PAMALI : Pattimura Magister Law Review

Volume 5 Issue 1, March 2025: p. 200-210
E-ISSN: 2775-5649
https://fhukum.unpatti.ac.id/jurnal/pamali/index
: 10.47268/pamali.v5i1.3008

PAMALI: Pattimura Magister Law Review

Legal Protection of the Torem Tree (*Manilkara Kanosiensis*) as an Endemic Plant

Theresia Nolda Agnes Narwadan[1*], Muchtar Anshary Hamid Labetubun[2], Sabri Fataruba[3]

[1,2,3,] Faculty of Law, Universitas Pattimura, Ambon, Indonesia.
: theresia.narwadan@gmail.com
Corresponding Author*

Abstract

Introduction: *Yamdena Island, part of the Tanimbar Islands, Maluku, holds unique biodiversity, including the endemic Torem Tree (/Manilkara kanosiensis/). This tree has important ecological value as an ecosystem buffer, economic value for local communities through the use of its fruit and wood, and cultural value related to traditional traditions and rituals. However, the Torem Tree faces serious threats from deforestation, land conversion, and unsustainable exploitation, exacerbated by climate change. Inadequate legal protection status is a crucial issue.*

Purposes of the Research: *This study aims to analyze and evaluate the effectiveness of legal protection of the Torem Tree as an endemic plant on Yamdena Island.*

Methods of the Research: *The research method used is normative law with a statutory and conceptual approach. Data is obtained from related laws and regulations, legal literature, and relevant documents. Data analysis is carried out through legal interpretation, comparative analysis, and legal synthesis.*

Results Main Findings of the Research: *The findings of the study show that the existing legal framework has not effectively protected the Torem Tree. The legal loophole lies in the lack of specific regulations that recognize and protect the endemic status of the Torem Tree, as well as weak enforcement of the law against related violations. This study concludes the need to strengthen legal protection through comprehensive revision of laws and regulations, increased effective supervision and law enforcement, and increased active participation of local communities in conservation efforts. Policy recommendations include the establishment of a clear legal status for the Torem Tree, the development of a sustainable management plan based on local wisdom, and increasing public awareness of the importance of the conservation of the Torem Tree for the sustainability of the ecosystem and the welfare of the Yamdena community.*

Keywords: Legal Protection; Endemic Crops; Torem Tree.

Submitted: 2024-11-12 *Revised: 2025-03-20* *Accepted: 2025-03-28* *Published: 2025-03-31*

How To Cite: Theresia Nolda Agnes Narwadan, Muchtar Anshary Hamid Labetubun, and Sabri Fataruba. "Legal Protection of the Torem Tree (*Manilkara Kanosiensis*) as an Endemic Plant." *PAMALI: Pattimura Magister Law Review* 5 no. 1 (2025): 201-211. https://doi.org/10.47268/pamali.v5i1.3008

INTRODUCTION

Indonesia, as the largest archipelago in the world, is endowed with extraordinary biodiversity. This diversity includes a variety of unique ecosystems and thousands of species of flora and fauna, including invaluable endemic plants. Endemic plants, which are only found in certain geographical areas, play an important role in maintaining ecosystem balance, providing natural resources, and preserving the local wisdom of communities.[1] Endemic plants in Indonesia are regulated in various laws and regulations, ranging from the 1945 Constitution to regional regulations. The 1945 Constitution Article 28H paragraph (1) states that everyone has the right to live a prosperous life in birth and mind, to live, and

[1] Arun Agrawal, "Common Property Institutions and Sustainable Governance of Resources," *World Development* 29, no. 10 (2001): 1649–72, https://doi.org/10.1016/S0305-750X(01)00063-8.

to have a good and healthy living environment and to have the right to receive health services. This provision is the constitutional basis for environmental protection, including endemic plants.

Law Number 32 of 2024 concerning Amendments to Law Number 5 of 1990 concerning the Conservation of Biological Natural Resources and Their Ecosystems is a law that specifically regulates the conservation of biodiversity, including endemic plants. This law gives the government the authority to determine the types of plants and animals that are protected based on certain criteria. In addition, this law also regulates the management of conservation areas, such as national parks, nature reserves, and wildlife sanctuaries, which are important habitats for endemic plants.

Government Regulation Number 7 of 1999 concerning the Preservation of Plant and Animal Species is the implementing regulation of Law Number 5 of 1990. This government regulation establishes a list of protected plant and animal species, including some endemic plant species. Protection of protected plant and animal species includes the prohibition of capturing, killing, keeping, possessing, storing, transporting, and trading.

In addition to laws and regulations at the national level, some regions also have regional regulations that regulate the protection of endemic plants. These regional regulations are usually more specific and tailored to the conditions and characteristics of each region. For example, some regions have local regulations governing the protection of endemic plants that have important cultural or economic value to the local community.

However, the implementation of laws and regulations on the protection of endemic plants in Indonesia still faces various challenges. Some of these challenges include lack of coordination between government agencies, weak law enforcement, lack of public awareness, and limited resources. Therefore, more serious and comprehensive efforts are needed to increase the effectiveness of endemic plant protection in Indonesia.[2]

However, Indonesia's biodiversity is currently facing various serious threats. The high rate of deforestation, the conversion of land into plantations and settlements, as well as the impact of climate change that is increasingly felt, threaten the survival of endemic plants. The loss of endemic plants not only impacts the loss of potential natural resources that can be utilized for economic benefits and community welfare, but also threatens the delicate balance of ecosystems and local wisdom that is closely related to the existence of these plants.[3]

Yamdena Island, located in Tanimbar Islands Regency, Maluku Province, is one of the regions in Indonesia that has rich biodiversity, including unique endemic plants. One of the endemic plants that is characteristic of Yamdena Island is the Torem Tree (*Manilkara kanosiensis*). This tree has ecological, economic, and cultural value that is important to the local community.

The Torem tree has an important role in maintaining the balance of the ecosystem of Yamdena Island. Its roots help prevent soil erosion, its leaves provide shelter for wildlife, and its fruits are a source of food for many different types of animals. In addition, the wood of the Torem Tree is of good quality and is often used by the local community for building

[2] Tania Murray Li, *The Will To Improve: Governmentality, Development, and The Practice of Politics* (Durham: Duke University Press, 2007).
[3] Michael R Dove, "So Far From Power, So Near to The Forest: Cultural Politics and Resource Management In Indonesia," *Borneo in Transition: People, Forests, Conservation, and Development*, no. 41–58 (2015).

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

materials, boat building, and handicrafts. The fruit of the Torem Tree can also be consumed and has good nutritional value. However, the existence of the Torem Tree on Yamdena Island is increasingly threatened due to various human activities, such as illegal logging, land clearing for plantations and settlements, and unsustainable natural resource management practices. Therefore, legal protection of the Torem Tree is very important to preserve this plant and prevent extinction. These protection efforts require a comprehensive approach, involving the government, communities, and other relevant parties, and considering ecological, economic, and socio-cultural aspects.

LITERATURE REVIEW

A. Legal Protection of Endemic Plants

Legal protection of endemic plants is an integral part of efforts to preserve biodiversity and the environment. This concept is based on the recognition that endemic plants have unique ecological, economic, and cultural values and are vulnerable to various threats. Legal protection aims to provide legal certainty, prevent damage and extinction, and promote sustainable use.[4]

Conceptually, the legal protection of endemic plants includes various aspects, ranging from identification and inventory, determination of conservation status, regulation of utilization, to law enforcement against violations. Identification and inventory are the first steps to find out the types, distribution, and characteristics of endemic plants that need to be protected. Conservation statuses, such as "protected" or "endangered," are based on objective scientific criteria and serve as the basis for determining the level of protection required. Utilization regulation aims to ensure that the use of endemic plants is carried out responsibly and does not threaten their survival. Law enforcement is a last resort to crack down on perpetrators of violations of endemic plant protection regulations. The legal protection of endemic plants is also closely related to the concept of human rights to a healthy and sustainable environment. Everyone has the right to enjoy a clean, healthy, and sustainable environment, including the existence of endemic plants as part of biodiversity. Therefore, the state has an obligation to protect and preserve endemic plants in order to fulfill these human rights.

In addition, the legal protection of endemic plants is also in line with the principles of sustainable development, which emphasizes the importance of balancing economic, social, and environmental interests. The protection of endemic plants not only aims to preserve nature, but also to provide economic and social benefits for the community, especially local communities who coexist with these plants. The sustainable use of endemic plants can be a source of income and employment, as well as improve community welfare.[5]

B. The Torem Tree and Local Wisdom

Although specific research on the legal protection of the Torem Tree (*Manilkara kanosiensis*) is still limited, there are several relevant studies on the botany, ecology, and cultural aspects of the Torem Tree, as well as the role of local wisdom in preserving the environment on Yamdena Island. From the botanical aspect, research on the Thorem Tree

[4] Alan Bicker, Roy Ellen, and Peter Parkes, *Indigenous Enviromental Knowledge and Its Transformations: Critical Anthropological Perspectives* (London: Routledge, 2003), p. 25. https://doi.org/10.4324/9780203479568.

[5] Elinor Ostrom, *Governing The Commons: The Evolution of Institutions For Collective Action* (Cambridge: Cambridge University Press, 1990), p. 47.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

generally discusses the classification, morphology, and physical characteristics of this tree. These studies provide basic information that is important for understanding the identity and potential of the Torem Tree. From an ecological aspect, research on the Torem Tree highlights the role of this tree in maintaining the balance of the ecosystem of Yamdena Island. The Torem tree has an important role in preventing soil erosion, providing habitat for wildlife, and maintaining water quality. These studies show the importance of preserving the Torem Tree to maintain the sustainability of the Yamdena Island ecosystem.

From the aspect of cultural value, the Torem Tree has an important meaning for the indigenous people of Yamdena Island. The wood of the Torem Tree is used to make traditional houses, boats, and various other traditional utensils. The fruit of the Torem Tree is also used as a source of food and traditional medicine. These studies show that the Torem Tree is not just a plant, but also an integral part of the social and cultural life of the indigenous people of Yamdena Island.[6]

The local wisdom of the indigenous people of Yamdena Island also has an important role in preserving the Torem Tree. Indigenous peoples have traditional knowledge about how to sustainably utilize the Torem Tree, as well as conservation practices that have been passed down from generation to generation. These practices include the prohibition of cutting down the Torem Tree in certain areas, the timing of the felling, and the replanting of the Torem Tree.[7] Research on local wisdom in natural resource management in various regions in Indonesia shows that local wisdom can be a strong basis in formulating effective and sustainable environmental protection policies. Therefore, the integration of the local wisdom of the indigenous peoples of Yamdena Island in the protection policy of the Torem Tree is very important to ensure the success of conservation efforts.

METHODS OF THE RESEARCH

This research is a normative and empirical legal research. Normative legal research is carried out by examining laws and regulations [8] which is related to the protection of endemic plants, especially the Torem Tree. Empirical research was carried out by obtaining data from the field, namely through interviews and observations on Yamdena Island, to find out how the implementation of these laws and regulations in practice, as well as the role of local wisdom of indigenous peoples in protecting the Torem Tree. This research uses a statute approach, a conceptual approach, and a sociological approach. A statutory approach is used to analyze laws and regulations relevant to the protection of the Torem Tree. A conceptual approach is used to understand the legal concepts underlying endemic plant protection and local wisdom. A sociological approach is used to understand how the law interacts with communities, particularly the indigenous people of Yamdena Island, in the context of the protection of the Torem Tree.[9] The data sources in this study consist of primary data and secondary data. Primary data was obtained through in-depth interviews with traditional leaders, local government representatives, and members of the Yamdena Island community who have knowledge and experience related to the Torem Tree and local wisdom. Secondary data were obtained from relevant laws and regulations, official local government documents, research reports, scientific articles, and books relevant to the

[6] Fikret Berkes, *Sacred Ecology* (New York: Routledge, 2017), p. 78. https://doi.org/10.4324/9781315114644.
[7] D Michael Warren, *Indigenous Knowledge And Development Monitor* (Washington DC, 1993), p. 2.
[8] Peter Mahmud Marzuki, *Penelitian Hukum,* (Jakarta: Kencana, 2016).
[9] Anna Lowenhaupt Tsing, *Friction: An Ethnography Of Global Connection* (New Jersey: Princeton University Press, 2024), p. 34.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

research topic. This primary and secondary data will be used in a complementary manner to provide a comprehensive picture of the legal protection of the Tree of Torem. The data collection techniques used in this study were document studies and in-depth interviews. Document studies are conducted to collect secondary data from various written sources. In-depth interviews were conducted to dig up information from informants related to the research topic. Data collected from document studies and in-depth interviews were analyzed qualitatively. Data analysis was carried out using the content analysis method to identify important themes related to the legal protection of the Torem Tree. The data is interpreted and presented descriptively to provide a clear and comprehensive picture of the problem being studied. The results of this data analysis will be used to answer the problem formulation and formulate policy recommendations.

RESULTS AND DISCUSSION

A. Ecological and Economic Value of Torem Trees and Their Habitats

The Torem tree (*Manilkara kanosiensis*) is an endemic plant of Yamdena Island that belongs to the Sapotaceae family. This tree has distinctive physical characteristics, namely a straight and tall trunk, grayish-brown bark, and dark green and shiny leaves. The Torem tree can grow to a height of 20 - 30 meters with a trunk diameter of 80-100 cm. The leaves are elliptical, dark green, and arranged in a spiral at the end of the twigs. The flowers of Torem are small, yellowish-white in color, and grow in the armpits of the leaves. The fruit is round, reddish-brown in color when ripe, and has a sweet taste that is loved by the locals.[10]

The Torem tree has a relatively long life cycle. The tree takes years to reach mature size and produce fruit. The Torem tree usually flowers in the dry season and produces fruit in the rainy season. The fruit of the Torem Tree is round in shape with a size of about 5-7 cm and is brownish-yellow when ripe. This fruit has a sweet taste and can be consumed directly or processed into various types of foods and drinks.

The habitat of the Torem Tree is generally in the lowland forests of Yamdena Island, especially in areas with fertile soil and good drainage. This tree is often found growing together with other types of trees, such as the Merbau tree, the Matoa tree, and the Iron tree. The Torem tree can also grow in areas adjacent to the coast, but with more limited conditions.

However, based on the latest data, the population of the Torem Tree on Yamdena Island is declining due to forest encroachment and overexploitation. The conservation status of this tree has not been officially established at this time, but some experts estimate that the Torem Tree falls into the vulnerable or *endangered category* if there are no serious conservation efforts.[11]

The Torem tree has ecological value that is very important for the environmental sustainability of Yamdena Island. As a large tree, the Thorem Tree plays a role in maintaining the balance of the microclimate, providing shelter for various types of wildlife, and preventing soil erosion. The strong roots of the Torem Tree help to hold the soil back from landslides and erosion, especially in slope and riverbank areas. The dense leaves of

[10] A Oktavianus, *Keanekaragaman Hayati Pulau Yamdena: Studi Kasus Pohon Torem* (Ambon: Pattimura University Press, 2018).
[11] IUCN, "The IUCN Red List of Threatened Species. Version 2023-1," www.iucnredlist.org, 2023, https://www.iucnredlist.org/en.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

the Torem Tree also help reduce the impact of rain on the soil, thereby reducing the risk of flooding and erosion.

Ecologically, the Torem Tree plays an important role in maintaining the balance of the Yamdena forest ecosystem. Its strong roots are able to resist soil erosion, while its dense crown provides shade for a wide variety of flora and fauna. This tree is also a habitat for several endemic bird species, such as the Yamdena Ternet (*Trichoglossus weberi*) and the Tanimbar Cockatoo (*Cacatua goffiniana*).[12] In addition, the Torem Tree also plays a role in maintaining water quality. These trees help absorb rainwater and store it in the soil, thereby increasing the availability of clean water for the community and the surrounding ecosystem. The Torem tree also helps filter pollutants from the water, thus maintaining good water quality.

In addition to its ecological value, the Torem Tree also has significant economic value for the Yamdena people. Its hard, durable wood is often used as a building material and household furniture. The sweet fruit is also used as a source of food and drinks. The sap of the Torem tree also has the potential to be processed into industrial raw materials.[13] From an economic point of view, the Torem Tree has a high value for the people of Yamdena Island. Torem Tree wood has good quality and is durable, so it is often used as a building material for houses, boats, and various other types of equipment. The wood of the Torem Tree also has a high aesthetic value, so it is often used to make carvings and handicrafts. The fruit of the Torem Tree also has economic value. This fruit can be consumed directly or processed into various types of foods and drinks, such as jam, juice, and dodol. The fruit of the Torem Tree also contains nutrients that are good for health, so it can be an important source of nutrition for the community. The sustainable use of Torem Trees can provide significant economic benefits for the people of Yamdena Island. This utilization can be done by developing the wood handicraft industry, fruit processing, and ecotourism based on the Torem Tree. However, this use must be done carefully and responsibly, so as not to threaten the preservation of the Torem Tree and the surrounding ecosystem.

B. Practices of Protection and Preservation of Torem Trees by Indigenous Peoples

The indigenous people of Yamdena Island have rich local wisdom in preserving the environment, including the protection of the Torem Tree. This local wisdom is passed down from generation to generation through stories, rituals, and daily practices. Indigenous peoples have a deep understanding of the relationship between humans and nature, as well as the importance of maintaining ecosystem balance.[11] One of the practices of protecting the Torem Tree carried out by indigenous peoples is the determination of sacred or sacred areas. In these areas, the felling of trees, including the Torem Tree, is strictly prohibited. Violations of this prohibition are believed to cause disaster or catastrophe for the community. The designation of this sacred area is an effective way to protect the Tree of Torem from illegal logging. In addition, indigenous peoples also have customary rules that regulate the use of the Torem Tree. These rules include a ban on cutting down young or productive Torem Trees, restrictions on the number of trees that can be cut down, and the obligation to replant trees after they have been cut down. These rules aim to ensure that the use of the Torem Tree is carried out in a sustainable manner and does not threaten its sustainability.

[12] C R Trainor, *Birds of Wallacea: An Annotated Checklist* (Cambridge: BirdLife Internasional, 2011).
[13] Y Barnabas, "Pemanfaatan Pohon Torem (Manilkara Kanosiensis) Oleh Masyarakat Adat Yamdena," *Jurnal Kehutanan Tropis* 18, no. 2 (2015): 123–30.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

Empowering local communities in the management and conservation of Torem Trees is also very important. Local communities need to be actively involved in every stage of planning, implementing, and supervising conservation activities. Local governments need to provide training and assistance to local communities on good and correct conservation techniques, as well as provide incentives for communities to actively participate in conservation activities.[14]. Indigenous peoples also have traditional knowledge on how to care for and preserve the Torem Tree. They know how to choose good seedlings, how to plant the right trees, and how to maintain trees to grow healthy and productive. This knowledge is routinely practiced in agricultural and plantation activities. In addition to the above practices, indigenous peoples also have traditional rituals that aim to respect and ask for protection from nature, including the Torem Tree. These rituals are usually performed at important times, such as during harvest, when building a house, or when dealing with natural disasters. These rituals are a form of gratitude and dependence of indigenous peoples on nature. Local governments and other relevant parties need to recognize and support the Torem Tree protection practices carried out by indigenous peoples. The local wisdom of indigenous peoples can be a strong basis in formulating more effective and sustainable Torem Tree protection policies. The preservation of the Torem Tree on Yamdena Island faces various serious threats, both from natural factors and human activities. One of the main threats is deforestation or illegal logging. Illegal logging is carried out for various purposes, such as clearing land for agriculture, plantations, settlements, and the use of timber for sale. Illegal logging not only reduces the number of Torem Trees directly, but also damages their natural habitat.

Land conversion is also a serious threat to the preservation of the Torem Tree. The forests where the Torem Tree grows are often converted into agricultural land, plantations, or settlements. This land conversion causes the loss of habitat of the Torem Tree and reduces the ability of the ecosystem to support the life of the Torem Tree. In addition, climate change can also be a threat to the preservation of the Torem Tree. Climate change can lead to changes in rainfall patterns, increased air temperatures, and increased frequency of natural disaster events, such as floods and droughts. These changes can affect the growth, reproduction, and survival of the Torem Tree. The lack of public awareness about the importance of preserving the Torem Tree is also a factor that worsens the threat to the preservation of this tree. Some people still consider the Torem Tree only as a source of wood that can be used freely without thinking about its impact on the environment. Weak law enforcement against illegal logging and land conversion is also a serious problem. Perpetrators of environmental destruction often do not receive appropriate sanctions, so they do not provide a deterrent effect for other perpetrators. Therefore, more serious and comprehensive efforts are needed to address various threats to the preservation of the Torem Tree. These efforts include increasing oversight of illegal logging and land conversion, increasing public awareness of the importance of preserving the Torem Tree, and strict law enforcement against environmental destroyers.

C. Effectiveness and Policies of Laws and Regulations in Protecting Torem Trees

Existing laws and regulations in Indonesia, both at the national and regional levels, have provided a legal basis for the protection of endemic plants, including the Torem Tree. Law Number 32 of 2024 concerning Amendments to Law Number 5 of 1990 concerning the

[14] M I Entingan and J Gaspersz, "Pemberdayaan Masyarakat Dalam Pengelolaan Sumber Daya Alam Berkelanjutan Di Maluku Tenggara Barat," *Jurnal Pengabdian Kepada Masyarakat* 5, no. 3 (2020): 201–15.

Conservation of Biological Natural Resources and Their Ecosystems, Government Regulation Number 7 of 1999 concerning the Preservation of Plant and Animal Species, as well as relevant regional regulations, explicitly or implicitly regulate the protection of endemic plants. However, the effectiveness of these laws and regulations in protecting the Torem Tree still needs to be questioned. The results of the study show that the implementation of these laws and regulations in the field still faces various obstacles and challenges. One of the main obstacles is the lack of coordination between authorized government agencies. The protection of the Torem Tree involves various government agencies, such as the Ministry of Environment and Forestry, Local Governments, the Forestry Service, and other related agencies. This lack of coordination between agencies leads to overlapping authority, difficulties in supervision, and slow handling of cases of environmental destruction. In addition, weak law enforcement is also a serious problem. Perpetrators of illegal logging and land conversion often do not receive appropriate sanctions, so they do not provide a deterrent effect for other perpetrators. This is due to various factors, such as the lack of human resources and budget for law enforcement, as well as the existence of corrupt and collusion practices.

In addition, increased supervision and law enforcement are also the key to success. Local governments need to increase the capacity of law enforcement officials, such as forest police and civil servant investigators, as well as improve coordination between relevant agencies, such as the Forestry Service, the Environment Service, and the police. Strict monitoring of forest encroachment and illegal logging activities needs to be increased to prevent further damage.[15] The lack of public awareness about the importance of preserving the Torem Tree is also a factor that worsens the situation. Some people still consider the Torem Tree only as a source of wood that can be used freely without thinking about its impact on the environment. In addition, existing laws and regulations have not specifically regulated the protection of the Torem Tree. The Torem tree has not been included in the list of protected plant species based on Government Regulation Number 7 of 1999. This causes the Torem Tree not to get optimal legal protection. Therefore, more serious and comprehensive efforts are needed to increase the effectiveness of laws and regulations in protecting the Torem Tree. These efforts include increasing coordination between government agencies, increasing law enforcement, increasing public awareness, and drafting more specific regional regulations on the protection of Torem Trees. Legal protection for the Torem Tree on Yamdena Island is currently very limited. Although there is a Regional Regulation of West Southeast Maluku Regency Number 5 of 2010 concerning Environmental Protection and Management which regulates environmental protection, there is no article that specifically mentions or regulates the protection of Torem Trees. The Regional Regulations are more general in nature and only cover the protection of flora and fauna as a whole.

Evaluation of the effectiveness of the Regional Regulation shows that its implementation is still not optimal. Law enforcement against violations related to environmental destruction is still weak, and the lack of coordination between relevant agencies is also an obstacle in the implementation of environmental protection. In addition, the lack of socialization and

[15] R Tampubolon, "Efektivitas Penegakan Hukum Lingkungan Di Wilayah Pesisir Dan Pulau-Pulau Kecil," *Jurnal Hukum Lingkungan* 3, no. 2 (2016): 123–35.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

public understanding of the importance of environmental protection is also an inhibiting factor.[16]

When compared to other regions that have endemic plants, such as Papua Province with Matoa plants (*Pometia pinnata*), it can be seen that the policy of protecting endemic plants in Papua is more comprehensive and integrated. Papua Province has a special Regional Regulation that regulates the protection of endemic plants, namely Papua Provincial Regulation Number 21 of 2008 concerning the Management and Protection of Local Plants, including regulating sustainable use and involving the participation of local communities. The legal gap and implementation weakness in the protection of Torem Trees on Yamdena Island need to be addressed immediately. There is a need for revisions or amendments to existing Regional Regulations, or even the formation of new Regional Regulations that specifically regulate the protection of Torem Trees. In addition, increasing the capacity of law enforcement officials, increasing coordination between related agencies, and increasing public awareness are also key to success in efforts to protect the Torem Tree.

D. The Role of Local Wisdom in Facing the Challenges and Obstacles of Legal Protection of Torem Trees

The local wisdom of the indigenous people of Yamdena Island has a very important role in supporting the legal protection of the Torem Tree. This local wisdom is a knowledge, value, and practice that has been passed down from generation to generation, and has proven to be effective in preserving the environment, including the Torem Tree. Empowering local communities in the management and conservation of Torem Trees is also very important. Local communities need to be actively involved in every stage of planning, implementing, and supervising conservation activities. Local governments need to provide training and assistance to local communities on good and correct conservation techniques, as well as provide incentives for communities to actively participate in conservation activities.[17]

Indigenous peoples have a deep understanding of the relationship between humans and nature. They realize that nature preservation is an absolute requirement for their survival. Therefore, they have customary rules that regulate the sustainable use of natural resources. These customary rules include a ban on cutting down trees in sacred areas, limiting the number of trees that can be cut down, the obligation to replant trees after they have been cut down, and a ban on burning forests. Violations of these rules will be subject to severe customary sanctions, such as fines, exclusion, or even expulsion from the village. In addition, indigenous peoples also have effective conservation practices, such as community-based forest management systems and environmentally friendly traditional agricultural systems. These systems allow communities to make sustainable use of natural resources without harming the environment.

The local wisdom of indigenous peoples can be a strong basis in formulating more effective and sustainable Torem Tree protection policies. Local governments and other relevant parties need to recognize and support the Torem Tree protection practices carried out by indigenous peoples. The integration of local wisdom in the protection of the Torem Tree can be done by involving indigenous peoples in the decision-making process,

[16] A S Lekatompessy, "Implementasi Kebijakan Perlindungan Lingkungan Hidup Di Kabupaten Maluku Tenggara Barat," *Jurnal Ilmu Pemerintahan* 8, no. 1 (2017): 45–58.

[17] Entingan and Gaspersz, "Pemberdayaan Masyarakat Dalam Pengelolaan Sumber Daya Alam Berkelanjutan Di Maluku Tenggara Barat."

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

providing recognition of the traditional rights of indigenous peoples to natural resources, and supporting the development of community-based conservation programs, by combining local wisdom with modern legal approaches, the protection of the Torem Tree can be carried out more effectively and sustainably. This will provide benefits not only for indigenous peoples, but also for the entire Indonesian people and the world.

Efforts to protect the Torem Tree on Yamdena Island face various complex challenges and obstacles. One of the main factors causing the damage and extinction of these trees is the encroachment of forests for the clearing of agricultural land and settlements. This activity is often carried out illegally and uncontrollably, causing the loss of the natural habitat of the Torem Tree.[18] In addition, climate change is also a serious threat to the survival of the Torem Tree. Rising temperatures and changes in rainfall patterns can affect the growth and reproduction of these trees, as well as increase the risk of wildfires. This condition is exacerbated by unsustainable illegal logging practices, which further accelerate the destruction of the Yamdena forest ecosystem.

Conflicts of interest between conservation and economic utilization are also obstacles in efforts to protect the Torem Tree. Local communities often depend on forest natural resources, including the Torem Tree, to meet their economic needs. On the one hand, they need to utilize natural resources to survive, but on the other hand, overutilization can threaten the preservation of the Torem Tree. The lack of public awareness and participation in conservation efforts is also a problem that needs to be addressed. Many people do not understand the importance of protecting the Torem Tree and the long-term benefits of environmental conservation. In addition, lack of access to information and environmental education is also a factor causing low community participation in conservation activities.

CONCLUSION

Existing laws and regulations have not effectively protected the Torem Tree from various threats, such as deforestation, land conversion, and climate change. The implementation of these laws and regulations still faces various obstacles and challenges, such as lack of coordination between government agencies, weak law enforcement, and lack of public awareness. On the other hand, the local wisdom of the indigenous people of Yamdena Island has a very important role in supporting the protection of the Torem Tree. Indigenous peoples have knowledge, values, and practices that have been passed down from generation to generation, and have proven to be effective in preserving the environment, including the Torem Tree. Therefore, a more serious and comprehensive effort is needed to improve the legal protection of the Tree of Torem. These efforts include the preparation of regional regulations on the protection of the Torem Tree, the integration of local wisdom in protection policies, increased supervision and law enforcement, increased public awareness, and the development of ecotourism based on the Torem Tree.

REFERENCES

Agrawal, Arun. "Common Property Institutions and Sustainable Governance of Resources." *World Development* 29, no. 10 (2001): 1649–72. https://doi.org/10.1016/S0305-750X(01)00063-8.

[18] J T Latumahina, "Analisis Spasial Perubahan Penggunaan Lahan Dan Dampaknya Terhadap Keanekaragaman Hayati Di Pulau Yamdena," *Jurnal Pengelolaan Sumberdaya Lingkungan* 9, no. 1 (2019): 34–47.

PAMALI: Pattimura Magister Law Review, 5 (1) March 2025: 201-211
E-ISSN: 2775-5649
Published by: Postgraduate Program Master in Law, Universitas Pattimura

Barnabas, Y. "Pemanfaatan Pohon Torem (Manilkara Kanosiensis) Oleh Masyarakat Adat Yamdena." *Jurnal Kehutanan Tropis* 18, no. 2 (2015): 123–30.

Berkes, Fikret. *Sacred Ecology*. New York: Routledge, 2017. https://doi.org/10.4324/9781315114644.

Bicker, Alan, Roy Ellen, and Peter Parkes. *Indigenous Enviromental Knowledge and Its Transformations: Critical Anthropological Perspectives*. London: Routledge, 2003. https://doi.org/10.4324/9780203479568.

Dove, Michael R. "So Far From Power, So Near to The Forest: Cultural Politics and Resource Management In Indonesia." *Borneo in Transition: People, Forests, Conservation, and Development*, no. 41–58 (2015).

Entingan, M I, and J Gaspersz. "Pemberdayaan Masyarakat Dalam Pengelolaan Sumber Daya Alam Berkelanjutan Di Maluku Tenggara Barat." *Jurnal Pengabdian Kepada Masyarakat* 5, no. 3 (2020): 201–15.

IUCN. "The IUCN Red List of Threatened Species. Version 2023-1." www.iucnredlist.org, 2023. https://www.iucnredlist.org/en.

Latumahina, J T. "Analisis Spasial Perubahan Penggunaan Lahan Dan Dampaknya Terhadap Keanekaragaman Hayati Di Pulau Yamdena." *Jurnal Pengelolaan Sumberdaya Lingkungan* 9, no. 1 (2019): 34–47.

Lekatompessy, A S. "Implementasi Kebijakan Perlindungan Lingkungan Hidup Di Kabupaten Maluku Tenggara Barat." *Jurnal Ilmu Pemerintahan* 8, no. 1 (2017): 45–58.

Li, Tania Murray. *The Will To Improve: Governmentality, Development, and The Practice of Politics*. Durham: Duke University Press, 2007.

Marzuki, Peter Mahmud. *Penelitian Hukum,*. Jakarta: Kencana, 2016.

Oktavianus, A. *Keanekaragaman Hayati Pulau Yamdena: Studi Kasus Pohon Torem*. Ambon: Pattimura University Press, 2018.

Ostrom, Elinor. *Governing The Commons: The Evolution of Institutions For Collective Action*. Cambridge: Cambridge University Press, 1990.

Tampubolon, R. "Efektivitas Penegakan Hukum Lingkungan Di Wilayah Pesisir Dan Pulau-Pulau Kecil." *Jurnal Hukum Lingkungan* 3, no. 2 (2016): 123–35.

Trainor, C R. *Birds of Wallacea: An Annotated Checklist*. Cambridge: BirdLife Internasional, 2011.

Tsing, Anna Lowenhaupt. *Friction: An Ethnography Of Global Connection*. New Jersey: Princeton University Press, 2024.

Warren, D Michael. *Indigenous Knowledge And Development Monitor*. Washington DC, 1993.