ISSN 2809-8587

Risk Management as a Strategy to Strengthen Company Competitiveness in the Digital Era

Mita Afasli[1], Zefriyenni[2]
[1.2] Putra Indonesia University "YPTK" Padang
E-mail:afaslimita03@gmail.com

The development of digital technology has significantly changed the business environment, creating both new opportunities and risks for companies. Digital transformation encourages companies to increase efficiency, expand markets, accelerate decision-making processes, and improve the quality of customer service. However, on the other hand, the use of digital technology also gives rise to various risks, such as cybersecurity, data leaks, system disruptions, market uncertainty, and increasingly rapid changes in consumer behavior. This article aims to analyze the role of risk management as a strategy in strengthening corporate competitiveness in the digital era. The method used is a literature study by reviewing various relevant scientific sources on risk management, digital transformation, and corporate competitiveness. The results of the study indicate that the implementation of effective risk management can help companies identify, analyze, evaluate, and control various risks that arise from changes in the business environment. Risk management not only functions as a corporate protection mechanism but can also be a source of competitive advantage by increasing organizational resilience, decision-making effectiveness, innovation, operational efficiency, and customer trust. Therefore, companies need to integrate risk management into their business strategies and digital transformation processes to be able to face uncertainty and maintain sustainable competitiveness.
Keywords: Risk Management, Competitiveness, Digital Transformation, Digital Risk, Business Strategy

This is an open access article under theCC BY-NClicense

Corresponding Author:
Mita Afasli
Putra Indonesia University "YPTK" Padang
afaslimita03@gmail.com

1. Introduction

The development of digital technology has transformed the way companies conduct business, from production processes and marketing to customer service and human resource management to decision-making. Digital transformation enables companies to integrate technology into business processes, increasing efficiency, flexibility, innovation, and the ability to respond to environmental changes. Research by Tortora et al. shows that digitalization has transformed the way companies conduct business while simultaneously encouraging the development of capabilities that support digital innovation and competitive advantage (Tortora et al., 2021). Consistent with this, Li et al. found that digital technology-based capabilities can improve company performance through the company's ability to capture market opportunities and make operational adjustments more quickly (Li et al., 2022). Digitalization is also increasingly important for companies because the application of technology can drive changes in value creation, organizational structure, innovation, performance, and competitive advantage (Mishra et al., 2023).

However, digital developments not only provide opportunities but also increase the complexity of the risks companies must face. Reliance on information systems, the use of cloud computing, artificial intelligence,

big data, and various digital platforms can increase information security risks, data leaks, cyberattacks, system failures, and disruptions to operational continuity. A systematic review conducted by Al-Ali et al. showed that digital transformation can increase efficiency and productivity, but at the same time, it creates cybersecurity challenges that can compromise business resilience (Al-Ali et al., 2023). Organizational reliance on digital technology also requires companies to build digital readiness and strategic cyber risk management to maintain business continuity (Seman et al., 2021). Therefore, the higher the level of digitalization in a company, the more crucial it is for the company to identify and control risks arising from its use of technology.

Risk management is one of the strategic approaches needed to address these conditions. Risk management is not only concerned with efforts to avoid losses, but also encompasses the process of identifying, analyzing, evaluating, controlling, and monitoring risks that can impact the achievement of company goals. In the context of Enterprise Risk Management (ERM), risk management is integrated with the decision-making process and organizational strategy. Saeidi et al. found that ERM has a positive relationship with a company's competitive advantage, while information technology strategy and structure also strengthen this relationship (Saeidi et al., 2019). These findings indicate that risk management can be positioned as part of a company's strategy, not merely as a control activity after a risk occurs.

The implementation of effective risk management can also help companies increase organizational resilience in the face of uncertainty. Companies that are able to identify risks early on will be better prepared to determine mitigation measures and reduce negative impacts on operational activities. Eichholz et al. show that a risk management orientation plays a role in increasing organizational resilience, which can then contribute to a company's competitive advantage, particularly when facing crises (Eichholz et al., 2024). Meanwhile, Khan shows that enterprise risk management practices can help mitigate risks while also having implications for improving company performance in emerging markets (Khan, 2023). Therefore, risk management can be a crucial instrument for maintaining company stability while maintaining competitiveness in a rapidly changing environment.

In the digital era, risk management also needs to be directed at managing technological and cybersecurity risks. Companies need to ensure that the digital systems they use have protection mechanisms against unauthorized access, data loss, system disruptions, and various cyber threats. Hasan et al. emphasize that integrating cybersecurity risk management with information systems governance can strengthen organizational resilience to digital threats (Hasan et al., 2026). Cyber risk management also needs to be carried out continuously because the nature of digital threats can change with technological developments. Noviany and Prasetyo explain that technological developments such as artificial intelligence and blockchain provide opportunities for increased security, but also introduce new forms of risk that require adequate governance and control (Noviany & Prasetyo, 2025).

Risk management integrated with digital transformation can further become a strategic resource in creating competitiveness. Companies need more than just modern technology; they must also be able to manage risks and develop organizational capabilities so that the technology generates value. Saeedikiya et al. explain that companies, especially small and medium enterprises, require dynamic capabilities for digital transformation to generate performance and competitive advantage (Saeedikiya et al., 2024). This is reinforced by Warner and Wäger, who demonstrate the importance of digital transformation capabilities in helping companies respond to changes in the business environment and maintain a competitive advantage. Therefore, a company's ability to integrate technology, human resources, business processes, and risk management is a crucial factor in generating sustainable excellence.

Strengthening competitiveness through risk management is also evident in companies that are able to link risk management with organizational strategy. Yuwono and Ellitan found that ERM implementation plays a crucial role in enhancing competitive advantage through the company's ability to face external risks, regulatory changes, market dynamics, operational issues, and human resource challenges (Yuwono & Ellitan, 2025). In the context of small and medium enterprises, the development of ERM combined with dynamic capabilities is also a factor supporting the formation of competitive advantage in the face of market changes (Yuwono & Ellitan, 2025). This demonstrates that risk management needs to be positioned as part of an organization's ability to adapt, not simply as a mechanism to avoid threats.

Furthermore, digital transformation needs to be accompanied by the development of organizational resources and capabilities. Recent research shows that digital transformation can increase company value through human capital development, technological innovation, and operational efficiency (Jiang et al., 2026). Other research also found that digital transformation can improve company performance through the development of product innovation capabilities and service improvement (Gu et al., 2026). However, the benefits of digitalization do not always emerge automatically, as the effectiveness of digital transformation can be influenced by market dynamics and policy uncertainty (2026). This situation further emphasizes the importance of risk management as a mechanism that helps companies anticipate change and ensure digital investments deliver optimal benefits.

Based on this description, risk management can be viewed as a crucial strategy for strengthening corporate competitiveness in the digital era. Companies that integrate risk management with digital transformation will be better able to anticipate threats, maintain operational continuity, improve decision-making, protect digital assets, and capitalize on innovation opportunities. Risk management can also strengthen organizational resilience and adaptability, enabling companies not only to survive change but also to capitalize on it as an opportunity to create value. Therefore, companies need to build an adaptive risk management system, enhance human resource competency, strengthen information technology governance, enhance cybersecurity, and integrate risk evaluation into the strategic planning process. With this approach, risk management is no longer viewed as a defensive activity but rather as a strategic instrument for creating competitive advantage and corporate sustainability in the face of increasingly digitalized business competition.

2. Method

This study uses a literature review with a qualitative descriptive approach to analyze the role of risk management as a strategy for strengthening corporate competitiveness in the digital era. This literature review method was chosen because the research focuses on collecting, reviewing, comparing, and synthesizing various previous research findings addressing risk management, digital transformation, technological risk, organizational resilience, and corporate competitiveness. This approach allows researchers to gain a more comprehensive understanding of the development of concepts and the relationship between risk management and a company's ability to respond to changes in the business environment.

The research data sources consist of secondary data obtained from scientific journal articles, proceedings, academic books, and other scientific publications relevant to the research topic. Literature searches were conducted through several scientific databases, such as Google Scholar, ScienceDirect, SpringerLink, and various academic journal pages. Keywords used in the search process included risk management, enterprise risk management, digital transformation, digital risk, cybersecurity risk, competitive advantage, organizational resilience, and digital capabilities. The selected literature primarily comes from research

discussing the relationship between risk management and company performance, resilience, innovation, digital transformation, and competitiveness.

The literature selection process involved several stages. The first stage was determining the research focus and keywords relevant to the study's objectives. The second stage was searching for articles based on the relevance of the title, abstract, and keywords. The third stage was screening articles, considering topic suitability, source quality, research contribution, and the availability of information on research methods and results. Articles not directly related to risk management, digital transformation, or corporate competitiveness were not used as primary sources in the analysis.

Data analysis was conducted descriptively and comparatively. Each selected article was reviewed based on its research objectives, concepts used, research objects, research methods, and key findings. Next, previous research findings were compared to identify patterns, similarities, differences, and relationships that could explain the role of risk management in enhancing corporate competitiveness. The information obtained was then grouped into several themes: strategic risk management, digital risk and cybersecurity, digital transformation, organizational resilience, innovation, and competitive advantage.

The final stage involves literature synthesis, integrating various research findings into a more comprehensive understanding. This synthesis explains that risk management not only serves as a control mechanism for potential losses but can also be a strategic instrument for improving a company's adaptability, efficiency, innovation, organizational resilience, and competitiveness. Therefore, the literature review method used in this research is expected to provide a systematic overview of the importance of integrating risk management with digital transformation strategies in facing increasingly dynamic business competition.

3. Results And Disccusion

The literature review shows that risk management plays an increasingly strategic role in strengthening corporate competitiveness in the digital era. Technological developments have provided opportunities for companies to increase efficiency, accelerate business processes, expand markets, and create innovation. However, digitalization has also increased the complexity of risks faced by companies, particularly cybersecurity risks, data breaches, system disruptions, technology dependency, regulatory changes, and shifts in consumer behavior. Therefore, companies require a risk management approach that can adapt to technological developments and changes in the business environment. Tortora et al. (2021) explain that a company's ability to utilize digital technology is a critical factor in supporting innovation and value creation. Meanwhile, Li et al. (2022) show that digital technology can develop dynamic capabilities that help companies improve adaptability and maintain performance in uncertain environmental conditions.

The study also shows that risk management can no longer be viewed solely as an activity to mitigate losses. It has evolved into an integral part of a company's strategic process, identifying threats and capitalizing on opportunities. The implementation of Enterprise Risk Management (ERM) enables various risks related to a company's activities to be managed in an integrated manner with the organization's goals and strategies. Saeidi et al. (2019) found that ERM implementation is associated with increased competitive advantage, particularly when supported by information technology. This demonstrates that sound risk management can be a strategic resource that helps companies navigate competition. Companies that better understand risk will have a stronger foundation for making investment decisions, product development, market expansion, and the implementation of new technologies.

In the context of digital transformation, one important finding is the increasing need for technology risk management and cybersecurity in companies. Digitalization has led to an increasing reliance on digital

information systems and networks for corporate activities. This situation creates the potential for technological disruption to directly impact operational activities and corporate reputation. Al-Ali et al. (2023) explain that digital transformation offers benefits for efficiency and productivity, but also poses various cybersecurity challenges that can impact business resilience. Therefore, companies need to develop control systems capable of protecting data, information systems, and digital assets. Seman et al. (2021) also emphasize the importance of digital readiness and strategic risk management in building organizations that are resilient to cyber threats.

Digital risk management is also closely linked to customer trust. In a digital business environment, customer data is a company's most important asset. Leaks of personal information or security system failures can cause customers to lose trust and switch to competitors. Therefore, data protection is not only a technical aspect but also an integral part of a customer retention strategy. Companies that demonstrate a commitment to information security can build a stronger reputation and increase market trust. Therefore, cybersecurity risk management can provide indirect benefits to competitiveness through improved reputation and long-term customer relationships.

Further research indicates that risk management is linked to organizational resilience. Organizational resilience is a company's ability to withstand disruptions, adapt, and resume operations effectively after facing pressure or change. Eichholz et al. (2024) demonstrated that a risk management orientation can support organizational resilience and contribute to a company's competitive advantage during a crisis. These findings suggest that companies with robust risk management systems tend to be better prepared for environmental changes. This capability is becoming increasingly important as digital companies operate in a dynamic environment with rapidly changing technology and market needs.

Besides enhancing resilience, risk management also supports corporate innovation. Innovation inherently carries uncertainty because companies must utilize resources to produce something that may not be accepted by the market. Risk management enables companies to identify the potential failure of an innovation and determine strategies to mitigate its impact. Saeedikiya et al. (2024) demonstrate the importance of dynamic capabilities in helping companies achieve digital transformation and create competitive advantage. Therefore, companies should not avoid innovation risks altogether, but rather manage these risks to ensure innovation is carried out with a more manageable level of uncertainty.

The relationship between risk management and competitiveness can also be seen in a company's ability to improve operational efficiency. Unmanaged operational risks can lead to wasted resources, process delays, work errors, and service disruptions. Through regular risk identification and evaluation, companies can identify activities with the greatest potential for disruption and determine corrective actions. The use of digital technology also enables faster risk monitoring through data analysis and information systems. Thus, the integration of digital technology and risk management can improve the quality of decision-making while reducing the potential for operational losses.

Furthermore, the study results show that successful risk management is significantly influenced by organizational and human resource capabilities. Digital transformation requires not only investment in technology but also employees who understand the use of technology and the associated risks. Warner and Wäger (2020) explain that companies need dynamic capabilities to sustainably implement digital transformation. This suggests that companies need to enhance digital competency, build a risk-aware culture, and encourage the involvement of all organizational elements in risk management. Without adequate human resource support, a company's technology and risk management systems may not be able to deliver optimal benefits.

From a strategic perspective, risk management can serve as a basis for companies in setting priorities and allocating resources. Companies can define risks based on their likelihood of occurrence and the magnitude of their impact on organizational goals. Risks with high impacts receive greater attention and resources than those with low impacts. This approach allows companies to use resources more efficiently. Khan (2024) demonstrated that enterprise risk management practices are related to risk mitigation efforts and company performance in emerging markets. These findings reinforce the view that risk management can benefit company sustainability and performance.

Overall, the discussion results indicate that risk management contributes to strengthening competitiveness through several key aspects, namely increasing organizational resilience, protecting assets and data, increasing efficiency, strengthening decision-making, supporting innovation, increasing customer trust, and adapting to change. Yuwono and Ellitan (2025) suggest that ERM can be used as a strategy to increase competitive advantage because it helps companies face various external and internal risks. Therefore, companies in the digital era need to integrate risk management into their business strategy, rather than positioning it as a mere administrative function.

Based on these results, it is clear that companies with adaptive risk management systems will be better able to navigate uncertainty than those solely focused on technology. Digital transformation must be accompanied by risk identification, enhanced information security, human resource competency development, regular evaluations, and preparedness for disruptions. With this approach, risk management can transform from a defensive function into a strategic tool that helps companies create value and maintain competitiveness. Ultimately, a company's strength in facing digital competition is determined not only by how quickly it adopts technology, but also by how well it can manage the risks that arise from its use..

4. Conclusion

Risk management plays a strategic role in strengthening corporate competitiveness in the digital era. Studies show that implementing risk management not only reduces potential losses but also supports organizational resilience, effective decision-making, operational efficiency, innovation, data security, and customer trust. Integrating risk management with digital transformation enables companies to be better prepared to face uncertainty, cyber threats, technological change, and market dynamics. Therefore, companies need to build adaptive risk management systems, improve human resource competencies, strengthen digital security, and conduct continuous risk evaluations to create competitive advantage and maintain long-term business sustainability.

5. Reference

[1] D. Tortora, R. Chierici, M.F. Briamonte, and R. Tiscini, “'I digitize so I exist': Searching for critical capabilities affecting firms' digital innovation,” Journal of Business Research, vol. 129, pp. 193–204, 2021.

[2] L. Li, Y. Tong, L. Wei, and S. Yang, “Digital technology-enabled dynamic capabilities and their impacts on firm performance: Evidence from the COVID-19 pandemic,” Information & Management, vol. 59, no. 8, Art. no. 103689, 2022.

[3] P. Saeidi, SP Saeidi, S. Sofian, SP Saeidi, M. Nilashi, and A. Mardani, "The impact of enterprise risk management on competitive advantage by moderating the role of information technology," Computer Standards & Interfaces, vol. 63, pp. 67–82, 2019.

[4] AA Al-Ali et al., “Digital transformation and cybersecurity challenges for business resilience: Issues and recommendations,” Sensors, vol. 23, no. 15, Art. no. 6666, 2023.

[5] SA Seman, A. Jamaludin, and AFA Zaini, "Building cyber resilient organizations through strategic risk

management and digital preparedness," The Asian Journal of Professional & Business Studies, vol. 2, no. 2, 2021.

[6] J. Eichholz and N. Hoffmann, "The role of risk management orientation and the planning function of budgeting in enhancing organizational resilience and its effect on competitive advantages during times of crises," Journal of Management Control, vol. 35, pp. 17–58, 2024.

[7] A. Khan, "Does corporate risk management lead to risk mitigation and firm performance? Evidence from Asian emerging markets," Management Research Review, vol. 47, no. 3, pp. 329–352, 2024.

[8] M. Saeedikiya, S. Salunke, and M. Kowalkiewicz, "Toward a dynamic capability perspective of digital transformation in SMEs: A study of the mobility sector," Journal of Cleaner Production, vol. 439, Art. no. 140718, 2024.

[9] KSR Warner and M. Wäger, "Building dynamic capabilities for digital transformation: An ongoing process of strategic renewal," Long Range Planning, vol. 52, no. 3, pp. 326–349, 2019.

[10] J. Y. Huang, R. Jiang, and J. Y. T. Chang, "The effects of transformational and adaptive leadership on dynamic capabilities: Digital transformation projects," Project Management Journal, vol. 54, no. 4, pp. 428–446, 2023.

[11] H. Noviany and KG Prasetyo, "Cybersecurity and innovation risk management: Organizational responses in the digital era," Novatio: Journal of Management Technology and Innovation, vol. 3, no. 4, 2025.

[12] SN Hasan et al., "Embedding cybersecurity risk management into information systems governance: A national-scale framework for organizational resilience, economic stability, and critical infrastructure protection," International Journal of Applied Mathematics, vol. 39, no. 1S, 2026.

[13] Z. Jiang, L. Li, and C. Zhou, "Is it strategy or technology that drives value? Exploring the impact of digital transformation on manufacturing firms," International Review of Economics & Finance, vol. 107, Art. no. 105076, 2026.

[14] AYM Yuwono and L. Ellitan, "Implementation of enterprise risk management as a strategy for increasing competitive advantage: Study at companies in Central Kalimantan," Journal of Business Management and Accounting, vol. 15, no. 1, pp. 55–78, 2025.

[15] MA Yuwono and L. Ellitan, "Developing MSMEs' competitive advantage through enterprise risk management and dynamic capabilities in Surabaya and Lampung," Issues and Perspectives in Business and Social Sciences, vol. 6, no. 1, 2026.