

## RISK MANAGEMENT ANALYSIS IN DIGITAL RETAIL COMPANIES

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### Abstract:

This study aims to describe the implementation of risk management in a digital retail company operating in the personal care and household products sector. The research focuses on risk identification, risk assessment, and mitigation strategies implemented by the company in facing the dynamics of the online retail business. The study used a qualitative-descriptive method through interviews with management, observation of operational processes, and review of internal documents. The analysis results indicate that the company faces various risks in human resources, operations, market, competition, and reputation. Assessment using a likelihood-impact matrix places most risks in the moderate category, requiring consistent control to prevent operational disruptions and reduced competitiveness. The company implemented a combination of strategies to strengthen standard operating procedures (SOPs), improve service quality, monitor the market, and mitigate internal and external risks to maintain business stability. These findings indicate that the implementation of risk management in the digital retail company has been quite successful, but still requires ongoing evaluation to make the company more adaptive to changes in the digital business environment.

## INTRODUCTION

Digital transformation in the retail industry is driving significant changes to operational processes, transaction systems, and corporate reporting mechanisms. This shift toward technology-based activities creates new opportunities, but also increases vulnerability to operational risks and recording errors that can impact business stability. In these circumstances, implementing risk management is a crucial element in ensuring effective and accountable business processes.

Digital retail companies, particularly those engaged in the distribution of household and personal care products, need to ensure that their data management systems, sales transactions, and internal controls support compliance with audit standards and tax regulations. Implementing good governance not only enhances operational integrity but is also a crucial prerequisite for maintaining business sustainability. As explained by Kamaludin et al. (2021), the quality of governance and internal control is closely linked to managerial behavior and corporate risk.

In the digital context, operational and reputational risks are becoming increasingly complex due to the reliance on information technology and high market dynamics. Research by Adi and Arijanti (2024) shows that exposure to reputational risk increases with the use of digital media in business activities. Furthermore, a study by Azizah et al. (2022) confirms that financial risk management plays a significant role in maintaining company stability, especially in sectors facing rapid change.

Although various studies have addressed digital risk management, most have focused on large companies or the large-scale e-commerce sector. This research gap arises from the lack of



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studies examining risk management implementation in medium-scale digital retailers with limited resources. However, these types of companies face unique challenges in establishing adequate auditable control and governance systems. Nola Padang et al. (2025) emphasize that cyber and digital risks require systematic management that aligns with the organization's capacity.

Based on these conditions, this study is directed to answer several questions: (1) what risks arise in the operations of digital retail companies, (2) how are the risk identification and assessment processes carried out, (3) what mitigation strategies are used to maintain operational stability and compliance, and (4) how does the implementation of risk management contribute to auditable corporate governance. By filling these research gaps, this study is expected to provide empirical contributions to strengthening internal control systems and governance practices in digital retail companies.

## METHODS

After explaining relevant risk management theories and models, this study uses a qualitative method with a descriptive approach to illustrate the application of these theories to a digital retail company. This method was chosen because it aims to understand the phenomenon in depth by gathering information directly from sources, so that the data obtained consists of narratives, views, and experiences related to the implementation of risk management in the company's operational environment. The descriptive approach is used to systematically compile, explain, and analyze field facts, including the risk identification process, mitigation strategies, and implemented control mechanisms. In accordance with Moleong's (2019) view that qualitative research emphasizes a holistic understanding in a natural context, this study relies on two data sources:

**Primary Data.** was obtained directly from primary sources through in-depth interviews with internal company personnel familiar with the risk management process, including managers and staff involved in risk identification, evaluation, and mitigation. This information is current and contextual, reflecting the direct views and experiences of those implementing the risk.

**Secondary Data.** obtained through third parties, is used in this study to describe the toiletries market conditions and the level of competition in Indonesia. According to a Fortune Business Insights report (2025), the Asia Pacific region accounts for approximately 34.86% of the global toiletries market, demonstrating high demand and sustained growth until 2032, with Indonesia as a key contributor. Furthermore, research by Ferdinand and Ciptono (2022) indicates that the level of competition in the cosmetics and toiletries industry in Indonesia is in the medium to high category based on Porter's Diamond Model analysis, with the demand and conditions factors scoring the highest. These findings confirm that substantial domestic demand creates significant market opportunities while increasing the intensity of competition, necessitating effective risk management for digital retail companies in this sector.

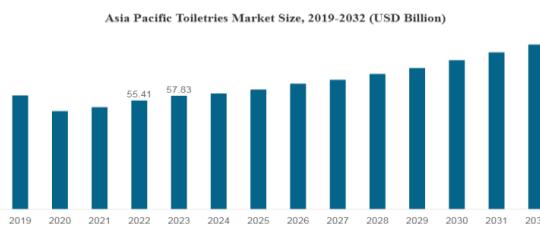
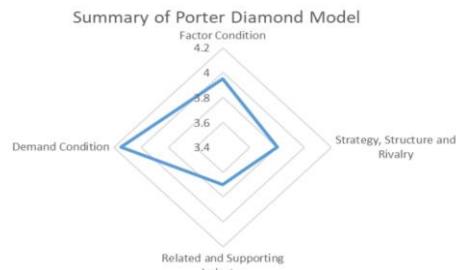


Figure 1. Toiletries Market Share in the Asia Pacific Region 2019–2032 (in Billions of USD)



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**Figure 2.** Summary of Competitiveness Analysis of the Indonesian Cosmetics and Toiletries Industry Based on Porter's Diamond Model

Observation is a data collection technique with unique characteristics compared to other techniques because it focuses not only on human behavior but also on various relevant objects and situations (Sugiyono, 2018). In this study, observations were conducted to understand the implementation of risk management in the operational activities of a digital retail company. The observations included how the company identified potential operational, financial, and strategic risks, how the risk assessment process was conducted, and the control and mitigation measures implemented to minimize the impact on company performance. Through these observations, a direct picture was obtained of the effectiveness of the company's risk management system.

This community service activity is directly relevant to the needs of digital retail companies in analyzing operational risk. Initial observations indicated that the company lacked a comprehensive understanding of the types and sources of risks that arise in its business processes. Through this activity, the company gained a more structured understanding of risk identification, evaluation, and control, enabling it to establish more appropriate preventive measures to minimize potential losses and improve operational resilience and efficiency.

## RESULTS AND DISCUSSION

**The application of risk.** Management analysis in this study refers to the basic concepts and mechanisms of risk management described by Royyan (2023) and Fadjar Harimurti (2012). The process begins with risk identification through document review, observation, and analysis of internal and external conditions. The identified risks are then assessed based on their likelihood and impact using a risk matrix and evaluated against the organization's risk appetite to determine management priorities.

The next stage involves developing mitigation strategies and recording them in a risk register to ensure systematic monitoring and evaluation. Monitoring is conducted periodically to assess the effectiveness of mitigation and adapt it to changing organizational conditions. This structured approach aligns with Situmorang et al.'s (2023) emphasis on the importance of internal control, as well as the views of Loso Judijanto and Zulfikri (2024) and Nola Padang et al. (2025) on the need for a comprehensive risk management framework to address the dynamics of digital business.

Risk identification is conducted by tracking the company's operational activities and gathering information through dialogue with direct managers using the Zoom Meeting platform. After collecting initial data, a series of indicators is developed that are deemed capable of representing various potential risks. These indicators are then reviewed to ensure their suitability for the company's conditions. Only relevant indicators are retained, while others are added or eliminated as needed for the analysis:



**Table 2.** Risk Identification/Risk Appetite

Types of Risk	Code	Risk	Source of Cause
Operational Risk	SDM1	High Employee Turnover	Lack of sense of ownership and less competitive incentives or benefits.
	OP1	Defective Product	Negligence in the checking or production process.
	OP2	Operational System Disrupted	SOPs are not implemented properly, or systems and technology are not updated.
Market and Competition Risks	PK1	Threat of Low-Price Competitors	Many new competitors are offering similar products at lower prices.
	PK2	Left Behind in the Digital Age	Inactive and not utilizing digital technology optimally.
	PK3	Irrelevant Products	Rapid changes in market trends and failure to adapt to consumer preferences.
Reputational Risk	RP1	Damaged Brand Image	Miscommunication or negative comments spread quickly in the digital world.

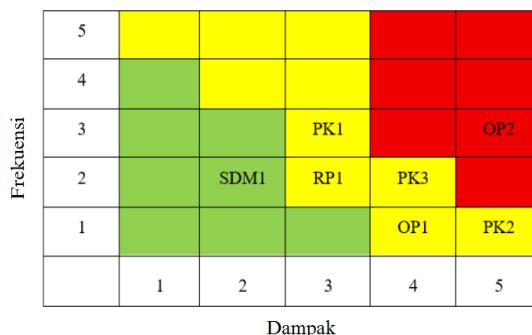
Companies conduct risk assessments to measure the magnitude of potential risks and their impact on operational continuity, allowing higher-urgency risks to be prioritized. In this study, the assessments were conducted using a frequency scale of 1–5, which reflects the likelihood of a risk occurring. The results were used to map risks based on their occurrence and consequences.

**Table 3.** Risk Assessment/Risk Tolerance

Types of Risk	Code	Risk	Frequency	Impact	Risk Value
Human Resource Risk	SDM 1	High employee turnover	2	2	Low
	OP1	Defective product	1	4	Medium
Operational Risk	OP2	The operational system is disrupted (SOP is not executed or system disruption)	3	5	High
	PK1	Threat of competitors offering lower prices	3	3	Medium
	PK2	Companies are lagging in utilizing digital technology	1	5	Medium
Market and Competition Risks	PK3	The product is irrelevant due to changing market trends	2	4	Medium
	RP1	Brand image damaged due to negative comments/communication	2	3	Medium



Risk severity assessment is performed using the Likelihood-Impact Matrix, where the frequency and impact scales are placed on the x- and y-axes. This matrix produces three levels of risk severity: green for low risk, yellow for medium risk, and red for high risk.



**Figure 3.** Likelihood-Impact Matrix

Based on the mapping results into the matrix, risks are grouped as follows:

1. Low Risk. This category includes risks with a low assessment value and is relatively easy to control, requiring regular monitoring. Risks in this group include high employee turnover (SDM1), outdated digital technology utilization (PK2), irrelevant products (PK3), and defective products (OP1).
2. Medium Risk. Risks in this category have a medium value and require more intensive monitoring and a structured mitigation plan. These risks include operational system disruptions (OP2), the threat of lower-priced competitors (PK1), and damage to brand image (RP1).
3. High Risk. Based on the risk tolerance calculation, no risks fall into the high-risk category. This finding indicates that all risks are within the company's tolerance limits and can be managed through preventive measures and consistent monitoring.

**Risk Financing.** The process of providing funds to mitigate potential losses when a risk actually occurs, either through internal or external mechanisms. ISO 31000 (2018) emphasizes that risk financing strategies must consider the risk characteristics, liquidity capacity, and the organization's risk tolerance level. In practice, internal financing is achieved through the preparation of reserves or the allocation of specific funds to cover risks within the organization's tolerance limits, as explained in the risk management concept by Royyan (2023) and Fadjar Harimurti (2012).

Meanwhile, external financing involves transferring or sharing the burden of losses to other parties when the risk has a potentially significant impact, allowing the company to maintain its operational stability. Studies by Azizah et al. (2022) and Situmorang et al. (2023) show that an appropriate risk financing strategy can strengthen a company's resilience to financial disruptions while supporting the effectiveness of overall risk management.

In digital retail companies, risk financing is achieved by combining these two funding sources. Companies set aside internal funds to cover routine operational losses, while major risks such as logistics asset damage, system disruptions, or delivery failures are managed through insurance. Companies also maintain liquidity by controlling costs and avoiding high-interest financing, opting instead for partnerships to share risk.

**Risk Mitigation.** crucial stage in risk management aimed at reducing the likelihood of a risk occurring and mitigating its impact. This stage is carried out after the risk identification and



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assessment process, allowing the organization to prioritize management based on the risk levels mapped in the risk matrix. Hopkin (2018) explains that mitigation can be achieved by reducing the likelihood of a risk occurring, reducing its impact, or a combination of both.

**In the HR risk category (HR1).** The risk level is still tolerable, so the company focuses control on retention and job satisfaction. These measures include regular appreciation programs, regular employee satisfaction surveys, pre-shift briefings, and internal knowledge-sharing training.

**For Operational Risk.** OP1, which is at a moderate level, strengthening quality control is a priority. Implemented measures include the regular use of quality checklists, the application of checkmarks at critical process points, routine calibration of production equipment, and weekly evaluations to ensure continuous improvement. Operational risk OP2 also requires controls to prevent disruptions to work activities, including the installation of SOP boards in key work areas, inspection rotations between supervisors, procedure reminders within workgroups, and recognition for units that achieve high levels of compliance.

**Market and competition risk (PK1).** Considered intolerable because it impacts revenue and market position. Mitigation is carried out through monitoring competitor prices, implementing measured discounts or bundling, reactivating existing customers, and implementing fast customer response time standards. PK2 risk requires long-term attention, with strategies including involvement in community activities, simple collaborations with local MSMEs, participation in public events, and optimizing the business's digital profile. For PK3, the risk is still acceptable with active monitoring through customer surveys, product variant testing, analyzing social media complaints, and minor design or packaging updates.

**Reputation risk (RP1).** Requires strict management because it impacts customer image and trust. Management includes developing complaint response templates, establishing a rapid response team, educating the public through informative content, monitoring reviews daily, responding quickly to negative reviews, and engaging in social activities.

Overall, mitigation measures are implemented proportionally according to risk tolerance and are designed to maintain operational stability, improve procedural compliance, maintain competitiveness, and strengthen customer trust.

The results of the risk management analysis using the ERM approach indicate that the company faces seven major risks grouped into four types: human resource risk (HR1), operational risk (OP1 and OP2), market and competition risk (PK1, PK2, PK3), and reputation risk (RP1). Risk level assessments were conducted by classifying risk responses into three categories: Low, Medium, and High.

Through dissemination and discussion, the company agreed that control should be focused on Medium and High risks. Meanwhile, Low risks were deemed acceptable with regular monitoring. Control recommendations were designed to reduce the likelihood and impact of these risks through implementable measures, such as employee satisfaction and retention programs, strengthened quality control and SOP compliance, market monitoring, and accelerated customer response times. This approach is expected to improve operational process effectiveness, maintain market competitiveness, and strengthen the company's long-term reputation.

## CONCLUSION

Based on the results of a risk management analysis conducted through observations, interviews, and a literature review related to the implementation of Enterprise Risk Management (ERM) in digital retail companies, it can be concluded that the company faces four main risk groups: operational, market and competitive, human resources, and reputational risks. These risks have



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been mapped using a likelihood-impact matrix, providing a prioritized picture of risks that need to be addressed in a structured manner.

Most risks fall into the medium risk category, indicating that they are within tolerable limits but require routine and ongoing control. The absence of high-risk risks indicates that the company's risk management is relatively stable, particularly in operational and strategic aspects of its business.

The recommended mitigation implementation refers to the COSO ERM and ISO 31000 frameworks, including improving SOP compliance, quality control, market monitoring, accelerating customer response, and utilizing digital technology. The company has also implemented a combination of internal and external risk financing to ensure funding availability in the event of operational disruptions.

Overall, the implementation of risk management is still in its development stage but shows positive progress in improving operational effectiveness, market competitiveness, and the company's reputation in the digital retail sector. Going forward, the company is advised to focus on strengthening mitigation efforts for medium-risk categories, accelerating the digitalization process, improving employee competency, and optimizing risk financing mechanisms to be more adaptive to industry changes.

For further research, the study could be expanded to include quantitative analysis based on operational data or a comparison of ERM implementation across several digital retail companies to obtain a more comprehensive picture.

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