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# **ORIGINAL ARTICLE**

# The Development of Traditional Rice Agro Tourism as a Media of Agro Business Socialization in Indonesia

Wa Ode Sifatu1\*, Kuswarini Sulandjari2, Ruwiah3 & Syamsumarlin4

<sup>1</sup>Department of Anthropology, Faculty of Cultural Science, Halu Oleo University, Kendari, Indonesia <sup>2</sup>Agribusiness Study Program, Faculty of Agriculture, Singaperbangsa University, Karawang Indonesia <sup>3</sup>Nutritional Department, Faculty of Public Health, Halu Oleo University, Kendari, Indonesia <sup>4</sup>Anthropology Department, Faculty of Cultural Science, Halu Oleo University, Kendari, Indonesia

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\*Corresponding Author Wa Ode Sifatu

E-mail: sifawaode@yahoo.co.id

Co-Author (s)

Author 2: kuswarini.sulandjari@staff.unsika

Author 3: ruwia@uho.ac.id

Author 4: <a href="mailto:syamsumarlinantrop@gmail.com">syamsumarlinantrop@gmail.com</a>

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### **ABSTRACT**

Indonesia is an agrarian country, second most biodiverse in the world after Brazil. But some of it has disappeared as a result of development. The purpose of this article is to look at the existence of traditional rice farming culture and its propogation in Indonesia. The research borrows from Foucault's theory of power and uses qualitative descriptive methods for analysis. Both primary (observations, interviews) and secondary (documents) data have been used in this research. The study finds that for 50 years the knowledge of traditional rice farming that was suitable with the natural environment of the land and its culture has been in contestation with knowledge of farming with synthetic chemical (inorganic) materials. A small number of farmers are able to retain thier power and maintain traditional farming culture. This research has policy implications: Traditional rice farming can be expanded and developed for traditional rice agro-tourism and as a media for socializing farming methods for millennial generation, bringing farming culture in harmony with nature, conservation of biological resources towards healthy and independent farmers.

**Keywords**: agro-tourism, independent, traditional rice, cultural preservation.

# Introduction

Indonesia is an agrarian country with the second highest of biodiversity in the world after Brazil. But some of this biodiversity has gradually disappeared including traditional rice. Traditional rice is rice cultivated through the traditional mode of agriculture. In traditional agriculture farmers accept the state of the soil, rainfall, plant varieties as they are and as provided by nature (Soetriono, et al., 2006). The loss of traditional rice varieties in line with the development of new varieties of rice crops complement other cultivation technologies as an effort to increase food production towards self-sufficiency. Supangkat (2017) states that local varieties of rice planted by farmers are estimated to be around 10–15% of the total local rice germplasm. However, this number is likely to decrease because there is no systematic effort to preserve local

varieties. On the other hand, the policy of rice farming technology package never includes local varieties but always superior and hybrid-superior varieties. Other things that cause these conditions are: the development of big cities, the expansion of plantation businesses for export products, the rise of urbanization waves, and the government's efforts to achieve food self-sufficiency are always incomplete and millennials do not appreciate farmers and their products. According to Supangkat (2017), the disinterest of young people in farming work results in farmers in Indonesia coming from an older generation aged 59 years and older. The Indonesian government has organized a national Integrated Pest Management program that was introduced since the late 1980s, which is a blend of science and practice that occurs in the minds and actions of alumni farmers with "wall-less schools" later known as the Pest Control Field School Integrated (SLPHT)



(Winarto, Yunita T. and Ardhianto, 2011: 135). Winarto felt uneasy with Indonesia as an agrarian country only discussing food independence but was not achieving it. Therefore, Yunita offered to make independent farmers as an initial step of food independence. They also explained the expression of the farmer: "...The most appropriate is the plan prepared by the farmers themselves who know the exact conditions of the field. What varieties of crops farmers want to be planted, farmers may be better versed than officials from outside...".

The development of Indonesia's population is high, which means that food needs will increase. If the average age of farmers in Indonesia is 50 years and over, then in the next 20-25 years, Indonesia will lose its livelihood in the field of farming. This condition is worsened by the Indonesian millennial who currently prefers to work in the industrial sector which is considered clean, compared to working in the agricultural sector which is still considered dirty work. Noting the above phenomena, it is necessary to look for efforts to introduce millennials to the place and process of work in the field of farming. This has been attempted by various parties, both through Non-Governmental Organizations (NGOs), world food organizations and individual volunteers and international NGOs concerned with traditional rice (see Rikolto, https://www.verywellfit. com/rice-nutrition-facts-calories-and-health-benefits-4119792 and Ani Nursalikah: https://www.verywellfit. com/rice-nutrition-facts-calories-and-health-benefits).

This study borrows from the theoretical perspective of Foucault to understand the issues facing traditional rice farming in Indonesia. Focus is on the broader idea of the disappearance of local knowledge due to the ability to actualize power in an individual capacity (Foucault, 1977). Foucault explained about power, namely knowledge, order, and discourse. Order is a "direction of behavior" which is an attempt to direct human behavior in a series of ways that have been calculated in such a way. Discourse in the form of rules and restrictions intertwined together uphold the truth values that manifest in the management and regulation of the body of the farmers and the government. Farmers have self-control so they miss the attention of other groups. They as individuals constantly judge what should and should not be done. Each farmer becomes a police officer for themselves.

## **Literature Review**

Many researchers examine the problems in farming (Akanksha, I., et al., 2012, p. 272–275; Arayaphong, Supsra, 2012, p. 30; Atia, Liraz and Menachem Bamberger, 2020,

p. 1-10; Bangi-Juliet P. Candog, et al., 2019, p. 21-32; Bhat FM. and Riar CS, 2015, p. 1–3; Chopkar, Rita and AK Sarawgi, 2017, p. 346-349; Delgado, Fernando Gordillo, et al, 2012, p. 7-13; Du, Pham, et al, 2016, p. 45; Eyhorn, Frank, et al, 2018, p. 1-15; Luo Shiming, 2018; Mendoza, Teodoro C., 2004, p, 93-115; Pirdashti, Hemmatollah, et al, 2015, p. 1489-1497; Prihtanti, Tinjung Mary, 2015, p. 279-298; Qiao, Yuhui, et al, 2015, p. 1-12; Shaikh Tanveer Hossain, et al, 2012, p. 17-30; Sharma, V., et al, 2017, p. 253-257; Sivakumar, T. S Ambika and K. Balakrishnan, 2017, p. 350-354; Sowarnalisha Sahoo, P et al, 2017, p. 290-297; TS Rathna Priya, et al, 2019, p. 1-11; Yanakittkul, Phaibun and Chuenjit Aungvaravon, 2020, p. 1-27). The various writings above show that the agro-tourism for traditional rice farming in Indonesia is very important to be encouraged by the government and all parties.

This research uses Foucault's (1980) theory about power. Foucault (1980: 142) said that in power of relations, domination and resistance become a generally accepted strategy for all humans. In the daily life of farmers in rural Indonesia, since the beginning of the New Order Era until now it has always been dealing with the government through Agricultural Extension Workers (PPL) and entrepreneurs of agricultural production facilities. Farmers who were initially always helped by free plant seeds, fertilizers, and medicines by PPL were always dominated in their daily interactions. Farmers were not able to contest or to carry out resistance to PPL and entrepreneurs. Power becomes productive for PPL and entrepreneurs, and it does not empower farmers, even unconsciously forcing farmers to leave their farming culture all this time. Conflict always occurs between farmers and entrepreneurs.

## Method

This study uses qualitative research method by Norman K. And Lincoln (eds) (2005).

### Research sites

The location of this research was determined intentionally to the areas that still maintain traditional rice farming and organic rice farming in Indonesia. The area starts from Sumatra Island and goes up to Nusatenggara Island.

## Data source

This research data consists of two sources, secondary data sources and primary data sources. Secondary data

sources consist of books, journals, and manuscripts while the primary data are sourced from interviews and observations of farmers.

### **Data Collection Procedure**

Data is collected and integrated in the analysis process, and presented in such way to support the main theme of the research, so that it is a separate construction as a product of interaction between informants and researchers. The document study was conducted by researchers by examining a number of written sources both related to the subject and location to obtain primary and secondary data. The researcher also conducts self-reflection and critical thinking by outlining the basic assumptions of cultural values in relation to the life of the farmers. This activity aims to achieve confidence in the results of research. This data confirmation activity was carried out from the initial data collection to the writing of the research report.

# Data analysis technique

The data of this study were analyzed as qualitative descriptions through interpretation and understanding. Data is presented in the form of narrative texts and conclusions drawn gradually until general conclusions are obtained, this study does not test hypotheses, but instead prepares abstractions based on the parts that have been collected and grouped by making a comprehensive and holistic analysis of all the elements that are the main problem in research.

## **Result and Discussion**

In Indonesia agricultural development is sought to achieve food self-sufficiency. Since the New Order Era until now the perpetrators of farming have been led to farming food crops in the form of rice. Farmers get free assistance with plant seeds, including superior rice seeds, chemical fertilizers, medicines, and farming technical assistance through Field Agricultural Instructors (PPL). However, this condition affected the farming of traditional rice belonging to local tribal farmers most of whom have gradually moved to other professions. This is due to the development of big cities, the expansion of plantation businesses for export products, the surge in urbanization, the average farmer aged 50 years and over, and the government's efforts to achieve food self-sufficiency are never successful. Millennials are less respectful of

farmers and what they produce as well as the decline of young people's interest in agricultural work. Farmers in Eastern Indonesia consider food crops are not only rice but also corn, tubers such as cassava, sweet potato, taro, banana, and gembili. Rice plants are sought as ceremonial food. Although there is an onslaught of government assistance to food crop farmers, in reality in almost all provinces in Indonesia, there are still farmers who maintain traditional rice farming culture, even though the numbers are small. Some farmers are successful in maintaining traditional farming as an ancestral heritage because of their ability to wield power in an individual capacity when they interact with government and entrepreneurs.

The Indonesian government's is endeavor to develop a culture of farming in various regions, like Bali, Sulawesi, Kalimantan, Java, and Sumatra. The government in collaboration with an NGO based in Belgium taught farmers how to farm traditionally with organic fertilizer to obtain organic rice certificates called VECO Indonesia, such as pandanus aromatic, brown rice and black rice. The aim is to meet the needs of organic rice exports which are economically more profitable and healthy. It was reported that the price comparison of rice referred to was: 1 kg of black organic rice for Rp. 50,900, brown organic rice Rp. 38,900, mixed organic rice for Rp. 38,900 and red organic rice Rp. 37,900. In various regions of Indonesia traditional rice farming is still maintained. Its product distribution channels are through Bloom Agro and its processing through the Simpatik Petani Union unit located in Tasikmalaya, West Java, and the Appoli Farmers Association in Boyolali, Central Java. The Simpatik Union unit consists of 2,300 cultivated farmers with an area of around 350 hectares of rice fields using the SRI method, to certify and produce rice exported to the United States, Germany, Singapore, Malaysia and the United Arab Emirates. In the United States, rice is imported and sold by Lotus Foods, while SRI rice going to Europe is sold under BloomAgro under the Sunria brand. It appears here that in power relations government does not dominate farmers. Farmers are allowed to be themselves, there is no contestation between farmers and entrepreneurs of agricultural facilities. Power is productive to empower farmers, even unconsciously forcing farmers to leave the culture of chemical farming owned by entrepreneurs. There is no conflict between farmers and entrepreneurs in the struggle for influence.

At the time, the production and processing of the Simpatik unit was certified as Fair for Life by the international certification organization IMO (Institute for Marketecology), based in Switzerland, the rice produced by Simpatik was the only rice to be certified as Fair for

Life by IMO (as of 2012). In fact, Simpatik scored higher than the norm, largely due to the many environmental benefits generated by farmers using SRI, such as water savings and soil conservation. All criteria and scores can be seen on the IMO website. NGOs appear to be more powerful than entrepreneurs and empower farmers.

On the island of Sumatra, for example, Nurjayanti, Ari (2016) in her research reported that farmers in Peringsewu district conducted rice cultivation, some using natural materials such as organic fertilizers and natural pesticides. This will certainly affect the level of production and selling prices. The selling price of organic rice is higher when compared to rice that uses organic chemical fertilizers. Organic rice prices range from Rp. 13,000.00-15,000.00 per kg, while for ordinary rice using chemical fertilizers is usually only around Rp. 7,000.00 per kg. The Belgian-based NGO Rikolto has empowered traditional rice farmers in Jambi. Government power relations do not dominate farmers, farmers are empowered with the help of NGO Rikolto. There is no conflict between farmers and entrepreneurs in the struggle for influence.

Dewantoro and Rachmawati as kompas.com reporters on April 22, 2019 reported the story of Sukardi, a Deli Serdang farmer who has planted organic rice since 1980 until now. Sukardi said farmers must be brave enough to reduce and stop their chemical planting patterns and act more wisely in cultivating land. Some farmers organically planted ancestral rice in Jatiwulih and thier organic certification was recently canceled because Subak water (communal irrigation system) from upstream water has infiltrated their fields. This Subak water contains pesticides and chemical runoff. "...Bali Jiwa also states that the safest way to farm and the most reliable way to farm organically is to use local springs. In the farmer Serdang's case there is no visible relationship of government power that dominates farmers. The power of farmers becomes productive and empowering, on the contrary entrepreneurs are powerless in their relations with NGOs from abroad.

The Ministry of Agriculture in cooperation with the United Nations Food and Agriculture Organization (FAO) launched a smallholder assistance program in West Kalimantan. The program adopted the Organic Agriculture System to produce rice (see also <a href="https://www.calorieking.com/us/en/foods/f/calories-in-rice-organic-long-grain-brown-rice">https://www.calorieking.com/us/en/foods/f/calories-in-rice-organic-long-grain-brown-rice</a>). This is part of the Government's plan to create a Thousand Organic Villages. Organic villages are one of the national development priorities (Nawacita) with a focus on increasing economic independence in the main domestic sector, supported by FAO. The farming system

in Kalimantan has long been a study of anthropologists. For example Michael R. Dove (1988) who examined how to cultivate in the Dayak Kantuk community, Kapuas Hulu Regency, West Kalimantan. With conditions of cooperation between the government and FAO, the government is helpless. Farmers be themselves. Power becomes productive in empowering farmers, and blatantly forces farmers to leave the culture of chemical farming owned by entrepreneurs. Employers of agricultural facilities must find new victims to practice their power over.

Ismail E.H., a republika.co.id journalist on Wednesday, May 23, 2018 reported that Central Kalimantan optimizes dry land using Largo Super technology (Larikan Padi Gogo) with the use of New Superior Varieties (VUB) of dry land combined with balanced fertilization using compost, biological fertilizer, decomposers, pest control of plant diseases (HPT) in an integrated manner, and the use of agricultural mechanization. Kholisdinuka, Alfi in his Finance report of Thursday, September 12, 2019 reported a strategic move to provide food for a new sovereign capital without imports in North Kalimantan Province. "There are three districts chosen, namely the districts of Bulungan, Malinau and Nunukan," said Inspector General of the Ministry of Agriculture, Justan Riduan Siahaan. H Ibrahim, November 4, 2013 The East Kalimantan Province Food Crop Agriculture Service will hold a number of demonstration plots in several districts/cities to pilot the development of local superior rice varieties from East Kalimantan. Leading local rice include Mayas rice, Adan Krayan, Adan Malinau, Fish rice, Gupa rice, Thai Hom rice, Buyung rice and Lemongrass rice. It seems that the power of farmers in Central Kalimantan is increasing. Likewise is the case in North Kalimantan as explained ahead.

Nurhasanah, et al (2018: ii) wrote a book in the form of a wealth of local rice genetic resources that provided information about the potential of the East and North Kalimantan regions. In these two provinces there are more than 300 local rice varieties, so that if genetic erosion occurs in the future, subsequent generations can find out the local rice wealth of their ancestral heritage. Imansyah (53 years), created innovations in farming without burning land, many farmers in Malong have followed his method (see Okezone, Friday, 6/4/2018, see also the DMPA program) Imansyah is now reaching 191 villages spread across Riau, Jambi, South Sumatra, East Kalimantan and West Kalimantan. As of March 2018, the beneficiaries of the DMPA program have reached 13,814 families, Manurung, a village farmer, admitted that for decades he had planted local varieties of rice in his paddy fields, although extension officers encouraged the use of superior variety (Supangkat, 2017).

Only traditional rice farmers in Sulawesi struggle alone in facing agricultural facilities with entrepreneurs, as experienced by Zulkifli, Rusmin, a farmer in Porame Village, Marawola District, Sigi Regency, Central Sulawesi, Tuesday (20/8 2019), describes his years of experience of how to plant rice with the seed of his own choice. This means that the rice that is prepared to be used as seed is of good quality and after it is planted using regular fertilizer according to the authorities' technical guidance. Thousands of farmers in a number of villages in the Districts of Biromaru, Dolo, Tanambulava and Gumbasa in Sigi Regency which were affected by the earthquake on September 28, 2018, have been unable to plant paddy rice. Rice fields were destroyed by the earthquake and the liquifaction and irrigation networks were totally damaged. What happened as a consequence of the power relations to farmers, agricultural fascist entrepreneurs, and the government in Central Sulawesi also applies in Southeast Sulawesi.

The government of North Buton Regency, Southeast Sulawesi, for example, has declared the area as an organic agriculture district with superior red rice and black rice. The policy is supported by Regent regulations and regional regulations (perda) with an adequate budget. Organic farming of 16,000 hectares of rice plants is spread throughout the districts in the area in Lapandewa Village, West Kulisusu District, North Buton Regency. In this village there are 130 families of traditional rice farmers. The village is four kilometers from the subdistrict capital. Farmers on average are 50 years or older. They can maintain four rice types, namely: Wakawondu rice, Wangkariri rice, Wakombe rice, and Warombia rice because the traditional rice fulfills their traditional life ceremony. In addition, planting, harvesting, and harvest parties are traditionally attended by many residents called mengkowalo and is one form of public entertainment and a place to preserve the values of togetherness. In the past, farmers still had many types of rice in addition to the four types mentioned above, namely, Wangkoito, Waburi-buri, Wabira, Warema, and many more had not obtained seeds. The rice is intercropped with corn, sweet potatoes, and vegetables.

Since the 1970s the government has banned traditional farming by rotation because it is damaging to the environment, but they resisted the government. The government did not give them the assistance of superior rice seeds, so they chose their own seeds at harvest time. According to farmers, ancestral local rice is more, tasty, fragrant, and with a bite. It is different from rice assistance from the government, although it is free and has shorter harvest time, but it feels normal, not fragrant, not savory, and

has no bite. To overcome the problem of limited seeds, farmers lent seeds to each other and returned after the rice harvest. At present, besides borrowing rice seeds the farmers can also buy them from each other. If there is a pest attack, for example rice leaves in red spots means there are menstrual women entering the rice field, and the medicine is in parika or shaman. If the rice leaves have streaks of black or yellow such as those found in coconut leaves, it is smoked with dried coconut leaves burned while touring the rice field.

If the rice leaves have lines shaped like the shape of the kokose (grouper), then blood and scales of the kokose fish are sprinkled in the rice field, it starts from the corner of the garden and then throughout the garden. The medicine used by farmers is classified as biological medicine. Farmers have understood that there are currently many local rice enthusiasts, because it has been circulating in the community that traditional rice is very beneficial to human health as it can prevent diabetes, prevent weight gain, improve heart health, control cholesterol levels, prevent cancer, and so on. Farmers in the area are resisting the government and entrepreneurs. The government's actions not to provide seedlings and medicines do not discourage farmers from preserving their culture. Farmers are self-reliant and conflicts often occur because of contestation between farmers, entrepreneurs, agricultural facilities and the government. The power of the government and entrepreneurs becomes unproductive when dealing with farmers in Lapandewa Village. Conflicts between farmers and entrepreneurs often occur in the struggle for influence.

In Bali, people who care about their physical health when shopping for food needs always wondered, where are organic food products grown or made, distributed or sold? Stephanie Brookes (<a href="https://indonesiaexpat.biz/news/sustainability-permaculture-organic-bali">https://indonesiaexpat.biz/news/sustainability-permaculture-organic-bali</a>) explores local farming practices and organic trade in Bali. There is a growing trend in Bali and elsewhere in Indonesia to find sustainable products that are sourced locally. The organic farmers market is well established in Bali which operates in Ubud, Canggu and Seminyak every week. Many consumers are now turning to meat-free food options like fruits, vegetables, and spices, and other products such as organic household cleaners, coffee, insect sprays, jams and beauty products.

Besides the farmers market, consumers can now look for organic products at the click of a button. There are new online organic suppliers such as Bali Jiwa has been meeting consumer demand through door-to-door services since January 2017. At the same time, there are increasing numbers of farmers making the decision to switch to organic farming practices, which can result in good returns and profits. Bali Jiwa helps these new farmers with education, equipment, human resources and a lot of encouragement. A member of the Bali Jiwa team explained that his experience in organic rice farming could lead to a profit of around Rp. 25,000.00 per day. However, there are other members of the Bali Jiwa farming ancient rice, whose ancestral heritage is Balinese and have been certified to prove that their nutritional value is higher than that of other organic rice, who can earn a daily profit of Rp. 100,000.00. The ratio of the number of calories is as follows: A total of 160 calories in 0.25 cup (1.5 oz): Fat = 1 g. Carbs = 32 g, Fiber = 1 g, Protein = 3 g.

There is a volunteer from Singapore named Mr. Ong who came to Pejeng, Bali to mentor the ancestral rice farmers in organic farming. One of his mentee named Kadek Sutaryasih has succeeded in expanding his agricultural area from one hectare to five hectares to meet consumer demand. Kadek was recently awarded a contract to supply the local Delta and Bintang supermarkets in Ubud and to meet the demand from Surabaya, East Java in large quantities. To meet all the increasing demands, Kadek has become a mentor to the surrounding ancestral rice farmers.

Turmuji, November 1, 2015 reported that traditional rice farmers in West Nusa Tenggara, usually rice planted in fields, hills and mountains are commonly called *pare rau*, which is rice grown from the results of clearing forested land. Mashing rice using *rantok* is usually done in mutual cooperation by the mothers in the village, where rice that has dried and picked together with the stems inserted into *rantok*, then mashed in turns by five to six people.

The traditional rice farmer in East Nusa Tenggara who still survives is known as Padi Gogo Kodi which is the original germplasm of Kodi. Farming areas around East Flores, Sikka and Nagekeo, NTT, farmers continue to plant traditional rice so that the escort activities and assistance of the Special Efforts program (UPSUS) are almost balanced because the government is willing to budge when farmers are not willing to accept government directives.

# Conclusion

Since the New Order era until the Reformation era in Indonesia, the government through PPL has provided farmers with synthetic chemical (inorganic) farming facilities. Technology received by farmers without considering the natural needs in the village because it is only

for production and economic interest. Behind the government's goal of helping farm facilities to farmers is to perpetuate their authority in the second period. Whereas entrepreneurs get economic benefits. Farmers want to achieve happiness and avoid suffering by getting lots and easy harvests. In the end, there are severe constraints on farmers. Nowadays, all parties have realized that there is an error in the distribution of agricultural technology to farmers. The power of PPL has become less productive and less empowering of local resources for farmers.

The impact, conflicts always occur between farmers and entrepreneurs. The implication is that developing agriculture in Indonesia must start with a small farming system according to the needs, resources and actual capabilities of small farmers and their cropping patterns, which usually reflect local needs and conditions. One way is through the development of a traditional rice agro-tourism program where PPL restores power, increases the pride of traditional farmers, and arouses the interest of millennials as farmers. The government and all parties need to disseminate information on farmers' livelihoods to millennials in a consistent and continuous manner. Another consideration is that not all staple foods of the Indonesian people are rice, especially outside Java. Traditional farmers play a large role in the production of commodities towards food independence.

# **Competing Interests Statement**

All authors have read and approved the manuscript and take full responsibility for its contents. No potential conflict of interest was reported by the author(s).

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## Biographical Statement of Author(s)

**Dr. Wa Ode Sifatu**, M.Si was born in 1960 at Muna Indonesia. She obtained her M.Si. and doctorate degrees from the University of Indonesia in 1996 and 2014, respectively for her research in Anthropology.



She is currently a lecturer at the Anthropology Study Program, Faculty of Humanities at Halu Oleo University, Indonesia.

## Dr. Wa Ode Sifatu

Department of Anthropology Faculty of Cultural Science Halu Oleo University Kendari, Indonesia

E-mail: sifatuwaode@gmail.com

**Dr. Ir. Kuswarini Sulandjari**, M.P., was born on May 18, 1959 in Ponorogo City, East Java Province, Indonesia.

She obtained her Undergraduate education in 1982 from the Department of Social Economics, Faculty of Agriculture, Bogor Agricultural University, and Magister in the Postgraduate Program of Brawijaya University Malang in 1995. She later got her doctor-



ate degree from the Faculty of Agriculture, Padjadjaran University Bandung in 2019.

She is currently a lecturer at the Agribusiness Study Program, Faculty of Agriculture, Singaperbangsa Karawang University.

# Dr. Ir. Kuswarini Sulandjari

Agribusiness Study Program Faculty of Agriculture Singaperbangsa University Karawang, Indonesia

E-mail: kuswarini.sulandjari@staff.unsika.ac.id

Ruwiah, SP. M. Kes was born in 1964 in Lakologou Indonesia. He graduated in 2001 with a Bachelor degree from the Bogor Agricultural University, and a master's degree in 2007 from the same university.



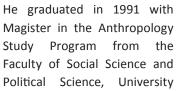
He is currently a lecturer at the Faculty of Public Health at Halu Oleo University.

#### Ms. Ruwiah SP. M. Kes

Nutritional Department Public Health Faculty Halu Oleo University Kendari, Indonesia

E-mail: ruwia@uho.ac.id

**Syamsumarlin, M. Si.**, was born on May 1 1966 in Pinrang, South Sulawesi, Indonesia.





Hasanuddin. He later obtained his doctorate in 2019 at the Faculty of Social Science and Political Science, University Hasanuddin.

He is currently a lecture at Anthropology Study Program, Faculty of Humanities, Haluoleo University. Undergraduate education at the Anthropology Study Program, Faculty of Social Science and Political Science, University Hasanuddin.

# Dr. Syamsumarlin, M.Si

Department of Anthropology Faculty of Humanities University of Halu Ole Kendari Indonesia

E-mail: syamsumarlinantrop@gmail.com