rule of thumb, namely the hypothesis is accepted if the t-statistics value $>$ t-table value (1.65) or if the p-value < 0.05 . This shows that the tested influence is considered significant and proven. The following are the results of path coefficient testing summarized in the following table:

Table 5. Path Coefficient Results

	Original sample (O)	T statistics (O/STDEV)	P values	Hypothesis	Conclusion
X1 -> Y1	0.191	2.080	0.038	H ₁	Accepted
X2 -> Y1	0.299	4.159	0.000	H ₂	Accepted
X3 -> Y1	0.446	3.848	0.000	H ₃	Accepted

Source: SmartPLS data processing results (2024)

Based on the results of Path Coefficient testing, the effect of the independent variables on the dependent variable in this study can be explained as follows:

H₁ is accepted: E-commerce (X1) has a positive and significant effect on increasing MSME revenue (Y1). This is evidenced by the t-statistics value of $2.080 > 1.65$ and a p-value of $0.038 < 0.05$. It shows a positive direction with an original sample (O) value of 0.191.

H₂ accepted: Social Media (X2) has a positive and significant effect on increasing MSME revenue (Y1). This can be seen from the t-statistics value of $4.159 > 1.65$ and a p-value of $0.000 < 0.05$, indicating a positive direction with an original sample (O) value of 0.299.

H₃ is accepted: Digital Payment (X3) has a positive and significant effect on increasing MSME revenue (Y1). The t-statistics value is $3.848 > 1.65$ and the p-value is $0.000 < 0.05$. It shows a positive direction with an original sample (O) value of 0.446.

Uji R-Square (R²)

The R-square test is conducted to assess the degree to which the dependent variable is affected by the independent variables in the research model. A higher R² value indicates an improved capacity of the model to predict the dependent variable. An R² value of 0.67 signifies a high influence, 0.33 denotes a moderate influence, and 0.19 reflects a weak influence.

Table 6. R-Square Results

	R-square	R-square adjusted
Y1	0.741	0.734

Source: SmartPLS data processing results (2024)

Table 6 indicates that the R-square (R²) value for the dependent variable (Y) is 0.741. The independent variables (X1, X2, X3) collectively account for 74.1% of the variance in the dependent variable (Y1). Twenty-five point nine percent is affected by other factors not accounted for in this model.

DISCUSSION

The Effect of E-commerce on Increasing MSME Income

The research findings indicate that E-Commerce positively and significantly impacts the income of MSMEs in Mataram City. The use of online applications such as Shopee, Tokopedia, Go-Food, and Grab-Food is proven to have a positive impact on various aspects of micro, small and medium enterprises (MSMEs). Based on the results of the analysis, the majority of respondents recognized that these applications made it easier to market their products. A total of 36% of respondents strongly agreed that online apps help market their products more effectively, followed by 28% who agreed. Moreover, these apps also reduce the need for advertising costs, providing an efficient and cost-effective marketing solution.

In terms of service, online apps help improve the quality of service to consumers. A total of 36% of respondents strongly agreed that they can provide better service to customers through the use of these apps. This allows MSMEs to focus more on meeting consumer needs quickly and efficiently, resulting in increased customer satisfaction. Ease of transactions is also one of the main advantages of online applications. As many as 39% of respondents strongly agreed that the app makes it easier to process their sales transactions, including real-time access to monitor sales activities. This convenience provides significant benefits in business management, especially in terms of time efficiency and better supervision.

In addition, online apps also help MSMEs in terms of capitalization. As many as 39% of respondents strongly agree that these apps allow them to reduce production costs and get additional business capital more easily. This shows that online apps not only serve as marketing tools, but also as financial support for businesses. Ease of access is also a factor that is widely appreciated by respondents. As many as 39% of respondents strongly agreed that online apps

make it easier for them to carry out sales transaction activities. This allows MSMEs to run their business practically and efficiently, without geographical or technical barriers.

Based on the results of the frequency distribution of respondent characteristics collected through the questionnaire, all respondents, namely 100%, are engaged in the culinary business sector and have used e-commerce as a means of marketing and transacting their business. This shows that they already understand the application of e-commerce has a direct effect on increasing the income of MSMEs, especially in the culinary sector. In terms of education, 54% of respondents have Diploma and S1 level education, which shows that most MSME players have a good understanding of technology, including e-commerce. In addition, respondents with an age range of 26-35 years, which reached 52%, are an age group that is technology-savvy and more accustomed to using e-commerce in running a business. Mataram sub-district, which is the business location of the majority of respondents (50%), has a dominance of the culinary sector in MSME activities, which is also supported by the presence of economic activity centers in the area. Mataram City itself, as the capital of West Nusa Tenggara Province, is the center of trade, tourism, and other economic activities that provide great opportunities for MSMEs to develop, especially through the use of technology such as e-commerce.

This discovery aligns with the Technology Acceptance Model (TAM), which posits that perceived usefulness and perceived ease of use are the primary determinants of technology adoption. The use of online applications by MSMEs provides tangible benefits in various aspects, such as ease of transactions, increased product visibility, and market expansion. This indicates that the greater the benefits perceived by users, the higher the level of technology adoption, as described in TAM. With ease of use, MSMEs not only save time and costs but can also speed up the transaction process and expand customer networks, thereby driving increased revenue.

This is supported by the results of research conducted by Achira et al. (2023), Ami et al. (2023), Ayunda et al. (2023), Fatma et al. (2024), Gao et al. (2023), Titasari, H. I. (2024), Kilay et al. (2022), Pratami et al. (2023), Arniyasa, P. Y. P., & Karmini, N. L. (2023), Usman, & Supriyati, D. (2023), and Aprilyan et al. (2022), which showed that E-Commerce plays an important role in improving the competitiveness, visibility, and operational efficiency of MSMEs. In the context of this research, E-Commerce allows MSMEs to utilize digital technology to introduce their products to a wider audience without geographical restrictions. Platforms such as Shopee, Tokopedia, GoFood, GrabFood, and other applications support MSMEs in buying and selling transactions, product marketing, and interaction with consumers. This not only speeds up the transaction process, but also increases consumer confidence in MSME products. Thus, E-Commerce is proven to be one of the important factors in improving the performance and income of MSMEs in the digital era.

The Effect of Social Media on Increasing MSME Income

The research findings indicate that social media usage positively and significantly enhances the income of MSMEs in Mataram City. Social media

usage significantly influences business advancement. The majority of respondents believe that social media facilitates the introduction of their business to a wider audience, with 47% of respondents strongly agreeing that social media helps expand market reach. In addition, the majority of respondents, 69%, felt that their products were more easily recognized by the public thanks to the use of social media. The use of social media in sales activities also makes it easier for consumers to make transactions, which is considered to increase business revenue, as perceived by 58% of respondents.

Regarding trust, most respondents believe that ensuring the safety of transactions through social media can increase their business revenue. This shows the importance of safety in transactions conducted through social media platforms. In addition, 52% of respondents experienced an increase in revenue after their social media platforms became more popular due to the number of purchases made through them. This shows that social media can strengthen business visibility and contribute to increased revenue. In terms of information quality, the majority of respondents believe that the use of social media can increase the number of customers for their business. 49% of respondents stated that social media plays a role in boosting the number of customers, which leads to an increase in business revenue. Overall, the analysis shows that social media plays an important role in marketing, increasing consumer trust, and improving the quality of information about products, which contributes to increased business revenue.

Based on the results of the frequency distribution of respondent characteristics, all respondents (100%) engaged in the culinary business sector have utilized social media, such as Instagram, Facebook, and WhatsApp, as marketing tools. The utilization of social media allows MSME players to reach consumers widely with high efficiency in terms of cost, time, and energy. In terms of education, 54% of respondents have a Diploma and S1 educational background, which reflects a good ability to understand and implement marketing strategies through social media to increase business income. Respondents in the age range of 26-35 years old, who dominate as much as 52%, are the age group most familiar with digital technology, making them more skilled in integrating social media into business activities. As the location of the majority of businesses, Mataram Sub-district (50% of total respondents) reflects the important role of social media in supporting MSME activities. Mataram City, as the center of economy and trade in West Nusa Tenggara, creates strategic opportunities for MSMEs to optimally utilize social media to increase business revenue.

This finding supports the Technology Acceptance Model (TAM) theory, which states that the two main factors in technology adoption are perceived usefulness and perceived ease of use. In the context of social media, perceived usefulness is reflected in the understanding that social media can expand market reach, promote products, and increase interaction with consumers, which leads to increased revenue. Meanwhile, perceived ease of use can be seen from the ease of use of social media that can be done by MSME actors, without requiring high

technical expertise, thus allowing them to access and manage their social media accounts effectively.

This is supported by previous studies, such as those conducted by Agnesia & Saputra (2022), Emilia (2023), Ferliansyah & Wijaya (2024), Gontur et al. (2023), Mudjahidin et al. (2024), and Setiawati & Pirdaus (2024), which show that social media has a positive and significant impact on MSME revenue. Social media allows MSMEs to reach potential consumers who were previously difficult to access through traditional channels. By using social media as a marketing tool, MSMEs can improve cost and time efficiency, which ultimately contributes to increasing their revenue.

The effect of digital payment on increasing MSME income

The research findings indicate that the utilization of digital payments positively and significantly enhances the income of MSMEs in Mataram City. The use of digital payment applications such as OVO, DANA, GoPay, and ShopeePay is proven to have a positive impact on various operational aspects of micro, small and medium enterprises (MSMEs). Based on the results of the analysis, the majority of respondents recognized that these digital payment applications make it easier to access finance and increase transaction efficiency. As many as 36% of respondents strongly agree that the use of digital payment provides convenience in terms of use and application, followed by 41% who agree. In addition, this digital payment application also plays an important role in providing a sense of security to users. As many as 45% of respondents feel safe using digital payments, and 43% of respondents feel confident that their balance has never been reduced without the knowledge of the account owner. This security is a very important factor in the adoption of digital payment, thus increasing the confidence of MSMEs to use it in daily transactions.

In terms of social influence, the influence of friends and advertisements also plays a big role in the use of digital payments. As many as 50% of respondents use digital payments because of friends' recommendations, and 48% of respondents are influenced by advertisements that explain the benefits of using this technology. This reflects that social influence and media have a big impact on MSMEs' decisions to adopt digital payment technology. Then, regarding behavior intention, 49% of respondents use digital payments more than three times a month, and 41% of respondents often use digital payment applications such as GoPay and ShopeePay in their transactions. This shows that the intention to use digital payment is getting higher along with the increasing benefits felt by users, such as ease, security, and convenience of transactions.

Based on the frequency distribution of respondent characteristics through questionnaires, all respondents (100%) are engaged in the culinary sector and have used digital payments in their business transactions. The application of digital payments is important in the operations of MSMEs, especially in the culinary sector, to simplify and speed up transactions. As many as 54% of respondents have Diploma and S1 level education, which shows that most MSME players in this region have a good understanding of technology, including digital payments. Respondents aged 26-35 years (52%), who are millennials and Z generation, are more tech-savvy and accustomed to using digital payments.

Mataram sub-district, where the majority of respondents (50%) are located, dominates the culinary sector and is driven by easy access to technology and a growing digital payment infrastructure. Mataram City, as the capital of West Nusa Tenggara Province, provides opportunities for MSMEs to utilize digital payments, contributing to increased revenue through more efficient and secure transactions. Overall, the adoption of digital payments is proven to increase the operational efficiency and income of MSMEs in the culinary sector, particularly in Mataram.

This finding is in line with the Technology Acceptance Model (TAM) theory, which states that perceived usefulness and perceived ease of use are the main factors in technology adoption. The use of digital payments by MSMEs provides tangible benefits in the ease of transactions, increases security, and speeds up the payment process. The greater the perceived benefits, the higher the level of technology adoption, in accordance with the basic principles of TAM. Digital payments, such as e-wallets, bank transfers, credit cards, and QRIS, offer convenience, comfort, and efficiency, and help MSMEs speed up payments, increase customer satisfaction, and reduce the risk of transaction errors. QRIS, which is gaining popularity in Indonesia, enables payments by simply scanning a QR code, making transactions easy without physical cash or cards. Adoption of this system enables MSMEs to increase sales volume, accelerate cash flow, and expand markets.

This is corroborated by prior research, including investigations undertaken by Amelia (2023), Evita et al. (2024), Fatma et al. (2024), Titasari, H. I. (2024), Kilay et al. (2022), and Shanshabilla et al. (2023), which show that digital payments have a positive and significant impact on MSME revenues. Digital payments also help MSMEs reduce operational costs and improve customer service efficiency. Therefore, it is important for MSME players to continue to adapt to the development of digital technology and make the most of digital payment systems in order to compete effectively in the digital era.

CONCLUSIONS AND RECOMMENDATIONS

The research findings indicate that e-commerce, social media, and digital payment usage significantly and positively impact the income of MSMEs in Mataram City. These three variables collectively account for the majority of the variance in the augmentation of MSME income. The use of e-commerce provides a great opportunity for MSMEs to expand market reach and increase competitiveness through digitizing the transaction and marketing process. Social media plays an important role in strengthening interactions with consumers, increasing the effectiveness of promotions, and building customer loyalty. Meanwhile, digital payment provides convenience and efficiency in the transaction process, thus enhancing customer satisfaction and business efficiency. These results align with the Technology Acceptance Model (TAM) paradigm theory, It underscores the significance of perceived usefulness and perceived ease in technology adoption. Therefore, the adoption of digital

technologies such as E-Commerce, social media, and digital payment is key for MSMEs to improve their competitiveness and performance in the digital era.

Based on the findings of this study, several recommendations for future research can be suggested. First, future research should expand the sample and coverage area to increase the representativeness of the results, for example by examining MSMEs in all districts/cities in NTB. The addition of other variables that are still related to technology that can increase MSME income such as Cloud Computing, Big Data and Data Analytics, Internet of Things (IoT), Artificial Intelligence (AI) and Machine Learning, Mobile Technology (Mobile Applications), Augmented Reality (AR) and Virtual Reality (VR), Blockchain, as well as Chatbots and Customer Service Automation can also enrich the research model. Thus, further research can provide a more holistic insight into the opportunities and challenges that can increase MSME revenues.

ADVANCE RESEARCH

Future research should explore the impact of emerging digital technologies on MSME income and competitiveness, building on the positive effects of e-commerce, social media, and digital payments. Investigating tools such as Cloud Computing, Big Data Analytics, IoT, AI, AR/VR, Blockchain, and automated customer service can provide insights into their potential to optimize operations, enhance customer engagement, and drive revenue growth. A mixed-methods approach, incorporating surveys and case studies, can assess the readiness and challenges of MSMEs in adopting these technologies while expanding the sample to include diverse regions. This research would offer practical strategies for MSME digital transformation and inform policies to support sustainable growth in the digital economy.

REFERENCES

- Achira, S. P., Ambarwati, S., & Azwari, P. C. (2023). Pengaruh Penggunaan E-commerce terhadap Peningkatan Pendapatan Usaha Mikro Kecil Menengah (Penelitian di Kota Palembang). *Jurnal Ekonomi KIAT*, 34(2). Retrieved from <https://journal.uir.ac.id/index.php/kiat>
- Agnesia, V., & Saputra, A. J. (2022). Pengaruh Penggunaan E-Commerce, Financial Technology dan Media Sosial Terhadap Peningkatan Pendapatan UMKM Kota Dumai. *E-Jurnal Akuntansi*, 32(3), 750. <https://doi.org/10.24843/eja.2022.v32.i03.p15>
- Ami, A. S., Syafitri, L., & Meiriasari, V. (2023). the Effect of E-Commerce and the Use of Accounting Information Systems on the Revenue Cycle of Micro, Small and Medium Enterprises. *Journal of Humanities Social Sciences and Business (Jhssb)*, 3(1), 68–77. <https://doi.org/10.55047/jhssb.v3i1.818>
- Antaranews. (2024). Pengguna QRIS didominasi oleh UMKM. Retrieved from <https://www.antaranews.com/berita/4236307/pengguna-qrisk-didominasi-oleh-umkm#:~:text=Menurut data Bank Indonesia%2C transaksi,jumlah merchant 32%2C71 juta.>
- Ayem, S., & Wahidah, U. (2022). Faktor-faktor yang mempengaruhi pemanfaatan e-billing pajak dengan menggunakan technology acceptance model (TAM) pada UMKM di Daerah Istimewa Yogyakarta. *Proceeding of National*

- Conference on Accounting & Finance*, 4(1989), 106–113.
<https://doi.org/10.20885/ncaf.vol4.art15>
- Damayanti, N. L. G. A., & Sujana, I. K. (2024). the Influence of the Village Financial System, Competence of Village Apparatus, and Community Participation on Accountability in Village Fund Management. *Transekonomika: Akuntansi, Bisnis Dan Keuangan*, 4(4), 529–536.
<https://doi.org/10.55047/transekonomika.v4i4.701>
- Emilia, K. P. A. E. A. (2023). Analisis pengaruh penggunaan e-commerce, media sosial dan sosial media marketing terhadap pendapatan usaha mikro kecil menengah (UMKM) fashion di Kota Jambi. *Journal Perdagangan Industri Dan Moneter*, 11(3), 2303–1204.
- Evita, U., Tripermata, L., & Anggraini, L. D. (2024). Pengaruh Literasi Keuangan, Kemudahan Digital Payment dan Sikap Keuangan Pribadi Terhadap Peningkatan Pendapatan Usaha Mikro Kecil dan Menengah. *Jurnal Ekonomi Manajemen (JEKMa)*, 28(2), 43–51.
- Fatma, M., Studi Ilmu Administrasi Bisnis, P., Ilmu Sosial Dan Ilmu Politik, F., & Riau, U. (2024). The Effect Of Using E-Commerce And Digital Payment On UMKM Income (Case Study On UMKM In The Culinary Sector Of Tuah Madani Sub-District, Pekanbaru City) Pengaruh Penggunaan E-Commerce Dan Digital Payment Terhadap Pendapatan UMKM (Studi Kasus Pada Umkm Se. *Management Studies and Entrepreneurship Journal*, 5(2), 3518–3535. Retrieved from <http://journal.yrpiiku.com/index.php/msej>
- Ferliansyah, & Wijaya, R. S. (2024). Pengaruh penggunaan e-commerce, financial technology, media sosial dan modal terhadap pendapatan UMKM Kota Padang. *Jurnal Akuntansi Keuangan Dan Bisnis*, 1(4), 733–739.
- Gontur, S., Seyi, A. O., Bakshak, Y. S., & Awoena, F. D. (2023). Do Digital Marketing Impact Business Performance? Emerging Views from Managers and Owners of Micro, Small and Medium Scales Enterprises in Nigeria. *Journal of Business & Management*, 1(3), 206–224.
<https://doi.org/10.47747/jbm.v1i3.1143>
- Hardiansyah, E. (2023). Pengaruh Penggunaan Media Sosial Dan Qris (Quick Response Code Indonesian Standard) Terhadap Peningkatan Pendapatan Umkm Di Kecamatan Curup. *E-Theses IAIN Curup*.
- Hasna Indarti Titasari. (2024). Pengaruh E-Commerce dan Digital Payment terhadap Pendapatan Usaha Mikro Kecil Menengah (UMKM) di Daerah Istimewa Yogyakarta. *Sunan Kalijaga: Islamic Economics Journal*, 2(1), 25–51.
<https://doi.org/10.14421/skiej.2023.2.1.1750>
- Hidayah, N., & Nurabiah. (2024). Determinants of the Quality of the Accounting Information System at Pt Pegadaian (Persero) Se-Kab Bima. *Journal of Accounting and Finance in Emerging Economies*, 10(1), 1–12.
<https://doi.org/10.26710/jafee.v10i1.2878>
- Intan Berlianawati, D., Nurabiah, & Ridhawati, R. (2024). Exploring The Mind of Gen Z: Deciphering E-wallet Adoption Through The Lens of TPB Theory. *Jurnal Ilmiah Akuntansi Dan Bisnis*, 19(1).
<https://doi.org/10.24843/JIAB.2024.v19.i01.p09>

- Kilay, A. L., Simamora, B. H., & Putra, D. P. (2022). The Influence of E-Payment and E-Commerce Services on Supply Chain Performance: Implications of Open Innovation and Solutions for the Digitalization of Micro, Small, and Medium Enterprises (MSMEs) in Indonesia. *Journal of Open Innovation: Technology, Market, and Complexity*, 8(3), 119. <https://doi.org/10.3390/joitmc8030119>
- Mudjahidin, M., Aristio, A. P., Balbeid, N. H., & Junaedi, L. (2024). The Influence of Social Media Sales Intensity and Competency on the Improvement of Business Performance Satisfaction in MSMEs. *Procedia Computer Science*, 234, 869–875. <https://doi.org/10.1016/j.procs.2024.03.074>
- Pendorong Utama, S., Irfan Mu'afi, M., Amalia, P. A., Amalia, T., Ilmu, J., Bisnis, A., ... Yogyakarta, ". (2024). Memahami Perilaku Investasi Generasi Z: Peran Literasi Keuangan, 9(1), 1–9.
- Perdagangan, P. K. (2024). Perdagangan Digital (E-Commerce) Indonesia Periode 2023, 1–8.
- Pratama, F. D. K., Animah, A., & Nurabiah, N. (2023). Determinan Akuntabilitas Pengelolaan Keuangan Masjid Di Kota Mataram. *E-Jurnal Ekonomi Dan Bisnis Universitas Udayana*, 12(05), 843. <https://doi.org/10.24843/eeb.2023.v12.i05.p05>
- Putu Yasti Putri Arniyasa, & Ni Luh Karmini. (2023). Pengaruh Modal Usaha, Tenaga Kerja, dan Penggunaan E-commerce Terhadap Pendapatan UMKM Bidang Kuliner di Kota Denpasar. *Public Service and Governance Journal*, 4(2), 139–149. <https://doi.org/10.56444/psgj.v4i2.938>
- Rosmawati, E., Suherman, U., Apriani, Z., Yani, D., & Arya Yudha, S. (2023). Analysis Of The Use Of Digital Payments In MSMEs As An Effort to Increase Income In The Sanggabuana Coffee Tourism Village. *Journal of Management*, 2(2), 97–108. Retrieved from <https://myjournal.or.id/index.php/JOM>
- Sari, D. S. P., Husnaini, W., & Nurabiah, N. (2023). Analisis Faktor-Faktor Yang Memengaruhi Kinerja Sistem Informasi Akuntansi Pada Puskesmas Pemerintah Di Kabupaten Lombok Tengah. *Bisnis-Net Jurnal Ekonomi Dan Bisnis*, 6(2), 601–616. <https://doi.org/10.46576/bn.v6i2.3767>
- Tatian, C. T., Nurabiah, Ridhawati, R., & Thao, H. T. P. (2024). From wallets to screens: Exploring the determinants of QRIS payment adoption among Millennials in Eastern Indonesia. *JEMA: Jurnal Ilmiah Bidang Akuntansi Dan Manajemen*, 21(1), 87–113. <https://doi.org/10.31106/jema.v21i1.21712>
- Wahdia, M., & Rintasari, N. (2023). E-Commerce, Financial Technology, Media Sosial, Modal Usaha, dan Pendapatan UMKM Bidang Fashion. *PERWIRA:Jurnal Pendidikan Kewirausahaan Indonesia*, 6(2), 83–98.
- Yuardi Aprilian, I., Anggun Hilendri Lestari, B., & Nurabiah. (2023). The Effect of Financial Literacy, Financial Attitudes and Income Levels on the Financial Behavior of the People in Saribaye Village, Lingsar District, West Lombok Regency, 1(March).
- Yusvita Aprilyan, Elin Erlina Sasanti, & Isnawati. (2022). Pengaruh E-Commerce Terhadap Peningkatan Pendapatan Usaha Mikro Kecil Dan Menengah (Umkm) Di Kabupaten Lombok Barat. *Jurnal Riset Mahasiswa Akuntansi*, 2(2), 292–306. <https://doi.org/10.29303/risma.v2i2.216>