

Governance of Waste in Indonesia: Implementing Policies and Role of Local Authorities

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Abstract

This research scrutinizes the array of strategies deployed in managing waste banks across Indonesia, highlighting the nation's efforts to tackle the growing challenge of waste management. By analyzing data from existing literature and documentary sources, the study aims to understand how waste banks operate within the Indonesian context thoroughly. It reveals that the success of these waste banks varies significantly across different regions, pointing to a complex interplay of factors influencing their effectiveness. The findings of this research are particularly revealing, uncovering three main factors that influence the effectiveness of waste bank management: the availability of human and financial resources, the quality of organizational communication, and the organization's overall structure. These factors are crucial in determining how well waste banks function. Regions with adequate resources and efficient communication channels better manage waste effectively.

Keywords: governance, waste bank, policy, local government, Indonesia

1. Introduction

In Indonesia, waste has emerged as a critical social issue requiring immediate action, a fact emphasized by numerous researchers. The country's struggle with managing waste effectively has led to dire consequences, impacting the environment and public health. This challenge is multi-dimensional, affecting various aspects of life and society (Castillo et al., 2003). The inadequate handling of waste in Indonesia not only deteriorates the environment but also poses significant health risks. This situation has been observed and documented extensively in scholarly work. The accumulation and mismanagement of solid waste have far-reaching implications. For one, it tarnishes the visual appeal of cities, turning urban landscapes into unsightly and unhygienic spaces. However, the impact goes beyond mere aesthetics (Bowles, 2001). Poor waste management has been linked to various health problems, ranging from minor ailments to severe diseases, as the accumulation of waste can create breeding grounds for pathogens and vectors (Yusriadi, n.d., 2019).

Furthermore, the issue of waste in Indonesia indicates a more profound, systemic problem. It reflects the need for more governmental policies and frameworks concerning solid waste management. This is a matter of ineffective implementation and highlights a need for comprehensive planning and foresight in policy design. The gaps in these policies become evident when one examines the growing piles of unmanaged waste and the consequent environmental degradation (R. I. K. Wardani et al., 2020).

Researchers and experts have pointed out that the failure to manage waste effectively is not just a failure of execution but a policy failure. It demonstrates a need for more robust, sustainable, and forward-thinking approaches to waste management. Such approaches must address the immediate issues of waste collection and disposal and consider the broader implications on public health, urban planning, and environmental sustainability. The challenge, therefore, is not just to clean up the waste but to rethink

and reform the systems and policies that lead to its accumulation, aligning them more closely with the principles of sustainability and public welfare.

In recent years, Indonesia has grappled with a substantial national challenge in waste management, particularly in its urban areas. The issue has been exacerbated by the fact that existing data only partially accounts for household waste, which, if fully considered, could dramatically escalate the total volume of waste. Given Indonesia's burgeoning population, now estimated at around 278 million, the amount of waste generated is likely much higher than current figures suggest. This situation has necessitated urgent and practical strategies from the government to tackle the growing crisis of solid waste management.

In response to this pressing issue, the Indonesian government has initiated various strategies to mitigate the effects and causes of this waste management problem. A cornerstone of these efforts is the enactment of Law Number 18 of 2008. This legislation is a crucial framework and guideline for addressing waste management nationwide. It underscores the recognition of waste as a critical national concern and advocates for a holistic approach to its management, encompassing the entire process from production to final disposal (Steenmans & Taylor, 2018).

The objectives of this law are multifaceted. It aims to provide economic benefits through efficient waste management and enhance public health by reducing the environmental hazards associated with improper waste disposal. Additionally, it seeks to protect the environment from the detrimental effects of waste accumulation and pollution. A significant aspect of this law is its emphasis on changing societal attitudes and behaviors towards waste, promoting more sustainable and environmentally conscious practices (Kader et al., 2015; R. Wardani et al., 2021). This comprehensive policy is designed to serve as a national guideline, offering a blueprint for effective waste management that can be adapted and implemented by every city and district in Indonesia. The government hopes to achieve a more sustainable, health-conscious, and environmentally friendly approach to handling the nation's waste challenges through this law.

2. Method

This research adopts a meticulous, systematic review approach, complemented by descriptive analysis, to thoroughly examine and elucidate the governance of waste banks within local governments in Indonesia. The methodology is designed to provide a detailed portrayal and analysis of the existing waste bank systems. It focuses on their operational frameworks, management strategies, and overall effectiveness within the local governmental context. The study utilizes a comprehensive literature review to gather relevant data, delving into a wide array of previously conducted research, scholarly articles, and case studies related to waste bank governance. This is supplemented by an extensive examination of documentary sources, including government reports, policy documents, and operational records of waste banks. These sources collectively offer a rich repository of information, enabling a deep understanding of Indonesia's current state of waste bank governance.

To ensure the robustness and validity of the findings, the study employs a rigorous data testing process. This involves conducting a comparative analysis with studies with similar themes or exploring related aspects of waste bank management. By contrasting and comparing these studies, the research aims to contextualize its findings within the broader body of knowledge and identify unique patterns, challenges, and best practices specific to the Indonesian context. The central research question driving this study is to understand how the governance model of waste banks in Indonesia can achieve success. This inquiry delves into identifying the key factors contributing to effective waste bank management and operation, exploring the roles of policy, community engagement, resource allocation, and organizational structures in fostering a successful waste bank system.

3. Result and Discussion

Waste Bank: The New Face of Waste Management in Indonesia

The enactment of Law Number 18 of 2008 marked a significant shift in Indonesia's approach to solid waste management, introducing a new paradigm where the central government plays a pivotal role. This law represented a departure from the traditional system, where the responsibility for managing solid waste predominantly fell on local governments. Under this new framework, waste management became a collaborative effort, requiring synchronized actions and adherence to a unified principle across different levels of government (Faridav et al., 2021; Yusriadi, Anwar, et al., 2020). The cornerstone of this collaborative approach is the 3R principle (Reduce, Reuse, Recycle), envisioned as a comprehensive solution to the escalating problem of solid waste in Indonesia. This principle aims to mitigate the environmental impact of waste and promote sustainable practices in waste handling.

To operationalize the 3R principle effectively, the Ministry of Environment issued Regulation No. 13 of 2012, providing detailed guidelines for its implementation through the concept of Waste Banks. This regulation was a crucial step in translating the overarching principles of Law Number 18 of 2008 into actionable strategies. Subsequently, this was further elaborated in the Minister of Environment Regulation No. 13 of 2013, which offered a more detailed blueprint for the 3R implementation via Waste Banks. These regulations underpin the policy framework for waste management in Indonesia, outlining specific methods and procedures for waste reduction, reuse, and recycling. This policy initiative underscores Indonesia's commitment to transforming its waste management system, shifting from traditional disposal methods to a more sustainable, resource-efficient model anchored in the principles of the 3R. Through these regulations, Waste Banks have become a key instrument in Indonesia's strategy to tackle the growing challenges of solid waste, aiming to foster environmental sustainability and community participation in waste management (Nurman et al., 2022).

Public Involvement: The Waste Bank Collective

The concept of waste banks in Indonesia has evolved into various models, with the community-based waste bank being a prominent example. This model emphasizes local participation and is grounded in the involvement of diverse community groups, including those formed explicitly around waste bank activities. The idea for community-based waste banks originated from the environmental agency as part of a broader policy implementation strategy. This approach fosters collaboration between the environmental agency and local bodies to achieve a cleaner Indonesia (Ahmda et al., 2020). The fundamental idea is to transform communities in each region into active partners of the waste bank initiative, thereby promoting environmental responsibility and sustainable waste management at the grassroots level.

To facilitate these community-based waste banks, the environmental service, which bears the primary responsibility for waste management policies, provides essential support. This includes supplying necessary facilities and infrastructure such as trash bins, scales, and other tools crucial for the operation of waste banks. These resources are vital for the smooth functioning of waste banks and for encouraging community participation in waste management practices. Moreover, other government agencies support raising awareness and socializing the concept of waste banks. Their efforts aim to ensure widespread acceptance and integration of waste banks within Indonesian communities (Yusriadi, bin Tahir, et al., 2020a). This multi-agency collaboration reflects a comprehensive approach to waste management, where community engagement is leveraged to enhance the effectiveness and reach of environmental policies. Through these concerted efforts, waste banks become more than just waste collection points; they evolve into platforms for community empowerment and environmental stewardship.

Framework and Challenges of Solid Waste Management

Delving deeper into the implications of Law No. 18/2008 on waste management, it becomes evident that while the law provides a unified legal framework, the strategies for policy implementation vary significantly across Indonesia. This variation largely stems from the diverse socio-economic conditions prevalent in different regions of the country. Urban areas, characterized by more established social systems and higher levels of economic activity, tend to have distinct approaches to waste management compared to areas with district characteristics, where economic activities are often less stable (Yusriadi, bin Tahir, et al., 2020b; Yusriadi et al., 2019).

These socio-economic disparities play a critical role in shaping the implementation of Law 18 of 2008, particularly in how it addresses the target community and the stakeholders involved in the waste bank system. In urban regions, where economic activity is more robust and social systems are better organized, the regulations and operations of waste banks are generally more efficient and effective. The urban population, often more exposed to environmental awareness and with better resource access, tends to engage more actively with waste bank initiatives.

In contrast, implementing waste bank regulations faces more challenges in rural areas or districts with less stable economic conditions (Yusriadi et al., 2019). Cultural perceptions play a significant role here; waste management is often seen as a low-priority issue in some communities. Additionally, economic factors are also pivotal. The economic activity level can influence the resources available for waste management and the community's engagement with waste bank initiatives. In these areas, the need for economic incentives and lower levels of environmental awareness can hinder the effective adoption and operation of waste banks. This dichotomy highlights the need for tailored approaches in policy implementation, taking into account the unique socio-economic dynamics of each region to ensure the successful governance of solid waste by Law 18 of 2008.

Assets for Executing Policy Measures

Resources play a pivotal role in the effective implementation of public policies, which is particularly true in waste policy. The availability and quality of resources are often critical determinants of whether a policy succeeds or fails. Among these resources, human resources (HR) stands out as a critical component. Human resources are not just a part of the policy implementation process; they are the driving force behind it (Niskanen, 2017). The capacity, skills, and motivation of individuals involved in policy execution significantly impact the outcomes of these policies.

In discussing human resources, the focus is primarily on the capacity and capabilities of individuals within an organization. This includes their skills, knowledge, training, and overall ability to execute the tasks required by the policy. In the specific context of this research, the human resources in question are those working under the cleaning service departments or similar entities responsible for waste management (Bowles, 2001; Castillo et al., 2003). These individuals are at the forefront of implementing waste policies, and their effectiveness can significantly influence the success of these initiatives. They are responsible for carrying out the day-to-day activities required by the policy, from operational tasks to community engagement and enforcement of regulations. Therefore, the competence, efficiency, and commitment of these personnel are integral to the overall effectiveness of waste management policies. Understanding and enhancing this human resource aspect is crucial for improving policy implementation in waste management.

4. Conclusion

Policies for waste banks implemented through a top-down approach often lead to a range of organizational challenges at the regional level, affecting the practical execution of these policies. This issue arises because regional administrations must adapt to these policies by enhancing three key aspects: regional resources, organizational communication, and organizational structure. The

effectiveness of policy implementation heavily depends on how well these aspects are managed and developed. Among these, the aspect of regional resources is crucial, particularly concerning the capability of local government staff to effectively convert national regulations into actionable policies on the ground. This includes the personnel's skills and training and the availability of adequate financial resources. Budget allocations at the regional level play a significant role in supporting the financial demands of policy implementation.

In this scenario, human and financial resources emerge as critical components for successful policy execution. The ability of local authorities to mobilize and manage these resources determines the extent to which they can effectively implement waste bank policies. The readiness of human resources involves preparing and equipping local personnel with the necessary skills and knowledge to administer the waste bank initiatives according to the national guidelines. Concurrently, securing sufficient budgetary support ensures that these initiatives have the financial backing needed to be carried out efficiently. The interplay of these factors – human resources, financial capacity, organizational communication, and structural efficacy – forms the foundation of effective policy implementation at the regional level, particularly in the context of waste bank management.

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