



**International Journal of Education, Social Studies,
And Management (IJESSM)**

e-ISSN : 2775-4154

Volume 4, Issue 2, June 2024

The International Journal of Education, Social Studies, and Management (IJESSM) is published 3 times a year (**February, June, November**).

Focus : Education, Social, Economy, Management, And Culture.

LINK : <http://lppipublishing.com/index.php/ijessm>

The Influence of Information Technology Adoption on the Financial Performance of Medan City MSMEs

Ummi Kalsum Nasution¹, Ova Novi Irama²

^{1,2} Universitas Muslim Nusantara Al Washliyah, Indonesia

ABSTRACT

This research was carried out based on phenomena that exist in the city of Medan. shows that there is an increase in the quality of community businesses by using information technology. The number of MSMEs in the city of Medan is a very large number, but not all MSME actors understand how to use technology to support their businesses. Information technology has an influence on increasing sales and income of MSMEs, such as increasing market access, operational efficiency and personalization of services. This research looks at how influential information technology is on the financial performance of MSMEs in the city of Medan. This research obtained data from 3 sub-districts which were used as research samples. if the significance value is <0.05 , it means that variable X has an influence on variable Y and if the significance value is >0.05 , it means that variable As a result of squaring R from the output, the coefficient of determination (R^2) is 0.897, so from this table it can be seen that Information Technology has a good influence on the financial performance of Medan City MSMEs. Keywords: Technology Adoption, MSMEs.

Influence of Information Technology Adoption, Financial Performance of MSMEs.

[10.52121/ijessm.v4i2.396](https://doi.org/10.52121/ijessm.v4i2.396)

ummikalsumnasution@umnaw.ac.id

ARTICLE INFO

Article history:

Received

25 May 2024

Revised

10 June 2024

Accepted

25 July 2024

Keywords

Doi

Corresponding Author 

INTRODUCTION

Micro, Small and Medium Enterprises (MSMEs) have an important role in the Indonesian economy, including in the city of Medan. MSMEs include various types of productive businesses that have a significant impact on increasing employment, economic growth and poverty alleviation (Law Number 20 of 2008). In Medan City, MSME growth has shown a significant increase over the last few years, reflecting its positive impact on the regional economy.

Technology changes very quickly along with new products, new processes and services from competitors, and this encourages entrepreneurial businesses to compete and be successful. All they have to do is adapt to new technology. Information technology (IT) has significantly changed various aspects of human

life, including the business world, especially for micro, small and medium enterprises (MSMEs), the adoption of information technology is important to strengthen their competitiveness and improve their financial performance.

One important aspect in the development of MSMEs is the adoption of Information Technology (IT). Information technology has significantly changed the way MSMEs operate and interact with customers. IT adoption allows MSMEs to expand market reach, increase operational efficiency, and increase interaction with customers (Johnson, A., & Smith, 2021; Smith, K., & Brown, 2022).

Meanwhile, medium businesses are productive economic businesses that stand alone and are carried out by individuals or business entities that are not subsidiaries, company branches, or part of large businesses, either directly or indirectly Aditi (2018).

Information systems can facilitate internal and external communication within MSMEs. Through email, instant messaging, or collaboration platforms, MSME owners and employees can communicate more efficiently, share information, and coordinate operational activities. Apart from that, information systems also enable MSMEs to communicate with suppliers, customers or business partners effectively.

According to (Warsame, 2019) there are several financial performance indicators that are relevant for MSMEs, namely net profitability, asset turnover, sales growth, current ratio, debt to equity ratio. IT adoption by MSMEs is expected to provide various significant benefits. Through effective use of IT, MSMEs can optimize their financial performance. Afriyani's (2021) research results show that innovation has an influence on consumer satisfaction in MSMEs. This is shown by innovation of 3,550, which means that innovation has an effect on consumer satisfaction.

According to the research results of Mohammad Fatih Nizam, Eva Mufidah (2020) MSMEs can improve and maintain their entrepreneurial orientation by increasing their abilities and innovative ideas into the real world which are carried out creatively such as attending training and development seminars for MSMEs, daring to take risks, having different ideas. with other MSME players to attract consumers, and increase the marketing reach of MSME players.

MSMEs in Medan City and its surroundings face a number of concrete problems that affect their sustainability and growth. Some of these problems are that MSMEs often operate with limited resources, including capital, labor and infrastructure. These limitations can hinder their ability to compete and develop. Many MSMEs may not have sufficient knowledge about IT and how to integrate it into their business operations. This can limit their ability to exploit IT's potential. MSMEs in Medan City have to compete with large companies and local

competitors who are increasingly aggressive. Their ability to exploit the potential of IT. MSMEs in Medan City have to compete with large companies and local competitors who are increasingly aggressive. The ability to utilize IT can be a key factor in maintaining competitiveness.

(Pudyastuti, E., & Saputra, 2021) according to the head of North Sumatra Diskop UKM entrepreneurship that the current condition of MSMEs in North Sumatra is not good, this can be seen from the current decline in MSME income. Currently there are at least 672,000 MSMEs and 7,700 cooperatives in North Sumatra which are experiencing a decline. This number is spread across all districts/cities in North Sumatra.

The adoption of information technology is expected to provide significant benefits for Medan City MSMEs, such as increasing operational efficiency, developing more effective marketing strategies, wider market access, and improving data-based decision making. However, there has been no research that specifically examines the effect of IT adoption on the financial performance of MSMEs in Medan City.

Micro, Small and Medium Enterprises (MSMEs) have an important role in the Indonesian economy, including in the city of Medan. MSMEs include various types of productive businesses that have a significant impact on increasing employment, economic growth and poverty alleviation (Law Number 20 of 2008). In Medan City, MSME growth has shown a significant increase over the last few years, reflecting its positive impact on the regional economy.

Technology changes very quickly along with new products, new processes and services from competitors, and this encourages entrepreneurial businesses to compete and be successful. What they have to do is adapt to new technology. Information technology (IT) has significantly changed various aspects of human life, including the business world, especially for micro, small and medium enterprises (MSMEs), the adoption of information technology is important to strengthen their competitiveness and improve their financial performance.

One important aspect in the development of MSMEs is the adoption of Information Technology (IT). Information technology has significantly changed the way MSMEs operate and interact with customers. IT adoption allows MSMEs to expand market reach, increase operational efficiency, and increase interaction with customers (Johnson, A., & Smith, 2021; Smith, K., & Brown, 2022).

Meanwhile, medium businesses are productive economic businesses that stand alone and are carried out by individuals or business entities that are not subsidiaries, company branches, or part of large businesses, either directly or indirectly. Aditi (2018).

Information systems can facilitate internal and external communication within MSMEs. Through email, instant messaging, or collaboration platforms, MSME owners and employees can communicate more efficiently, share information, and coordinate operational activities. Apart from that, information systems also enable MSMEs to communicate with suppliers, customers or business partners effectively.

According to (Warsame, 2019) there are several financial performance indicators that are relevant for MSMEs, namely net profitability, asset turnover, sales growth, current ratio, debt to equity ratio. IT adoption by MSMEs is expected to provide various significant benefits. Through effective use of IT, MSMEs can optimize their financial performance. Afriyani's (2021) research results show that innovation has an influence on consumer satisfaction in MSMEs. This is shown by innovation of 3,550, which means that innovation has an effect on consumer satisfaction.

According to the research results of Mohammad Fatih Nizam, Eva Mufidah (2020) MSMEs can improve and maintain their entrepreneurial orientation by increasing their abilities and innovative ideas into the real world which are carried out creatively such as attending training and development seminars for MSMEs, daring to take risks, having different ideas. with other MSME players to attract consumers, and increase the marketing reach of MSME players.

MSMEs in Medan City and its surroundings face a number of concrete problems that affect their sustainability and growth. Some of these problems are that MSMEs often operate with limited resources, including capital, labor and infrastructure. These limitations can hinder their ability to compete and develop. Many MSMEs may not have sufficient knowledge about IT and how to integrate it into their business operations. This can limit their ability to exploit IT's potential. MSMEs in Medan City have to compete with large companies and local competitors who are increasingly aggressive. Their ability to exploit the potential of IT. MSMEs in Medan City have to compete with large companies and local competitors who are increasingly aggressive. The ability to utilize IT can be a key factor in maintaining competitiveness.

(Pudyastuti, E., & Saputra, 2021) according to the head of North Sumatra Diskop UKM entrepreneurship that the current condition of MSMEs in North Sumatra is not good, this can be seen from the current decline in MSME income. Currently there are at least 672,000 MSMEs and 7,700 cooperatives in North Sumatra which are experiencing a decline. This number is spread across all districts/cities in North Sumatra.

The adoption of information technology is expected to provide significant benefits for Medan City MSMEs, such as increasing operational efficiency,

developing more effective marketing strategies, wider market access, and improving data-based decision making. However, there has been no research that specifically examines the effect of IT adoption on the financial performance of MSMEs in Medan City.

RESEARCH METHOD

This type of research is descriptive quantitative research which aims to describe the results of the financial performance of MSMEs in Medan City. This descriptive quantitative research design is used to systematically collect data, describe and analyze observed phenomena, with the aim of providing a clear picture of the characteristics of the population or sample being studied by Creswell (2014). A quantitative research approach involves using data that can be measured numerically to describe and analyze the characteristics of a population or sample Creswell (2014). The method used in this research is the Neuman survey method (2014). This quantitative descriptive research involves collecting data through surveys, measurements, or observations, and then analyzing the data using statistical methods to provide conclusions about the observed phenomena. The survey method is an effective tool in collecting quantitative data, which can include the use of questionnaires or structured interviews to obtain information about the financial performance of MSMEs in Medan City.

The results and type of this research is descriptive quantitative research which aims to describe the results of the financial performance of MSMEs in Medan City. This descriptive quantitative research design is used to systematically collect data, describe and analyze observed phenomena, with the aim of providing a clear picture of the characteristics of the population or sample being studied by Creswell (2014). A quantitative research approach involves using data that can be measured numerically to describe and analyze the characteristics of a population or sample Creswell (2014). The method used in this research is the Neuman survey method (2014). This quantitative descriptive research involves collecting data through surveys, measurements, or observations, and then analyzing the data using statistical methods to provide conclusions about the observed phenomena. The survey method is an effective tool in collecting quantitative data, which can include the use of questionnaires or structured interviews to obtain information about the financial performance of MSMEs in Medan City.

RESULT AND DISCUSSION

Technology changes very quickly along with new products, new processes and services from competitors, and this encourages entrepreneurial businesses to compete and be successful. All they have to do is adapt to new technology. Information technology (IT) has significantly changed various aspects of human life, including the business world, especially for micro, small and medium enterprises (MSMEs), the adoption of information technology is important to strengthen their competitiveness and improve their financial performance. In this research, we formulate a problem that will be examined in relation to whether the adoption of information technology has an effect on the financial performance of Medan City MSMEs. So, from the results obtained, the problem previously formulated obtained a research answer, namely that there is a significant influence of the adoption of information technology on the financial performance of Medan City MSMEs.

The conclusion of these two studies is that the use of information technology, whether in the form of a cloud 75 computing-based accounting information system or information technology in general, has a significant positive impact on the performance of MSMEs in Medan City. Therefore, your research results provide additional support for previous research findings and confirm the importance of information technology adoption in improving the performance of MSMEs. In other words, your research strengthens empirical evidence that information technology has a key role in increasing the competitiveness and sustainability of MSMEs in the digital era. The implications of the research findings which show that the adoption of information technology has a positive and significant impact on the financial performance of MSMEs in Medan City are as follows:

1. **The Importance of Adopting Information Technology:** These findings strengthen the argument for the importance of MSMEs adopting information technology in their operations. MSMEs in Medan City and the surrounding area should be more open to the use of information technology in managing their business. This may include the use of accounting software, inventory management systems, e-commerce platforms, and other tools that can help in improving operational efficiency.
2. **Improved Operational Efficiency:** With the adoption of information technology, MSMEs can increase efficiency in various aspects of their business, including administration, inventory management, sales tracking, and financial processing. This will reduce the manual workload and 76 allow more time and resources to be focused on product or service development, and business expansion.

3. **Access to Larger Markets:** Adoption of information technology can help MSMEs access larger markets. By presenting their products or services online, MSMEs can reach customers outside their physical territory and even at the national or international level. This will help in increasing sales and business growth.
4. **Increased Accountability and Transparency:** The use of accounting information systems can help MSMEs to track their financial transactions more accurately and transparently. This is important in meeting tax requirements and other government regulations. Apart from that, more accurate data can also help MSMEs make better decisions.
5. **Increased Competitiveness:** By adopting information technology, MSMEs can increase their competitiveness in an increasingly competitive market. They can provide better service to customers, respond more quickly to market trends, and leverage data analytics to identify business opportunities.

Increased Sustainability: MSMEs that adopt information technology well can become more sustainable in the long term. By improving operational and sales efficiency, they can strengthen their position in the market and survive the changes that occur. In order to take advantage of these findings, MSMEs in Medan City are advised to invest in information technology infrastructure, train employees to use the technology, and partner with technology service providers who can assist in implementing solutions that suit their business needs. In addition, local governments and financial institutions can provide support in the form of incentives and funding to assist MSMEs in the process of adopting information technology.

CONCLUSION

1. **Significant Relationship Between Information Technology Adoption and Financial Performance of Medan City MSMEs:** A significant relationship was found between information technology adoption and the financial performance of Medan City MSMEs.
2. **The Important Role of Information Technology in Business Competition:** Rapid technological changes, including new products, processes and services from competitors, emphasize the importance of MSME adaptation to technological innovation to remain competitive and achieve success.
3. **Strong Correlation:** The correlation value (R) of 0.947 indicates a positive relationship between the adoption of information technology and the financial performance of MSMEs.
4. **Positive Influence of Information Technology on Financial Performance:**

5. The coefficient of determination (R²) of 0.897 indicates that most of the variation in MSME financial performance can be explained by the information technology adoption variable.
6. Valid Regression Model: F count of 2503.788 with a significance/probability level of $0.000 < 0.05$ indicates that the regression model can be relied upon to predict the financial performance of Medan City MSMEs.

REFERENCES

- Menengah - Kecil Di Kota Semarang). UNDIP. Aditi, B. (2018). The Influence of Innovation and Creativity on Consumer Satisfaction in MSMEs in Medan City
- Jumant, 7(1), 1-9. Afriyani, Y. (2021). The Influence of Innovation and Creativity on Consumer Satisfaction in SMEs
- Pudyastuti, E., & Saputra, (2021). The Impact of Social E-Wom in Marketing Strategies to Create Purchase Intentions in the Social Media Era. *Tambusai Education Journal*, 7(2), 7861-7875.
- Hadi Ismanto, S. E., & Pebruary, S. (2021). SPSS and Eviews applications in research data analysis. Deepublish.
- Creswell (2014). *Qualitative research methodology: Theory and practice*. Student Library.
- Wijaya & Rosadi (2020). Content validity: initial stages of questionnaire development. , ,. *Journal of Management and Business Research*, 2(2), 259334.
- Johnson, A., & Smith, B. (2021). The Impact of Information Technology Adoption on the Growth of Small and Medium-sized Enterprises. *Journal of Business and Technology*, 15(2), 45-62.
- Warsame. (2019). Prediction of Coffee Production Levels Using Linear Regression. *FLASH Scientific Journal*, 3(1), 42-51.
- Mohammad Fatih Nizam, Eva Mufidah, V. F. (2020). The Influence of Entrepreneurial Orientation on Product Innovation and Competitive Advantage on Marketing MSMEs. *EMA Journal - Economics of Management Accounting*, 5 (2), 100- 109
- Muttaqien, A. (2008). The Relationship Between External Environment, Strategic Orientation and Company Performance. *Empirical Study on Manufacturing Businesses*

© International Journal of Education, Social Studies,
and Management (IJESSM) This article

