

Muro: An Indigenous Method to Deal with Climate Change

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Abstract. The objective of this study is to study muro as a native method used by the coastal people of Lembata Island to cope with climate change. Muro is the practice of the temporary closure of marine territory by indigenous peoples to manage coastal resources sustainably. The research also wants to know how muro can contribute to ecosystem-based adaptation and biodiversity conservation. The author uses a case study method with a qualitative ethnographic approach. The author carried out the data collection using participatory observation techniques, in-depth interviews, and document analysis in several coastal villages on the Plain Island. The author then analyzed the data using the ecosystem-based adaptation framework (EbA). The findings show that the muro has high ecological, social, cultural, and economic value for the coastal communities of Lembata Island. Muro can improve the productivity and biodiversity of the sea as well as maintain the balance and continuity of coastal ecosystems. Muro can also improve the well-being and resilience of the coastal communities and preserve the customary values and local wisdom related to coastal resource management. The authors conclude that the muro is an effective customary method of tackling climate change and suggest that there should be recognition and support from governments and other stakeholders for the practice of the muro as one of the ecosystem-based adaptation and biodiversity conservation strategies that have been demonstrated.

Keywords: Muro, Climate Change, Indigenous, Lembata, Ecosystem-based Adaptation

1 Introduction

Muro lembata nusa tenggara timur is a practice of marine conservation by the local communities in Lembata, an island in the eastern part of Indonesia. Muro, also known as Badu, is a term that refers to a protected area in the land or sea that is governed by customary rules and rituals. Muro is a manifestation of the local wisdom and culture that aims to preserve the biodiversity and ecosystem services of the coastal and marine environment. This paper will discuss the origin, characteristics, benefits, and challenges of Muro in Lembata, nusa tenggara timur.

The Muro tradition of Lembata, Nusa Tenggara Timur, embodies indigenous marine conservation practices deeply rooted in local culture. Known locally as Badu, Muro zones are sanctuaries governed by ancestral customs, safeguarding biodiversity and ecosystem services. This study explores Muro's origins, practices, ecological impact, and its potential as a model for sustainable living and climate resilience.

In response to historical food scarcities, the indigenous peoples of Lembata developed Muro—a practice of demarcating protected marine areas to allow ecosystems to thrive undisturbed. This oral tradition, integral to the Lamaholot people's bond with nature, ensures the replenishment of marine resources, securing sustenance and embodying the principles of food sustainability.

Muro stands in stark contrast to modern disregard for environmental stewardship, offering a blueprint for community-driven conservation and capacity-building. It exemplifies the profound relationship between humans and nature, meriting examination, and replication across Indonesia.

The muro is a tradition that was born on the search of indigenous peoples especially the woods and surrounding areas for food shortages due to the drought in the past. This tradition was passed down orally and is still preserved to this day as part of the community's connection with nature and ancestors. The tradition is done by giving a certain zone in the sea region so that the exploitation of the territory can be protected. The real impact that can be felt is that when the zone is reopened, at certain times, there is enough food and marine life available to nourish the population and prevent them from starving.

This tradition also has an important meaning because it teaches people the concept of food sustainability that is rooted in the local culture. If modern society does not care or relinquish their responsibility for food availability on the other side muro is the antithesis of such modern society. The muro provides and provides facilities for the people of Lamaholot to continue to rely on, hanging their lives to nature responsibly. This tradition is an important lesson of the noble value of human relations with nature that is worth studying and developing into programmes of conservation and capacity-building of communities in other parts of Indonesia.

This paper will try to elaborate on the mantras of the muro and how it saves the people of the woods from the famine and how the muro can be a lesson for the people in other regions of Indonesia to protect the nature. The paper will be divided into three main parts namely the mantra of the traditions of muro, how muro preserves the environment, how wall can counteract climate change and how to replicate the muro to be applied in other parts of Indonesia [1].

Muro lembata nusa tenggara timur is a traditional marine management system that has been practiced by the local communities in Lembata Island, Indonesia, for generations. Muro is based on the principle of respecting and protecting the sea as the source of life and livelihood. Muro applies a zonation system that divides the marine area into three zones: Tahi Tubere or Jiwa Laut (Core Zone), Ikan Berewae or Ikan Perempuan (Buffer Zone), and Ikan Ribu Ratu or Ikan untuk Umum (Utilization Zone). Each zone has different rules and restrictions regarding fishing activities and gear types. The Core Zone is the most sacred and restricted area, where no fishing is allowed. The Buffer Zone is reserved for women and children who can only use traditional fishing lines. The Utilization Zone is open for everyone who can use various fishing methods, but only at certain times and seasons. Muro also involves various rituals that signify the respect and gratitude of the local people to their ancestors and nature. The rituals include Sumpah Adat

(Oath Ceremony) at Namang (a sacred place where the living and the dead meet), Nading (a sign that indicates that the sea is closed or open for fishing), Balela (a boundary marker for Muro), and Bedu (a ceremony to open or close Muro). Muro is legitimized by both customary and formal institutions. The local communities have their own customary leaders, such as Kapitan Sari Lewa (Sea Guardian), who are responsible for enforcing and monitoring Muro. Muro is also recognized and supported by the government through legal documents, such as SK Gubernur Nusa Tenggara Timur No.192/KEP/HK/2019 about Marine Protected Areas in Lembata District and Kepmen Menteri KKP No.95/2021 about Conservation Areas in Lembata Region [2].

Muro lembata nusa tenggara timur has manifold benefits for the ecological, economic, and social aspects of the local communities and the marine environment. Ecologically, Muro contributes to the conservation and restoration of marine biodiversity and ecosystem functions. By limiting or prohibiting fishing activities in certain areas and times, Muro allows the fish stocks to recover and reproduce. Muro also protects other important habitats, such as mangroves, coral reefs, and seagrass beds, that provide shelter, food, and nursery grounds for various marine species. Economically, Muro enhances the livelihoods and well-being of the local communities who depend on marine resources. By improving the fish abundance and diversity, Muro increases the catch per unit effort (CPUE) and income of the fishers. Muro also creates alternative sources of income, such as ecotourism, handicrafts, and seaweed farming. Socially, Muro strengthens the social cohesion and empowerment of the local communities who participate in managing Muro. By involving various stakeholders, such as customary leaders, fishermen, women, youth, government officials, NGOs, and researchers, Muro fosters collaboration, communication, trust, and mutual respect among them. Muro also preserves and promotes the local culture and identity that are embedded in Muro.

Muro lembata nusa tenggara timur is not without its challenges, however. Despite its long-standing tradition and culture, Muro faces various threats and constraints that jeopardize its future. Some of these challenges are external, such as climate change, natural disasters, pollution, illegal fishing, population growth, development pressure, market demand, and policy inconsistency. These external factors can have negative impacts on the marine environment and the local communities, such as environmental degradation, resource depletion, conflict, and poverty. Some of these challenges are internal, such as lack of awareness, knowledge, skills, resources, participation, coordination, monitoring, evaluation, and enforcement. These internal factors can hinder the effective and efficient management of Muro, leading to non-compliance, mismanagement, corruption, and dissatisfaction. Therefore, Muro in lembata requires more support and collaboration from different actors and sectors, such as government, NGOs, researchers, and other stakeholders, to overcome these challenges and to enhance its effectiveness and sustainability.

2 Method

The methodology of this study is rooted in the systematic review of literature, which serves as both a means of data collection and a method of analysis. The approach is multifaceted, involving a detailed exploration of various sources to construct a comprehensive understanding of the subject matter.

In the data collection phase, the study delves into media studies to capture the pulse of current discourse, examining a range of media outputs for insights and information. This is complemented by a careful selection of scholarly articles, which provide a foundation of academic thought and previous research findings. To ensure the inclusion of authoritative and factual data, the study also incorporates documents from government sources, which offer official statistics and policy perspectives. Additionally, records from related customary institutions are reviewed to glean historical and cultural insights that may inform the research.

The data analysis phase is characterized by the creation of an analytical matrix. This matrix serves as a tool to organize the topics of the research into a coherent structure, facilitating a focused examination of each topic's relevance to the research objectives. The matrix is not merely a tabulation of data but a dynamic instrument for synthesizing information and identifying patterns and themes that emerge from the literature.

Finally, the presentation of research results involves a careful display of the findings, ensuring that they are accessible and understandable. The results are then contextualized by comparing them with relevant references and literature, drawing connections between the study's outcomes and the existing body of knowledge. This comparative analysis not only situates the research within the broader academic dialogue but also highlights its unique contributions to the field. Through this meticulous and descriptive approach, the study aims to provide a rich and nuanced understanding of the research topic, aligning closely with the study's title and purpose.

3 Discussion

3.1 Muro as a tradition

Muro is a tradition that originates from the Lawaholot community in regulating their food resilience to face uncertain seasons. Lawaholot communities are those who live on three major islands in the islands of Flores such as Lembata, Alor, and East Flores. Muro was historically first developed by communities that lived in mountainous areas but over time developed and applied to preserve the marine environment.

The sea became a livelihood of the lawaholot people after previously depended heavily on the forest outputs of the mountains. It's probably based on the mountainous conditions on the three islands that make it unlikely to do farming extensively. Excellent sea conditions and being the migration site of many large fish populations make communities heavily dependent on seafood as their livelihood. However, irresponsible practices by some of the communities have damaged the environment and resulted in a drastic reduction in ocean yields. This time is likely to occur in the early 2000s, when the marine environment suffered very massive damage to the environment. So then the muro tradition began to be modified and applied customarily to be used in the preservation of the marine environment.

Muro himself refers to a zoning process issued by custom to protect one territory from the possibility of overfishing and other exploitation of irresponsible seafood. Historically, the people of Lembata know two kinds of walls, land walls and sea walls. But as time passes, the local walls are identified with the walls of the sea. In a narrow sense, the wall is defined as a ban or a sign of prohibition. For the Lembata people, it is a sacred place that is believed to be the meeting place of the dead, the land of the living, to ask for sacrifice from the dead. (*penguasa*

alam semesta). Namang became a symbol of supernatural or metaphysical powers so that it became a sacred place to be valued including to make customary oaths. After performing customary oaths in the ghetto represented by indigenous figures and the village government, continued the installation of nading or balela as a sign of prohibition of the border of the muro area. The coastal community of the Lembata is aware that entering the Muro area unwillingly will bring disaster to themselves and their families in sickness, accident and even death.

The implementation of the open close system of the muro area of each village is different based on existing conditions and customary arrangements. The right and authority to open and close the walls belongs to indigenous figures. The opening and closing of the Muro are always preceded and ended by customary rituals in Muro. Aboriginal becomes the highlight of the muro journey to be accepted and applied in the midst of society. Through Muro people are taught how to value nature as the mother earth that gives them life and food.

3.2 Muro and environmental conservation

As Muro becomes part of the conservation Muro has some core values and areas that are classified according to thought and customary values. Some important pillars contained in local wisdom are:

- a) Continuity:
Local wisdom is an important part of sustainable coastal management. The muro area insures the sustainability of coastal and marine ecosystems through an open close system.
- b) Inclusiveness:
The management of the muro area is done by customary people with customary oaths. The authority to manage and control the marine resources is carried out by the customary figures and the community through customary vows in the sacred place called "Gang".
- c) Ecosystem base:
Local wisdom muro controls coastal and marine ecosystems from the use that is open to three eco-systems namely the mangrove ecosystem, the oak ecosystem, and the coral reef ecosystem. These three major ecosystems are interconnected with each other. An ecosystem-based approach advances the interaction between humans with biotic, and abiotic components.

As time passed, Muro's location continued to grow. Not only that, the addition of the location of the Muro application is also accompanied by the existence of good mapping to be able to know the Sub-Zone Area of each village that has enforced Muro. The creation of such a map involves local NGOs to accompany and has used sufficiently sophisticated technology to measure the zoning. Here are some examples of Muro maps in some villages in Lembata.

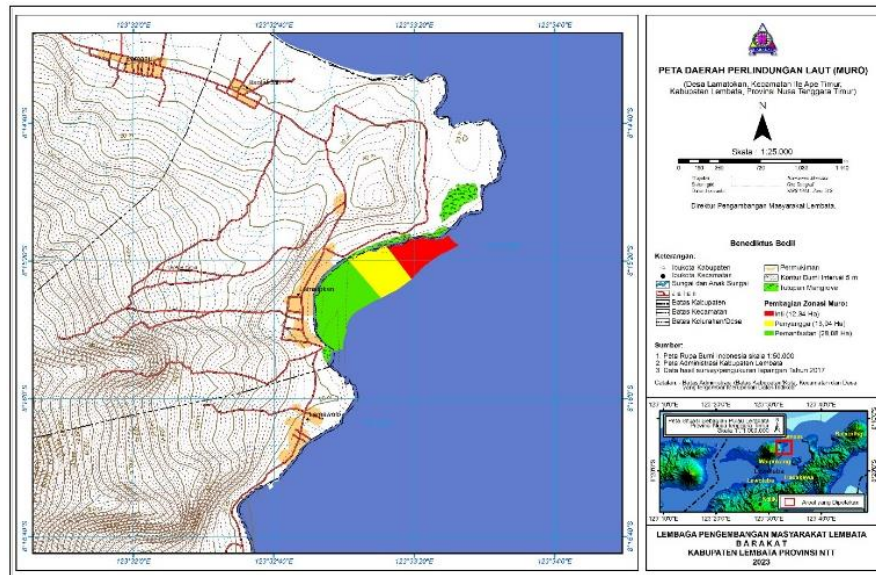


Fig. 1. Muro Desa Lamahelan

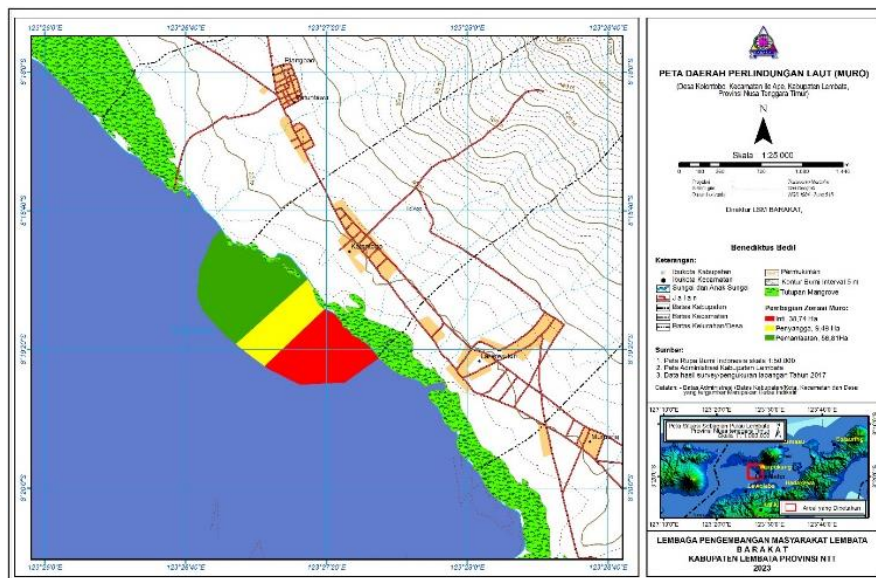


Fig. 2. Muro Desa Kolontobo

The practice of Muro, a traditional method of marine conservation, has been passed down through generations and is currently being implemented by local communities on Lembata Island, Indonesia. The foundation of Muro is grounded in the fundamental principle of upholding and safeguarding the ocean as the fundamental wellspring of existence and

sustenance. Muro exhibits a multitude of discernible characteristics that are indicative of the indigenous knowledge and cultural practices of its inhabitants. One notable feature of the marine area is the implementation of a zonation system, which categorizes the area into three distinct zones: Tahi Tubere or Jiwa Laut (Core Zone), Ikan Berewae or Ikan Perempuan (Buffer Zone), and Ikan Ribu Ratu or Ikan untuk Umum (Utilization Zone). Various zones have distinct regulations and limitations pertaining to fishing activities and the types of gear that can be used. The Core Zone represents the utmost sacred and highly regulated region, wherein fishing activities are strictly prohibited. The designated area known as the Buffer Zone is exclusively allocated for the utilization of women and children, who are limited to employing conventional fishing lines for their fishing activities. According to [3], the Utilization Zone is accessible to individuals proficient in diverse fishing techniques, albeit subject to specific temporal and seasonal restrictions.

One additional characteristic of Muro is its ritual system, which serves as a symbolic expression of the local community's reverence and appreciation towards their ancestors and the natural environment. The observed customs encompass various rituals, such as the Sumpah Adat, which is an Oath Ceremony conducted at Namang, a revered location symbolizing the convergence of the living and the deceased. Additionally, there is the Nading ritual, serving as a signal denoting the availability or restriction of fishing activities in the sea. Furthermore, the Balela ritual serves as a demarcation point for Muro, while the Bedu ceremony is performed to inaugurate or conclude Muro [4]. A third feature of Muro is the legitimization system that involves both customary and formal institutions. The local communities are governed by customary leaders, such as Kapitan Sari Lewa (Sea Guardian), who bear the responsibility of upholding and overseeing the implementation of Muro. Muro has received official recognition and governmental support as evidenced by legal documents, namely SK Gubernur Nusa Tenggara Timur No.192/KEP/HK/2019 pertaining to Marine Protected Areas in Lembata District and Kepmen Menteri KKP No.95/2021 concerning Conservation Areas in Lembata Region [5].

The cultural traditions of Muro Lembata in Nusa Tenggara Timur have been transmitted intergenerationally by local communities who possess a profound affinity and reliance on the marine environment. The Muro holds significance not only as a means of sustenance, but also as a symbol of cultural identity and personal esteem for its inhabitants. Muro encapsulates the principles and standards that shape the conduct and mindset of individuals in relation to the ocean and its assets. Muro additionally cultivates a collective sentiment of affiliation and accountability among individuals who possess a shared vision and objective pertaining to the preservation and governance of the marine environment. Muro can be understood as an embodiment of the collaborative efforts and coordinated endeavors of individuals who share a sense of mutual trust and respect. Muro represents a significant emblem of the symbiotic relationship between humanity and the natural environment, fostering the preservation and welfare of both entities.

3.3 Muro and climate change (praxis, value)

The traditional practice of marine conservation known as Muro has been long-standing among the local communities of Lembata Island, Indonesia. The foundation of Muro revolves around the fundamental principle of upholding and safeguarding the ocean as the fundamental wellspring of sustenance and existence. Muro exhibits a range of discernible characteristics that embody the indigenous knowledge and cultural practices of its inhabitants, including the

zonation system, the ritual system, and the legitimation system [4]. According to [6], Muro offers a range of advantages for the ecological, economic, and social dimensions of coastal and marine environments, as well as for local communities. Nevertheless, Muro is confronted with a multitude of challenges that pose risks to its long-term viability and sustainability. These challenges encompass both external threats and internal constraints, as reported by Media Indonesia in 2022.

Climate change poses a significant external threat to Muro, as it has the potential to adversely affect marine biodiversity, ecosystem functions, and the overall well-being of local communities. According to [7], climate change has the potential to induce alterations in various aspects of the marine environment, including sea temperature, sea level, ocean acidification, storm intensity, and rainfall patterns. These changes can subsequently impact the distribution, abundance, diversity, and overall well-being of marine species and habitats. The user's text is too short to be rewritten academically. According to [8], the phenomenon of climate change has the potential to heighten the susceptibility and diminish the ability of local communities reliant on marine resources for sustenance, economic stability, and cultural preservation [2].

Consequently, it is imperative for Muro to exhibit adaptability and resilience in order to effectively mitigate and manage the consequences arising from climate change. Muro has the potential to exhibit adaptability by integrating scientific knowledge and information into its management strategies. This can be achieved through the systematic monitoring of alterations in the marine environment and subsequently modifying rules and restrictions in response. Muro has the potential to exhibit adaptability through the diversification of its livelihood options and the enhancement of its income sources. This can be achieved by undertaking initiatives such as the development of ecotourism, the promotion of handicrafts, the cultivation of seaweed, and the exploration of other alternative activities. Muro has the potential to enhance its resilience through the reinforcement of its social capital and institutional capacity [9]. This can be achieved by promoting collaboration, communication, trust, and mutual respect among diverse stakeholders, including customary leaders, fishermen, women, youth, government officials, non-governmental organizations (NGOs), and researchers. Muro exhibits resilience through the preservation and promotion of its cultural values and identity, which are deeply ingrained within the community [7].

In summary, Muro Lembata Nusa Tenggara Timur represents a longstanding traditional marine conservation practice that is deeply rooted in a vibrant cultural heritage. Muro exhibits several distinct characteristics that set it apart from other methods of marine management. Muro possesses a range of advantages that enhance the ecological, economic, and social circumstances of the coastal and marine environment, as well as the local communities. Nevertheless, Muro is confronted with a multitude of challenges that pose a significant risk to its long-term viability and sustainability. One of the challenges that society faces is climate change, a phenomenon that can exert detrimental effects on both ecological and societal systems. Consequently, it is imperative for Muro to exhibit adaptability and resilience in order to effectively mitigate and manage the consequences of climate change [10].

3.4 Replication to other regions (value based)

The lesson derived from Muro is that it demonstrates the potential for implementing its methodologies in comparable regions facing comparable circumstances and obstacles [2]. The Muro model has the potential for replication in regions with indigenous or local communities that possess a profound connection and reliance on marine environments. These areas should also exhibit abundant and diverse marine biodiversity and ecosystems that necessitate conservation efforts. Additionally, the presence of external factors that pose threats and pressures to both natural and human systems, as well as opportunities and support from various actors and sectors, are essential for facilitating and augmenting conservation endeavors [9]. The replication of Muro can be achieved through the adaptation of its features to align with the specific local context and culture of each area. This entails making adjustments to its zonation system, ritual system, and legitimation system in accordance with the unique needs and preferences of the local population. The replication of Muro can be achieved through the acquisition of knowledge and skills derived from its experiences and challenges [11]. This includes enhancing its awareness, knowledge, skills, resources, participation, coordination, monitoring, evaluation, and enforcement, as discussed by [7].

An instance of replicating Muro in different regions can be observed in the case of Lamalera, a village situated in Lembata Island, which exhibits a comparable practice of marine conservation known as Petu. Petu refers to the customary practice of managing the hunting activities of whales and dolphins by indigenous communities, which has been carried out for an extensive period of time. Petu employs a zonation framework to categorize the sea into four distinct zones: Petu Laki (designated for males), Petu Bini (designated for females), Petu Bocah (designated for children), and Petu Umum (designated for the general public). Each geographical zone is subject to distinct regulations and limitations pertaining to hunting practices and equipment categories. The Male Zone is characterized by stringent regulations, permitting solely the use of conventional harpoons. The designated area known as the Female Zone is exclusively allocated for the utilization of women and children, with the restriction that only fishing lines may be employed. The Child Zone is accessible to individuals of all skill levels in employing diverse fishing techniques, albeit subject to specific temporal and seasonal restrictions. The Public Zone allows external individuals to engage in contemporary fishing techniques, albeit subject to the condition of obtaining explicit authorization and being under constant supervision. Petu encompasses a range of ceremonial practices that symbolize the reverence and appreciation of the indigenous population towards their forebears and the natural environment. These rituals include Lamafa, which entails seeking permission and receiving blessings from the sea, Lamalera, which commemorates the initial catch of the fishing season, and Lama Hura, which involves the communal sharing and distribution of the catch within the community [8].

Petu has undergone a process of replication from Muro, wherein its characteristics have been adjusted to align with the specific context and cultural nuances of Lamalera. This adaptation has involved modifications to its zonation system, ritual system, and legitimation system, all of which have been tailored to cater to the local requirements and preferences. Petu has also undergone replication through the process of learning from Muro's experiences and challenges. This replication has involved enhancing various aspects of Petu, including its awareness, knowledge, skills, resources, participation, coordination, monitoring, evaluation, and enforcement. Petu has garnered acknowledgement and backing from customary and formal

establishments, including Kapitan Laki (Male Guardian), Kapitan Bini (Female Guardian), Kapitan Bocah (Child Guardian), and Kapitan Umum (Public Guardian), who bear the responsibility of implementing and overseeing Petu.

4 Conclusion

Muro is a traditional tool that has brought proof that man and nature are an inseparable union. As long as man is able to take responsibility and to safeguard his nature, then he is contributing in supporting the life of the Society. This is because man and nature are inseparable. The ideals, such as independence and sustainability, that are embodied in the muro are universal values that deserve to be copied and reproduced in all settings and regions. These values can be found in the muro. The author holds out hope that climate change can be averted by reviving cultural practices and putting them to use in a way that modifies the dynamic between humans and their natural surroundings.

References

- [1] Mongabay: Muro, Kearifan Lokal Lindungi Ikan dan Laut. Seperti Apa? (2022). Retrieved from <https://www.mongabay.co.id/2022/01/23/muro-kearifan-lokal-lindungi-ikan-dan-laut-seperti-apa/>
- [2] Pos-Kupang: Muro dan Cara Leluhur Lembata Wariskan Kearifan Lokal untuk Menjaga Laut (2022). Retrieved from <https://kupang.tribunnews.com/2022/03/02/muro-dan-cara-leluhur-lembata-wariskan-kearifan-lokal-untuk-menjaga-laut>
- [3] Media Indonesia: Muro di Perairan Desa Petuntawa, Merawat Keragaman Hayati Lembata (2022). Retrieved from <https://mediaindonesia.com/nusantara/484367/muro-di-perairan-desa-petuntawa-merawat-keragaman-hayati-lembata>
- [4] Mongabay: Wawancara dengan Benediktus Bedil: Menjaga Pesisir Pulau Lembata dengan Adat “Muro” (2022). Retrieved from <https://www.mongabay.co.id/2019/10/12/wawancara-dengan-benediktus-bedil-menjaga-pesisir-pulau-lembata-dengan-adat-muro/>
- [5] Ratnaningsih, M., Prasetyo L.B., & Suharsono: The Role of Local Wisdom in Marine Conservation: A Case Study of Lamatokan Village in Lembata Island Indonesia. IOP Conference Series: Earth and Environmental Science 253(1), 012035 (2019).
- [6] Nuraini S.R., Prasetyo L.B., & Suharsono: The Impact of Climate Change on Coastal Community Livelihood: A Case Study in Lamatokan Village Lembata Regency Indonesia. IOP Conference Series: Earth and Environmental Science 253(1), 012034 (2019).
- [7] Ramadani, D., E. Astari, A. A. Digdo, and P. Pulang: Integrating Indigenous Environmental and Scientific Knowledge for Ecosystem-Based Adaptation of Muro Practices on Lembata Island. P. 12041 in IOP Conference Series: Earth and Environmental Science. Vol. 1220. IOP Publishing (2023).
- [8] Samun, Leonardus Kenisah Cornelius, and I. Ketut Kaler: Konservasi sumber daya laut berbasis kearifan lokal (studi antropologi tentang fungsi muro di desa Kolontobo Kabupaten Lembata Nusa Tenggara Timur).” Jurnal Socia Logica 3(2):154–64 (2023).
- [9] Sirimorok, Nurhady, and Asfriyanto Asfriyanto: The Return of the Muro: Institutional Bricolage, Customary Institutions, and Protection of the Commons in Lembata Island, Nusa Tenggara. Forest and Society 4(1):61–80 (2020).
- [10] Stanis, Stefanus: Pengelolaan Sumberdaya Pesisir Dan Laut Melalui Pemberdayaan Kearifan Lokal

Di Kabupaten Lembata Propinsi Nusa Tenggara Timur (2005).

- [11] Wesso, Yuselvin Beo, Karolus B. Jama, and Margareta P. E. Djokaho. Bentuk Dan Fungsi Metafora Perempuan Dalam Ritual Adat Belo Tue Di Desa Ile Padung, Kecamatan Lewolema, Kabupaten Flores Timur.” *Jurnal Ilmiah Telaah* 7(2):221–26 (2022).