

Building a Sustainable Work Culture: The Mediating Role of Psychological Capital in SME Performance

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ARTICLE INFORMATION

Publication information

Research article

HOW TO CITE

Liana, T. M. M., Samosir, A. T., Sitorus, S. A., & Samosir, H. (2026). Building a sustainable work culture: The mediating role of psychological capital in SME performance. *International Journal of Applied Business & International Management*, 11(1), 1-19.

DOI:

<https://doi.org/10.32535/ijabim.v11i1.4477>

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Received: 30 November 2025

Accepted: 19 March 2026

Published: 20 April 2026

ABSTRACT

Growing sustainability pressures have increased the importance of internal capabilities for micro, small, and medium enterprises (MSMEs) to achieve sustainable performance, especially in resource-constrained environments. This study examines the effects of sustainable human resource management (Sustainable HRM) and psychological capital (PsyCap) on sustainable performance, with sustainable work culture as a mediating variable. A quantitative approach was employed using Partial Least Squares–Structural Equation Modeling (PLS-SEM) based on data from 105 MSME owners in Medan City. The results show that a sustainable work culture has a significant positive effect on sustainable performance ($\beta = 0.462$, $t = 4.658$, $p < 0.001$). PsyCap does not significantly influence sustainable work culture ($\beta = -0.202$, $p = 0.122$) or sustainable performance ($\beta = -0.093$, $p = 0.369$). Sustainable HRM shows no significant effect on performance ($\beta = 0.031$, $p = 0.720$) and negatively affects work culture ($\beta = -0.324$, $p < 0.001$). The findings indicate that organizational culture plays a key role in shaping sustainability in MSMEs, suggesting that cultural alignment may be more influential than formal HR practices or individual psychological traits. These results offer practical and policy implications by emphasizing targeted capacity-building programs and supportive interventions to strengthen MSMEs' internal capabilities.

Keywords: MSMEs; Organizational Culture; Psychological Capital; Sustainable HRM; Sustainable Performance; Sustainable Work Culture

INTRODUCTION

Micro, small, and medium enterprises (MSMEs) play a central role in Indonesia's economic structure through their contributions to employment, income distribution, and regional economic stability (Aggarwal & Joshi, 2024; Octasyva et al., 2022). In Medan City, MSMEs also serve as a strategic economic sector that supports household livelihoods and contributes to regional gross domestic product (GDRP). Nevertheless, MSMEs operate under dynamic conditions shaped by limited resources, market uncertainty, and structural constraints. As a result, their capacity to sustain performance remains highly sensitive to environmental disruption.

The development of MSMEs in Medan City has exhibited a fluctuating trajectory in recent years. Prior to the pandemic, the number of MSMEs was relatively stable, but it declined sharply during the COVID-19 crisis as business activity and market demand weakened. In the post-pandemic period, a gradual recovery has become evident through a more consistent increase in MSME growth. This trend reflects the dual character of MSMEs as both vulnerable and resilient business actors, as emphasized in earlier studies (Ridhwan et al., 2024; Ssenyonga, 2021; Supari & Anton, 2022).

These conditions indicate the importance of internal organizational capacity in sustaining long-term performance. In this regard, sustainable HRM and psychological capital (PsyCap) have increasingly been identified as important determinants of organizational sustainability and effectiveness (Ehnert et al., 2014; Kusnadi & Ramli, 2025; Luthans et al., 2007; Renwick et al., 2013). Their contribution, however, may depend on the extent to which sustainability values are embedded in everyday work practices. Accordingly, sustainable work culture becomes an important contextual mechanism for aligning employee behavior with long-term organizational goals (Davidescu et al., 2020; Shim et al., 2024).

Despite this potential, the adoption of sustainable HRM and the development of PsyCap remain limited among MSMEs in Medan City. Many MSMEs continue to emphasize short-term operational survival rather than long-term strategic development, which in turn weakens HR systems and reduces investment in employee development (Ali et al., 2021; Lišková & Tomšík, 2013). This challenge is compounded by the absence of a structured organizational culture that supports sustainability-oriented practices. Prior studies suggest that sustainable HRM and PsyCap may improve organizational performance, particularly when supported by a strong sustainability-oriented culture, although empirical findings in MSME contexts are still inconclusive (Agyabeng-Mensah & Tang, 2021; Iqbal et al., 2025; Lin et al., 2024).

Table 1. Number of Assisted MSMEs in Medan City, 2017–2023

Year	Number of Assisted MSMEs
2017	1,663
2018	1,664
2019	1,072
2020	1,040
2021	1,541
2022	1,825
2023	1,875

Source: [BPS Medan \(2024\)](#)

Based on data from [BPS Medan \(2024\)](#), the number of assisted MSMEs in Medan City during 2017–2023 showed a fluctuating pattern. In 2017 and 2018, the number remained

relatively stable at 1,663 and 1,664 units, respectively. However, it declined sharply in 2019 to 1,072 units and decreased further in 2020 to 1,040 units. After this downturn, the number of assisted MSMEs recovered significantly, increasing to 1,541 units in 2021, 1,825 units in 2022, and 1,875 units in 2023. This pattern indicates that MSMEs in Medan City experienced substantial pressure during the crisis period but were able to recover and adapt in the post-crisis phase.

Management practices that support long-term competitiveness are essential in MSMEs operating under dynamic and resource-constrained environments. In this context, sustainable HRM and PsyCap have emerged as key predictors of organizational sustainability (Mahapatro, 2010; Mathis et al., 2016; Kusnadi & Ramli, 2025). In MSMEs, where operational instability and resource limitations are common, both factors are expected to strengthen organizational sustainability, although their effectiveness may depend on contextual conditions.

However, sustainable HRM and PsyCap alone may not ensure organizational sustainability without the presence of a supportive organizational culture. A sustainable work culture, which emphasizes environmental responsibility, social consciousness, long-term orientation, and ethical decision-making, plays an important role in shaping employee attitudes and behaviors (Shim et al., 2024). Such a culture helps embed sustainability values into daily work practices, strengthens employee engagement, and enhances collective commitment to organizational goals. Empirical studies further indicate that sustainability-oriented cultures are associated with higher levels of innovation and organizational performance (Davidescu et al., 2020; Zhu et al., 2023). At the same time, prior research highlights that the implementation of structured HR practices and the development of psychological resources in MSMEs are often constrained by limited capabilities and informal management systems (Ali et al., 2021; Amaliyah et al., 2024; Lišková & Tomšík, 2013).

These constraints make it difficult to institutionalize sustainability values or develop a comprehensive work culture aligned with long-term objectives. Recent research underscores the importance of sustainability-driven HR practices and organizational culture in enhancing resilience and performance (Agyabeng-Mensah & Tang, 2021; Bindeeba et al., 2025; Iqbal et al., 2025; Lin et al., 2024). In addition, empirical evidence shows that entrepreneurial competency and competitive advantage play significant roles in improving MSME performance (Adiputra et al., 2023; Suwandi & Komariyah, 2023), while innovation also strengthens organizational outcomes through mediating mechanisms (Andiana et al., 2024). These findings suggest that integrating sustainable HRM, PsyCap, and sustainable work culture is essential to strengthen MSME performance in dynamic environments.

Therefore, this study aims to examine the effects of sustainable HRM and PsyCap on the sustainable performance of MSMEs in Medan City, with sustainable work culture as a mediating variable. Sustainable performance is understood not only in terms of economic outcomes, but also in environmental and social dimensions in line with the triple bottom line concept (Huang et al., 2025). The novelty of this study lies in its integrative framework, which links managerial practices, psychological resources, and organizational culture within a single model in the MSME context, particularly in a resource-constrained environment. This study contributes to the literature by providing a more comprehensive explanation of the internal mechanisms that drive sustainable performance, as well as practical insights for policymakers and MSME practitioners.

LITERATURE REVIEW

Sustainable Human Resource Management (Sustainable HRM)

Sustainable HRM refers to the integration of environmental, social, and economic objectives into HR policies and practices to ensure long-term organizational sustainability (Ehnert et al., 2014; Renwick et al., 2013). Unlike traditional HRM, Sustainable HRM emphasizes employee well-being, green competencies, ethical practices, and long-term workforce resilience. Recent studies highlight that sustainable HRM practices, such as green recruitment, environmental training, and sustainability-oriented performance management, contribute to organizational adaptability and sustainable outcomes (Bindeeba et al., 2025; Gazi et al., 2024). In the MSME context, however, the implementation of sustainable HRM is often constrained by limited resources, informal structures, and a lack of managerial expertise. As a result, the effectiveness of sustainable HRM in improving performance remains inconsistent (Mushtaq & Akhtar, 2024). This indicates that HRM practices alone may not directly translate into performance outcomes without supporting organizational mechanisms.

Psychological Capital (PsyCap)

PsyCap is a positive psychological state characterized by hope, self-efficacy, resilience, and optimism (Luthans et al., 2007). PsyCap enhances employees' ability to cope with challenges, maintain motivation, and contribute to organizational goals. Empirical studies suggest that PsyCap positively influences job performance, innovation, and adaptability, particularly in uncertain and dynamic environments (Baig et al., 2021; Kusnadi & Ramli, 2025). In MSMEs, PsyCap is considered a critical internal resource due to high environmental uncertainty and operational instability. However, recent findings indicate that the impact of PsyCap on organizational outcomes may depend on contextual factors such as organizational support and culture (Abbas et al., 2024). Without a supportive environment, individual psychological strengths may not be sufficient to drive sustainable performance.

Sustainable Work Culture

Sustainable work culture refers to shared values, norms, and practices that promote sustainability-oriented behaviors within an organization. It includes environmental awareness, ethical responsibility, long-term thinking, and collective commitment to sustainability goals (Huang et al., 2025; Shim et al., 2024). Organizational culture plays a crucial role in shaping employee behavior and aligning individual actions with organizational objectives. Studies show that a strong sustainability-oriented culture enhances innovation, employee engagement, and organizational performance (Davidescu et al., 2020; Zhang et al., 2024). In MSMEs, where formal systems are often limited, culture becomes a dominant mechanism for driving organizational effectiveness.

Sustainable Performance

Sustainable performance refers to an organization's ability to achieve economic success while simultaneously addressing social and environmental responsibilities, in line with the triple bottom line framework (Aguinis, 2013). It encompasses financial sustainability, social impact, environmental management, and long-term organizational resilience. Recent studies emphasize that sustainable performance is influenced by both internal resources (such as HRM and PsyCap) and organizational mechanisms (such as culture and innovation) (Iqbal et al., 2025; Lin et al., 2024). However, empirical evidence in MSMEs remains limited, particularly regarding how these factors interact within an integrated framework.

Hypotheses Development

Sustainable HRM and Sustainable Work Culture

The relationship between sustainable HRM and sustainable work culture has been widely discussed in the literature. Sustainable HRM practices are expected to promote sustainability values through training, leadership, and performance systems, which in turn shape organizational culture (Gazi et al., 2024; Lin et al., 2024). Therefore, organizations that implement sustainability-oriented HR practices are more likely to develop a strong, sustainable work culture.

H1: Sustainable HRM has a positive effect on sustainable work culture.

Sustainable HRM and Sustainable Performance

From a resource-based perspective, sustainable HRM can be viewed as a strategic capability that enables organizations to build valuable human resources and long-term competitiveness. By strengthening employee competencies and fostering commitment, sustainable HRM provides a foundation for achieving sustainable organizational outcomes. Furthermore, sustainable HRM is expected to directly enhance sustainable performance by improving employee competencies, engagement, and long-term organizational capabilities (Agyabeng-Mensah & Tang, 2021; Mushtaq & Akhtar, 2024).

H2: Sustainable HRM has a positive effect on sustainable performance.

Psychological Capital and Sustainable Work Culture

From a behavioral perspective, employees' psychological states play a crucial role in shaping shared values and organizational norms within the workplace. Individuals with higher levels of PsyCap tend to demonstrate proactive behavior, collaboration, and resilience, which can contribute to the development of a positive work environment. PsyCap is also expected to influence organizational outcomes. Employees with higher levels of hope, resilience, optimism, and self-efficacy are more likely to engage in positive work behaviors and contribute to organizational culture (Kusnadi & Ramli, 2025).

H3: Psychological capital has a positive effect on sustainable work culture.

Psychological Capital and Sustainable Performance

In addition, psychological capital has been widely associated with improved individual performance, which may cumulatively influence organizational outcomes. Employees with strong PsyCap are more adaptive, persistent, and goal-oriented in responding to challenges, thereby supporting sustainable performance. Additionally, PsyCap is expected to enhance sustainable performance by improving adaptability, creativity, and problem-solving capabilities (Baig et al., 2021).

H4: Psychological capital has a positive effect on sustainable performance.

Sustainable Work Culture and Sustainable Performance

Sustainable work culture is considered a key mechanism that translates internal resources into performance outcomes. A strong sustainability-oriented culture fosters shared commitment and consistent behavior aligned with sustainability goals (Davidescu et al., 2020; Zhang et al., 2024).

H5: Sustainable work culture has a positive effect on sustainable performance.

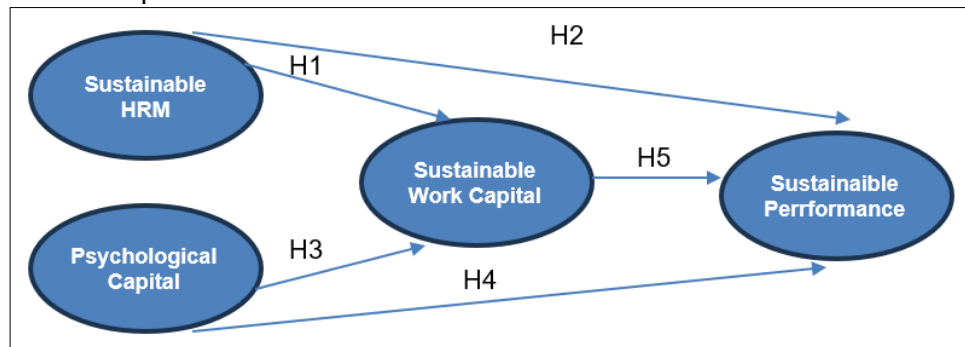
Finally, a sustainable work culture is expected to mediate the relationship between internal resources (sustainable HRM and PsyCap) and sustainable performance, as

culture serves as a mechanism that embeds sustainability into daily organizational practices (Iqbal et al., 2025).

Conceptual Framework

To illustrate the proposed relationships among variables, the conceptual framework of this study is presented in Figure 1.

Figure 1. Conceptual Framework



According to Figure 1, sustainable HRM and PsyCap are positioned as independent variables that influence sustainable performance both directly and indirectly. Sustainable work culture serves as a mediating variable, explaining how organizational practices and individual psychological resources are translated into sustainability outcomes. Specifically, sustainable HRM and PsyCap are expected to shape sustainability-oriented values and behaviors within the organization, which are reflected in the development of a sustainable work culture. This culture, in turn, strengthens organizational alignment and enhances sustainable performance. The framework highlights the integrated role of managerial practices, psychological resources, and cultural mechanisms in achieving sustainability within MSMEs.

RESEARCH METHOD

Research Approach

This study employs a quantitative research approach to examine the relationships among sustainable HRM, PsyCap, sustainable work culture, and sustainable performance. A quantitative approach is appropriate as it enables the testing of theoretically developed hypotheses using empirical data and provides objective, reliable, and generalizable results.

Research Design

The study adopts a descriptive and explanatory research design. The descriptive aspect aims to provide an overview of MSME conditions in Medan City, while the explanatory approach is used to analyze causal relationships among variables. Structural Equation Modeling (SEM) with Partial Least Squares (PLS) was employed using SmartPLS version 4.0. SEM-PLS is suitable for this study due to its predictive capability, flexibility with small sample sizes, and minimal distributional assumptions, which align with the characteristics of MSME data (Yusoff et al., 2024).

Data Sources and Selection Criteria

The population of this study consists of 1,875 MSME owners registered with the Medan City Cooperative and MSME Office in 2023. These registered MSMEs served as the sampling frame, ensuring that all units in the population had an identifiable and accessible record. The sample size was determined using the rule-of-thumb in SEM,

which recommends a minimum of five respondents per indicator. With a total of 21 indicators, a minimum sample of 105 respondents was required and subsequently fulfilled in this study. A simple random sampling technique was applied to ensure equal probability for each MSME owner to be selected.

The sampling procedure was implemented by obtaining the official list of registered MSMEs from the local authority, assigning a unique number to each MSME, and selecting respondents using a random number generator. This procedure minimizes selection bias and enhances the representativeness of the sample. The selected respondents met the criteria of being active MSME owners operating in Medan City and having ongoing business activities during the data collection period.

Data Collection Process

Data were collected through a structured questionnaire distributed directly to MSME owners. The questionnaire used a five-point Likert scale ranging from strongly disagree (1) to strongly agree (5). The measurement of variables was adapted from established and validated scales to ensure content validity. Sustainable HRM was measured using indicators such as green recruitment, environmental training, environmental performance management, green compensation, and workplace sustainability policies, based on [Boiral & Paillé \(2012\)](#), [Ehnert et al. \(2014\)](#), and [Renwick et al. \(2013\)](#). PsyCap was measured using four dimensions: hope, self-efficacy, resilience, and optimism, following [Luthans et al. \(2007\)](#).

Sustainable work culture was assessed through indicators related to sustainability awareness, shared organizational values, behavioral commitment, managerial support, and employee participation, as proposed by [Chibulanotu \(2023\)](#). Meanwhile, sustainable performance was measured using the triple bottom line framework, including financial, social, and environmental performance dimensions ([Aguinis, 2013](#)). All measurement indicators were selected based on their relevance to the MSME context and their frequent use in prior empirical studies, ensuring both theoretical and empirical justification.

Data Analysis

Data analysis was conducted using a two-stage SEM–PLS approach. The first stage involved evaluating the measurement model to assess validity and reliability. Convergent validity was confirmed through factor loadings greater than 0.70 and Average Variance Extracted (AVE) values above 0.50. Reliability was evaluated using Cronbach's Alpha and Composite Reliability, with threshold values exceeding 0.70. Discriminant validity was assessed using the Fornell–Larcker criterion and the Heterotrait–Monotrait ratio (HTMT), ensuring that each construct was distinct from others. The second stage involved evaluating the structural model to test the hypotheses. Path coefficients, t-statistics, and p-values were obtained using bootstrapping with 5,000 resamples. Hypotheses were considered significant if t-values exceeded 1.96 and p-values were below 0.05. In addition, mediation analysis was conducted to examine the indirect effects of sustainable HRM and PsyCap on sustainable performance through sustainable work culture, providing a deeper understanding of the underlying mechanisms among variables.

RESULTS

Respondents' Demographic Profile

Table 1. Demographic Profile of Respondents

Characteristics	Category	Frequency	Percentage (%)
Gender	Male	58	55.2
	Female	47	44.8
Age	< 30 years	21	20
	30–40 years	46	43.8
	> 40 years	38	36.2
Business Duration	< 3 years	25	23.8
	3–5 years	40	38.1
	> 5 years	40	38.1
Business Sector	Trade	45	42.9
	Services	30	28.6
	Manufacturing	30	28.6

Table 1 presents the demographic characteristics of the respondents. The results indicate that MSME ownership is relatively balanced in terms of gender, with male respondents accounting for 55.2% and female respondents for 44.8%. This distribution suggests that entrepreneurial participation in Medan is not dominated by a single gender group, thereby offering a broader representation of MSME actors. In terms of age, the largest proportion of respondents falls within the 30–40-year age category (43.8%), indicating that most participants are in their economically productive years and are therefore likely to be actively involved in business management, strategic decision-making, and operational development.

With respect to business experience, the majority of MSMEs have been operating for more than three years, which implies that the sample is largely composed of relatively established enterprises with sufficient operational exposure. This characteristic enhances the relevance of the sample for examining organizational practices related to sustainability. Furthermore, the dominance of the trade, service, and manufacturing sectors reflects the heterogeneous nature of MSME activities in Medan City and indicates that the sample captures diverse business contexts. Overall, these respondent characteristics demonstrate that the sample provides an adequate representation of key MSME profiles, thereby strengthening the validity of the study and supporting the relevance of the findings within the broader MSME context.

The Convergent Validity Test

Table 2. Convergent Validity Results

Construct	Indicator	Loading Factor
Sustainable HRM	Sustainable1	0.890
	Sustainable2	0.900
	Sustainable4	0.759
Psychological Capital	Psychological1	0.745
	Psychological2	0.849
	Psychological3	0.797
Sustainable Work Culture	Culture1	0.761
	Culture2	0.887
	Culture3	0.800
Sustainable Performance	Performance1	0.886
	Performance2	0.909

	Performance3	0.773
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In Table 2, the results of convergent validity indicate that all measurement indicators have loading factors exceeding the threshold value of 0.70. This confirms that each indicator reliably represents its respective construct. The sustainable HRM construct shows strong loadings ranging from 0.759 to 0.900, indicating consistent measurement of sustainability-oriented HR practices. Similarly, PsyCap demonstrates adequate loadings between 0.745 and 0.849, confirming the robustness of its dimensions. The Sustainable work culture construct also exhibits strong indicator reliability, with loadings ranging from 0.761 to 0.887. Meanwhile, Sustainable performance shows the highest loading values, ranging from 0.773 to 0.909. These results confirm that all constructs meet the criteria for convergent validity and are suitable for further analysis.

The Reliability Test

Table 3. Reliability Test Results

Construct	Cronbach's Alpha	rho_A	Composite Reliability
Sustainable Work Culture	0.751	0.760	0.858
Sustainable Performance	0.827	0.882	0.893
Psychological Capital	0.716	0.732	0.840
Sustainable HRM	0.814	0.871	0.888

In Table 3, the reliability test results show that all constructs meet the required thresholds for internal consistency. Cronbach's Alpha and Composite Reliability values for all variables exceed 0.70, indicating strong reliability. Sustainable Work Culture demonstrates reliable measurement with a composite reliability of 0.858. Sustainable Performance shows the highest reliability (0.893), indicating strong internal consistency across its indicators. PsyCap (0.840) and sustainable HRM (0.888) also meet the reliability criteria. These findings confirm that all constructs are reliable and suitable for structural model analysis.

The Path Diagram PLS Test

The structural relationships among the variables were further examined using the PLS path model, as illustrated in Figure 2.

Figure 2. Path Diagram PLS Result

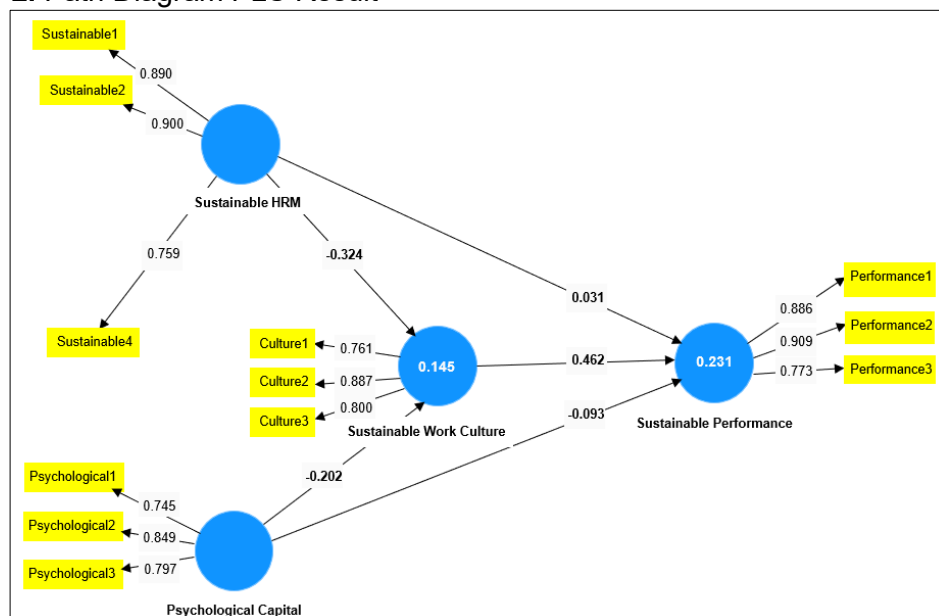


Figure 2 presents the structural model results of the PLS analysis. The model shows that a sustainable work culture plays a central role in influencing sustainable performance, as indicated by the strongest positive relationship among the variables. In contrast, the relationships of sustainable HRM and psychological capital with both sustainable work culture and sustainable performance appear weak and negative or negligible. This pattern suggests that organizational culture serves as a key mechanism in translating internal resources into sustainability outcomes within MSMEs.

The Path Coefficient Test

Table 4. Path Coefficients Result

	Hypothesis	Coefficient (β)	T-Statistic	P-Value	Decision
H1	Sustainable HRM → Sustainable Work Culture	-0.324	4.052	0.000	Rejected
H2	Sustainable HRM → Sustainable Performance	0.031	0.358	0.720	Rejected
H3	PsyCap → Sustainable Work Culture	-0.202	1.546	0.122	Rejected
H4	PsyCap → Sustainable Performance	-0.093	0.898	0.369	Rejected
H5	Sustainable Work Culture → Sustainable Performance	0.462	4.658	0.000	Accepted

The structural model analysis provides insights into the relationships among the study variables. As presented in Table 4, the results indicate that H5 is accepted, as sustainable work culture has a strong and significant positive effect on sustainable performance ($\beta = 0.462$, $t = 4.658$, $p = 0.000$). This finding demonstrates that MSMEs with stronger sustainability-oriented cultural practices tend to achieve higher levels of sustainable performance across economic, social, and environmental dimensions. The significance of this relationship underscores the central role of internal cultural values and behavioral norms in shaping sustainability outcomes.

Furthermore, the analysis reveals that H1 is rejected, as sustainable HRM has a significant but negative effect on sustainable work culture ($\beta = -0.324$, $t = 4.052$, $p = 0.000$). This unexpected finding suggests that existing HRM practices labeled as “sustainable” within MSMEs may not yet be effectively implemented or may be perceived as burdensome, leading to resistance or reduced alignment with sustainability-oriented cultural norms. This misalignment highlights potential gaps between policy intentions and practical execution in MSME management systems. The results indicate that H2 is rejected, as sustainable HRM does not have a significant effect on sustainable performance ($\beta = 0.031$, $t = 0.358$, $p = 0.720$). This implies that HR-related sustainability initiatives have not directly contributed to performance improvements and may require better integration with organizational culture and strategic practices to produce meaningful outcomes.

In contrast, the findings show that H3 and H4 are rejected, as PsyCap does not have a significant effect on sustainable work culture ($\beta = -0.202$, $t = 1.546$, $p = 0.122$) nor on sustainable performance ($\beta = -0.093$, $t = 0.898$, $p = 0.369$). These results suggest that individual psychological resources, such as hope, resilience, efficacy, and optimism, are not strong predictors of sustainability-related behaviors or performance within MSMEs in this context. This may reflect the dominance of external organizational factors, such as

managerial practices and structural constraints, which often outweigh personal psychological strengths in small business environments.

DISCUSSION

H1: The Effect of Sustainable HRM on Sustainable Work Culture

The findings indicate that sustainable HRM has a significant but negative effect on sustainable work culture, leading to the rejection of H1. This result contradicts prior studies suggesting that sustainability-oriented HR practices promote cultural alignment and reinforce organizational values (Gazi et al., 2024; Lin et al., 2024). Rather than strengthening a sustainability-oriented culture, the implementation of sustainable HRM in this study appears to be associated with a weakening of such culture in the MSME context. One important explanation for this result lies in the difference between formal adoption and substantive internalization. In theory, sustainable HRM is expected to embed sustainability values into recruitment, training, performance appraisal, and employee engagement. However, when these practices are introduced only symbolically or administratively, employees may not interpret them as meaningful organizational commitments. Instead, they may perceive them as additional procedural demands that are disconnected from day-to-day realities.

This condition is particularly relevant in MSMEs, where organizational systems are often informal, centralized, and highly dependent on the owner or a small group of managers. Unlike larger firms with structured HR departments, MSMEs may implement HR initiatives without sufficient strategic planning, communication, or evaluation. As a result, sustainable HRM may exist only at the level of managerial intention, while employees do not experience it as a coherent cultural signal. This disconnect helps explain why sustainable HRM does not translate into a stronger sustainable work culture.

From a theoretical perspective, this finding suggests that HRM practices do not automatically produce cultural change. Organizational culture is not formed merely through the existence of policies, but through repeated social interactions, shared interpretation, and behavioral consistency. If sustainability-oriented HR practices are not supported by leadership behavior and daily routines, employees may fail to associate them with authentic organizational values.

Consequently, sustainable HRM may remain fragmented and unable to shape shared cultural assumptions. This result also indicates that the effectiveness of sustainable HRM depends on implementation quality rather than mere adoption. Sustainable HRM can contribute positively to culture only when practices are credible, consistently applied, and experienced as beneficial by employees. If implementation is partial, inconsistent, or imposed without participation, it may undermine trust and weaken collective identification with sustainability values. Thus, the negative effect found here may reveal an implementation gap rather than a failure of the sustainable HRM concept itself.

In relation to previous studies, the contradiction with Gazi et al. (2024) and Lin et al. (2024) may stem from contextual differences. Many studies that report positive effects of sustainable HRM are conducted in larger or more formalized organizations where systems, leadership commitment, and employee development mechanisms are better established. In MSMEs, however, the same HR practices may function differently because of limited managerial capacity, weak formalization, and stronger dependence on informal relationships. Therefore, the present finding highlights the contextual boundaries of prior research rather than simply disproving it. Overall, the rejection of H1 suggests that sustainable HRM in MSMEs cannot be assumed to cultivate a sustainable

work culture unless it is supported by organizational readiness, credible leadership, and context-sensitive implementation. The finding refines the existing literature by showing that sustainability-oriented HR practices may produce unintended negative consequences when they are not embedded in everyday organizational life.

H2: The Effect of Sustainable HRM on Sustainable Performance

The results show that sustainable HRM does not significantly influence sustainable performance, leading to the rejection of H2. This finding suggests that HR practices alone are insufficient to generate measurable sustainability outcomes in MSMEs. Although sustainable HRM is often regarded as a strategic resource, its direct contribution to sustainable performance was not supported in the present study. A key explanation is that sustainable performance is a multidimensional outcome that usually emerges through cumulative organizational processes rather than through isolated managerial practices. Performance related to sustainability often includes economic continuity, social responsibility, employee well-being, and environmental consciousness. In MSMEs, these dimensions may be influenced more strongly by market conditions, owner decisions, financial constraints, and operational capabilities than by formal HR interventions. Therefore, the absence of a direct effect suggests that sustainable HRM may not be a sufficiently dominant force on its own.

From the resource-based perspective, HRM can be considered a strategic asset only when it generates valuable, rare, and difficult-to-imitate organizational capabilities. In MSMEs, however, HR systems are often underdeveloped and may not yet reach the threshold required to create such capabilities. Sustainable HRM may exist in principle, but if it does not substantially improve employee competencies, commitment, or collective routines, its contribution to performance remains weak. This helps explain why the theoretical promise of sustainable HRM is not automatically realized in practice.

Practices such as training, empowerment, fair treatment, and sustainability-oriented development typically produce gradual rather than immediate outcomes. In MSMEs, where performance is often evaluated based on short-term indicators, the long-term value of sustainable HRM may remain obscured. Thus, the non-significant result may partly reflect a temporal mismatch between HR investments and performance measurement.

The contradiction between theoretical expectations and empirical findings should not be interpreted as evidence that sustainable HRM is irrelevant. Rather, it suggests that the role of sustainable HRM is conditional and depends on supporting organizational mechanisms. Without a culture that reinforces sustainability values or a managerial system that integrates HR practices into broader strategy, sustainable HRM may remain operationally disconnected from performance outcomes. This interpretation is consistent with [Agyabeng-Mensah and Tang \(2021\)](#), who stress the importance of mediating pathways.

Overall, the rejection of H2 indicates that sustainable HRM alone is not enough to drive sustainable performance in MSMEs. The finding contributes to the literature by emphasizing that performance improvement requires more than formal HR initiatives; it requires an organizational environment capable of converting those initiatives into collective capability and strategic outcomes. In MSMEs, where structural limitations are pronounced, the path from HRM to performance appears indirect, fragile, and heavily dependent on internal alignment. This makes sustainable HRM a necessary but insufficient condition for sustainable performance.

H3: The Effect of Psychological Capital on Sustainable Work Culture

The analysis reveals that PsyCap does not significantly affect sustainable work culture, resulting in the rejection of H3. This finding challenges the assumption that individual psychological strengths automatically translate into collective organizational behavior. Although psychological capital is theoretically associated with hope, resilience, optimism, and self-efficacy, those personal capacities did not significantly shape a sustainable work culture in this study. One possible explanation is that culture is inherently a collective phenomenon, whereas PsyCap is primarily an individual-level construct. Employees may possess strong psychological resources, but organizational culture develops through shared meanings, repeated practices, and common norms. As a result, high levels of individual optimism or resilience do not necessarily become embedded in the wider organizational environment. This distinction between individual attributes and collective systems is crucial for interpreting the non-significant effect.

In the MSME context, organizational culture is often shaped more strongly by leadership style, founder values, and informal social relationships than by employee psychological traits. Because organizational structures in MSMEs tend to be less formalized, cultural patterns may depend heavily on the daily behavior of the owner or manager. Even if employees demonstrate strong PsyCap, their ability to influence shared values may be limited when authority and symbolic direction remain centralized. Thus, psychological resources at the individual level may not be sufficient to alter the cultural core of the organization.

Compared with studies that suggest positive organizational outcomes of psychological capital, the present finding highlights the importance of level-of-analysis differences. PsyCap may indeed improve job attitudes, persistence, and personal performance, but its ability to influence sustainable work culture depends on whether the organization can collectivize those strengths. Where communication is weak, participation is limited, and values are not institutionally reinforced, individual PsyCap may remain isolated rather than culturally generative. This helps explain why the expected relationship was not observed. Overall, the rejection of H3 indicates that sustainable work culture in MSMEs is not shaped directly by employee psychological capital. Instead, culture appears to depend more on organizational structures, leadership cues, and shared norms than on individual psychological resources alone. The finding contributes to theory by underscoring that personal strengths must be socially and structurally embedded before they can influence collective sustainability values. In this sense, PsyCap may be important, but it is not an autonomous driver of sustainable work culture.

H4: The Effect of Psychological Capital on Sustainable Performance

The results also indicate that PsyCap does not significantly influence sustainable performance, leading to the rejection of H4. This finding contrasts with prior research that links PsyCap to improved performance outcomes (Baig et al., 2021). In the present study, however, psychological capital did not emerge as a significant direct predictor of sustainable performance in MSMEs.

One explanation is that sustainable performance is shaped by a complex interaction of organizational, market, and structural factors that may overshadow individual psychological strengths. While employees with higher PsyCap may be more persistent, confident, and adaptable, these qualities alone may not be sufficient to improve broader sustainability outcomes. In MSMEs, performance is often constrained by capital limitations, unstable demand, supply disruptions, and managerial capacity. Under such conditions, the effect of individual psychological resources may be diluted.

This result suggests that PsyCap may have stronger relevance for micro-level outcomes than for organizational-level sustainability performance. Psychological capital can improve individual motivation, coping ability, and work engagement, but these personal gains do not automatically scale up into measurable organizational performance. For such a translation to occur, organizations typically need systems that coordinate effort, align goals, and support collaborative execution. In MSMEs, those systems are often weak or informal, limiting the organizational impact of individual strengths.

The contradiction with Baig et al. (2021) may be explained by contextual and institutional differences. Studies that find positive effects of PsyCap on performance are often conducted in organizations with stronger managerial systems, clearer performance structures, or more stable environments. In those settings, employee confidence and resilience can be channeled into productive outcomes more effectively. By contrast, in MSMEs facing structural constraints, the same psychological strengths may not have enough organizational leverage to influence sustainable performance directly.

This finding also highlights the importance of complementary organizational conditions. Psychological capital may generate stronger performance effects when accompanied by supportive leadership, learning opportunities, team cohesion, and a culture that encourages sustainable behavior. Without these conditions, individual optimism and efficacy may remain underutilized. Thus, the non-significant result does not necessarily negate the value of PsyCap, but rather shows that its effectiveness depends on the organizational context in which it operates.

Overall, the rejection of H4 indicates that sustainable performance in MSMEs cannot be explained by employee psychological capital alone. The finding extends prior research by showing that the relationship between PsyCap and performance is context-dependent and may weaken significantly under structural constraints. In resource-limited organizations, performance appears to depend more on collective systems and organizational alignment than on personal psychological strengths. Therefore, PsyCap may support employee functioning, but it does not directly guarantee sustainable performance.

H5: The Effect of Sustainable Work Culture on Sustainable Performance

The findings confirm that a sustainable work culture has a strong and significant positive effect on sustainable performance, supporting H5. This result highlights the central role of organizational culture as a driver of sustainability outcomes. Among the variables examined, sustainable work culture appears to be the most decisive factor in explaining sustainable performance in the MSME context. One reason for this strong effect is that culture provides a shared framework that guides behavior even in the absence of formal controls. In MSMEs, organizational systems are often less structured, making culture a crucial mechanism for aligning employee actions with organizational goals. When sustainability values are embedded in the work culture, employees are more likely to make decisions and behave in ways that support long-term organizational continuity. This collective alignment can directly enhance sustainable performance.

A sustainable work culture encourages consistency between values, decisions, and everyday practices. Employees who operate within such a culture are more likely to internalize norms related to responsibility, collaboration, adaptability, and long-term thinking. These norms influence not only individual conduct but also patterns of coordination across the organization. As a result, culture becomes a practical infrastructure through which sustainability objectives are enacted rather than merely stated.

This finding is especially important in MSMEs because culture often substitutes for the formal systems that are more commonly found in large organizations. Where detailed procedures, sustainability reporting systems, or specialized HR departments are absent, shared values become the dominant mechanism for organizational control and integration. A sustainability-oriented culture can therefore compensate for structural limitations by creating coherence in behavior and priorities. This helps explain why culture shows a stronger influence on performance than HRM or PsyCap.

The result is consistent with socio-cultural theory, which emphasizes the role of shared norms, values, and social meaning in shaping organizational outcomes (Davidescu et al., 2020; Zhang et al., 2024). From this perspective, performance is not merely the product of individual effort or managerial policy, but of socially constructed patterns that shape how members interpret and respond to organizational challenges. A sustainable work culture provides this interpretive structure, enabling employees to act in ways that are collectively supportive of sustainability. This theoretical lens helps explain the robust positive effect observed in the study.

CONCLUSION

This study aimed to examine the effects of sustainable HRM and PsyCap on sustainable performance, with sustainable work culture as a mediating variable among MSMEs in Medan City. The findings reveal that sustainable work culture is the only variable that significantly influences sustainable performance, highlighting its central role in shaping economic, social, and environmental outcomes.

In contrast, both PsyCap and sustainable HRM do not demonstrate significant direct effects on sustainable performance. PsyCap also shows no significant influence on sustainable work culture, while sustainable HRM exhibits a significant but negative relationship with sustainable work culture. These results indicate that individual psychological resources and formal HR practices are insufficient to drive sustainability outcomes in MSMEs without proper cultural alignment. Overall, the study concludes that a sustainable work culture serves as the primary mechanism through which sustainability is operationalized within MSMEs. This finding directly supports the research objective by confirming that organizational culture plays a mediating and dominant role in linking internal resources to sustainable performance.

The findings of this study provide important practical implications for MSME practitioners and policymakers. For MSMEs, the results emphasize the need to prioritize the development of a sustainability-oriented work culture rather than relying solely on formal HR practices or individual capabilities. Business owners should focus on strengthening shared values, leadership commitment, and internal communication to embed sustainability into daily operations. For policymakers, the findings suggest that support programs for MSMEs should go beyond technical training and financial assistance. Greater emphasis should be placed on developing organizational culture through capacity-building programs, leadership development initiatives, and sustainability awareness campaigns. This approach can enhance the long-term effectiveness of MSMEs in achieving sustainable performance.

Based on the findings, several recommendations can be proposed. MSME owners are encouraged to integrate sustainability values into their organizational culture by promoting consistent behavioral norms, encouraging employee participation, and aligning business practices with long-term sustainability goals. Policymakers should

design more holistic support strategies that incorporate cultural transformation, rather than focusing solely on administrative or financial interventions. In addition, future research is recommended to explore other potential mediating or moderating variables, such as leadership style or organizational learning, to provide a deeper understanding of sustainability dynamics in MSMEs.

LIMITATION

This study has several limitations that should be considered when interpreting the findings. First, the study focuses only on MSMEs in Medan City, which may limit the generalizability of the results to other regions with different economic structures and institutional environments. Second, the use of a cross-sectional research design restricts the ability to capture dynamic changes in sustainability practices over time. Third, the sample size is relatively limited and based on self-reported data from MSME owners, which may introduce response bias and affect the accuracy of the findings.

Additionally, the study examines only three main predictors of sustainable performance, namely sustainable HRM, PsyCap, and sustainable work culture. Other potentially influential variables, such as leadership style, innovation capability, or external support systems, were not included in the model. Therefore, future research is encouraged to expand the scope by incorporating longitudinal data, larger and more diverse samples, and additional variables to provide a more comprehensive understanding of sustainability in MSMEs.

ACKNOWLEDGMENT

The authors would like to express their sincere gratitude to the Lembaga Penelitian dan Pengabdian kepada Masyarakat (LPPM) of Universitas HKBP Nommensen for their support in facilitating this research. Appreciation is also extended to the Faculty of Economics and Business, particularly the Management Study Program, for providing academic guidance and institutional support throughout the research process.

DECLARATION OF CONFLICTING INTERESTS

The authors have declared no potential conflicts of interest concerning the research, authorship, and/or publication of this article.

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