

## FORMULATING THE KEY FACTORS INFLUENCING MARITIME SECURITY CONTROL IN SARAWAK WATERS IN THE ABSENCE OF A TLDM BASE

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### ABSTRACT

*This study evaluates maritime security in Sarawak waters in the context of the absence of a Tentara Laut DiRaja Malaysia (TLDM) base. The primary objective is to identify the factors that contribute to the high risk of maritime security breaches, as well as to analyse the level of vulnerability to maritime threats in the absence of a TLDM base. This study employs the Strategic Integration model, which combines elements of surveillance, technology, international cooperation, and economic stability. Data is obtained through literature analysis, observation of security incident cases, and assessment of current enforcement agency capabilities. The study's findings reveal that the lack of supervision and enforcement leads to weaknesses in addressing threats such as smuggling and seafood theft. Emphasis is also placed on the importance of technology and international cooperation in improving surveillance capabilities. The study's results are expected to inform future operational policies and strategies aimed at enhancing maritime security and attracting foreign investment to the state of Sarawak.*

## 1.0 INTRODUCTION

Maritime security is a critical aspect in ensuring the economic survival and stability of a country, especially for states that rely on water as their primary means of trade. Sarawak, one of the states in Malaysia with extensive waters, faces a unique challenge in securing its maritime borders. The situation is further complicated by the absence of a dedicated *Tentara Laut DiRaja Malaysia* (TLDM) base in Sarawak, which increases the risk of maritime security breaches (Halim, 2022).

## 2.0 BACKGROUND

Sarawak's waters are a vital route for international trade and a significant economic resource, supporting the fishing, oil, and gas industries. However, the absence of a permanent TLDM base in Sarawak raises concerns about the level of maritime security in this area. Threats such as smuggling, theft of seafood, and incursions by foreign parties are among the problems often faced (Hennig-Breitfeld et al. 2019). In addition, the waters of Sarawak also face the risk of pirate activity that can threaten the safety of commercial ships (Çetin & Köseoğlu, 2020).

The absence of a strategic TLDM base in Sarawak results in a lack of military presence that can act quickly against maritime threats (Build More Naval Bases to Amp up Sarawak's Defence, Senator Tells Federal Govt | DayakDaily, 2024). This simultaneously reduces the ability to monitor and respond to security incidents. This weakness can hurt the confidence of foreign

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investors in the safety of their investments in Sarawak (Laiko et al. 2023). Investors tend to invest in areas with high security guarantees to protect their assets and operations.

### 3.0 PROBLEM STATEMENT

Based on the current situation, several significant problems arise due to the absence of a TLDM base in Sarawak—first, the high risk of maritime security violations in Sarawak waters. The constant absence of a TLDM base makes surveillance and law enforcement efforts in these waters difficult. This leaves the area vulnerable to various maritime threats, which can result in security breaches (Build More Naval Bases to Amp up Sarawak's Defence, Senator Tells Federal Govt | DayakDaily, 2024; Mulia, 2023; Shamsuri, 2021).

Second, the level of vulnerability to maritime threats is too high. Without a significant TLDM presence, the ability to respond to security threats and incidents is limited. This makes Sarawak waters more easily exploited by malicious parties. This situation exacerbates the perception of security among foreign investors, who may perceive a higher risk of investing in this area (Johari Mohd Jaafar, 2015; Musa et al. 2023).

### 4.0 RESEARCH OBJECTIVE

This study aims to gain a deeper understanding of the factors that affect maritime security control in Sarawak waters in the absence of a TLDM base. Two specific objectives have been identified for this study:

- i. To identify the factors that contribute to the high risk of maritime security violations in Sarawak waters due to the absence of a TLDM base.
- ii. To analyse the level of vulnerability to maritime threats in Sarawak waters without the presence of TLDM bases.

The first objective will focus on identifying the elements that make Sarawak's waters vulnerable to security breaches. This study will involve observing the geographical conditions, strengths and weaknesses of the current security infrastructure, as well as case analysis of security incidents that have occurred (Musa & Zulkifli, 2022). This includes identifying any gaps in surveillance and response capabilities to maritime threats.

The second objective will focus on analysing the level of vulnerability of Sarawak waters to maritime threats. This involves an examination of cases involving threats that have occurred, as well as an evaluation of the current capabilities of enforcement agencies to address such threats. This study will also examine the impact of the absence of a TLDM based on maritime security strategy in this area (Androniceanu et al. 2021).

### 5.0 SIGNIFICANCE OF RESEARCH

This study is important for several main reasons. First, it can provide a clearer picture of the factors that contribute to maritime security problems in Sarawak waters. This can help authorities and policymakers to devise more effective strategies for improving maritime security. Second, by analysing the level of vulnerability to maritime threats, this study can help inform the planning of more robust security infrastructure needs, including the possibility of establishing a

TLDM base in Sarawak (Build More Naval Bases to Amp up Sarawak's Defence, Senator Tells Federal Govt | DayakDaily, 2024).

Additionally, this study can provide valuable insights to foreign investors on the measures taken to enhance maritime security in Sarawak. This can help restore investors' confidence in the security of their investments and further attract more investment to the state (Agyemang et al. 2019). In the long term, improving maritime security will contribute to economic and social stability in Sarawak.

## 6.0 LITERATURE REVIEW

The literature on maritime security is extensive, encompassing various global, regional, and local perspectives. Maritime security, defined as the protection of a nation's maritime interests against threats such as piracy, smuggling, illegal fishing, and territorial disputes, is critical for ensuring the stability and economic survival of coastal states. For regions like Sarawak, which rely heavily on maritime routes for trade and resource extraction, the absence of robust maritime security infrastructure, such as a dedicated TLDM (Tentera Laut DiRaja Malaysia) base, presents unique challenges. This literature review examines the key themes and topics related to maritime security in Sarawak, identifies gaps in the existing research, and discusses the potential for a conceptual framework that could guide future studies.

Maritime security in Sarawak is a multifaceted issue, influenced by the region's strategic importance and the existing security infrastructure. Sarawak's waters are vital for international trade. They are rich in natural resources, including fisheries and oil and gas reserves (TLDM Kerah Kapal Tambahan Susulan Pencerobohan Di EEZ Sabah, Sarawak | The Malaysian Insight, 2021). However, the absence of a TLDM base in the region has raised concerns about the effectiveness of maritime surveillance and enforcement (TLDM Showcases Naval Strength At Open Day | New Sarawak Tribune, 2024). The literature highlights that without a strong naval presence, Sarawak's waters are vulnerable to various threats, including smuggling, illegal fishing, and piracy. These threats not only jeopardise the safety of maritime activities but also undermine investor confidence in the region. The role of TLDM in maintaining maritime security is well-documented, emphasising the need for rapid response capabilities and a consistent enforcement presence. The absence of such a base in Sarawak limits the region's ability to respond swiftly to maritime threats, increasing its vulnerability (Mulia, 2023).

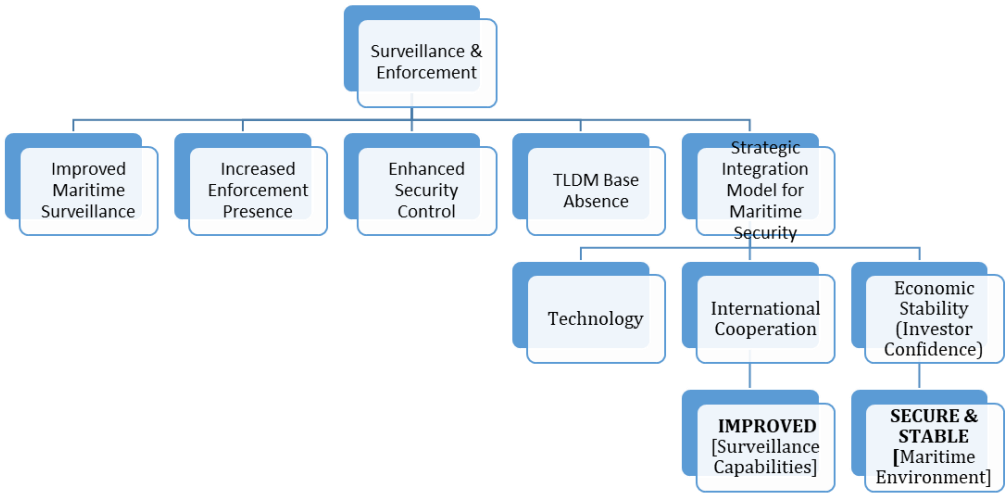
Key themes in the literature include the importance of surveillance and enforcement in maintaining maritime security, the role of technology, and the significance of international cooperation. Surveillance and enforcement are fundamental to deterring and responding to maritime threats. The literature highlights the importance of continuous monitoring of maritime activities, which is currently compromised in Sarawak due to the absence of a dedicated naval base (TLDM-Maritime Malaysia Joint Exercise to Enhance Understanding, 2018). Furthermore, technological advancements such as radar, satellite monitoring, and drones are increasingly recognised as essential tools for enhancing maritime security. These technologies extend the reach of surveillance operations and improve the efficiency of enforcement efforts (Bhardwaj et al. 2019). The literature also emphasises the importance of international cooperation, particularly in regions such as Southeast Asia, where maritime threats frequently extend beyond national boundaries. Collaborative efforts, including joint patrols and information sharing, are crucial for addressing complex and cross-border maritime security challenges (Chang & Khan, 2019).

Despite extensive research on maritime security, notable gaps remain in the literature, particularly concerning Sarawak. Most studies focus on broader regional or global issues, with limited attention given to the specific challenges faced by Sarawak due to the absence of a TLDM base. This gap is significant, given the region's strategic importance and the growing concerns about its maritime security vulnerabilities. Additionally, while the literature discusses various technological and strategic approaches to enhancing maritime security, there is a lack of localised studies that consider the unique geographical, political, and economic context of Sarawak. This gap highlights the need for research that specifically addresses the maritime security needs of Sarawak and explores alternative strategies in the absence of a TLDM base.

To address these gaps, a conceptual framework for maritime security in Sarawak could be developed. This framework would integrate key elements, including surveillance, enforcement, technology, and international cooperation, to provide a holistic approach to enhancing maritime security in the region. The proposed Strategic Integration Model could serve as a foundation for this framework, guiding the formulation of policies and operational strategies tailored to Sarawak's unique needs. Such a framework would not only enhance the region's ability to respond to maritime threats but also strengthen investor confidence and contribute to economic stability.

The literature reveals several key findings and controversies related to maritime security in Sarawak. One of the most significant findings is the critical role of a naval base in maintaining maritime security. The absence of such a base in Sarawak is widely regarded as a significant weakness, limiting the region's ability to effectively monitor and respond to maritime threats. However, there is also debate about the effectiveness of alternative approaches, such as the use of technology and international cooperation, in compensating for the lack of a physical naval presence. While these alternatives are seen as valuable, their limitations and potential drawbacks must be carefully considered.

In conclusion, the literature on maritime security provides valuable insights into the challenges faced by Sarawak in the absence of a TLDM base. The need for enhanced surveillance, enforcement, and technological integration is evident, as is the importance of international cooperation. However, significant gaps remain, particularly in the context of localised studies that address Sarawak's unique security needs. The development of a comprehensive conceptual framework, such as the Strategic Integration Model, could help bridge these gaps and provide a robust foundation for future research and policy development. By addressing these issues, Sarawak can enhance its maritime security and safeguard its vital economic interests.



**Fig. 1 Strategic Integration Model for Maritime Security in Sarawak**

**7.0 EXPLANATION OF THE MODEL**

The Strategic Integration Model for Maritime Security in Sarawak combines the components of surveillance, technology, international cooperation, and economic stability to form a comprehensive approach to addressing maritime security challenges in Sarawak's waters. Each component plays a crucial role and complements the others to achieve the goal of enhancing maritime security and fostering economic stability.

Through better surveillance and enforcement, as well as the use of sophisticated technology, Sarawak's waters can be monitored more effectively (Petrovic et al. 2021). International cooperation ensures that cross-border threats can be dealt with collectively and comprehensively. These efforts will collectively contribute to increasing investor confidence, which is crucial for ensuring continued economic growth and social stability in the region.

This model offers an approach that not only addresses current maritime security challenges but also provides a solid foundation for sustainable economic development in Sarawak in the long term. By understanding and implementing the components in this model, the safety of Sarawak's waters can be strengthened, further benefiting the entire economy and local community.

**7.1 Surveillance & Enforcement**

This component refers to ongoing surveillance and maritime law enforcement activities. Effective surveillance includes more frequent sea patrols and the use of surveillance technology to monitor Sarawak's waters. Law enforcement involves strict action against threats such as

smuggling, robbery, and illegal fishing. Effective surveillance and enforcement are crucial in maintaining stable maritime security, particularly in areas without TLDM bases. Therefore, increased surveillance and enforcement will directly reduce the risk of security breaches in Sarawak waters, making it more difficult for irresponsible parties to carry out illegal activities.

## 7.2 Technology

The use of advanced technology is a crucial element in enhancing surveillance and enforcement capabilities. For example, radar, automatic surveillance systems (AIS), and CCTV play a role in extending the reach of surveillance and speeding up early detection of threats. This technology also enables a faster and more accurate response to security incidents. With technology integration, surveillance and enforcement efficiency can be significantly increased, thereby reducing response time to maritime threats and enhancing overall security in the area (Gooding et al. 2022).

## 7.3 International Cooperation

International cooperation is critical in addressing maritime threats that cross national borders. Through information sharing, joint training, and joint patrols with neighbouring countries, the ability to monitor and respond to global threats can be enhanced. This cooperation includes collaboration with international enforcement agencies and regional organisations such as ASEAN. International cooperation will strengthen maritime security capabilities by expanding surveillance networks and strengthening joint responses to more complex threats (Heryadi et al. 2022).

## 7.4 Economic Stability (Investor Confidence)

This component links maritime security with economic stability, particularly investor confidence. When maritime security is guaranteed, investors will be more confident to invest in strategic sectors such as oil and gas, fisheries, and tourism in Sarawak. On the other hand, if the security threat is not effectively managed, it can erode investor confidence, which in turn can harm the local economy. Strong security will attract more foreign investment, which will increase economic growth and ensure long-term economic stability in Sarawak (Barra & Zotti, 2022).

## 8.0 CONCLUSION

In summarising this study, several important findings are noteworthy in the context of maritime security in Sarawak waters. Key findings include a lack of maritime surveillance and enforcement, which leaves the area vulnerable to illegal activities such as seafood theft and smuggling. Study participants have outlined the need for increased patrol boat presence and more intensive enforcement activities to reduce this risk.

The discussion of the findings also highlighted the need for a TLDM base in Sarawak as a strategic step to enhance maritime defence capacity. With the existence of the TLDM base, the authorities can plan and implement more systematic and practical marine enforcement operations. This aligns with the study's objective to identify the factors contributing to the high risk of maritime security violations due to the absence of TLDM bases in the area (Mulia, 2023; Shamsuri, 2021; TLDM-Maritime Malaysia Joint Exercise to Enhance Understanding, 2018).

The discussion also showed the importance of involving local communities, especially fishermen, in efforts to maintain maritime security. Local communities serve as the authorities' effective eyes and ears in detecting and reporting suspicious activities in the waters. This reflects efforts to develop awareness and involvement of the local community, in line with analysing the level of vulnerability to maritime threats in Sarawak.

Additionally, the importance of technology in maritime surveillance is also emphasised in this study. Investments in radar, CCTV, and automated monitoring systems are considered crucial to enhancing maritime surveillance capabilities and detecting threats more effectively. This finding aligns with analysing the factors that contribute to the high risk of maritime security and how technology can serve as a solution.

This study makes a significant contribution to the field of maritime security by outlining the primary challenges faced and providing recommendations for improvement. By presenting themes such as the lack of oversight, the need for technological advancements, and the importance of international cooperation, this study provides a basis for more effective policies and operational strategies in the future. It is hoped that the results of this study will inform the formulation of policies and the implementation of practical measures to enhance maritime security in Sarawak waters, ultimately benefiting the local maritime community and the port industry.

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