

Analysis of Bissu Segeri's Role as an Environmental Communicator

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ABSTRACT

This study investigates the role of the Bissu, a traditional Bugis priestly figure, as an environmental communicator through the Mappalili ritual in Segeri, South Sulawesi. The problem addressed is the declining ecological relevance of traditional rituals amidst rapid modernization and technological changes in agriculture. The objective is to analyze how Bissu communicate environmental values through symbolic practices and assess their effectiveness using environmental leadership indicators: ecological vision, motivating others, exemplary leadership, effective communication, and goal orientation. A qualitative case study approach was employed, involving participatory observation, in-depth interviews, and document analysis. The findings reveal that while the Bissu maintain a strong cultural and symbolic presence in ritual leadership, their influence on practical agricultural and environmental practices has significantly diminished. Their role has shifted from active agents in environmental management to ceremonial figures. Although they promote traditional ecological wisdom, modern agricultural practices and the lack of institutional collaboration limit their communicative effectiveness. This research implies the need to integrate indigenous knowledge with contemporary environmental strategies through policy dialogue and community engagement to preserve cultural identity and promote sustainable development.

Keywords: Environmental Communication, Environmental Rhetoric, Bissu, Mappalili , Ecology

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INTRODUCTION

The ancient Bugis people had a tradition or belief that there were five genders in their lives. In addition to men (uroane) and women (makunrai), there is also celabai. (male who resembles a woman), calalai (female who resembles a man), and Bissu Suliyati (2018) Indonesian Azizah (2022):(Saleh et al., 2023) Bissu is a priest in ancient Bugis tradition who connotes a saint and acts as a liaison between the human world and the world of the Gods Rahayu (2021); (Yusran, 2018). Bissu are not sissy or sissy, because they do not wear clothes of one particular gender, but rather combine two sexes, male and female, in their appearance (Mulia, 2021). This can be seen from their clothing consisting of shirts (usually worn by men) and skirts (usually worn by women) which symbolize the combination of the sexes (Pattinama et al., 2020).

Bissu is a group found in several areas in South Sulawesi, Indonesia. Especially in Segeri, a sub-district in Pangkajene and Islands Regency, South Sulawesi, the Bissu group still carries out its role as traditional leaders, including leading the Mappalili Ritual (Suliyati, 2018). This ritual is an annual ceremony that is carried out as a means to preserve the environment, especially related to agriculture (Pattinama et al., 2020). Mappalili is the opening ritual of the rice planting season, which has a deep meaning in maintaining the balance between humans and nature, as well as efforts to maintain environmental harmony. Unlike Bissu in other areas in South Sulawesi, Bissu Segeri used to be a farmer who owned traditional rice fields and survived by farming (Hilmi et al., 2024). This is what makes the

Bissu in Segeri still trusted to be mediators in carrying out the ritual. The Segeri people believe that the Mappalili Ritual is a sacred ceremony that must be carried out, because when this ritual is not carried out, there will be reinforcements or crop failure (Saputra et al., 2023).

This approach is in line with environmental rhetorical theory which views cultural practices as an important tool in building ecological awareness and influencing public policies related to the environment (Senda-Cook et al., 2023). Environmental rhetorical theory emphasizes that environmental communication is not only limited to the dissemination of information, but also involves the formation of social identities and relationships through symbolic practices that influence people's views of the environment (Ahn, 2020).

In the context of this study, environmental rhetoric is not only part of ritual practices, but also a communication tool used by Bissu to interact with society. As part of a tradition that has lasted for centuries, Mappalili blends spiritual and ecological elements, reflecting the belief that humans are an integral part of nature, and that their actions have a direct impact on the balance of ecosystems (Paramita et al., 2021). With the increasing global awareness of the importance of environmental conservation, the analysis of environmental rhetoric in traditional rituals such as Mappalili is becoming increasingly relevant, especially from the perspective of communication science (Sri & Suyana, 2019). Environmental rhetoric in the context of traditional rituals such as Mappalili involves the use of language and symbolism to communicate ecological and sustainability values to communities (Hidayat & Kurniawan, 2023). Cultural rituals often serve as a means of environmental education that teaches the importance of maintaining the balance of nature through symbolism and meaningful actions (Darusman, 2014).

In the context of Mappalili, the environmental rhetoric used by indigenous leaders can also be seen as a form of narrative that connects communities with their natural landscapes, strengthening spiritual and ecological connections (Liu, 2021). This research focuses on Bissu's role as a leader in the Mappalili ceremony and how the practice of environmental rhetoric is applied. By implementing Effective Environmental Leadership indicators, including ecological vision, motivating others, exemplary leadership, effective communication, and goal orientation (Labu et al., 2024).

Despite significant allocations of village funds and development efforts, North Lampung Regency consistently ranks among the lowest in Lampung Province's Developing Village Index (IDM). From 2018 to 2023, no village in the regency has achieved "independent" status, with several sub-districts showing performance stagnation or decline. This persistent underperformance raises concerns about the effectiveness and equity of fund distribution, population management, and poverty alleviation policies at the village level (Endres, 2020).

Improving IDM is vital for achieving equitable regional development and reducing disparities among districts in Lampung Province. North Lampung, as one of the oldest regencies, risks being left behind without effective interventions. The stagnation of IDM performance could undermine national development objectives and widen the development gap with more advanced regencies like Central and South Lampung.

Moreover, ineffective use of village funds, misaligned with poverty levels and population density, can result in inefficiency and mismanagement of public resources. Accurate analysis and evidence-based strategies are urgently needed to redirect policies and funding mechanisms to achieve meaningful development outcomes in rural communities.

Ekawati et al. (2022) highlighted that appropriate utilization of village funds significantly influences IDM improvement by supporting empowerment programs tailored to community needs. Arina et al. (2021) found that village funds and their allocation had a partial but significant effect on IDM, suggesting the importance of fiscal governance at the village level.

Conversely, Halim and Taryani (2023) reported that the impact of fund allocation on IDM appears only after a time lag of two to three years, implying that the current evaluation models may not reflect long-term benefits. This insight points to the need for longitudinal analysis in evaluating development strategies.

Wibowo et al. (2024) showed that using village funds for BUMDes capital directly contributed to IDM growth, whereas general fund allocation did not, signaling a mismatch between fund disbursement and strategic use. Their findings stress the importance of aligning village-level fiscal policy with targeted development outcomes.

Most existing studies focus on individual factors such as village funds or population without integrating them into a comprehensive model. There is a lack of panel data analysis that simultaneously considers village fund allocation, population density, and poverty levels in one framework. Additionally, few studies examine stagnant performance in historically established regencies like North Lampung using a strategy formulation approach such as SWOT analysis.

This study introduces a novel analytical framework combining narrative descriptive analysis, panel data regression, and SWOT strategy formulation to assess and improve IDM in North Lampung Regency. It uniquely integrates socioeconomic variables into a comprehensive panel model while offering practical, location-specific development strategies to bridge the policy-performance gap.

This study aims to evaluate IDM trends and performance in North Lampung Regency from 2018 to 2023, analyze the effects of village funds, their allocation, population density, and poverty on IDM, and propose strategic interventions using SWOT analysis to improve village development performance.

The findings of this research provide valuable insights for regional governments, policymakers, and development planners. It helps refine the allocation of village funds, supports data-driven poverty alleviation strategies, and guides sustainable village development. The proposed strategic framework can also serve as a model for other underperforming regencies in Indonesia.

METHOD

This study uses a qualitative approach with a case study method. (Labu et al., 2024) (Budiaman et al., 2023) This approach was chosen to gain a deep understanding of Bissu's role as a communicator in communicating the environment in the Mappalili tradition. Furthermore, this research was conducted on the Bissu community in Segeri, Pangkep Regency, South Sulawesi. The subjects of the study are Bissu figures, local community members, and related parties involved in environmental communication practices in the area. The selection of subjects was carried out by the purposive sampling method to ensure that the informant had in-depth knowledge of the topic being researched.

The data collection was carried out through in-depth interviews and participatory observation of Bissu figures, as well as document analysis. Participatory observation will be carried out by participating in community activities involving Bissu in the perspective of environmental communication, both in traditional ceremonies and daily activities. The documents analyzed include historical records, customary literature, and reports of environmental activities involving the role of Bissu. Data analysis was carried out using six stages (Wibowo et al., 2024), namely interview transcripts, data coding, data correlation, data analysis and interpretation, literature review, conclusions and findings.

RESULTH AND DISCUSSION

The latest findings from this study show a shift in Bissu's role in the Segeri farming community, particularly related to agricultural practices and environmental rhetoric. Although

the Bissu remain revered as ritual leaders, their influence in the technical aspects of agriculture and environmental preservation has declined significantly. The following is a breakdown of the key findings:

a. The Role of Bissu is Only Limited to Traditional Rituals:

Bissu is now better known as a leader of traditional rituals than a decision-maker in agricultural practices. Rituals such as Mappalili are still carried out as a form of cultural preservation, but are no longer considered to directly affect agricultural output.

b. Shifting the Focus to Agricultural Technology:

Farmers in Segeri are increasingly relying on modern technology and scientific methods in their farming activities. Traditional Bissu advice on planting time and other agricultural practices has received less attention, as reliance on technology and science increases.

c. Social Change and Cultural Values:

Changes in social values in peasant societies also affect the role of Bissu. The younger generation tends to see Bissu as a guardian of cultural traditions, rather than as an authority figure in daily life, especially when it comes to agriculture and the environment.

d. Limitations of Environmental Rhetoric:

Bissu, once considered to play an important role in maintaining the balance of nature through rituals and spiritual advice, is now seen more as a symbolic figure. Their influence in inspiring and motivating the community to protect the environment is increasingly limited, especially with the shift in mindset towards efficiency and modernization.

e. Preservation of Agricultural Culture and Practices:

Although the Bissu remain an important element in traditional ceremonies, their role in agricultural practices and environmental preservation has diminished. This reflects a shift away from traditional values to a more pragmatic and science-based approach to farmers' daily lives. Overall, these findings suggest that although the Bissu are still respected in their capacity as ritual leaders and cultural symbols, their role in practical aspects such as agriculture and the environment is diminishing, reflecting broader changes in their communities and values.

This study aims to explore Bissu's role as the leader of the Mappalili ritual with an environmental rhetorical approach using five indicators, namely Ecological Vision, Motivating Others, Exemplary Leadership, Effective Communication, and Goal Orientation. The results of the study show the scope of Bissu's role as a communicator in local farming communities that still preserve and maintain customs from generation to generation:

1. Ecological Vision

The ecological vision is embedded in the ritual practice of Mappalili. This vision can be seen in the efforts of local farming communities to maintain a balance between humans and nature, as well as preserve natural resources for future generations. The Mappalili ritual which is carried out every year before the planting season is a representation of Bissu's ecological view who believes that a harmonious relationship between humans and the environment is the key to sustainable agriculture and community welfare. The use of Arajang, a traditional plow of royal heritage, in this ritual becomes a major symbol that reinforces the ecological message.

In the research findings, the ecological vision is not the goal communicated by the Bissu community in agricultural practices and environmental conservation. According to Puang Matoa, the main leader of the Bissu community, Bissu plays a central role in "mappinati", which is determining the right time to start farming activities. For Bissu, they have the ability to determine the right planting schedule based on hereditary knowledge, which they call "ompo". Moonlight or the Moon's movement.

This is the main concern of the community in the Bissu community and after that Bissu performs the Mappalili ritual which marks the beginning of the time to go down to the rice fields to plant rice. Furthermore, Bissu's role is not directly involved in agricultural practices and environmental sustainability from the practices carried out. However, the hereditary knowledge inherited by the Bissu people in agricultural practices is still embraced by the community to this day.

This finding was then strengthened by the perspective of Prof. Hafied Cangara, an academic who focuses on the study of environmental communication, where according to him the current Mappalili Ritual is only a form of cultural preservation rather than activities that have a direct impact on crop yields. According to him, currently there is no research that definitively shows the correlation between these rituals and agricultural productivity. Bissu as a form of local wisdom has undergone a shift in role. Although they used to be trusted as leaders who determined when was the right time to start agricultural activities, including rituals before going down to the rice fields. One of the characteristics that the Bissu people believe can affect agricultural productivity is the rain that falls when the Mappalili Ritual is completed

This is believed to be related to the availability of water and the success of farmers in that year's planting season. The community and the government also participated in the joy of welcoming the arrival of the planting season by voluntarily watering the plants to the participants who participated in the Mappalili procession using equipment in their homes and fire engines. An unusual thing that happened during the implementation of the Mappalili ritual in 2023 was that it did not rain as expected, so the water that soaked the participants only came from the community and fire engines. However, this does not dampen the enthusiasm of farmers and the community to welcome the start of the rice planting period. Prof. Bulqis, a scientist in the field of agriculture, attributed the phenomenon to the impact of climate change. This was emphasized by the youngest Bissu, namely Bissu Anca and the Head of Extension of the Pangkep Agriculture Office, Musaidah, who said that Bissu and farmers have been equipped with knowledge about the climate, including the understanding that every seven years there will be a long drought known as the El Nino phenomenon. Therefore, the community does not blame the Mappalili Ritual procession when after the procession there is no rain or there is a decrease in agricultural production, because they have understood that climate factors also play an important role in agricultural products. Furthermore, Prof. Bulqis added, the procession of farming in South Sulawesi in principle involves the local government and climate experts to determine the schedule for going down to the rice fields to farmers, which was discussed in the activity of "Tudang Sipulung" (a deliberation activity between the agriculture office and farmer groups attended by climatology experts). The goal is for every existing rice field to get enough seeds and water and avoid pest attacks.

However, regarding rain and the impact that can arise on agricultural activities from Bissu's point of view, as explained by Bissu Eka, the success of the ritual is highly dependent on the sacredness and use of halal ingredients. If after the ritual it does not rain, then it is considered that something is wrong in the preparation and implementation, one of the highlights is the use of non-halal funds that can damage the purity of the intention of the Bissu. Likewise, the Segeri people believe that if they do not carry out the Mappalili ritual, it can result in crop failure.

This belief is based on the assumption that the ritual is a hereditary mandate that must be maintained and its influence on agricultural products is considered very important. One of the important processions in the Mappalili ritual is the bathing of arajang, which is a traditional plow believed to be hundreds of years old, which is performed at the end of the ceremony. The Bissu believed that this procession could ensure the availability of sufficient water for the rice fields. However, from the Ministry of Agriculture's side, the current condition has changed

with the existence of a modern irrigation system. Farmers who have access to adequate water sources often choose to start farming activities early without having to wait for the Mappalili ritual. He added, if there is a crop failure, usually the main focus is the evaluation of agricultural extension workers, especially related to the effectiveness of the extension provided to farmer groups.

The problem that arises from the education carried out by agricultural extension workers is that the number of farmer groups is more than the number of agricultural extension workers, which indicates that there are challenges in the delivery of information and effective training. Until now, the Agriculture Office has not conducted in-depth communication with the Bissu regarding agricultural practices in Segeri District. This indicates the lack of dialogue between agricultural institutions and the Bissu community, and shows the weak role of Bissu as environmental communicators in preserving the environment.

From the perspective of Social Systems Theory Bissu can be considered as part of a traditional social system that can serve as an important custodian of local knowledge but from a communication perspective, Bissu is not able to act as an environmental communicator but only acts as a ritual leader. In the context of environmental rhetoric in Segeri Regency, due to the lack of interaction between the government, the Bissu community, and the community in agricultural activities, it leads to a knowledge gap that results in the application of environmental rhetoric not optimally. This happens due to differences in access to information, limitations in communication, and lack of resources to process the information received.

2. Motivating Others

Bissu's Environmental Rhetoric not only performs rituals as a form of traditional responsibility, but also as a tool to motivate local communities to care more about their environment. The rhetoric that Bissu uses in the Mappalili rituals, such as prayer and oral teachings, has succeeded in raising the collective awareness of the importance of maintaining the balance of nature.

Through charismatic and spiritual communication, Bissu seeks to mobilize the community to jointly protect the environment, especially in the context of sustainable agriculture. For Bissu Eka, Bissu plays an important role as a leader in agricultural activities, especially among the community and farmer groups. One of the ways Bissu motivates farmer groups is by providing instruction on natural farming methods that cover the entire process, from plant care to harvesting.

The community's belief in the role of Bissu in agricultural rituals is still very strong, especially seen in the tradition of "sessu" pasa, which is an activity that involves the community and market traders in the implementation of the Mappalili Ritual. For example, fish traders donate fish, vegetable traders provide vegetables, and various other necessities are provided by the local community as a form of support for the ritual.

In the practice of farming, Bissu teaches principles that emphasize harmony between humans and nature. They encourage farmers not to kill animals such as insects or rats that eat plants, but to move the animals elsewhere with the help of traditional spells. Natural methods such as fumigation using leaves that are not liked by the pest are used to maintain the balance of the ecosystem without damaging the environment. In addition, Bissu also taught effective ways to repel birds that eat rice by installing scarecrows or tau-tau and the use of metal roofs, which are environmentally friendly solutions.

For the community, the prayers taught by Bissu using the ancient Bugis language, such as the prayer exemplified by Bissu Eka when interviewed "O insect, don't be damaged here and go find halal sustenance elsewhere," not only serve as plant protection, but also as teachings that instill ecological values in daily life. In addition, Bissu also advocates limiting the use of modern tractors or plows, as such tools can damage soil particles that are important for soil fertility and stability, as well as potentially causing erosion. By blending traditional knowledge

and ecological values, Bissu not only guides communities in farming, but also promotes sustainable and environmentally friendly agricultural practices.

The challenge faced by Bissu in motivating young farmers is the difficulty of motivating young farmers to adopt agricultural principles that are closely related to the dynamics of the shift in the agricultural profession. According to the Head of Extension of the Pangkep Agriculture Office, Musaidah, there have been significant changes in the demographic and socio-economic structure of farmers.

In the past, becoming a farmer was a choice driven by geographical demands and an emphasis on the agricultural profession as the primary occupation. Today, individuals in agriculture are no longer limited to those who work as farmers; The agricultural profession is now carried out by individuals with diverse work backgrounds, such as teachers, police, and civil servants (Primayanti & Puspita, 2022).

These changes show that modern farmers tend to look for practical and efficient ways of farming. Along with the advancement of agricultural technology, such as the introduction of plant-based pesticides, it is necessary to evaluate the relevance of the traditional agricultural principles taught by the Bissu. Although the Bissu may resist the use of chemical pesticides and maintain traditional farming methods, it is worth considering whether these principles remain in line with changing weather and environmental conditions. In their role as environmental communicators, the Bissu use the power of stories to motivate and inspire farmers and the surrounding community to support and preserve traditional Mappalili practices and have been proven to be able to encourage the community to be involved in achieving the agricultural sustainability goals carried out by the Bissu. In the context of symbolic communication, the Mappalili ritual is still highly anticipated and is still the identity of the Segeri people to this day, especially in preparation for the start of the planting season.

3. Exemplary Leadership

In the context of agricultural customs and practices, Bissu is not only known as a spiritual leader, but also as a role model in environmental sustainability practices. The Bissu's leadership is reflected in their consistency in carrying out the Mappalili ritual for hundreds of years, demonstrating their commitment to preserving the customs and the environment. Bissu is a role model for the community in how the relationship between humans and nature must be maintained. Their inclusive leadership based on indigenous values is able to maintain their legitimacy in the eyes of the local community. Although many farmers have traditionally consulted Bissu regarding agricultural practices, the results of the study show that there is a tendency among new and young farmers to begin to doubt Bissu's authority. The Mappalili procession, which is an important ritual in Bissu agricultural practices, has undergone significant changes over time. Currently, the procession has undergone modifications compared to its implementation in the past, due to the reduction of procession equipment and limited funds according to Bissu Eka and Bissu Juleha. The decline in public enthusiasm for this procession has also led to a change in the practice. On the other hand, the Agriculture Office through agricultural extension workers does not adopt the Bissu farming method that has been passed down from generation to generation, because it is considered less efficient in increasing rice field productivity. The traditional method is considered to produce slow and low productivity. In addition, the Agriculture Office also has a farming concept that tends to be more modern.

On the other hand, the Bissu defend their practice on the grounds that it is an organic method that does not use chemical pesticides, which are considered harmful to the soil, plants, and human health. The Bissu view this approach as safer for the environment and health, although it may not be as efficient as modern agricultural technology in terms of productivity. The main challenge in this context is to balance the preservation of traditions and the efficient

application of agricultural technology, as well as to create a constructive dialogue between the Bissu and the Ministry of Agriculture to find solutions that accommodate both perspectives.

In the context of exemplary leadership, Bissu becomes a role model for others to inspire, motivate, and guide the community, especially farmer groups, to achieve maximum crop yields. By using symbolic interactions to build strong relationships, fictional narratives to inspire and motivate as examples of the use of organic fertilizers, and ecolinguistics to create awareness of the social and environmental impacts of the actions of peasant groups if they do not heed the Mappalili ritual procession. By combining these three approaches, Bissu can create an environment conducive to the balance of the agricultural ecosystem.

4. Effective Communication

Effective communication is one of the main keys in promoting environmental rhetoric that must be maximized by Bissu. In the Mappalili ritual, the Bissu use rich and meaningful symbols to convey ecological messages. The symbols used in such rituals, such as Arajang, are not only a means of communicating with nature, but also a medium to strengthen the ecological awareness of the community. The language used by the Bissu in this ritual is able to bridge the understanding between traditional values and the contemporary environmental challenges faced by modern society today. In terms of communicating agricultural ideas and practices, communication between the Bissu and the community is not carried out by all Bissu.

One of those who is still actively building communication with the community is Bissu women, Sanro Nisa. Sanro Nisa is believed by the community to have the ability to communicate with the Gods, thus playing an important role as a guardian of indigenous knowledge, especially in directing the general rules of agriculture and property layout in the Mappalili ritual. The effectiveness of Bissu communication can be assessed through various perspectives and indicators. One way to measure this effectiveness is to look at the level of community participation in the implementation of the Mappalili ritual. In this case, the community's contribution can still be seen from the high enthusiasm of residents in attending and contributing to fulfilling the elements in the implementation of the Mappalili ritual.

According to Prof. Bulqis, through "tudang sipulung", which is a forum or meeting that allows dialogue between stakeholders and the community, field facts are obtained that this activity functions as a means of discussing and disseminating messages, as well as assessing the response and participation of the community in the process of the beginning of the planting season without involving Bissu in it. Musaidah emphasized that effective communication can be measured more from the performance of agricultural extension workers in providing education to farmers.

The focus here is on the extent to which extension workers are able to transfer modern agricultural science and technology to farmers, and how this affects agricultural practices in the field. According to Prof. Cangara, the effectiveness of Bissu communication currently tends to function more as an effort to preserve culture. In this view, Bissu practices include the Mappalili ritual, considered a form of cultural heritage preservation effort although it may not always be in line with the practical needs and modern agricultural technology. In the context of agriculture, the role is not only limited to Bissu, but also involves significant contributions from local governments.

Bissu plays the role of a traditional guardian and distributor of cultural values in agricultural practices, especially through the implementation of rituals such as Mappalili. However, the effectiveness of modern agriculture depends not only on cultural practices, but also on the support and interventions carried out by local governments. Local governments, through institutions such as the Ministry of Agriculture, have a responsibility to provide agricultural education and technology needed to increase agricultural productivity and efficiency. This includes providing agricultural extension services, developing infrastructure such as irrigation, and introducing innovative agricultural technologies. In this regard, the role

of agricultural extension workers is crucial in transferring modern knowledge and techniques to farmers, and ensuring that relevant information reaches farmer groups. Local government involvement also includes assessing and evaluating the effectiveness of various farming methods, including traditional methods managed by Bissu.

The government needs to engage the Bissu people more deeply to understand their practices and evaluate the relevance and potential integration between traditional methods and modern agricultural technologies. Therefore, collaboration between Bissu and local governments is key to building effective communication that can create a holistic and sustainable approach to agriculture.

5. Goal Orientation

The Bissu have the main goal of obtaining maximum harvest through the implementation of the Mappalili ritual. They consistently remind the community and farmers that this ritual must be carried out to ensure optimal crop yields. The Bissu emphasized that failure to implement Mappalili could bring disaster. In addition, because the Bissu have the skill of "ompo uleng", which is the ability to see and interpret the position of the moon, the success of the Mappalili ritual and the success of the planting season depend heavily on determining the right time to go down to the rice fields and start farming activities (Jones et al., 2022).

The Bissu show a clear orientation towards the goals depicted in each implementation of the Mappalili ritual. The main purpose of this ritual is to ensure the sustainability of agriculture by determining the right time to plant rice based on nature's instructions.

Overall, the results of this study show that Bissu di Segeri, Pangkep, has a complex but crucial role in maintaining ecological balance through the environmental rhetoric they practice in the Mappalili ritual. Matoa emphasized the importance of rice seed care to ensure that the quality is maintained until the planting period, in order to maintain plant resilience and productivity. In an effort to protect the environment, Bissu promotes safe and pesticide-free farming practices. One of the practices taught is "mappanyawa", which is the process of resting the soil after planting. During this process, the soil is allowed to fertilize naturally, while cattle or other farm animals are released into the field to fertilize the soil organically through animal manure.

However, in the context of modern agriculture, there is a difference of opinion between Bissu and related parties such as Prof. Bulqis and the Ministry of Agriculture. According to Prof. Bulqis, currently there are new rice seed varieties that offer better quality and faster harvest times. The Department of Agriculture also encourages the use of superior seeds designed to meet high food needs, with the potential to be harvested two to three times a year.

On the other hand, Bissu, as Juleha expressed, rejects seeds developed by agricultural institutions. They argued that the seeds were not suitable for their soil conditions and that the results were unsatisfactory. Instead, Bissu prefer to use the traditional seeds they have, although production may be slower (Nurkamilah, 2018).

One of the reasons is that seeds from the Agriculture Office have a shorter expiration period, while seeds belonging to Bissu have a longer shelf life. In addition, there are differences in determining the rice planting day between Bissu and the local Agriculture Office, which can affect the timing and yield of the crop.

When it comes to tillage of the soil, Bissu prefers to use cows to plough fields. This practice is considered better for soil fertility because cow manure functions as an organic fertilizer and the soil becomes smoother and more even. Although this method is slower than using a tractor, Bissu argues that the benefits of organic fertilizer and the quality of soil dredging provide long-term benefits to soil health and crop yields.

Bissu's role as an environmental communicator in the farming community and the local community in Segeri who still believe in local culture and wisdom is very significant, especially in the context of starting the planting season early. In other matters, such as farming

practices, problems faced by farmers, modernization of agricultural tools and seeds, and so on, the role of Bissu has begun to disappear or be marginalized. Some aspects that can be recommended for Bissu to encourage a more effective and optimal role in preserving local traditions and wisdom, namely:

1. Local wisdom often contains sustainability practices that have stood the test of time. Bissu as an environmental communicator understands this and strives to combine local wisdom with modern scientific approaches that can be obtained by discussing with scientists and practitioners and opening himself up to accept scientific approaches, thereby creating more comprehensive and sustainable environmental solutions.
2. The modern and digital era has eroded the practices carried out by Bissu. Bissu leaders can play an important role in documenting, promoting, and preserving local wisdom through various digital platforms. This not only helps protect culture and traditions, but also promotes these practices as alternative solutions to environmental problems.
3. In recent years, Bissu has often been faced with various internal and external interests that are not always in line with the principles of agriculture that have been practiced. Bissu should serve as a facilitator of dialogue between indigenous peoples and external parties, to ensure that indigenous peoples' views and needs are taken into account in decision-making that impacts their environment.
4. The current weakness of Bissu is that they are more passive in the dynamics that occur in their communities, whereas as indigenous leaders, Bissu have to voice their aspirations on a wider stage. Bissu must be able to bring local perspectives into national and international dialogues to help ensure that environmental policies support their sustainability and well-being.
5. The development of technology plays a big role in reducing people's interest, especially the younger generation who are starting to lose interest in traditional knowledge, one of the reasons is that they do not see its relevance to their lives in the modern era. Therefore, it is important for Bissu to be involved in teaching local wisdom directly to the younger generation. So that they have the opportunity to appreciate and understand the importance of their traditions. Globalization has made many young people feel disconnected from their cultural identity. Bissu can be a bridge to increase awareness of the cultural identity of the younger generation.

CONCLUSION

In the peasant community in Segeri, the role of Bissu has changed quite significantly from time to time, from previously considered as spiritual leaders and organizers of agricultural activities, now their role is more limited to the implementation of traditional rituals alone. As a ritual leader, Bissu is still recognized as an important figure who has the authority to carry out traditional processions, especially the Mappalili ritual which marks the start of the rice planting season. However, along with the development of agricultural technology and social changes in society, Bissu's role in determining agricultural practices began to fade. Although Bissu are still respected in their capacity as traditional guardians, their authority in the technical aspects of agriculture is now diminishing. Modern farmers tend to rely more on efficient farming methods and technologies than on the traditional advice given by Bissu. Nevertheless, the rituals they lead are still carried out as a form of cultural preservation and respect for ancestral heritage. Bissu, who was once seen as a figure who was able to bridge the world of humans and nature, now functions more as a cultural symbol than as an environmental communicator or determinant of agricultural success. Their practices, such as the Mappalili ritual, are seen more as part of a festive traditional ceremony, rather than as an activity that directly affects agricultural yields. In this context, Bissu are important figures in maintaining cultural sustainability, but their involvement in the practical aspects of farming life is

diminishing. Although they remain respected in their capacity as ritual leaders, their influence in agricultural decision-making and environmental conservation is no longer as strong as before.

REFERENCES

- Ahn, C. S. (2020). Considering the role of documentary media in environmental education. *Journal of the Canadian Association for Curriculum Studies*, 17(2), 67–79.
- Azizah, N. (2022). Agama dan Tradisi: Pergumulan Bissu'Masyarakat Bugis di Sulawesi Selatan. *Jurnal Penelitian Keislaman*, 18(1), 63–72.
- Darusman, Y. (2014). Kearifan Lokal dan Pelestarian Lingkungan (Studi Kasus di Kampung Naga, Kabupaten Tasikm. *Jurnal Pendidikan Dan Kebudayaan*, 20(1), 140–154.
- Endres, D. (2020). Environmental criticism. *Western Journal of Communication*, 84(3), 314–331.
- Hidayaht, A. N., & Kurniawan, N. (2023). Local wisdom in agricultural management of the Samin indigenous peoples, Indonesia. *IOP Conference Series: Earth and Environmental Science*, 1190(1), 012018.
- Hilmi, A. Z., Giswandhani, M., Saleh, R., & Saade, A. R. (2024). Pandora's Box in Mappalili: Exploring Environmental Rhetoric and Cultural Communication in the Bugis Community. *Humaniora*, 15(2), 161–165.
- Jones, M., Beveridge, A., Garrison, J. R., Greene, A., & MacDonald, H. (2022). Tracking memes in the wild: Visual rhetoric and image circulation in environmental communication. *Frontiers in Communication*, 7, 883278.
- Labu, N., Widianarko, Y. B., & Utami, M. S. S. (2024). Effectiveness of Environmental Leadership Indicators Based on Local Wisdom in Development Horticultural Agriculture in Ngada-Indonesia. *Asian Journal of Engineering, Social and Health*, 3(5), 804–893.
- Liu, L. (2021). Prisms of Pathos: Environmental Memes as a Public Rhetorical Strategy in the Example of Haze-Related Duanzi in China. *6th Annual International Conference on Social Science and Contemporary Humanity Development (SSCHD 2020)*, 979–989.
- Mulia, H. R. (2021). Gender dan Orientasi Seksual Waria: Faktor Pembentukannya pada Lingkungan Keluarga. *Journal An-Nafs: Kajian Penelitian Psikologi*, 6(1), 55–67.
- Nurkamilah, C. (2018). Etika lingkungan dan implementasinya dalam pemeliharaan lingkungan alam pada masyarakat Kampung Naga. *Jurnal Studi Agama-Agama Dan Lintas Budaya*, 2(2), 136–148.
- Paramita, E. P., Safitri, B. V., Miharja, D. L., & Suadnya, I. W. (2021). Environmental communication in local cultural traditions as a form of mitigation of global climate change. *Proceedings Of International Conference On Communication Science*, 1(1), 50–58.
- Pattinama, A. J., Mawara, J. E. T., & Mamosey, W. E. (2020). Eksistensi Komunitas Bissu Pada Masyarakat Desa Bontomatene Kecamatan Segeri Kabupaten Pangkajene Kepulauan Sulawesi Selatan. *HOLISTIK, Journal of Social and Culture*.
- Primayanti, N. W., & Puspita, V. (2022). Local wisdom narrative in environmental campaign. *Cogent Arts & Humanities*, 9(1), 2090062.
- Rahayu, N. W. S. (2021). Eksistensi Pendeta Bugis (Bissu) Dalam Kebertahanan Tradisi Di Kecamatan Segeri. *Widya Genitri: Jurnal Ilmiah Pendidikan, Agama Dan Kebudayaan Hindu*, 12(3), 166–176.
- Saputra, Y. W., Goma, E. I., & Sandy, A. T. (2023). The Mappalili Tradition as a Form of Maintaining Agricultural Culture in South Sulawesi (Cultural Geography Perspective). *Santhet (Jurnal Sejarah Pendidikan Dan Humaniora)*, 7(1), 181–189.
- Senda-Cook, S., Endres, D., Sowards, S. K., & McGreavy, B. (2023). Engaging complex temporalities in environmental rhetoric. *Frontiers in Communication*, 8, 1176887.

- Sri, L., & Suyana, U. M. (2019). The effect of local government own revenue and revenue sharing funds on economic performance and community welfare through capital expenditure of regency/city in Bali Province, Indonesia. *Russian Journal of Agricultural and Socio-Economic Sciences*, 91(7), 67–87.
- Suliyati, T. (2018). Bissu: Keistimewaan gender dalam tradisi Bugis. *Endogami: Jurnal Ilmiah Kajian Antropologi*, 2(1), 52–61.
- Wibowo, A., Suwanto, S., Lestari, E., & Rahayu, R. (2024). A watershed sustainability model based on the integration of livestock, conservation agriculture, and local wisdom in Indonesia. *IOP Conference Series: Earth and Environmental Science*, 1292(1), 012030.