

THE IMPACT OF DIGITAL MARKETING ON BUSINESS PERFORMANCE THROUGH THE ROLE OF COMPETITIVENESS IN MSMES IN SEMARANG REGENCY

Endang Kustami^{1)*}, Luthfy Purnanta Anzie²⁾, Isa Al Ansori³⁾, Aisyah Putri Nurusyifa⁴⁾

¹²³⁴Universitas Sains dan Teknologi Komputer

E-mail: endangkustami@stekom.ac.id^{1*}, luthfypurnanta@stekom.ac.id²,
isa.al.ansori00@gmail.com³, aisyahnurusyifa358@gmail.com⁴

Abstract

Digital marketing has been identified as a potential strategy to promote MSMEs and sell their products. The objective of this research is to test the influence of digital marketing on business performance with competitiveness as a mediating variable. The study respondents in this sample were 200 MSMEs in Semarang Regency, Central Java Province. The sampling procedure adopted a purposive sampling approach. The closed-end questionnaire was utilized to collect data with a five-point Likert scale. The analysis data method of this study is carried out based on the path analysis using SmartPLS software version 4.1.1.2. The study findings reveal that there is a significant impact of digital marketing on competitiveness. The second one is that digital marketing has a positive impact on business results. Third, the mediating relationship analysis illustrates that the competitiveness variable can mediate the impact of digital marketing on business performance. Research implications are the practical ideas for micro-entrepreneurs of meatball culinary businesses in applying digital marketing, competitiveness, and business performance.

Keywords: Digital Marketing, Business Performance, MSMEs, Competitiveness, Semarang.

1. INTRODUCTION

Digitalization has changed the practices in marketing, including those within Micro, Small, and Medium Enterprises (MSMEs), by which this sector is struggling to maximize digital marketing for better performance. Nevertheless, some research has not deeply investigated the contribution of digital marketing in affecting business performance through its mediation on competitiveness at the MSME local level. Their utilization is significant for micro, small, and medium enterprises (MSMEs), which contribute about 60.3% of the GDP in Indonesia. Further, MSMEs employ 97% of the total labor force and 99 % of total employment. In 2018, there were about 64.2 millions MSMEs capitalizing on a variety if small to large business activities and its growth running their ventures (Djakasaputra et al., 2021).

One potential solution for MSMEs to increase product visibility and sales is through digital marketing. The adoption of digital media, such as social media and e-commerce platforms, allows MSMEs to reach a wider market at a more affordable cost compared to previous traditional marketing methods (Mukhsin, 2019); (Sholikah et al., 2023). Statistically, several survey institutions found that MSMEs that saw increased sales volume after adopting digital marketing strategies in Semarang City were (Harini et al., 2022). The success of digital marketing in increasing sales MSME is influenced by the level of digital literacy and competitiveness between MSME actors or "the same fate" of innovation (Susano, 2024); (Susanto et al., 2020).

The high digital literacy of MSMEs may also form the foundation for them to be adaptive to new technologies and utilize thereof digital marketing strategies (Firdaus et al., 2022); (Zahro,

2020). Study on digital literacy for marketing education indicates that their ability to create and implement marketing plan designed for MSMEs is influenced by the level of understanding in digital marketing (Pida & Imsar, 2022); (Sholikah et al., 2023). Low or no digital marketing skills can also lead the competitive power of business actors to diminish (Pida & Imsar, 2022); (Yusuf et al., 2022). Hence, the level of competitiveness in moderating effects of DM on MSMEs BP relationship can also be explored.

The impact of digital marketing on business performance especially from the competitiveness angle of MSMEs has over time become a very critical knowledge area. For the enhanced competitiveness and performance of MSMEs in an increasingly dynamic market environment, digital marketing strategies are imperative. Digital devices facilitate business to have market expansion, operational efficiency and best of all is business performance (Asikin et al., 2024).

Digital marketing is an innovation-led process, helping MSMEs to produce and offer products or services that fulfill or surpass customers' needs. This sense for innovation is important since it makes possible that MSMEs are highly competitive (Cueto et al., 2022). Specifically, the adoption of a digital marketing framework impacts MSMEs' ability to engage with a broader consumer base, which is intrinsically linked to competitiveness and customer satisfaction (Kawira et al., 2019). The relationship between digital marketing and business performance through competitiveness illustrates that MSMEs can leverage digital platforms for greater market engagement and operational efficiency.

Referring to a research result that shows a strong positive correlation between digital marketing and MSME performance (Risdiyanto et al., 2023). Descriptive results of digital marketing and MSME performance support that most MSME owners/managers, who apply digital marketing in their business, perceive that his or her company's performance is getting better over time. There are some deficiencies in a number of the research results covered, which this study attempts to answer with those gaps and has intentions to test about the role of competitiveness: Impact of digital marketing on MSME business performance in Semarang Regency. The expected result of this research is to find out how far the actors of MSMEs in Semarang Regency are able to optimize their business performance and help them increase competitiveness with utilizing potential digital marketing.

2. LITERATURE REVIEW

2.1. Digital Marketing

Digital marketing is a product or service marketing strategy that utilizes digital platforms and technology to attract consumer interest, build brands, increase customer retention, and boost sales through the integration of digital-based business operating systems (Kannan & Li, 2017). Digital marketing is a marketing strategy that utilizes digital technology to expand the reach and effectiveness of MSME product promotions (Aditya & Rusdianto, 2023). Digital marketing variable indicators (Kannan & Li, 2017), include:

- a. Social Media Marketing
- b. Content Marketing
- c. SEO (Search Engine Optimization)

2.2. Competitiveness

Competitiveness is the dynamic ability of an organization to sustainably create unique value in the market by combining digital resources, innovative capabilities, and ecosystem adaptation (Warner & Wäger, 2019). Competitive advantage is very important to pay attention to today because today's competition is very dramatic as a result of globalization, technological

innovation and a chaotic business environment (Zultraqawa et al., 2020). Several indicators of competitiveness variables according to Warner and Wäger (2019), are as follows:

- a. Innovation
- b. Operational Efficiency
- c. Differentiation

2.3. Business Performance

Business performance is a multidimensional outcome that reflects the success of a business's digital adaptation (Gupta et al., 2023). Business Performance is defined as the company's ability to create the expected actions and results, therefore a good operational concept and system is needed that can be measured as a standardization (Arraniri, 2020).

- a. Financial Viability
- b. Operational Agility
- c. Strategic Resilience

2.4. Research Hypothesis

As much as possible, the researcher has attempted to specify the relationship of variables and to express theoretical explanation for responding research questions in an objective way that could be measured through such a hypothetical statement:

H1: Digital marketing has a positive and significant effect on competitiveness.

H2: Digital marketing has a positive and significant effect on business performance.

H3: Competitiveness has a positive and significant effect on business performance.

H4: Competitiveness mediates the relationship between digital marketing and business performance.

2.5. Research Framework

A theoretical framework is a conceptual model that provides a rational and systematically structured view of relationships among variables. A theoretical frame of reference developed from this review and used as the foundation of hypothesis formation Figure 1.

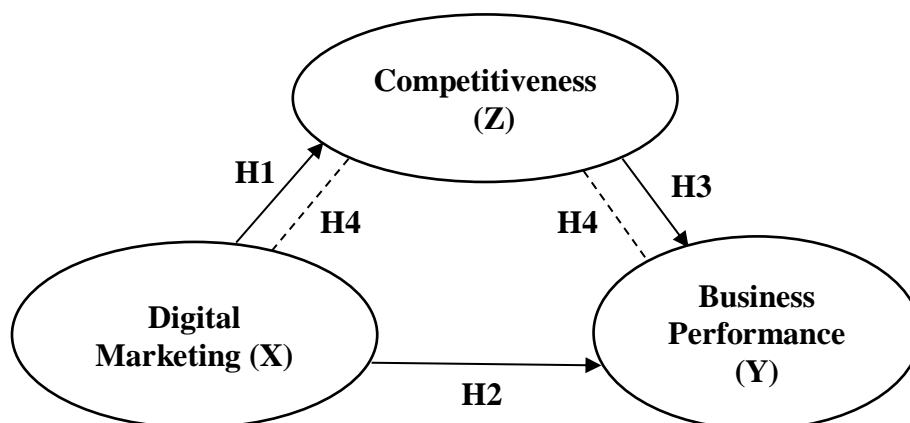


Figure 1. Research Framework

3. RESEARCH METHOD

This research is a quantitative study using an associative method. The population in this research is all MSME actors in Semarang Regency with a total of 200 respondents and also serves as a sample and delimiter in this study. In the sampling technique, the researcher used a non-random sampling technique with a purposive sampling method. The considerations and criteria for selecting respondents were based on MSME actors respondents domiciled in Semarang Regency. In data collection, the researcher used primary data collected using a questionnaire given to all respondents and then processed and analyzed the data. Measurement of the value of respondents' answers uses a 1-5 point Likert scale parameter. The data analysis technique used Multivariate Analysis - Structural Equation Model (SEM-PLS) with the help of SmartPLS software Version 4.1.1.2.

4. RESULTS AND DISCUSSION

4.1. OUTER MODEL

4.1.1. Convergent Validity

The association between indicators and their constructs demonstrates convergent validity (Andria et al., 2023). External loading values between 0.5 to 0.6 are still considered sound with a construct being deemed have substantial impact when the correlation is higher than 0.7 (Ghozali & Latan, 2018). The reliability indexes of all outcomes shown in Figure 2 are over than 0.7; the results are therefore accepted.

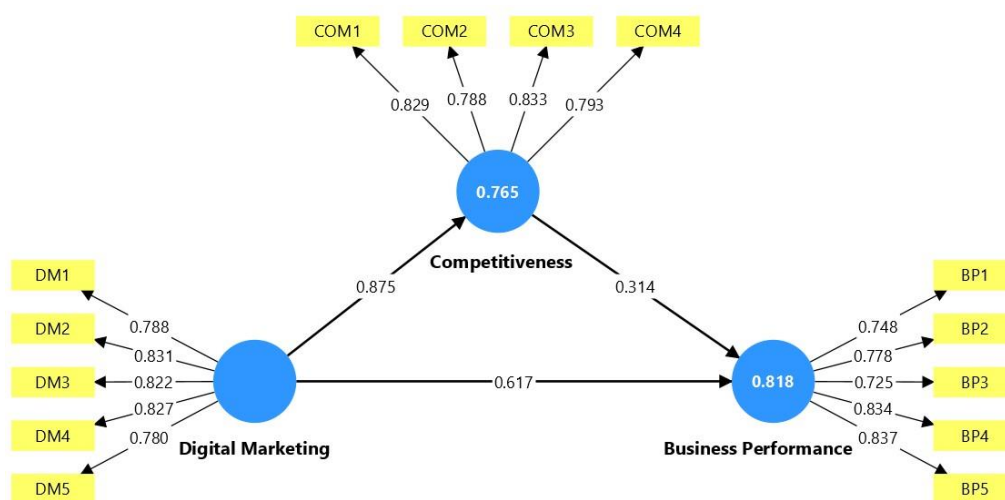


Figure 2. Outer Loading

4.1.2. Discriminant Validity

Discriminant validity is intended to make sure that each construct variable on a latent model is distinct from the rest of the other variables (Henseler et al., 2015). Validity assessment calculates the AVE value metric, which has a threshold value that is 0.5. A value of 0.5 or higher means that the construct can explain 50% or more of the variance of its items (Sarstedt et al., 2021). In Table 1, we see that AVE values for all of the variables exceed 0.5 and therefore can be considered valid.

Table 1. Discriminant Validity

Construct reliability and validity - Overview	
Average variance extracted (AVE)	
Business Performance	0.617
Competitiveness	0.658
Digital Marketing	0.656

Source: Processed primary data, 2025

4.1.3. Composite Reliability

An instrument is reliable when the overall AVE value averages greater than 0.5 and the values of Composite Reliability and Cronbach Alpha are more than 0.7 (Ghozali, 2021). The high Composite Reliability output data in Table 2 can be seen as those which have a CR value more than 0.7. As can be seen, the composite reliabilities of all variables are larger than 0.7, so we conclude that in general measured constructs of the HRM and wage inequality variables are relatively reliable.

Table 2. Composite Reliability

R-square - Overview			
	Cronbach Alpha	Composite reliability (rho_a)	Composite reliability (rho_a)
Business Performance	0.844	0.848	0.889
Competitiveness	0.827	0.829	0.885
Digital Marketing	0.869	0.871	0.905

Source: Processed primary data, 2025

As seen in Table 4, the research findings indicate that all the Cronbach's Alpha and Composite Reliability values of each variable is over 0.70, signifying each construct has reliability and validity consonance; hence, they were employed to examine the structural model. Effect size is F-square (F^2), and 0.02, 0.15, and 0.35 were characterized as small, small, and large values (Sarstedt et al., 2021).

4.2. INNER MODEL

4.2.1. R-Square

The R-square value indicates the level of determination of exogenous variables on endogenous variables. A higher R-square value indicates a better level of determination. An R-square value of 0.75 is categorized as a strong model, 0.50 as a moderate model, and 0.25 as a weak model (Sarstedt et al., 2021). In Table 3, the R-square (R^2) value for Business Performance of 0.818 falls into the strong category, and the R-square (R^2) value for Competitiveness of 0.764 falls into the strong category.

Table 3. R-Square Test

R-square - Overview	R-square	R-square adjusted	Category
Business Performance	0.818	0.816	Strong
Competitiveness	0.765	0.764	Strong

Source: Processed primary data, 2025

4.2.2. Hypothesis Testing

In hypothesis testing, researchers use bootstrapping to assess the significance level or probability of direct and indirect effects. Bootstrapping is a technique used to examine the significance of a model (Qurniawati et al., 2023). The t-statistic indicates the significance of the coefficient path (Sarstedt et al., 2021). Table 4 shows a complete overview of the relationships between variables in the four research hypotheses.

Table 4. Hypothesis Testing

Construct	Original Sample (O)	Sample Mean (M)	Standard deviation	T-statistics	P values	Result
DM → COM	0.875	0.874	0.021	41.385	0.000	accepted
DM → BP	0.617	0.618	0.065	9.563	0.000	accepted
COM → BP	0.314	0.313	0.065	4.804	0.000	accepted
DM → COM → BP	0.274	0.274	0.057	4.773	0.000	accepted

Source: Processed primary data, 2025

The hypothesis test between digital marketing and competitiveness showed a p-value of 0.000. This means the t-statistic meets the requirement of a p-value <0.05 , while the coefficient value is 0.875. It can be concluded that the first hypothesis is accepted.

The hypothesis test between digital marketing and business performance showed a p-value of 0.000, which is <0.05 . The coefficient value is 0.617, therefore, it can be concluded that the assumption of digital marketing on business performance is accepted.

The hypothesis test between competitiveness and business performance showed a p-value of 0.000, indicating a p-value <0.05 , while the coefficient value was 0.314. Therefore, it can be concluded that the third hypothesis is accepted.

Meanwhile, the hypothesis test between digital marketing and business performance, mediated by competitiveness, showed a p-value of 0.000, indicating a p-value <0.05 , while the coefficient value was 0.274. So, it can be concluded that this hypothesis is accepted.

4.2.3. Goodness of Fit (GoF)

Goodness of Fit (GoF) is designed to assess the feasibility and accuracy of a model used for validation in SEM-PLS. A structural equation model can be said to be fit if the SRMR (Standardized Root Mean Residual) value is <0.10 and the model is declared unfit if the SRMR value is >0.15 (Ghozali, 2021). A good Chi-square value is if it has a value range >0.05 (Astuti et al., 2019). The NFI (Normed Fit Index) value that indicates a good model is if the NFI value is <0.90 . Based on the results attached in Table 5, showing an SRMR value of 0.059, Chi-square of 240.445 and NFI of 0.868, the model in this study is declared fit.

Table 5. Goodness of Fit

Model fit	Model fit	
	Saturated model	Estimated model
SRMR	0.059	0.059
Chi-square	240.445	240.445
NFI	0.868	0.868

Source: Processed primary data, 2025

4.2.4. Effect Size

Effect size calculation is represented by F-square (F^2), 0.02 is considered as small, 0.15 is small and 0.35 can be termed as large value (Sarstedt et al., 2021). The data in Table 7 shows that the competitive position variable have only a small effect on business performance with 0.127 for the interpretation of the effect size (F^2). Additionally, the digital marketing variable has a strong influence on firm performance representing an effect size (F^2) value of 0.492. In the meantime, the variable of social media marketing exerts considerable influence on competitiveness (the effect size F^2 is 3.259).

Table 7. Effect Size

f-square - Matrix	f-square - Matrix	
	Business Performance	Competitiveness
Competitiveness	0.127	
Digital Marketing	0.492	3.259

Source: Processed primary data, 2025

4.3. DISCUSSION**Digital Marketing on Competitiveness**

The first hypothesis proves that digital marketing has a significant positive effect on competitiveness. Previous research also showed relevant results, such as that of Hadiyati (2023), who found that digital marketing variables significantly influence the competitiveness of entrepreneurs in Malang City. The implementation of digital marketing strategies to improve the competitiveness.

Digital Marketing on Business Performance

The second hypothesis proves that digital marketing has a significant positive effect on business performance. This finding aligns with research by Hadiyati (2023), which explains that digital marketing variables significantly influence the business performance of entrepreneurs in Malang City. Another study by Kawira et al. (2019) shows that digital marketing has a significant positive effect on MSME performance.

Competitiveness on Business Performance

Thirdly, the hypothesis that business performance has a positive and significant impact on competitiveness is confirmed. The results coincide with Hadiyati (2023), study that found the variable of competitiveness significantly influenced business performance directly and in a positive direction. According to Munandar (2025) study, high competitiveness is a direct effect of improving marketing and business performance.

Competitiveness Mediates the Effect of Digital Marketing on Business Performance

The fourth hypothesis, the mediating effect of competitiveness on the relationship between digital marketing and business performance was not supported. This result is consistent with Hadiyati (2023) study, which revealed that competitiveness mediated the relationship between digital marketing and service quality in business performance. This implies that the higher a MSME is competitive, the more positive influence of digital strategies and services on business performance.

5. CONCLUSION

The results of this study prove that digital marketing can be used as a strategy to compete and improve business performance in MSME clusters in the Regency of Semarang. These results, in turn, confirm the idea that digital marketing is directly influencing firm performance, and consequently indirectly influencing competitive position of the business. Thus, competitiveness is validated as a mediator that acts to fortify the link between digital marketing strategy and MSME business performance. Based on those findings, it is recommended that MSMEs be given the opportunity to adopt and make use of digital marketing efforts such as social media, marketplaces, and creative content to expand their markets. Furthermore, coaching and references regarding product service and branding innovation to sustainable strategy must periodically be improved in order for the effect brought by digital marketing on business performances can give maximum contributions. Local government and MSME support organizations are also expected to have a significant role at encouraging this digital transformation.

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