



Cassava-Themed Conversation Using Banjar Language: A Local Wisdom-Based Ethnobotany Education

Rissari Yayuk

National Research and Innovation Agency, Jakarta, Indonesia
yrissariyayuk@yahoo.co.id

Abstract. This study described conversations on the theme of cassava in the Banjar language as an approach to ethnobotany education based on local wisdom. Conducted from January to May 2024, the research employed a descriptive qualitative method, using observation, interviews, and literature review for data collection, along with recording and documentation. Data analysis included sorting, analyzing, presenting, and drawing conclusions. Based on ethnobotany and anthropolinguistics within an ethnographic framework, the study examined conversations among residents of Banjar, Banjarbaru, Tanah Laut, and Banjarmasin in South Kalimantan. The findings highlighted topics related to cassava, such as planting methods, uses of leaves (culinary, animal feed, children's games), benefits of stems, and cassava processing (e.g., chips, crackers). Ethnobotanical education on cassava underscored the preservation of archaic vocabulary, documentation of Banjar ethnobotanical knowledge, and the use of cassava as a food source, nutritional and economic resource, and a foundation for creativity and innovation within the Banjar community.

Keywords: Anthropolinguistics, Banjar, Education, Ethnobotany, *Gumbili*.

1 Introduction

Cassava, known locally as *gumbili*, is a staple plant that thrives in South Kalimantan and has long supported the Banjar community's livelihood through its versatility as a food source and economic commodity (Yayuk et al., 2024). Traditionally, cassava has been integral to Banjar culture, with stories, recipes, and practices surrounding its planting, harvesting, and cooking becoming part of everyday life. However, increasing urbanization has led to a decline in its cultivation within accessible areas, relegating cassava to more remote gardens and limiting younger generations' exposure to this valuable plant. This trend, combined with the popularity of instant, modern foods, has caused a cultural shift; fewer people, especially younger individuals, are familiar with preparing or consuming cassava-based dishes (Alfisyah, 2019). Bella et al. (2022) highlighted that socio-cultural shifts and educational factors have further accelerated the decline in knowledge about local plants. In contrast, cassava remains essential in countries like Nigeria, Ethiopia, Sudan, and Brazil, where it continues to support both economic and cultural practices.

This study sought to highlight the significance of cassava by examining its various uses and cultural importance within the Banjar community. By investigating how cassava is utilized, discussed, and valued from the Banjar perspective, the research aimed to raise awareness about the plant's role beyond food, emphasizing its place in cultural identity. Cassava knowledge, transmitted through the Banjar language, serves as a form of ethnobotanical education that could inspire future generations to innovate in cassava-related practices. Ethnobotany, which investigates how cultural practices shape plant use (Salsabila, 2021; Cacatian & Tabian, 2023), forms the theoretical basis for this work. While prior research has explored cassava's dietary and economic role in other cultures, such as Sundanese and Brazilian societies (Irawan et al., 2024; Lima et al., 2022), few studies have focused on the educational value of ethnobotanical conversations in Banjar culture. This study addressed this gap by documenting these cassava-themed discussions, aiming to strengthen regional cultural identity and preserve the community's traditional knowledge.

The research questions focused on identifying conversation topics related to cassava in the Banjar language and understanding the ethnobotanical educational value these topics provide. The goal was to document these conversations to support local knowledge and identity. Ethnobotany reveals plant-based cultural practices, while anthropolinguistics connects language with cultural knowledge (Alfayed & Riefani, 2022; Prasetyo et al., 2020). From an ethnobotanical perspective, knowledge about cultivating and using cassava enriches Banjar's socio-cultural life. Meanwhile, an anthropolinguistic approach helps preserve this knowledge by integrating it into daily conversations in the Banjar language, which enhances cultural continuity.

This study highlights the Banjar community's knowledge on cassava within its cultural context, emphasizing the importance of the Banjar language for discussing *gumbili*. Findings offer insight into cassava's uses and suggest that ethnobotanical conversations can serve as educational media for preserving language and local wisdom. The results can enrich educational resources and support regional identity, demonstrating the potential of local language conversations to document and sustain local wisdom. For the Banjar community, these findings show how preserving local wisdom through language can strengthen regional identity and cultural heritage.

2 Method

The research method used was descriptive qualitative, with data collection aligned to field findings and presented descriptively. Research techniques included observation, semi-structured interviews, and literature and document studies. Observation helped determine the study location, while interviews, both pre-written and spontaneous, focused on planting, processing, and utilizing cassava using the Banjar language. Interviews were conducted informally among Banjar speakers discussing cassava. Informants were drawn from the researcher's close environment in Banjar, Banjarbaru, Tanah Laut, and Banjarmasin Regencies. Initial observations indicated that these areas still had Banjar generations managing cassava according to traditional knowledge and cultural practices. Data collection took place from January to May 2024, with a literature

study adding references on cassava's socio-cultural role in Banjar life. Documents were used to reinforce field data through recordings and visual documentation of cassava planting and processing. These data collection techniques provided essential information to answer research questions, following sorting and interpretive analysis.

This study faced challenges in data acquisition and sourcing written materials, despite the Banjar community's broad distribution across 13 districts in South Kalimantan. A significant amount of local knowledge embedded in cassava-related conversations within the Banjar language has yet to be documented, highlighting the need for detailed ethnobotanical studies. The research methodology involved several stages: initial observation, comprehensive data collection, systematic sorting, detailed analysis, organized presentation, and conclusion. While the primary data was gathered through Banjar-language interactions, it was presented in Indonesian to convey key insights more broadly. An ethnographic approach was employed, allowing the researcher to directly participate in and observe various cassava management practices within the Banjar community. To ensure data accuracy, time and place triangulation techniques were applied. Creswell (2007) emphasizes that ethnographic research involves a close examination of a community's behaviors, language, and customs. These components were carefully interpreted by the researcher, enhancing the study's value as a qualitative educational resource and offering insights that can be used for learning and cultural preservation.

3 Findings and Discussion

Based on the research results, various topics related to *gumbili* (cassava) were found in Banjar language conversations. Embedded within these discussions are ethnobotanical values that convey knowledge and wisdom about cassava, reflecting the cultural insights of the Banjar community.

3.1 Topics of Banjar Language Conversation on the Theme of *Gumbili* Cassava Based on Local Knowledge

The topic of *gumbili* (cassava) encompasses several aspects, from planting and cultivation methods to the diverse uses of its leaves, stalks, stems, and tubers. Among these, the use of cassava tubers stands out as particularly important in the traditional knowledge system of the Banjar community. This knowledge reflects a blend of agricultural practices and cultural values, as cassava is not only a staple food but also part of rituals, local cuisine, and daily life. The following provides an overview of how cassava is utilized by the Banjar people, highlighting its role in food preparation, community traditions, and practical applications. This rich cultural knowledge passed down through generations, demonstrates cassava's central role in both the livelihoods and cultural identity of the Banjar community.

Through discussions with the Banjar community, traditional methods for planting cassava were identified. Cassava stems are cut into approximately 25 cm sections and planted in holes prepared with a hoe, with planting ideally taking place during the rainy

season. The plants require maintenance for 6–7 months before they can be harvested, and fertilizers made from animal waste are commonly used.

After harvest, some cassava stems are set aside for seeds, while others are discarded. Discarded stems often produce new shoots and dense leaves shortly after being left on the ground. In some cases, fallen cassava stems may even grow upright branches. However, this type of growth typically does not yield substantial tubers because the stem tip is not firmly embedded in the soil, limiting its potential for tuber production.

Cassava leaves serve multiple culinary purposes within the Banjar community, commonly used in dishes like *lalapan* (fresh salad) and *urap* (vegetable salad) or in stir-fried preparations. Before consumption, the leaves are first boiled: they are added to boiling water with a pinch of salt and uncovered. After boiling, the leaves are quickly transferred to cold water to retain their vibrant green color and tenderness. Once blanched, they are squeezed dry and are then ready for further preparation or immediate serving.

Cassava comes in various types, distinguishable by stem color—red, green (often called white), *jawau gumbili*, and *karet gumbili*. The *jawau* and *karet* varieties are known for their softer texture when boiled, making them preferable for cooking compared to the red and green-stemmed types. Cassava leaves are also used as animal feed, particularly for livestock like goats and cows, offering a sustainable option that includes both young shoots and mature leaves.

Cassava leaves are versatile and can be used as a nutritious feed for livestock such as goats and cows. Unlike some plants that are only partially consumable, cassava leaves allow for both young shoots and mature leaves to be used as animal feed. The young shoots are more tender, making them easier to chew, while the older leaves, although tougher, provide additional bulk for animal diets. This makes cassava a valuable resource in areas where livestock feed is sourced locally, as it provides continuous food for animals without requiring extensive processing or supplemental feed. Additionally, cassava plants regenerate quickly; once shoots are cut, new ones sprout within a few days. The typical method for harvesting cassava leaves is simple—farmers and locals often break the shoots by hand without the need for cutting tools, which makes the process more efficient and accessible.

Cassava leaves also serve as a source of entertainment for children in rural areas, who have devised playful uses for the leaves. Select cassava leaves, particularly those that are thick and have a large structure, are chosen for a traditional game. To play, a child takes a leaf and places it between the thumbs, which are interlocked to form a small space. By pressing the thumbs slightly inward and then slamming the palm down on the leaf's top, the leaf produces a loud popping sound before breaking. This simple yet amusing game provides children with a form of entertainment that requires no additional materials, demonstrating how cassava leaves contribute to traditional play and creativity.

Beyond the leaves, cassava stems can also be repurposed for children's games. The cassava leaf stalk, once detached from the plant, can be used to create a toy necklace. The process begins by breaking the lower part of the stalk, which is relatively thick, and pulling it down along with the skin of the stem. This step is repeated, breaking the stalk into sections until it reaches the leaf's tip, forming a natural loop or "necklace."

Children often cut the ends of about seven leaves, creating a short, circular chain that can be worn as a necklace or used in other playful ways. This practice exemplifies the resourcefulness found in traditional games, where children use natural materials from their environment for play, developing a deeper connection to their surroundings and fostering creativity through simple means. Cassava thus provides not only a source of food for animals but also a rich basis for cultural and recreational activities in the community.

In Banjar culture, cassava stems, or *gumbili*, have many practical uses beyond agriculture. These stems not only serve as seed material for new plants but are also utilized as structural support for climbing plants like long beans and as fencing for small areas, such as chicken coops and garden plots. Cassava stems even serve as a source of amusement for children, who enjoy extracting the soft, cork-like center with thin sticks, turning this simple activity into a playful challenge.

Cassava itself is a staple in Banjar cuisine and is prepared in various forms. For instance, *tapai* (fermented cassava) is made by boiling peeled cassava, letting it cool, and then layering it with banana leaves and yeast to ferment for a few days. *Karupuk*, a type of cassava cracker, is created by mixing grated cassava with spices, chili, and shrimp paste, then boiling, slicing, and sun-drying before frying. A larger version, *upak*, is similarly made but spread thinly on leaves before drying and can be enjoyed with condiments like *petis* or liquid brown sugar. Cassava lettuce (*salada gumbili*) is made by grating cassava into small balls, steaming them, and serving them with a sweet brown sugar sauce.

The Banjar community enjoys additional cassava-based dishes like *dulinat* and *gumpal*. *Dulinat* is made by shaping grated cassava and coconut into small balls filled with brown sugar, then frying them for a sweet, chewy treat. *Gumpal* involves steaming and pounding cassava, mixing it with grated coconut, brown sugar, salt, and a bit of white sugar, forming it into patties, and lightly frying each one after a dip in a thin wheat flour batter. Both dishes showcase the Banjar community's creativity in using cassava, transforming it into flavorful, traditional treats that reflect the region's resourcefulness and culinary heritage.

3.2 The Educational Value of Ethnobotany Through Cassava-Themed Conversations in The Banjar Language Based on Local Wisdom

The educational value of ethnobotany within Banjar community discussions on cassava includes educating the community through regional languages, which reflects a key aspect of local knowledge systems. This approach helps document and preserve traditional Banjar vocabulary that aligns with the community's cultural perspectives. Vocabulary related to plant parts and their uses—such as *gumbili* batang (cassava stem), *gumbili* bungkah (cassava root), *dulinat* (a type of cassava snack), and *gumpal*—illustrates this connection. Putri and Nurita (2021) note that the use of regional lexicons in everyday life supports their continuity within a regional language. Similarly, Wibowo (2020) suggests that the messages and values embedded in local wisdom passed down through generations, can serve as valuable materials for formal education. These community conversations also offer a means of practicing and transmitting ethnobotanical

knowledge within a socio-cultural framework across generations. Gao et al. (2024) further highlight the link between traditional knowledge and socio-cultural characteristics.

The findings of this study offer valuable insights into creatively and innovatively using ethnobotanical resources, particularly cassava. By encouraging new approaches to cassava use, the study highlights the potential for developing nutritious food sources and generating economic benefits, as seen in local markets where a range of cassava-based products continues to be sold. These products not only meet consumer demand but also help sustain traditional knowledge, reinforcing cassava's importance within the community. Mislikhah (2020) underscores the value of promoting creativity and innovation within character education, illustrating that these traits are fundamental for sustainable development in both rural and urban contexts.

The study also emphasizes the role of local wisdom, connecting it with earlier research findings that link plant knowledge within communities to communication through regional languages. This connection reinforces the idea that language is a powerful tool for preserving local plant knowledge. Higgins (2022) argues that maintaining this knowledge as cultural heritage serves as an educational bridge, connecting natural resources with community needs and fostering a sustainable cultural legacy. Through such preservation, the study contributes to a broader understanding of how traditional knowledge can support both local and regional development.

4 Conclusion

The study found that conversations in the Banjar language about cassava generally cover topics such as planting methods, uses of different parts of the cassava plant (including the roots, stems, stalks, and leaves), and ways to process these parts into traditional Banjar dishes, such as *dulinat*, *gumpal*, and crackers. The ethnobotanical educational value of these cassava-themed discussions, rooted in local wisdom, includes promoting the preservation of regional vocabulary related to cassava and encouraging the next generation to incorporate this knowledge into the socio-cultural life of the Banjar community. Educational institutions could consider incorporating these cassava-related conversations into local curriculum materials, as they contain many archaic terms related to cassava in the Banjar language—terms that are increasingly unfamiliar to younger generations due to the prevalence of modern foods.

Additionally, using the Banjar language to convey educational information about cassava can inspire creativity and innovation in managing *gumbili* plants. By engaging with this traditional knowledge, students and community members alike may develop a renewed appreciation for the cultural and practical uses of cassava. However, given the study's limitations in sampling (both in terms of informants and research locations), further research is recommended to deepen the understanding of cassava knowledge from a socio-cultural perspective within the Banjar community. Future studies could involve a larger number of informants and a broader geographic range for more comprehensive insights.

Finally, the researchers suggest that ethnobotanical values could be explored through conversations in Banjar or other regional languages and that future studies might consider investigating other plants. South Kalimantan, along with the areas inhabited by Banjar and other indigenous communities, is rich in diverse plant species that play important roles in daily life. These plants offer both cultural and practical benefits not only to the Banjar people but to Indonesian society as a whole.

References

- Alfayed, D., & Riefani, M. K. (2022). Kajian Etnobotani Mahoni (*Swietenia mahagoni*) di kawasan desa Sabuhur kabupaten Tanah Laut [Ethnobotanical study of Mahogany (*Swietenia mahagoni*) in the Sabuhur village area, Tanah Laut district]. *Jurnal Pendidikan Biologi*, 3(1), 1–8.
- Alfisyah. (2019). Tradisi makan Urang Banjar (Kajian folklor atas pola makan masyarakat lahan basah) [Urang Banjar eating tradition (Folklore study of the eating patterns of wetland communities)]. *PADARINGAN. Jurnal Pendidikan Sosiologi Antropologi*, 1(3), 97–109.
- Bella, M., Mumpung, Y., Hakim, A. R., Indrayanti, A. L., Yustha, Y., Manya, M., ... & Suprpti, W. (2022, September). Survei Etnobotani tumbuhan pangan lokal di desa Tumbang Talaken dan desa Tumbang Jalemu kecamatan Manuhing kabupaten gunung Mas [Ethnobotanical survey of local food plants in Tumbang Talaken village and Tumbang Jalemu village, Manuhing sub-district, Gunung Mas district.]. In *Prosiding Seminar Nasional Universitas Pgri Palangka Raya*, 1(1), 1–12. <https://doi.org/10.54683/puppr.v1i0.4>
- Cacatian, S. B., & Tabian, J. L. T. (2023). Floristic composition and diversity of indigenous wild food resources in northwestern Cagayan, Philippines. *Biodiversitas*, 24(4), 2324–2333. <https://doi.org/10.13057/biodiv/d240446>
- Creswell, J. W. (2007). Chapter 3: Designing a qualitative study. *Qualitative Inquiry and Research Design: Choosing among Five Approaches*, 35–41.
- Gao, H., Huang, W., Zhao, C., & Xiong, Y. (2024). An ethnoveterinary study on medicinal plants used by the Bai people in Yunlong County northwest Yunnan, China. *Journal of Ethnobiology and Ethnomedicine*, 20(1), 1–14. <https://doi.org/10.1186/s13002-023-00633-0>
- Higgins, N. (2022). Indigenous intangible cultural heritage. *LAWS*, 11(47), 2–15. https://uwspace.uwaterloo.ca/bitstream/handle/10012/11668/Ste-vens_Julia.pdf?sequence=1&isAllowed=y
- Irawan, B., Safira, K. M., Annisa, A., Rohmatullayaly, E. N., Ihsan, M., Suryana, S., ... & Iskandar, B. S. (2024). Ethnobotany of cassava (*Manihot esculenta* Crantz) in the traditional peri-urban Sundanese community of Cireundeu Hamlet, Cimahi

- City, West Java, Indonesia. *Biodiversitas Journal of Biological Diversity*, 25(1), 116–128. <https://doi.org/10.13057/biodiv/d250113>
- Lima, T. T. M., Hosken, B. D. O., Venturim, B. C., Lopes, I. L., & Martin, J. G. P. (2022). Traditional Brazilian fermented foods: Cultural and technological aspects. *Journal of Ethnic Foods*, 9(1), 35.
- Mislikhah, S. (2020). Pendidikan karakter berbasis kearifan lokal [Character education based on local wisdom]. *FALASIFA: Jurnal Studi Keislaman*, 11(2), 17–34. <https://doi.org/10.36835/falasifa.v11i2.368>
- Putri, I. G. A. V. W., & Nurita, W. (2021). Critical condition in Balinese lexicon extinction. *Journal of Language and Linguistic Studies*, 17(4), 1773–1786. <https://doi.org/10.52462/jlls.129>
- Prasetyo, M. A., Tamara, A., Hindarto, S., & Zakiyah, M. (2020). Tradisi larangan adat pada cerita rakyat Desa Golan dan Mirah: Tinjauan antropolinguistik [Tradition of customary prohibitions in the folklore of Golan and Mirah Villages: An anthropo-linguistic review]. *Jurnal Ilmiah Kebudayaan SINTESIS*, 14(2), 138–147. (www.ijrrjournal.com)
- Salsabila, N., Dharmono, D., & Putra, A. P. (2021). Ethnobotany study of *Albizia procera* in Tamiang Hill forest of Tanah Laut Regency as a popular scientific book. *Jurnal Atrium Pendidikan Biologi*, 6(2), 79–87.
- Yayuk, R., Riana, D. R., Jamzaroh, S., Indra, Y., & Suryatin, E. (2024, February). Reading the ethnobotanical value of plant diversity in South Kalimantan. In *7th International Conference on Language, Literature, Culture, and Education (ICOLLITE 2023)* (pp. 394–401). Atlantis Press. https://doi.org/10.2991/978-94-6463-376-4_52
- Wibowo, R. M. (2020). Leksikon dalam aktivitas pertanian masyarakat Yogyakarta [Lexicon in the agricultural activities of the Yogyakarta community]. *SASDAYA: Gadjah Mada Journal of Humanities*, 4(2), 105. <https://doi.org/10.22146/sasdayajournal.59661>

Open Access This chapter is licensed under the terms of the Creative Commons Attribution-NonCommercial 4.0 International License (<http://creativecommons.org/licenses/by-nc/4.0/>), which permits any noncommercial use, sharing, adaptation, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license and indicate if changes were made.

The images or other third party material in this chapter are included in the chapter's Creative Commons license, unless indicated otherwise in a credit line to the material. If material is not included in the chapter's Creative Commons license and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder.

