

Local Wisdom of the Dayak Kenyah Customary Community in the Management of Tana Ulen in Kayan National Park, Mentarang, North Kalimantan

Njau Anau¹, Abdul Hakim², Amin Setyo Leksono³, Endah Setyowati⁴

Brawijaya University

Abstract: *In accordance with the nobility of the local wisdom of the DayakKenyah indigenous people in Long Alango Village, BahauHulu District, Malinau District, the indigenous peoples have known the concept of conservation for centuries or are more familiar with the term Tana 'Ulen. Tana 'Ulen in the language of the DayakKenyah Indigenous people means an area that is banned or has been imposed by someone's rights so that it is no longer free for other people to enter. Physically, Tana 'Ulen is a primary forest area along certain watersheds that are rich in natural resources of high economic value to the local community, and located not too far from the village. This study aims to describe and analyze comprehensively and in detail the local wisdom practices of the DayakKenyah indigenous people in the management of Tana 'Ulen, the impact of the local wisdom practices of DayakKenyah indigenous people in the management of Tanah Ulen in KayanMentarang National Park against deforestation, and models of local wisdom practices which can prevent deforestation. Data that has been collected through field observations and in-depth interviews (in-depth interviews), and documentation studies, then tested the validity and reliability. After that, it was analyzed using the data analysis technique of the Interactive Analysis Model (Mile, Huberman, and Saldana), namely the analytical method used for analysis of qualitative data obtained in the field and continuous reciprocity during the research. In its implementation, the method used is by integrating interactively and circularly between data collection, data condensation, data display, and then drawing conclusions and verification (drawing / verification). The study has the following conclusions, namely 1) The impact of the local wisdom practices of DayakKenyah indigenous people in the management of TanaUlen in KayanMentarang National Park on forest destruction can be identified as follows: (a) Community wisdom about forest management, namely the distribution of forest utilization zones. (b) TanaUlen can function as a 'granary' village so that the potential of forests in the KNP area can provide a sense of security and guarantee for the survival of the community both economically and socially to support the existence of the DayakKenyah indigenous people. 2) Factors that support the practice of local wisdom of the DayakKenyah indigenous people in the management of TanaUlen in KayanMentarang National Park are the active participation of indigenous peoples in applying local wisdom in their daily lives and this also has the support of indigenous peoples' representative forums and customary institutions. The inhibiting factors related to the Forestry Service have not been optimal in establishing communication and involving indigenous people in the management of TanaUlen in KayanMentarang National Park. 3) The model of local wisdom practices that can prevent forest destruction departs from the awareness of the community to respect their ancestors and continue to obey and not ignore ancestral advice that forests are part of their lives so they must be preserved. The real impacts that can be felt include the preservation of forests that are still maintained, the preservation of flora and fauna, maintaining the balance of ecosystems around the forest preventing deforestation, reducing potential disasters such as erosion and flooding, the beauty of natural forest charms, cleanliness of water sources, adequate water availability and avoidance from the problem of water difficulties so that the community's need for water can be fulfilled.*

Keywords: local wisdom, tanaulen, conservation

1. Introduction

The DayakKenyah Indigenous people in the village of Long Alango, BahauHulu Sub-district, Malinau District have known the concept of conservation or are more familiar with the term Tana 'Ulen. Tana 'Ulen in the language of the DayakKenyah Indigenous people means an area that is banned or has been imposed by someone's rights so that it is no longer free for other people to enter. Physically, Tana 'Ulen is a primary forest area along certain watersheds that are rich in natural resources of high economic value to the local community, and located not too far from the village. In the concept of Tana 'Ulen, the river was originally an area that was prohibited for the community to freely take fish. So, when there are guests in the village or there is a party, the people will easily get fish and other hunting products in the surrounding forest. Apart from that, in the Tana 'Ulen region, people are prohibited from cutting down trees, burning forests, making fields, and carrying out other

activities that cause forest destruction. Originally Tana 'Ulen was only owned by nobles in Long Alango, Long Uli, and Long Pujungan in Malinau District, North Kalimantan Province. The culture of environmental preservation of Tana 'Ulen in Long Alango in Malinau District is an example of the tightly harvested forest products in the Tana' Ulen region. DayakKenyah Indigenous People in Long AlangoMalinau District has a local wisdom system in managing forest functions, forest products that can be taken by the DayakKenyah Indigenous people in Long Alango, including gaharu (trees whose sap can be used for perfume), rattan, cinnamon, fruits, fish, and animals. The collection of Tana 'Ulen forest products by the DayakKenyah Indigenous people in Long Alango, Malinau District is only used at certain times, and is intended for public purposes, if there are activities in the village. While for personal consumption of local people, such as daily meals, they may find fish, vegetables, or hunt animals, but in limited quantities.



Figure 1: Map of KayanMentarang National Park

The existence of Tana 'Ulen in Long Alango in Malinau District often gets threats and there are problems with the spirit of environmental preservation by the DayakKenyah Indigenous people in Long Alango, Malinau District. This is related to the polemic that occurs because the government with its authority starting from the Minister of LHK, the Provincial and Regency Governments has repeatedly established areas of customary forests as protected forests, nature reserves, HTI areas, mining, and plantations without coordination with local indigenous communities. Government policy through the licensing system has sacrificed primary forests including the indigenous communities of Tana 'Ulen. Interference with Tana 'Ulen is not only from government policy but also from entrepreneurs and eagerness seekers from outside the region.

Greed and greed because of the desire to enrich themselves and groups that are not knowledgeable about environmental sustainability, are very damaging to the environment. The prospect of local wisdom in the future is strongly influenced by various government policies that are directly related to natural resource management, where the local community lives and the willingness of the community to maintain a balance with the environment despite facing various challenges. Therefore it is important to involve local communities in taking action in the environment in which they live to avoid social conflicts. Therefore local wisdom is important to be preserved in a community in order to maintain a balance with its environment and at the same time be able to preserve its environment. Based on the description above, the position, role and function of the local wisdom of the DayakKenyah indigenous people in Long Alango, Malinau Regency in managing environmental sustainability are still very relevant. Especially the local wisdom of indigenous people about the concept of environmental conservation that is in the KayanMentarang National Park area of Malinau Regency or who is more familiar with the term Tana 'Ulen. On this basis, the author is very interested in researching and studying the local

wisdom of indigenous people in the management of Tana 'Ulen in KayanMentarang National Park, Malinau Regency.

This study aims to describe and analyze comprehensively and in detail the local wisdom practices of the DayakKenyah indigenous people in the management of Tana 'Ulen, the impact of the local wisdom practices of DayakKenyah indigenous people in the management of Tanah Ulen in KayanMentarang National Park against deforestation, and models of local wisdom practices which can prevent deforestation.

2. Methods

The qualitative research approach is expected to enable researchers to fully and comprehensively describe the phenomenon examined in the DayakKenyah indigenous community, and more specifically the communities that live around the KayanMentarang National Park area, as described in detail in the research focus, so that in finally able to answer research problems that have been formulated and thus the research objectives can be achieved.

Data collection in this study was carried out through observation or observation, interviews and document tracking (documentation techniques). In the process of collecting data, a human approach between researchers and data sources (informants) became the main instrument in this study. By using informants as research subjects, data collection refers to the assumption that data sources can respond in the form of signs, adjustments, and responses to the environment.

Data collected was analyzed using Interactive Model data analysis techniques from Miles, Huberman, and Saldana (2014: 31-33), namely the analytical method used for the analysis process of data obtained in the field and moving reciprocally continuously during the research take place. In practice, the method used is to integrate interactively and

circularly between data collection (data collection), data condensation (condensation of data), data display (data presentation), and then draw conclusions and verification (drawing / verification).

3. Results

3.1 Local Wisdom Practices of DayakKenyah Indigenous Peoples in the Management of TanaUlen in Kayan Mentarang National Park

Local wisdom or local wisdom is one of the cultural investments that develop in local communities. Referring to the opinion of Koenjaraningrat (2008) that local wisdom can be reflected in various forms, such as ideas, ideas, values, norms and cultural conventions, whereas in social life it can be a religious system, social organization and system, knowledge system, livelihood system life and technology and equipment systems. Furthermore, with regard to religious meaning, forests are considered by the surrounding community as a place that contains sacred or magical values that influence the cultural system, and their social system is not only a physical environment but also has a spirit that will give a reaction that can hurt or harm if it is needed badly (Tjahjono, et al., 2000). Based on the two opinions above, then relating to local wisdom can be interpreted as indigenous culture that has been attached to indigenous peoples having certain values that are trusted and carried out continuously.

The practice of local wisdom is manifested in the management of tanaulen in KayanMentarang National Park (TNKM). The application of local wisdom is carried out by providing intact forests that can be enjoyed by their children and grandchildren in the current generation, and future generations (inheritance). The local wisdom practices of the DayakKenyah community in the management of TanaUlen in KayanMentarang National Park include customary rules, related ritual activities, utilization of TanaUlen forest products in KayanMentarang National Park.

3.2 The Socio-Economic Condition of Local Communities, Especially Those Living and Living Around National Parks

TanaUlen provides a new paradigm of forest management, namely benefiting from forests without destroying forests. Violations of the social will get sanctions, as well as sanctions from the community and from God. With these arrangements, over-exploitation of the biophysical environment can be avoided such as exploitation of forest resources. This arose due to anxiety from traditional leaders related to the existence of cultural elements in TanaUlen. However, with the entry of outsiders into the TanaUlen forest area, this raises its own concerns. These concerns have an impact on the sustainability of indigenous peoples' culture that has been preserved so far. So that, for the next generation, this cultural custom must be continuously preserved to preserve it. Therefore, certain efforts need to be made that can overcome these problems. Sustainable forest management or also termed sustainable forest management, has 3 characteristics or indicators, namely: (1) sustainability of production and forest services / benefits; (2) preservation

of the physical environment of the forest (land, flora, fauna, hydrology, and climate); and (3) the preservation of the social environment of the community (including social, economic and cultural) (Lindenmayer, et al., 2000; Sheppard and Meitner, 2005; Siry, et al., 2005; Kastanya, 2006).

Efforts made in overcoming the impact on the socio-economic conditions of the local community, especially those living and living around KayanMentarang National Park, refer to the opinions above, so what needs to be done are: (1) By conducting training related to the environment. This includes providing insights related to the introduction of protected animals; (2) training aimed at forest guides to become reliable, professional and competent natural forest guides by integrating local and modern safety techniques; (3) the middle class needs to provide foreign language courses, which are needed to explain the local language or traditions and customs around tanaulen; (4) workshops on the development of traditions such as local art in order to survive until the younger generation. For example local dance and music performances; and (5) community economic empowerment training especially for indigenous women.

3.3 Supporting and Inhibiting Factors of Indigenous Peoples, from Government (Regional) Policy and Other External Factors

The management policy of TanaUlen in KayanMentarang National Park in Malinau District contains an allotment of local conservation areas that can be developed by the community. One of the policies taken by the government is the formation of the TanaUlen management body (BPTU) with the intention of preserving the diversity of flora and fauna and the ecosystem in it, with limited regulation of natural resource use. With the presence of the TanaUlen Management Board (BPTU), the Malinau District government provides space for the community to manage conservation areas.

The management of tanaulen that has been carried out by the community is fully to fulfill their daily needs. Therefore, a comprehensive policy is needed to ensure the sustainability of the forest. Community needs for clothing, food and shelter are fully taken from the region. The legal recognition at the local government level of Malinau District for the efforts made by indigenous peoples to support conservation activities shows that there are regional policies to assist the DayakKenyah indigenous people in carrying out biodiversity conservation activities in KayanMentarang National Park (TNKM). From the aspect of the policy approach, the Malinau District Government tends to communicate less with the community. The division of roles and coordination is the main obstacle faced by the local government and the community in conducting tanaulen conservation in the kayanMentarang National Park (TNKM).

The policies made by the government should be supported and enforced by the government itself and the community who can provide input in the management of tanaulen in KayanMentarang National Park (TNKM). The concept of protection and preservation is an inherent and existing policy in tanaulen natural resource management in the

KayanMentarang national park. Community involvement provides a distinct advantage in managing natural resources, because people actually live around these natural resources. In fact, the indigenous DayakKenyah community is a particular religious content. Increasing the involvement of the community to protect the tanaulen area in the KayanMentarang National Park is very possible. Based on the discussion above, it is known that the supporting and inhibiting factors in the practice of local wisdom of the DayakKenyah indigenous people in the management of TanaUlen in KayanMentarang National Park are derived from internal and external factors. These factors must be followed up to maximize the preservation of natural resources through the practice of local wisdom in the KayanMentarang National Park (TNKM). Supporting factors must be implemented and acted upon and managed properly so that the management of tanaulen can be optimal. As for the inhibiting factors, it is necessary to immediately provide the right solution to minimize the existing constraints.

3.4 Recommended Models of Local Wisdom Practices in the Utilization of TanaUlen that Prevent the occurrence of Forest Damage

Forest damage arises when considering natural resources, especially forests, as a source of income that can be exploited. In addition, forest destruction can arise when there is no strict regulation from the local government. Therefore, efforts made in the management of national park forests to avoid forest destruction are by changing the mindset in the management of national parks around indigenous territories. Indigenous peoples are a major milestone in national park management policies and actions. The model drawings recommended in the practice of indigenous wisdom of indigenous peoples in the management of TanaUlen in KayanMentarang National Park (TNKM) are presented in the figure below.

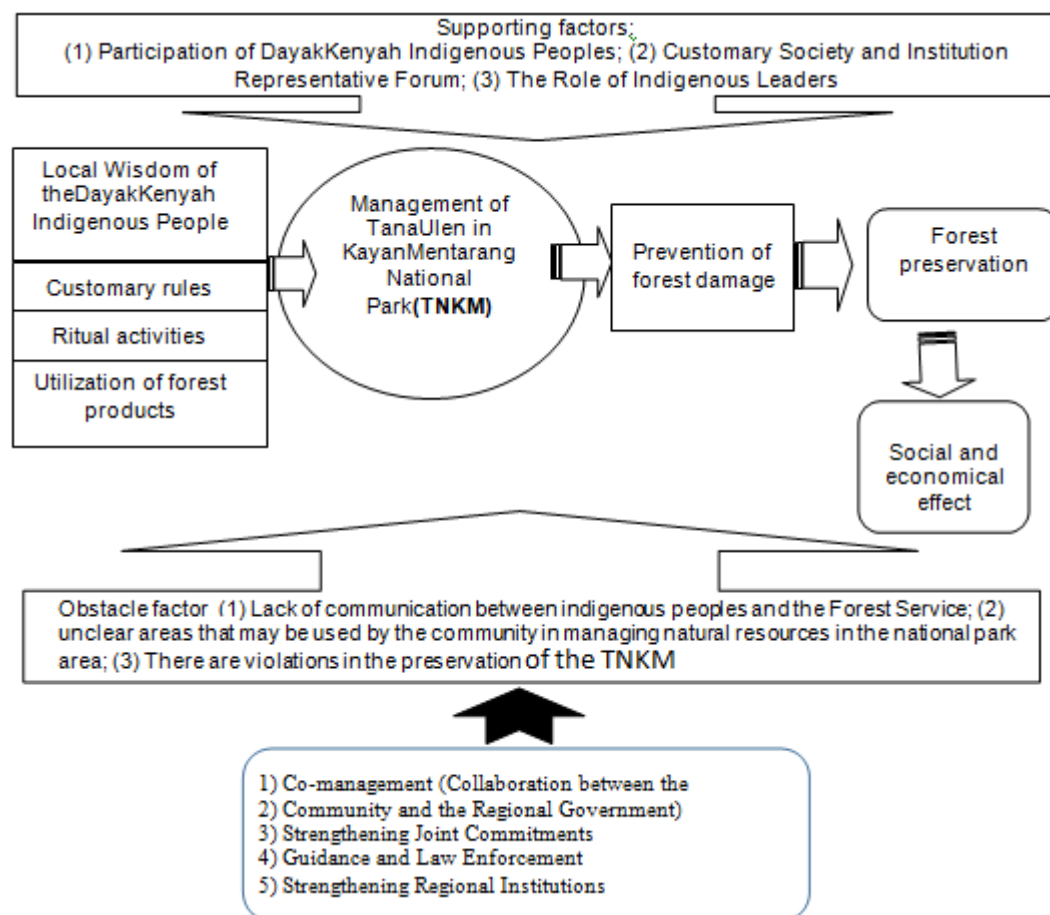


Figure 2: Recommended Models in Local Wisdom Practices in the Management of TanaUlen in Kayan National Park Mentarang (TNKM)

Based on the picture of the recommended model above, it can be seen that in the management of TanaUlen in KayanMentarang National Park (TNKM) there is local wisdom that is still held firmly by the indigenous DayakKenyah community. This local wisdom has existed since their ancestors and is still valid for generations until now. Local wisdom is seen in the form of rules - customary rules that must be obeyed by the surrounding community. The regulation was made to preserve the sustainability of TanaUlen in the KNP from the threat of forest destruction.

The traditional rules of the DayakKenyah community can be seen from (1) the results of tanaulen can be used by the surrounding community for a certain period of time, one year. The results are usually used such as at the celebration of the harvest party, the wedding party naming the newborn child and traditional parties. The next rule is (2) there are sanctions and fines for people who violate the rules set by indigenous peoples; (3) there are regulations that prohibit the results of levies from the sale and purchase; (4) all activities carried out in the tanaulen must obtain permission from the

head or traditional village head; and (5) the tanaulen forest area is not intended for residents outside the indigenous Dayak community and (6) it is prohibited to cut down carelessly or damage the TanaUlen area. From some of the customary rules, it is clear that this customary rule is made by the indigenous DayakKenyah community in accordance with local wisdom or culture that has been owned and must be obeyed by all the surrounding indigenous people to guarantee the preservation of KayanMentarang National Park (TNKM).

There are also factors that impede the practice of local wisdom, namely (1) lack of communication between indigenous peoples and the Malinau District Forest Service; (2) unclear areas that may be used by the community in managing natural resources in the national park area; and (3) There are violations in the preservation of the KMNP. Conditions as mentioned above, expect a solution in the management of TanaUlen. Indigenous people have high hopes for the forest. However, indigenous people still depend their lives on the forest products. These obstacles should be resolved properly and correctly. This needs to be done to avoid the occurrence of forest loss, such as illegal logging, forest fires and other things that can damage the forest and its ecosystem. The high desire of indigenous people to be able to protect their land is a key factor in conserving forests through the practice of local wisdom.

Therefore, certain solutions are needed to minimize these obstacles. The importance of balanced collaboration between indigenous peoples and the local government of Malinau District, through Co-management, which means joint management is expected to be able to balance the role in accordance with their respective functions. Both the functions of indigenous peoples, the functions of customary institutions, the functions of traditional leaders, and the functions of the local government to jointly manage TanaUlen in the KayanMentarang National Park (TNKM) as well as necessary to increase joint commitment for the sustainability of national park forests.

4. Conclusion

The study has the following conclusions, namely 1) The impact of the local wisdom practices of DayakKenyah indigenous people in the management of TanaUlen in KayanMentarang National Park on forest destruction can be identified as follows: (a) Community wisdom about forest management, namely the distribution of forest utilization zones. (b) TanaUlen can function as a 'granary' village so that the potential of forests in the KNP area can provide a sense of security and guarantee for the survival of the community both economically and socially to support the existence of the DayakKenyah indigenous people. 2) Factors that support the practice of local wisdom of the DayakKenyah indigenous people in the management of TanaUlen in KayanMentarang National Park are the active participation of indigenous peoples in applying local wisdom in their daily lives and this also has the support of indigenous peoples' representative forums and customary institutions. The inhibiting factors related to the Forestry Service have not been optimal in establishing communication and involving indigenous people in the

management of TanaUlen in KayanMentarang National Park. 3) The model of local wisdom practices that can prevent forest destruction departs from the awareness of the community to respect their ancestors and continue to obey and not ignore ancestral advice that forests are part of their lives so they must be preserved. The real impacts that can be felt include the preservation of forests that are still maintained, the preservation of flora and fauna, maintaining the balance of ecosystems around the forest preventing deforestation, reducing potential disasters such as erosion and flooding, the beauty of natural forest charms, cleanliness of water sources, adequate water availability and avoidance from the problem of water difficulties so that the community's need for water can be fulfilled.

5. Suggestion

There needs to be empowerment of communities around the forest in order to be able to manage the forest appropriately so that the benefits from the forest can be truly felt by the community. The local wisdom practices of the DayakKenyah indigenous people in the management of TanaUlen can be recommended as a model of sustainable forest management in Indonesia.

References

- [1] Agrawal, A., 2007. "Forests, governance, and sustainability: common property theory and its contributions". In *International Journal of the Commons*, 1(1), 111-136.
- [2] Cahaya, Andi, 2015. "Fishermen Community in the Coastal Area: A Note from Indonesian Poor Family". In *Procedia Economics and Finance* 26 (2015) 29-33.
- [3] Creswell, John W., 1994. *Research Design: Qualitative and Quantitative Approaches*. Thousand Oaks: SAGE Publications.
- [4] -----, 2013. *Research Design: Pendekatan Kualitatif, Kuantitatif dan Mixed*. Diterjemahkan oleh Achmad Fawaid. Yogyakarta: Pustaka Pelajar.
- [5] FAO, 2010. *Global forest resources assessment 2010: Main report*. Hutan untuk pelestarian. Jakarta: Bumi Aksara.
- [6] Griffiths, T., 2004. "Indigenous peoples, land tenure and land policy in Latin America". In *Land Reform, Land Settlement and Cooperatives*, 1, 46-63.
- [7] Hasbiah, Astri, 2015. "Analysis of Local Wisdom As An Environmental Conservation Strategy In Indonesia". In *Journal Sampurasun: Interdisciplinary Studies for Cultural Heritage*, Sampurasun e-Journal Vol 01, No. 01. December 2015.
- [8] Mayaux, P., Holmgren, P., Achard, F., Eva, H., Stibig, H. J., & Branthomme, A., 2005. "Tropical forest cover change in the 1990s and options for future monitoring". In *Philosophical Transactions of the Royal Society B: Biological Sciences*, 360(1454), 373-384.
- [9] Nathan, I., & Boon, T. E., 2012. "Constraints and options in local forest management in Cambodia: is decentralization a solution?". In *Journal of Sustainable Forestry*, 31(4-5), 396-420.
- [10] Ndoye, O., & Tieguhong, J. C., 2004. "Forest resources and rural livelihoods: the conflict between timber and non-timber forest products in the Congo Basin". In

Scandinavian Journal of Forest Research, 19(S4), 36-44.

- [11] Primyastanto, Mimit, 2014. "Fisheries Resource Management through Local Institutions in Empowering Community Based on Local Wisdom in Coastal Madura Strait". In *International Review of Social Sciences*, Vol. 2 Issue.5, 2014.
- [12] Purnomo, H., Mendoza, G. A., Prabhu, R., & Yasmi, Y., 2005. "Developing multi-stakeholder forest management scenarios: a multi-agent system simulation approach applied in Indonesia". In *Forest Policy and Economics*, 7(4), 475-491.
- [13] Priyono Tjiptoherijanto, 2001. *Perencanaan Pembangunan*. Bandung: Penerbit Tarsito.
- [14] Saatchi, S. S., Harris, N. L., Brown, S., Lefsky, M., Mitchard, E. T., Salas, W., Zutta, B.R., Buermann, W., Lewis, S.L., Hagen, S., Petrova, S., White, L., Silman, M., & Morel, A., 2011. "Benchmark map of forest carbon stocks in tropical regions across three continents". In *Proceedings of the National Academy of Sciences*, 108(24), 9899-9904.
- [15] Soemarwoto, O., 1999. *Analisis Mengenai Dampak Lingkungan Hidup*. Yogyakarta: Gadjah Mada University Press
- [16] Otto, Soemarwoto, 2004. *Buku Ekologi Lingkungan Hidup dan Pembangunan*. Jakarta: Djambatan.
- [17] Sunderlin, W. D., Angelsen, A., Resosudarmo, D. P., Dermawan, A., & Rianto, E., 2001. "Economic crisis, small farmer well-being, and forest cover change in Indonesia". In *World Development*, 29(5), 767-782.
- [18] Wollenberg, E., Moeliono, M., Limberg, G., Iwan, R., Rhee, S., & Sudana, M., 2006. "Between state and society: local governance of forests in Malinau, Indonesia". In *Forest Policy and Economics*, 8(4), 421-433.