

## EVALUATION OF STRATEGIES TO STRENGTHEN HOSPITAL RISK MANAGEMENT THROUGH THE IMPLEMENTATION OF CLINICAL RISK MANAGEMENT AT MURNI TEGUH MEMORIAL HOSPITAL

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### ABSTRACT

*This study aims to evaluate the strategy for strengthening hospital risk management through the implementation of Clinical Risk Management (CRM) at Murni Teguh Memorial Hospital (MTMH). The research utilized a qualitative descriptive approach, with data collected through in-depth interviews, observations, and document reviews involving eight key informants from hospital management and clinical units. The findings reveal that while clinical risk identification and analysis are systematically conducted using incident reporting, clinical audits, and analytical tools like RCA and FMEA, operational challenges such as underreporting and high staff workloads remain. To address these issues, this study identified a five-pillar integrated CRM reinforcement model combining top-down and bottom-up approaches: leadership and risk governance, integrated CRM processes, human resource competency enhancement, a non-punitive safety culture, and continuous monitoring and evaluation. The implementation of this strategy has significantly improved the incident reporting culture, interprofessional coordination, and staff risk awareness. This demonstrates that strong top management commitment is crucial for sustaining patient safety improvements.*

**Keywords:** *Clinical Risk Management, Hospital, Patient Safety, Risk Mitigation, Safety Culture.*

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### Introduction

Hospitals as healthcare institutions are highly complex, in terms of services, technology, human resources, and management systems. Murni Teguh Memorial Hospital (MTMH) is a type A hospital with a capacity of 365 beds, serving patients with various financing schemes, such as BPJS, private insurance, and personal expenses. The complexity of services at MTMH encompasses various specializations and subspecializations, which require an effective and efficient

management system to ensure quality of service and patient safety.

In such a complex service process, the potential for incidents that impact patient safety is very high. Patient safety incidents not only endanger lives, but can also damage the hospital's reputation and result in legal and financial losses. Therefore, hospital risk management is one of the important pillars of the healthcare system.

Hospitals need to implement risk management and risk response plans to mitigate and reduce existing or potential

risks. One strategic approach to controlling clinical risks is the implementation of Clinical Risk Management (CRM). CRM is a systematic process for identifying, analyzing, evaluating, and controlling risks directly related to clinical services (Menteri Kesehatan Republik Indonesia, 2024). The optimal implementation of CRM is expected to improve patient safety, reduce incidents that could affect patient safety, and thereby strengthen the culture of safety in hospitals (Vincent, 2010).

However, in reality, many hospitals, including MTMH, still face various challenges in implementing CRM comprehensively and sustainably. These include limitations in incident reporting, low staff understanding of clinical risks, and the suboptimal integration of risk management systems into everyday work culture (Kardiahning et al., 2025). Therefore, it is necessary to further examine the appropriate strategy for strengthening hospital risk management through the implementation of structured Clinical Risk Management based on the actual conditions at MTMH. While previous studies often focus heavily on the theoretical aspects of CRM or technological interventions, this study provides a practical evaluation of a five-pillar integrated model combining top-down and bottom-up approaches specifically in a Type A hospital setting with high service complexity.

## **Method**

This study uses a qualitative descriptive approach with the aim of gaining an in-depth understanding of the processes, strategies, and dynamics of Clinical Risk Management implementation at Murni Teguh Memorial Hospital.

The research was conducted at Murni Teguh Memorial Hospital. Informants were selected purposively based on their strategic roles in the clinical risk management system. Eight informants were involved in this study, consisting of three board members, one chair of the quality committee, three heads of service units, and one head of nursing.

Data were collected through:

1. In-depth interviews to explore perceptions, experiences, and CRM implementation strategies;
2. Observations of service processes and incident reporting mechanisms;
3. Document review, including policies, standard operating procedures, and incident reports.

### **Research Instruments:**

The primary instrument in this qualitative study is the researcher, who is guided by semi-structured in-depth interview protocols, standardized observation checklists, and document analysis guidelines to ensure systematic and focused data collection.

## Results

Clinical risk identification at MTMH is carried out through incident reporting, clinical audits, service observations, and the compilation of unit risk profiles. Risk analysis uses risk assessment to determine risk analysis priorities and is also aided by the use of several tools such as RCA and FMEA. However, this process still faces obstacles in the form of underreporting and inconsistent documentation caused by several constraints such as a low reporting culture and staff workload.

Clinical risk management at MTMH has been integrated with the PMKP system and implemented in stages from top management to service units. Risk mitigation is carried out through the implementation of SPOs, safety checklists, compliance audits, and periodic evaluations. However, the effectiveness of implementation still varies between units, especially in terms of consistency of supervision and staff compliance.

The strategy for strengthening clinical risk management at MTMH includes strengthening top management commitment, improving human resource competencies through continuous training, implementing methods such as RCA and FMEA, strengthening patient safety culture, and optimizing the electronic incident reporting system. Cross-unit

collaboration and routine supervision support the sustainability of this strategy.

This study identifies an integrated and sustainable clinical risk management strengthening model, consisting of leadership and risk governance, integrated clinical risk management processes, strengthening human resource competencies, a non-punitive safety culture, and continuous monitoring and evaluation. This model combines top-down and bottom-up approaches in the hospital system.

The implementation of the clinical risk management strengthening strategy at Murni Teguh Memorial Hospital has resulted in an improved incident reporting culture, risk awareness, staff risk analysis capabilities, and strengthened interprofessional coordination and risk mitigation systems. This strategy is considered feasible and sustainable because it is supported by top management commitment, organizational structure, policies, and adequate reporting systems. However, challenges remain in the form of a non-punitive culture that is not yet optimal, high workloads, staff turnover, and uneven physician involvement.

## Discussion

The results of the study show that clinical risk identification and analysis at

Murni Teguh Memorial Hospital (MTMH) has been carried out systematically, comprehensively, and continuously through various mechanisms, both reactive and proactive, such as incident reporting, clinical audits, field observations, trend analysis, and the preparation of annual risk profiles. This practice is in line with the principles of risk management in ISO 31000, which emphasizes a structured process of risk identification, analysis, and evaluation involving all stakeholders in the organization (ISO 31000, 2018).

The evidence-based approach applied by MTMH, particularly in determining priority risks based on trends such as medication errors, healthcare-associated infections, and surgical errors, is also consistent with WHO Patient Safety recommendations that emphasize the importance of proactive risk identification to prevent adverse events (World Health Organization, 2021). In addition, the use of analytical methods such as Root Cause Analysis (RCA), Failure Mode and Effect Analysis (FMEA), and risk scoring demonstrates compliance with hospital accreditation standards, which require hospitals to conduct root cause analysis and prioritize risks as a basis for mitigation planning (Kemenkes, 2019). However, the findings of this study also reveal challenges in the form of underreporting, inconsistent reporting, and systemic factors such as

workload, high turnover of healthcare personnel, and a suboptimal safety culture, which according to the literature are common obstacles in the implementation of clinical risk management in hospitals with high service complexity (Kardiahning et al., 2025; Portoghese et al., 2014; Randa & Phale, 2023). Thus, the results confirm that the success of clinical risk identification and analysis depends not only on the availability of systems and methods, but also on the strengthening of a culture of safety, management commitment, and the integration of risk management into daily clinical practice.

The integration of clinical risk management with the patient safety and quality improvement system, along with support from top management, are key factors in the successful implementation of risk strengthening strategies. This is in line with the concept of High Reliability Organizations, which emphasizes the role of leadership, organizational learning, and effective communication in maintaining patient safety (Vogus et al., 2025). Variations in implementation between units show that the main challenge lies not in the absence of a system, but in the consistency of its application and the strengthening of a non-punitive culture at the operational level.

The implementation of the CRM strengthening strategy at MTMH shows that the hospital has undergone systemic transformation in terms of structure, behavior, and organizational culture. Support from top management is a dominant factor in ensuring the feasibility and sustainability of the strategy. The commitment of leaders, the readiness of digital reporting systems, and the stability of the organizational structure have enabled the effective implementation of the strategy in accordance with ISO 31000, WHO Patient Safety, hospital accreditation standards, and High Reliability Organization (HRO) principles (ISO 31000, 2018; Menteri Kesehatan Republik Indonesia, 2024; Vogus et al., 2025; World Health Organization, 2021). Although the CRM reinforcement model in this study demonstrates a holistic and integrated approach, these findings differ from a number of studies that place technology, particularly Artificial Intelligence, as the main factor in improving the effectiveness of hospital risk management (Alahmed, 2025; Božić, 2023). Differences with other studies show that the success of CRM implementation is greatly influenced by the organizational context, the level of risk culture maturity, and the alignment of top-down and bottom-up approaches (Alijoyo, 2021; Amir et al., 2025; Lima et al., 2025).

## Conclusions

The evaluation of Clinical Risk Management (CRM) at Murni Teguh Memorial Hospital confirms that the integration of a five-pillar model comprising leadership and risk governance, integrated CRM processes, continuous human resource capacity building, a non-punitive reporting culture, and rigorous monitoring effectively strengthens the hospital's risk management strategy. This systemic transformation has successfully enhanced interprofessional coordination, optimized standard operating procedures, and improved staff risk awareness. While top management commitment and stable governance strongly support the sustainability of this model, continuous efforts are necessary to address existing operational challenges. Specifically, mitigating staff workloads and further nurturing a non-punitive safety environment are crucial steps to maximize consistent incident reporting and cross-disciplinary collaboration in the future.

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