

Contents lists available at: https://e-journal.unair.ac.id

AJIM (Airlangga Journal of Innovation Management)

Journal homepage: https://e-journal.unair.ac.id/AJIM

Enhancing MSMEs: Exploring the Relationship between Financial Literacy, Financial Inclusion, and Capital Access to Improve Performance

Rania Nur Ainun^{1*}, Naelati Tubastuvi², Wida Purwidianti³, Luthfi Zamakhsyari⁴

^{1,2,3,4} Department of Management, Faculty of Economics and Business, Universitas Muhammadiyah Purwokerto, Indonesia

ARTICLE INFO

Paper Type:

Research Paper

Keywords:

MSME Performance, Financial Literacy, Financial Inclusion, Capital Access

Article History

Received: 12 January 2024 Revised: 28 March 2024 Accepted: 21 April 2024 Available online: 26 April 2024

This is an open-access article under the CC BY-NC-SA license (https://creativecommons.org/licenses/by-nc-sa/4.0/)

ABSTRACT

The growth of micro, small, and medium-sized enterprises (MSMEs) is critical to Indonesia's present economic development. This study has the purpose of examining how financial literacy, financial inclusion, and access to capital affect the performance of MSMEs in the Banyumas area. The performance of MSMEs is the dependent variable in this study, and the independent factors are financial literacy, financial inclusion, and access to finance. This study used partial Least Squares (PLS) to handle data in this work. Purposive sampling procedures were employed to select 127 MSMEs from a total of 8,559 MSMEs in the Banyumas Regency as research participants. The study's main findings of the relationship between the three variables of financial literacy, financial inclusion, and access to capital on MSME performance show that these three variables significantly influence MSME performance, both partially and simultaneously. As a result, MSMEs with a high degree of financial competence, simple access to finance, and suitable access to capital would improve MSMEs' performance in an area, resulting in the growth of the enterprises they manage. This research found that the financial literacy level of Banyumas MSMEs is quite high, available financial inclusion is easily accessible and sufficient access to capital can help MSMEs to improve their performance so that they can increase the development of the businesses they run.

Cite this article as Ainun, R.N., Tubastuvi, N., Purwidianti, W., Zamakhsyari, L. (2024). Enhancing MSME: Exploring The Relationship Between Financial Literacy, Financial Inclusion, and Capital Access for Improved Performance. *Airlangga Journal of Innovation Management*, *5*(1), 1-16. https://doi.org/10.20473/ajim.v5i1.53990

^{*}Corresponding author: naelatitubastuvi@ump.ac.id

Introduction

The industrial sector in the global era is a sector that drives the country's economy whose contribution is very large and can create extensive employment opportunities for the community. In most developing countries, the industrial sector, especially MSMEs, plays an important role in supporting the country's economy. Small and medium industries are industrial sectors that dominate the industrial structure in Indonesia. Around 90% of the workforce is absorbed in this sector and its contribution to GDP is 60% (Pratama et al., 2021). MSMEs, as defined by Law No. 20 of 2008, are small businesses owned and managed by an individual or a small group of individuals with specific financial resources and earnings (Naufalin, 2020). According to Sarwono (Istiningrum et al., 2023), the predominant economic state in a specific area is today characterized by the prevalence of micro, small, and medium-sized enterprises (MSMEs). The existence of MSMEs in Indonesia plays a role in increasing regional income, especially as a helper for people with a lower middle economic level. The development of this sector is a strategic and independent step in driving the regional economy because the business activities carried out cover everything in the field (Mendo et al., 2023). MSMEs face the problem of low productivity levels that can affect business competitiveness both locally, regionally and internationally. (Poernamasari, 2023) In fact, MSMEs are one of the sectors that contribute to the country's economy. (Rosadhillah & Hasib, 2022)

According to 2021 statistical data, Banyumas Regency, which is a city within the territorial area of Central Java Province, has enormous potential in industry and trade. Economic growth in Banyumas Regency was recorded at a percentage of 4.0%. Then economic growth on a larger scale, namely in Central Java Province, was 3.32% and the level of economic development nationally reached 3.69% in (Istiningrum et al., 2023). Central Statistics Agency released economic growth figures for the Banyumas Regency of 5.86 percent in 2022. This figure is far above the target set by the Banyumas Regency government of 4.5 percent and Java's economic growth of 5.31% is the average. According to the Central Java Province Small and Medium Enterprises Cooperative Service, which posted data on the number of registered small and medium companies in 2023 on its website, the Banyumas Regency region has 8,559 MSMEs, with a total of 2,224 male workers and 418 female workers. According to (Susilo et al., 2022), the growth of MSMEs in Banyumas Regency continues to increase year after year. Performance is a measure of a company's success in meeting its objectives.

The performance of MSMEs itself will ultimately be hampered by the absence of clear financial goals. Poor financial planning will result from a lack of financial awareness. The development of financial knowledge will consequently result in better MSME performance, including higher sales and higher profits if a person knows fundamental principles, profits, and financial management, backed up by behavior and attitudes (Damayanti & Mardiana, 2023). According to research undertaken by (Hilmawati & Kusumaningtias, 2021), (Sanistasya et al., 2019), and (Fajri et al., 2021) financial literacy influences the performance of MSMEs. However, research (Fitria et al., 2021) and (Irawati & Lubis, 2022) found conflicting results, suggesting that financial literacy did not affect the performance of MSMEs.

Financial inclusion is the second factor that impacts the success of MSMEs. Financial Inclusion is an extensive examination aimed at eradicating diverse barriers associated with the utilization of financial institution services by the community (Hilmawati & Kusumaningtias, 2021). Furthermore, the National Strategy for Financial Inclusion (SNKI) by Bank Indonesia delineates financial inclusion as an entitlement for each person to avail and acquire optimal services from financial institutions comprehensively and punctually, at reasonable expenses, while also considering their convenience and preserving their honor (Hilmawati & Kusumaningtias, 2021). According to previous studies conducted by (Septiani & Wuryani,

2020), (Susilo et al., 2022), and (Martono & Febriyanti, 2023) financial inclusion has an impact on the performance of MSMEs. Financial inclusion, on the other hand, has little effect on MSME performance (Qosim et al., 2023).

One of the key determinants of MSME performance is the availability of financial resources. Capital, as defined by (Aulia & Hidayat, 2021) " refers to the funds that are utilized as the primary source for doing business activities, such as investing in assets (such as money and goods) that can be employed to generate wealth". Capital, in this context, can be defined as a sum of money utilized in the execution of commercial endeavors. A significant number of individuals hold the belief that financial capital is not the sole determinant of success in a corporation. Nevertheless, it is imperative to comprehend that financial resources are essential in a firm. According to research undertaken by (Mukoffi & As'adi, 2021), (Rahman et al., 2022), and (Ryandono et al., 2022) access to finance influences the performance of MSMEs. However, a study conducted by (Junedi & Arumsari, 2021) concluded that MSMEs' access to financing has little effect on their performance. Based on the aforementioned, the author aims to explore the impact of financial awareness, financial inclusion, and access to capital on MSMEs' performance. This study focuses on MSMEs in the Banyumas Regency.

Literature Review

RBV Theory (Resouce Based View)

The main concept of RBV theory, according to Barney in (Hilmawati & Kusumaningtias, 2021), is that a firm can achieve performance excellence and long-term competitive advantage if it gets valuable resources, possesses valuable abilities that have no substance and cannot be reproduced, and can absorb and employ them. Resource-based View Theory suggests that tangible resources and intangible resources in a company or organization can encourage a company or organization to develop strategies to realize an advantage in the marketplace according to Sari in (Hilmawati & Kusumaningtias, 2021). The Theory of Resource-Based View (RBV) used in this study serves as the foundation for elucidating the idea that financial inclusion and financial literacy, as internal organizational assets, have inherent worth and potential to bolster corporate operations to gain a competitive advantage and foster long-term performance growth (Wijayanti & Ryandono, 2020).

MSME Performance

According to Musran Minizu (Susilo et al., 2022), MSME performance refers to an individual's level of achievement in their endeavors, as demonstrated by increased sales, capital, staff size, market share, and profitability. According to Robert S. Kaplan (Hilmawati & Kusumaningtias, 2021), the evaluation of MSMEs is conducted utilizing the balanced scorecard framework to assess the extent of performance of micro, small, and medium firms, encompassing both financial and non-financial aspects of performance. This performance is evaluated utilizing a non-expensive performance assessment approach in which performance assessment is conducted based on perception (Wijayanti et al., 2020).

Performance is a measure of the success of a business entity in achieving its goals. Performance is the result of work that encompasses a solid relationship with the organization's key objectives, and client fulfillment and contributes to the economy. (Alsharif et al., 2021). Performance measurement has an important role in all operational aspects to achieve the business's vision and mission. The growth conditions of MSMEs in Banyumas Regency continue to increase from year to year (Azhari et al., 2020).

Micro, Small, and Medium Enterprises in Banyumas have the potential to develop because several factors encourage the progress of MSMEs. These factors come from within and from outside. Internal factors include a desire on the part of MSMEs to create, a readiness to memorize, and a crave to exceed expectations. In the mean time, outside variables that trigger the improvement of MSMEs incorporate simple get to to credit, financial advancement, and technological advances. (Pratiwi et al., 2022).

Financial Literacy

According to OJK rule no. 76/POJK.07/2016 mentioned in (Susilo et al., 2022) financial literacy refers to an individual's understanding, conduct, and mindset when it comes to handling their financial matters. Inadequate financial literacy will lead to subpar financial planning, thereby diminishing the overall performance of the MSME due to the absence of well-defined financial objectives. Hence, possessing comprehension of fundamental principles, advantages, and fiscal administration, along with exhibiting commendable conduct and attitudes toward finance, will foster the acquisition of financial knowledge. This, in turn, will contribute to the enhancement of MSME performance, characterized by a continuous growth in sales and a corresponding increase in profits. Research findings demonstrated by (Prakoso, 2020) indicate that financial literacy has a substantial impact on the success of MSMEs.

The level of understanding of financial literacy in MSMEs may provide critical insights for businesses in decision-making and improving MSMEs' performance. The same previous studies conducted by (Hilmawati & Kusumaningtias, 2021), (Sanistasya et al., 2019), and (Fajri et al., 2021) established the impact of financial literacy characteristics on MSMEs' performance. A person's capacity to understand, analyze, manage, and explain financial conditions that affect their well-being is referred to as financial literacy. MSME players with strong financial literacy will outperform their competitors. The following hypothesis can be developed as a result of this description:

H1. Financial literacy influence on the performance of MSMEs

Financial Inclusion

Financial inclusion, as described by Yar (Rosyadah et al., 2022), is the supply of various financial institutions, goods, and services based on the requirements and capacities of the community to progress community welfare. Budgetary Institution is an substance that works within the dispersion or collection of stores from the community which is valuable as an speculation within the company. (Syarofi & Putri, 2023) This is critical, according to (Sanistasya et al., 2019), because maximizing regional income sources means assisting the UK in being more productive and developing. The extent of UK performance is determined by financial management. According to (Martono & Febriyanti, 2023), has a major impact on the success of MSMEs. A high level of inclusion will give MSMEs access to more financial services at lower costs, hence enhancing MSME performance.

Financial inclusion can open up opportunities for business actors who are useful in accessing the availability of financial services, and prosperity in the use of financial products and services which can ultimately be used and can also be utilized in the process of business activities in increasing sales growth, growth in profits, capital, and business work (Febriana & Sulhan, 2021). Financial inclusion determinants affect MSMEs' performance, according to research from (Septiani & Wuryani, 2020), (Susilo et al., 2022), and (Martono & Febriyanti, 2023). Every person has the right to access and receive all financial institution services at an affordable, timely, and informative price while maintaining dignity and comfort. MSMEs

will find it easier to aid in their business, such as funding, if they have easy access to money. As a result of this description, the following hypothesis can be developed:

H2. Financial inclusion influence on the performance of MSMEs

Access of Capital

According to Listyawan (Mukoffi & As'adi, 2021), business capital is a portion of funds utilized for fundamental expenses while launching a business to develop or expand wealth. Cash is a key component that MSMEs require to establish a firm because simple access to cash can inspire business actors to innovate, therefore enhancing MSMEs' performance (Iman, Wardhana, et al., 2022). According to (Ferdiansyah & Bukhari, 2021), in realizing improvement and development of business performance, capital or financing is a very important factor for every business, whether small, medium, or large scale. Capital is defined as funds used to produce further goods. To carry out all company activities, you need funds (capital), either personal funds (equity) or loans (Wardhana, 2021).

According to the findings of (Aulia & Hidayat, 2021), access to capital has a substantial impact on the performance of MSMEs. The same research from (Mukoffi & As'adi, 2021), (Ryandono et al., 2020), and (Dewi & Masdiantini, 2023) highlighted the impact of access to capital determinants on MSMEs' performance. The absence of hurdles such as administrative charges or cumbersome procedures at capital-providing institutions that MSMEs face when seeking loans is defined as access to capital. MSMEs will be able to increase their business performance with available financing and access to suitable resources. As a result of this investigation, the following hypothesis can be developed:

H3. Access to capital influence on the performance of MSMEs

Literacy of Financial Inclusion

According to the findings of a study conducted by (Fauziana et al., 2022), literacy, inclusion, and financial management simultaneously or simultaneously have a significant effect on the performance of MSMEs. Proving the hypothesis was also carried out in the research (Aulia & Hidayat, 2021) that there is a simultaneous influence of mode and innovation variables on the performance of MSMEs.

H4. There is an influence of financial literacy, financial inclusion, and access to capital on the performance of MSMEs

Hypothesis Development

- H1. Financial literacy influence on the performance of MSMEs
- H2. Financial inclusion influence on the performance of MSMEs
- H3. Access to capital influence on the performance of MSMEs
- H4. There is an influence of financial literacy, financial inclusion, and access to capital on the performance of MSMEs

Methodology

Based The foundation of this quantitative investigation is a well-defined problem environment and a precise collection of target respondents. As test subjects, MSMEs from the Banyumas Regency were used. In this study, the sampling strategy was purposeful sampling. MSMEs in Banyumas with a minimum of one year in operation are eligible. Using the Slovin approach and a 10% error tolerance, the sample size for this study was found to be 98,845 people, and the researchers were able to collect a sample of 127 people.

Primary data is employed to collect information in this study. The core data for this study was gathered through the use of a questionnaire comprised of statements filled out directly by respondents, either online using Google Forms or on paper.

MSMEs in the Banyumas Regency area were given questionnaires. This study employs both exogenous and endogenous variables. Financial literacy (X1), financial inclusion (X1), and access to capital (X3) are the exogenous factors in this study, whereas MSME performance (Y) is an endogenous factor. To develop or predict theoretical conceptions, Descriptive Statistics, and Partial Least Squares Structural Equation Modelling (SEM) data analysis are employed in this study. The descriptive method is used to paint a complete and accurate picture of the issue under consideration. This paper employs PLS structural model analysis with SmartPLS 3.0 software.

In PLS, there are two sorts of testing, there external model and the internal model. In testing the external model, the conclusion is to see the legitimacy and trustability of a demonstrate. This test investigation will see at the impact of loading factor, Average Variance Extracted (AVE), and Discriminant Legitimacy, as well as composite Unwavering quality. Factor loading is the first organize in testing the legitimacy of a demonstrate, the condition for calculate filling is that it must be>0.6, so that the list is said to be substantial. In case it's invalid moreover it must be erased from the show. Average Variance Extracted (AVE) is the esteem utilized in focalized legitimacy testing since the esteem is gotten from the convergent validity output.

In this consider, the anticipated AVE value is > 0.5, and so in case author see at the idle variable construct, all construct have values over 0.5 (or more noteworthy than 0.5). Discriminant Legitimacy can be tried by looking at the cross-loading table, this yield is utilized to test discriminant legitimacy at the pointer level with the arrangements, relationship between markers with the late variable > compared with the relationship between the pointer and other inactive factors (exterior the piece). To guarantee that there are no issues related to estimation, the ultimate step in assessing the external demonstrate is to test the unidimensionality of the show. This unidimensionality test was carried out utilizing composite unwavering quality and Cronbach's alpha.

For the three indicators, the cut-off esteem is 0,7. At that point, in testing the inner show is to see the coefficient of assurance R-Square and hypothesis testing. The goodness of fit in PLS can be decided by the Q2 esteem. The Q2 esteem has the same meaning as the coefficient of assurance (R-Square) in relapse investigation. To carry out theory testing in PLS-SEM, it can be done by utilizing the calculated t value (to) compared with the t table esteem (t α). The t-table esteem with a noteworthiness of 5 percent and degree of flexibility (DF) = number of information (n) – 3, to be specific 100 - 3 = 97 is 1.984 (t table) underneath will be shown.

Table 1. Variables and Indicators

Variable	Indicators and	Statement
	Statements	
Financial Literacy (Sanistasya et al.)	X1.1: Behaviour	I keep books or records of cash (money) going in and out every day.
	X1.2: Skill	I can set strategies to minimize financial risks in my business.
	X1.3: Knowledge	I know the benefits and how to prepare a financial budget plan.

	X1.4: Attitude	I understand the aspects that need to be considered when taking out credit and how to calculate loan interest rates.
Financial Inclusion (Sanistasya et al.)	X2.1: Access	Financial services in the area around me are easy to access.
•	X2.2: Quality	Financial services in the area around me provide services quickly and precisely.
	X2.3: Usage	I can use financial services, both savings and credit.
	X2.4: Welfare	Financial services in the environment around me provide benefits for improving my business.
Access to Capital (Mualifah &	X3.1: Grant	I can easily obtain information regarding grant aid from various parties.
Prasetyoningrum)	X3.2: Loan	I use bank loan funds or other financial institutions as business capital.
	X3.3: Personal Funds	I use personal funds as business capital.
	X3.4: Personal Funds	The capital used is very useful for the development of my business.
MSME Performance (Sanistasya et al.)	Y.1: Profitability	Sales profits from my business increase every month.
, , ,	Y.2: Productivity	The assets of my business have developed since its inception.
	Y.3: Productivity	The business I run experiences an increase in sales every month.
	Y.4: Market	The number of customers for my business is increasing every day.

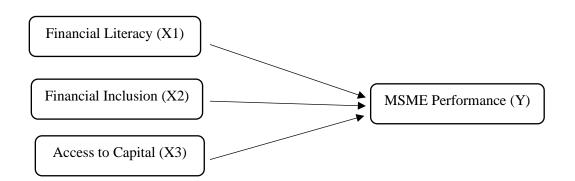


Figure 1. Model of variables

Results and Discussion

Respondents in this study were MSMEs in Banyumas Regency who had been in business for at least a year. Table 2 shows the outcomes of aggregating respondent characteristics. Respondents in this research were MSMEs in Banyumas Regency who had been running their businesses for at least one year. Table 1 shows the results of aggregating respondent characteristics. The table explains that there were 127 MSMEs in the sample in this study, of which 77 women dominated and 50 men dominated. Then classified based on age, namely the MSMEs that dominate in this research sample are 36 MSMEs aged 41-50 years,

Then those aged <20 years there are 4 people, aged 20-30 years there are 30 people, aged 31-40 years there are 33 and aged >50 years there were 24 people. Based on the sub-district, the MSMEs sampled in this research mostly came from the Kembaran sub-district with 35 MSMEs. This is because the area is closer to the researcher's domicile so much of the research was carried out in the Kembaran sub-district. This research groups MSMEs based on several categories, namely MSMEs in the food/beverage category with the most, namely 85 MSMEs, MSMEs in the category of electronic goods, accessories, and household equipment, each representing 1 MSME, 3 MSMEs in the attachments, and photocopying category and the remaining 36 MSMEs. MSMEs in other categories.

Furthermore, grouping MSMEs based on monthly income can also be used to see whether MSMEs are included in micro, small, or medium enterprises. There were 115 micro-businesses in this study with a monthly income of <25,000,000 million, 9 small businesses with a monthly income of 25,000,000-208,300,000 million, and 3 medium businesses with a monthly income of>208,300,000 million. Another grouping based on net assets in a year, most MSMEs have net assets <50,000,000 million, namely 108 MSMEs, 15 net assets of 50,000,000-500,000,000 million, and 4 MSMEs with net assets >500,000,000 million. Finally, MSMEs are grouped based on the number of employees they have, but based on research conducted, most MSMEs only have 1-5 employees, namely 61 MSMEs, then many 57 MSMEs do not have employees, 4 MSMEs have 6-10 employees and 5 MSMEs that have >10 employees.

In As seen in Figure 2, some statement items in the first test had Outer loadings less than 0.7. According to these findings, one Financial Literacy statement item had an Outer loading less than 0.7 (X1.1). One statement item has an average loading of less than 0.7 (X3.2) for the Capital Access variable. Figure 3 Test findings reveal that all statement items have an outside loading larger than 0.7, indicating that the test results match the standards. The Cronbach Alpha, Composite Reliability, and Average Variance Extract test results are shown in Table 4. According to the AVE value, the convergent validity test must have a value larger than 0.5. The findings show that the AVE for all variables is more than 0.5.

Table 2. Descriptions of Respondent

Gender	Total	Percentage
Male	50	39,37%
Female	77	60,63%
Total	127	100%
Age	Total	Percentage
< 20 years	4	3,14%
20 - 30 years	30	23,62%
31 - 40 years	33	25,98%
41 - 50 years	36	28,34%
>50 years	24	18,89%
Total	127	100%
Sub-districts	Total	Percentage

Kembaran	35	27,55%
Sumbang	14	11,02%
Kemranjen	15	11,81%
Baturraden	18	14,17%
Cilongok	1	0,78%
Pekuncen	2	1,57%
Sumpiuh	1	0,78%
Banyumas	6	4,72%
Ajibarang	3	2,36%
South Purwokerto	4	3,14%
West Purwokerto	3	2,36%
East Purwokerto	16	12,59%
North Purwokerto	5	3,93%
Sokaraja	3	2,36%
Karanglewas	1	0,78%
Total	127	100%
MSME Category	Total	Percentage
Food/ Beverage	85	66,92%
Electronic Goods	1	0,78%
Accessories	1	0,78%
Household Appliances	1	0,78%
Attachments and Photocopying	3	2,36%
Other Categories	36	28,34%
Total	127	100%
Turnover in a Month	Total	Percentage
< 25.000.000 million	115	92,12%
25.000.000 - 208.300.000 million	9	7,08%
>208.000.000 million	3	2,36%
Total	127	100%
Net Assets in a Year	Total	Percentage
< 50.000.000 million	108	85,03%
50.000.000 - 500.000.000 million	15	11,81%
>500.000.000 million	4	3,14%
Total	127	100%
Number of Employees	Total	Percentage
Do not have employees	57	44,88%
1-5 employees	61	48,03%
6 – 10 employees	4	3,14%
>10 employees	5	3,93%
Total	127	100%
Course Data Dragged (2022)	-	•

Source: Data Proceed (2023)

Table 3. Descriptive Statistics

Items	Mean	Median	Skewness	Excess Kurtosis	Standard Deviation

Y.1	3,756	4,000	-0,539	-0,097	0,953	
Y.2	3,984	4,000	-0,816	0,527	0,878	
Y.3	3,772	4,000	-0,533	-0,076	0,949	
Y.4	3,803	4,000	-0,661	0,428	0,897	
X1.1	3,433	4,000	-0,489	-0,607	1,091	
X1.2	4,126	4,000	-1,057	2,579	0,732	
X1.3	3,858	4,000	-0,748	1,097	0,781	
X1.4	3,551	4,000	-0,457	-0,018	0,894	
X2.1	4,102	4,000	-1,337	2,512	0,877	
X2.2	3,984	4,000	-0,697	0,317	0,869	
X2.3	3,913	4,000	-0,858	0,743	0,905	
X2.4	3,827	4,000	-0,652	0,195	0,931	
X3.1	3,441	4,000	-0,293	-0,696	1,120	
X3.2	2,693	2,000	0,255	-1,170	1,200	
X3.3	4,236	4,000	-1,527	4,432	0,758	
X3.4	4,315	4,000	-1,827	5,665	0,781	

Source: Data Proceed (2023)

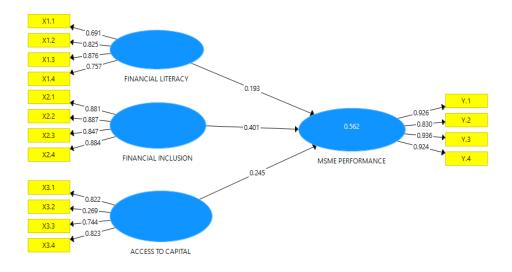


Figure 2. Several Statement Items Had Outer loadings Smaller Than 0.7

Source: Data Proceed (2023)

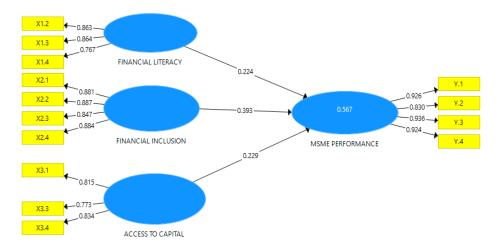


Figure 3. All Statement Items Have an Outer Loading Greater Than 0.7

Source: Data Proceed (2023)

Fornell-Lacker's and Cross Loading are two measures used in the discriminant validity test. By comparing the square root value of AVE with the latent variable correlation, the Fornell-Lacker's test is computed. The test results are shown in Table 5, which shows that the square root of AVE is bigger than the latent variable correlation. As a result, the discriminant validity test is appropriate.

Table 4. Cronbach Alpha, Composite Reliability, and Average Variance Extracted (AVE)

Variables	Cronbach's	Rho A	Composite	Average Variance	Criteria
	Alpha		Reliability	Extracted (AVE)	
Access to Capital	0.743	0.769	0.849	0.652	Reliable
Financial Inclusion	0.898	0.905	0.929	0.766	Reliable
Financial Literacy	0.790	0.849	0.871	0.694	Reliable
MSME Performance	0.926	0.926	0.948	0.819	Reliable

Source: Data Proceed (2023)

Table 5. Fornell Lacker's Test

	X3	X2	X1	Y	
Access to Capital	0.808				
Financial Inclusion	0.704	0.875			
Financial Literacy	0.549	0.721	0.833		
MSME Performance	0.629	0.716	0.633	0.905	

Source: Data Proceed (2023)

The test results on the outer model have a coefficient of determination value, which can be seen in Table 6 R-Square, namely that the MSME Performance variance can be explained by 0.567 or 56,7% knowledge of finance, inclusion in finance, and Access to Funds are all at odds. Meanwhile, 43.3% were influenced by factors unrelated to this study. In Table 8, the validity also shows quite good results where the Q-squared value obtains a number greater than zero.

Table 9 showed that for the first test, the influence of Access to Capital on MSME Performance has an original sample value of 0.229 and a t- t-statistic of 2.534, namely, a p-value of 0.012. Because the

statistic value is above 1.979 and the p-value is below 0.05, this means that Access to Capital influences MSME Performance. The results of the second test revealed that the influence of Financial Inclusion on MSME Performance has an original sample value of 0.393, a t-statistic of 3.276, namely, a p-value of 0.001. Because the statistic value is above 1.979 and the p-value is below 0.05, it means that Financial Inclusion influences MSME Performance. The results of the third test reveal that the influence of Financial Literacy on MSME Performance has an original sample value of 0.224 and a t-statistic of 2.072, namely a p-value of 0.039. Because the statistic value is above 1.979 and the p-value is below 0.05, it means that Financial Literacy influences MSME Performance.

Table 6. R-Square

	R Square	Adjusted R Square	
MSME Performance	0.567	0.577	

Source: Data Proceed (2023)

Table 7. F-Square

	Access to Capital	Financial Inclusion	Financial Literacy	MSME Performance
Access to Capital				0.060
Financial Inclusion				0.123
Financial Literacy				0.055
MSME Performance				

Source: Data Proceed (2023)

Table 8. Q-Square

	SSO	SSE	Q^2 (=1-SSE/SSO)
Access to Capital	381,000	381,000	
Financial Inclusion	508,000	508,000	
Financial Literacy	381,000	381,000	
MSME Performance	508,000	276,818	0.455

Source: Data Proceed (2023)

Table 9. Hypothesis Test Results

	Original Sample (O)	T Statistics (O/STDEV)	P Values	Conclusion
Access to Capital -> MSME	0.229	2,534	0.012	H1 Accepted
Performance				
Financial Inclusion -> MSME	0.393	3,276	0.001	H2 Accepted
Performance				
Financial Literacy -> MSME	0.224	2,072	0.039	H3 Accepted
Performance				

Source: Data Proceed (2023)

The Influence of Financial Literacy on MSME Performance

Based on a survey of 127 Banyumas MSMEs, empirical results reveal that the financial literacy variable has a 0.055 influence on the MSME performance variable. The financial literacy variable has a t-statistic value of 2.072 > t table 1.979, indicating that it has a significant effect on the performance of MSMEs with a significance value of 0.039 < 0.05, indicating that Hypothesis 1: "Financial literacy affects

the performance of MSMEs" is accepted. As a consequence of this research, financial literacy variables that influence the performance of MSMEs in the Banyumas area have been developed. This shows that MSMEs increasingly understand a high level of financial literacy, such as understanding bookkeeping or recording cash in and out, how to determine strategies to minimize financial risks, knowing the benefits/how to prepare a financial budget plan, and understanding financial aspects such as taking out credit or calculate loan interest rates. MSMEs with a high level of literacy will be able to improve their business performance so that the business they run will grow and the profits they get will also increase. The findings of this study are also consistent with those of (Hilmawati & Kusumaningtias, 2021), (Loestefani et al., 2022), and (Fajri et al., 2021), which found that financial literacy influences the performance of MSMEs.

The Influence of Financial Inclusion on MSME Performance

The variable of financial inclusion has a 0.001 influence on the variable of MSME performance. The financial inclusion variable has a t-statistic value of 3.276 > t table 1.979, indicating that it has a significant effect on the performance of MSMEs with a significance value of 0.001 < 0.05, indicating that Hypothesis 2: "financial inclusion affects the performance of MSMEs" is accepted. As a result of this research, financial inclusion variables that influence the performance of MSMEs in the Banyumas area are produced, indicating that financial access around MSME players is becoming easier and more accessible, such as the availability of easily accessible financial services such as savings or credit, as well as fast and precise financial services, will provide benefits for improving MSMEs' performance, thereby improving MSMEs' businesses. The findings of this study are also similar to the findings of previous studies (Septiani & Wuryani, 2020), (Ghifara et al., 2022), and (Martono & Febriyanti, 2023), which suggests that financial inclusion has an impact on the performance of MSMEs.

The Influence of Access to Capital on MSME Performance

With a 0.012 effect, the capital availability variable has a partial effect on MSME performance. The variable access to capital has a significant effect on the performance of MSMEs with a significance value of 0.012 < 0.05, indicating that Hypothesis 3: "access to capital has an effect on the performance of MSMEs" is accepted. As a consequence of this research, MSMEs in the Banyumas area have varying access to financing, which affects their performance. This demonstrates that there is greater access to cash for the development of MSME enterprises, as evidenced by the amount of information available about grant aid, easy loans from banks and other financial institutions, and the availability of capital. Owning a business would help MSMEs enhance their performance in terms of business development, allowing them to grow their firms. The findings of this study are also similar to findings from (Mukoffi & As'adi, 2021), (Aulia & Hidayat, 2021), and (Dewi & Masdiantini, 2023), which suggests that access to capital influences the performance of MSMEs in the Banyumas area.

The Influence of Financial Literacy, Financial Inclusion, and Access to Capital on MSME Performance

Based on the findings of this study, it is possible to conclude that financial literacy, financial inclusion, and access to capital all have a 0.567 influence on the performance of MSMEs in the Banyumas area. These findings support Hypothesis 4: "Financial literacy, financial inclusion, and access to capital influence MSME performance." The R Square value in Table 5 is 0.567, indicating that financial literacy, financial inclusion, and access to capital have a 56.7% influence on the performance of MSMEs. Other variables not discussed in this study contributed 43.3% to MSME performance. The findings of this study show that the variables of financial literacy, financial inclusion, and access to capital all have an impact on the performance of MSMEs in the Banyumas area. If you understand finances, especially when preparing financial budgets, access to financial services or financial facilities is easy and widely available, and adequate access to capital will be able to help improve the performance of MSMEs and the businesses they run (Iman, Sukmana, et al., 2022).

Conclusion

MSMEs have many positive impacts on society, including job creation and contribution to regional income in Banyumas Regency. This research found that the financial literacy level of Banyumas MSMEs is quite high, available financial inclusion is easily accessible and sufficient access to capital can help MSMEs to improve their performance so that they can increase the development of the businesses they run. In future research, it is hoped that the number of research samples and variables will be increased so that the results obtained are more optimal, accurate, and can represent all certain areas.

Author's Contribution

All authors have contributed to the final manuscript. The contribution of each author is as follows, Rania Nur Ainun was responsible for collecting data, compiling the manuscript, and compiling images, compiling the main conceptual ideas. Naelati Tubastuvi, Wida Purwidianti, and Luthfi Zamakhsyari provided excellent guidance and provided critical revisions to the article. All authors discussed the results and contributed to the final manuscript.

Acknowledgements

Thank you to 'Author 1,' who also performed the statistical analysis, devised the process, and drafted the original draft of the essay. Thank you to 'Author 2', 'Author 3', and 'Author 4' for supervising the study's analysis and research. All writers read and approved the final manuscript.

Declaration of Competing Interest

The author declares that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

References

- Alsharif, H. Z. H., Shu, T., Obrenovic, B., Godinic, D., Alhujailli, A., & Abdullaev, A. M. (2021). Impact of entrepreneurial leadership and bricolage on job security and sustainable economic performance: An empirical study of Croatian companies during COVID-19 pandemic. *Sustainability (Switzerland)*, 13(21). https://doi.org/10.3390/su132111958
- Aulia, F., & Hidayat, T. (2021). PENGARUH MODAL DAN INOVASI TERHADAP KINERJA UMKM KAIN PERCA DI KECAMATAN MEDAN DENAI. 2, 119–132.
- Azhari, H. N., Putri, N. K., & Suparlinah, I. (2020). Faktor-faktor yang mempengaruhi kinerja umkm di wilayah purwokerto kabupaten banyumas. 1(1), 68–77.
- Damayanti, A., & Mardiana. (2023). PERAN FINANCIAL TECHNOLOGY SEBAGAI MEDIATOR PADA PENGARUH LITERASI KEUANGAN TERHADAP KINERJA UMKM. 07(02), 183–197.
- Dewi, A. L. S., & Masdiantini, P. R. (2023). Pengaruh Akses Permodalan, E-Payment dan E-Commerce Terhadap Kinerja UMKM di Kecamatan Buleleng. 619–630.
- Fajri, A., Indriasih, D., & Indriyati, N. (2021). *Pengaruh Inklusi Keuangan dan Literasi Keuangan terhadap Kinerja UMKM Batik di Kabupaten Tegal. 13*(1), 108–123.
- Fauziana, H., Wardhana, A. K., & Rusgianto, S. (2022). The Effect of Education, Income, Unemployment,

- and Poverty toward the Gini Ratio in Member of OIC Countries. *Daengku: Journal of Humanities and Social Sciences Innovation*, 2(2), 181–191.
- Febriana, S. N., & Sulhan, M. (2021). PENGARUH INKLUSI KEUANGAN DAN LITERASI KEUANGAN TERHADAP KINERJA UMKM PADA MASA PANDEMI COVID 19 (Studi kasus pada UMKM Kabupaten Malang). 16, 59–69.
- Ferdiansyah, A., & Bukhari, E. (2021). Pengaruh Modal, Financial Knowledge, Teknologi dan Media Sosial terhadap Kinerja UMKM Fashiondi Bekasi Utara.
- Fitria, I., Soejono, F., & Tyra, M. J. (2021). *Literasi keuangan, sikap keuangan dan perilaku keuangan dan kinerja UMKM*. 11(1), 1–15. https://doi.org/10.14414/jbb.v11i1.2496
- Ghifara, A. S., Iman, A. N., Wardhana, A. K., Rusgianto, S., & Ratnasari, R. T. (2022). The Effect of Economic Growth, Government Spending, and Human Development Index toward Inequality of Income Distribution in the Metropolitan Cities in Indonesia. *Daengku: Journal of Humanities and Social Sciences Innovation*, 2(4), 529–536.
- Hilmawati, M. R. N., & Kusumaningtias, R. (2021). INKLUSI KEUANGAN DAN LITERASI KEUANGAN TERHADAP KINERJA DAN KEBERLANGSUNGAN SEKTOR USAHA MIKRO KECIL MENENGAH. 10(1).
- Iman, A. N., Sukmana, R., Ghifara, A. S., & Wardhana, A. K. (2022). The Effect of Zakat Collection, Company Age, and Company's Total Assets on Financial Performance of Sharia Banking in Indonesia 2019-2020. *Economic Education and Entrepreneurship Journal*, 5(2), 217–224.
- Iman, A. N., Wardhana, A. K., Rusgianto, S., & Ratnasari, R. T. (2022). Venture vs Investment, Which Type of Financing was more Demanded by Agriculture, Forestry, and Aquaculture Sector? *Daengku: Journal of Humanities and Social Sciences Innovation*, 2(5), 587–595.
- Irawati, L., & Lubis, K. sari. (2022). The Effect of Financial Literacy and Capital Management on MSME Performance. 1, 77–85.
- Istiningrum, R. F., Kristianto, G. B., & Kanivia, A. (2023). ANALISIS PENERAPAN SAK EMKM PADA KELOMPOK UMKM DI KECAMATAN PATIKRAJA BANYUMAS. 9, 1–5.
- Junedi, J., & Arumsari, M. D. (2021). Pengaruh Modal Usaha, Kualitas Produk, Jaringan Wirausaha Terhadap Kelangsungan Usaha UMKM Madu Sari Lanceng. 1(2), 175–184.
- Loestefani, V., Poan, R., Suwitorahardjo, B., & Wardhana, A. K. (2022). Service Quality and Product Quality as An Influence on Customer Loyalty at Naturalis Koffie. *FIRM Journal of Management Studies*, 7(2), 211–236.
- Martono, S., & Febriyanti, R. (2023). *PENGARUH INKLUSI KEUANGAN, LITERASI KEUANGAN DAN PENGELOLAAN KEUANGAN TERHADAP KINERJA UMKM DI KOTA SALATIGA. 11*(2), 153–168. https://doi.org/10.26740/jepk.v11n2.p153-168
- Mendo, A. Y., Singh, S. K., Yantu, I., Hinelo, R., Bokingo, A. H., Dungga, E. F., Juanna, A., Wardhana, A. K., Niroula, B., & Win, T. (2023). Entrepreneurial leadership and global management of COVID-19: A bibliometric study. *F1000Research*, *12*(31), 31.
- Mukoffi, A., & As'adi. (2021). *Karakteristik wirausaha*, modal usaha dan kecanggihan teknologi terhadap kinerja UMKM di masa pandemi Covid-19. 16(2), 235–246.
- Naufalin, L. (2020). Tantangan pengembangan usaha mikro kecil menengah (umkm) di kabupaten banyumas. 22(1), 95–102.

- Prakoso, A. (2020). Pengaruh Literasi Keuangan terhadap Kinerja UMKM se-Eks Karesidenan Besuki. 17(2), 151–161.
- Pratama, B. C., Innayah, M. N., & Darmawan, A. (2021). PENDAMPINGAN UMKM DAN PEDAGANG KAKI LIMA (PKL) TERDAMPAK PANDEMI COVID-19 DI AREA KAMPUS UNIVERSITAS MUHAMMADIYAH PURWOKERTO DALAM MENJALANKAN CONTACTLESS BUSINESS. 03(01), 116–122.
- Pratiwi, A. C., Wardhana, A. K., & Rusgianto, S. (2022). Application of Vector Error Correction Model on Macroeconomic Variables toward Changes in the Composite Stock Price Index. *Daengku: Journal of Humanities and Social Sciences Innovation*, 2(2), 219–229.
- Poernamasari, D.W. (2023). The Effect of Profit-Sharing on the Productivity of Small and Micro Enterprises in Indonesia. *Airlangga Journal of Innovation Management*, 4(2), 198-207. https://doi.org/10.20473/ajim.v4i2.48385
- Qosim, N., Ratnasari, R. T., Wardhana, A. K., Fauziana, H., & Barkah, T. T. (2023). Eight Years of Research Related to the Green Sukuk in the Global Stock Exchange Market to Support the Implementation of SDG: A Bibliometric Review. *Journal of Islamic Economic and Business Research*, 3(2), 161–180.
- Rahman, I., Ratnasari, R. T., & Wardhana, A. K. (2022). Effect of Certificate of Bank Indonesia Sharia and Indonesian Bank Seven Days Repository Rate to Inflation Ratio in Indonesia During Covid-19 Pandemic. *Economic Education and Entrepreneurship Journal*, *5*(1), 157–174.
- Rosyadah, K., Mus, A. R., Semmaila, B., Chalid, L., & Budiandriani. (2022). *Open Access The Relevance of Working Capital , Financial Literacy and Financial Inclusion on Financial Performance and Sustainability of Micro , Small and Medium-Sized Enterprises (MSMEs).* 216(4), 203–216.
- Rosadhillah, V.K., & Hasib, F.F. (2022). The Efficiency of Baitul Mal Wa Tamwil (BMT) in Surabaya Using Data Envelopment Analysis (DEA). *Airlangga Journal of Innovation Management*. 3(2). 175-186. https:// 10.20473/ajim.v3i1.39465
- Ryandono, M. N. H., Mawardi, I., Rani, L. N., Widiastuti, T., Ratnasari, R. T., & Wardhana, A. K. (2022). Trends of research topics related to Halal meat as a commodity between Scopus and Web of Science: A systematic review. *F1000Research*, *11*(1562), 1562.
- Ryandono, M. N. H., Wijayanti, I., & Kusuma, K. A. (2020). Determinants of Investment In Islamic Crowdfunding. *Muqtasid: Jurnal Ekonomi Dan Perbankan Syariah*, 11(1), 70–87.
- Sanistasya, P. A., Rahardjo, K., & Iqbal, M. (2019). Pengaruh Literasi Keuangan dan Inklusi Keuangan Terhadap Kinerja Usaha Kecil di Kalimantan Timur. 14, 48–59.
- Septiani, R. N., & Wuryani, E. (2020). *PENGARUH LITERASI KEUANGAN DAN INKLUSI KEUANGAN TERHADAP KINERJA UMKM DI SIDOARJO*. 9(8), 3214–3236.
- Susilo, J., Anisma, Y., & Syofyan, A. (2022). *PENGARUH LITERASI KEUANGAN, INKLUSI KEUANGAN, DAN INOVASI TERHADAP KINERJA UMKM. 3*(1), 1–10.
- Syarofi, M., Putri, L. 2023. The Importance of Sharia Supervisory Board on Islamic Financial Institution. *Airlangga Journal of Innovation Management*, 4(1) 74-83. https://doi.org/10.20473/ajim.v4i1.45357
- Wardhana, A. K. (2021). The Application of Waqf and Endowment Fund Based on the Principles in the Sharia Maqashid Pillar Society. *Prosperity: Journal of Society and Empowerment*, 1(2), 107–119. https://doi.org/10.21580/prosperity.2021.1.2.8829

- Wijayanti, I., Herianingrum, S., & Ryandono, M. N. H. (2020). Islamic Crowdfunding Mechanism to Answer Renewable Energy Investment Challenge in Indonesia. *Test Engineering and Management*, 83, 3596–3605.
- Wijayanti, I., & Ryandono, M. N. H. (2020). Zakat institutions' mustahiq transformation in developing countries: Comparison study. *Opcion*, *36*(S26), 350–366.