

# LAND MANAGEMENT AND ECONOMIC IMPROVEMENT OF PALA PLANTATIONS IN THE BANDA ISLAND AFTER COLONIALIZATION 1954-2018

### Djumadi

Institut Agama Islam Negeri (IAIN), Ambon, Indonesia

\*Email: djunaidyady@gmail.com

#### ABSTRACT

In the 14th and 15th centuries, European countries desperately needed the spice nutmeg, which was used for a variety of purposes, such as preserving fresh meat in cattle, for medical and dietary purposes, and in claims about its health and virility properties. The high demand for the commodity nutmeg opened up trade networks that stretched from Asia to Africa and Europe. Banda Naira, as a nutmeg-endemic region, has been connected for centuries. This study uses a qualitative method with a sociohistorical perspective and aims to analyze the Banda nutmeg spice management model from 1945 to 2018. The research findings show that the distribution pattern of post-colonization nutmeg plantations from 1945 to 2018 was carried out by lottery, which was specifically intended for people who had families based on their necessities of life. While the management pattern of nutmeg plantations includes the harvesting of nutmeg up to the drying of nutmeg, this is carried out by smoking and drying under the hot sun in order to produce quality dried nutmeg. This nutmeg spice management model has had a huge impact on the people of the Banda Islands, both positive and negative. The positive impact is bringing prosperity to the people of the Banda Islands, but the negative impact is land grabbing, theft, and manipulation of the quality of nutmeg.

### **KEYWORDS**

Land Management, Economic Improvement, Pala Plantation, Banda Island

#### INTRODUCTION

For Europeans, spices are a necessity and a taste. During the European winter, there was no way to keep all the livestock alive. Because of this, many livestock were slaughtered and their meat preserved. To preserve meat, salt and spices are needed. Banda Naira, as a cluster of "spice islands," was then hunted for producing market commodities such as nutmeg, cinnamon, cloves, pepper, and "bunga lawang".

In the 14th and 15th centuries, nutmeg and mace produced by the Banda Islands became exclusive commodities in the global spice trade. The high price caused nutmeg and mace to be hunted by Asian, Arab, Persian, and Indian traders in the 14th and 15th centuries. The hunt did not stop with Asian traders. In the late 15th and 16th centuries, European traders took part, even being sensitively involved in the hunt for this commodity. The trade network that was created from and to the Banda Islands was pioneered by Asian traders in the initial phase and then gave birth to the classical Asian trade network. Furthermore, the trade network was created as a result of the



adventures of European navigators who made voyages from Europe to Asia to the Moluccas and the Banda Islands (Thalib & La Raman, 2015:105).

In the 17th century, Banda had the status of a provincial capital. Therefore, the governor general is domiciled in Banda. The next change was in the 19th century, when Banda had the status of a resident (as well as a district). A century later, namely in the 20th century, Banda had the status of a district until now. The illustration shows that Banda is an area full of a glorious past, a concerning present, and an unimaginable future. This is an irony, compared to other areas whose past is unknown to people, where the present is glorious and the future is full of hope. Alwi, 2006:30).

Before the colonials arrived, the Banda Islands were islands where the indigenous people were safe and prosperous with their crops. However, when the colonialists arrived, bloodshed occurred everywhere in defending nutmeg, and at that time, the price of nutmeg was the same as the price of gold, so the colonials were tempted by this nutmeg. Not only is it expensive, but the nutritional properties contained in nutmeg are often used in preservation and as a spice for cooking.

Of the group of islands in the Banda archipelago, Banda Besar is one of the islands that has a large area of land, so it is one of the reasons for the distribution and production of the second-largest nutmeg from several places in the Banda Islands. Banda Besar owned 34 perken (nutmeg plantations), which were divided by the Dutch, led by landlords called perkenir, and run by slaves who were brought in from many places.

After the Japanese left, Indonesia government took back the nutmeg or nutmeg plantations that had been managed by the Dutch so that the government nationalized them, and then the government authorized BNP XXVIII to manage the plantations until the plantations were distributed per block to the community. The condition of the people of the Banda Islands began to gradually improve as they began to re-use the nutmeg plantations to meet their daily needs, so that the Banda community, which consists of around 70%, is now nutmeg farmers. A question: how was the distribution system for nutmeg plantations at that time? What is the model for the distribution of plantation land that occurs? Are there differences in the management of nutmeg plantations in the past and now?

### **RESEARCH METHODS**

This study uses qualitative research methods with a socio-historical perspective. Qualitative research is both descriptive and analytical at the same time, which emphasizes the process and the acquisition of meaning (subject perspective). The theoretical basis is used as a guide so that the research focus is in accordance with the facts in the field. In addition, the theoretical basis is also useful for providing an overview of the research setting and as material for discussing research results.

This research was conducted on the island of Banda Besar, Banda District, Central Maluku Regency. Informants are those who know events and practice them in relation to the management of Banda Nutmeg. Informants consist of two types, namely: (1) key



informants are sources who are actors; and (2) secondary informants are sources who are not actors but are descendants of these actors.



Figure 1. Banda Besar Island (Lonthoir) Source: Google Maps

This research collects related data and information using techniques including: First, the interview, according to Nazir (1988), is the process of obtaining information for research purposes by means of debriefing face-to-face between the questioner or interviewer and the answerer or respondent using a tool called an interview guide. The interviewees who were interviewed were: (1) Nutmeg Plantation Owners (Perk), namely those who have nutmeg trees on average over 70 years; (2) The local State Government, namely those who serve in the existing government in the lands of Lonthoir, Boiyauw, Waling-Spanciby, Cumber-Kasestoren, Selamong, Dender, Waer, and Uring-Tutra; (3) Informants from the community, namely those who know information about the distribution system and management of plantations after colonialization from 1945 to 2018. (4) Other agencies, namely those directly related to PT. Banda Permai and the Yayasan Warisan dan Budaya Banda (YWBB).

Second, data collection is also carried out by means of library research, namely collecting information relevant to the topic or problem that is the object of research obtained from books, scientific papers, theses, dissertations, encyclopedias, the internet, and other sources. By conducting a literature study, researchers can take advantage of all the information and thoughts relevant to their research.

### **RESULTS AND DISCUSSION**

#### The Banda Plantation System in the VOC Colonial Era

After the conquest of Banda, a resolution was issued on April 5, 1621, by the Governor General and Council XVII, which specified the division of land into plots. In a letter dated March 16, 1621, Coen had given orders to newly appointed Governor Martin Sonck to divide the islands into plots of land, which would then be handed over on easy terms to the colonists or people who had consideration for that. But as a whole, these islands remained the property of the company, while plots of land, called perks, were loaned out to the perkeniers (Thalib & La Raman, 2015:162).



Based on memory written by JP. Coen, all of the plots of land that had been divided were not handed over according to the provisions of property rights, but were leased or used rights over land. Coen referred to the colonists as "borrowers (contracts) from the company". a hereditary loan which at that time was determined according to the deed and included in the loan list or loan book. In the contract deed it was explained later that the legal heirs would enjoy the loan and would own it under the following conditions: if the land was actually released as property, the first colonists must still have the title deeds. In connection with the provisions of the land use contract, Pieter deCarpentier has determined the provisions of the contract letters through an announcement on February 7, 1624 (Thalib & La Raman, 2015: 162).

Also in Coen's memory, there appears to be a loan system that only regulates fruit harvesting contracts. But with regard to land contracts, the provisions explicitly state that loans are not hereditary. Although the procedures for land borrowed by colonists at the time of its development were different, based on the explanation contained in Coen's memory, it can be concluded that the heirs to the land plot loans were very flexible, especially given the unclear contract letters and the terms of the contract where the terms were not explained. This ultimately gave freedom to the colonists to act freely on the lands that had been lent to them (Thalib & La Raman, 2015:163).

The governors who faced difficult and complex tasks in terms of land distribution after Coen's departure were Willem van Antsen (1621), Martijn Sonck (1623), De Bruyne (temporary official, 1623), Willem Jansz (1623–1627), Pieter Vlack (1627–1628), Jacob Schram (temporary incumbent, 1628), and Jan Jansz. Vischer (1628–1629). Sonck, Jansz, and Vlack have tried their best (especially Vlack) and succeeded in carrying out the distribution of land under his administration. However, the implementation of the distribution of land according to gardens carried out by the governors took a long time due to the lack of colonists and slaves. The division, which began in 1621, could only be completed between 1627 and 1628 (Thalib & La Raman, 2015:166).

The Norwegin Keli Plantation, owned by the Baadilla family and the Nio family, was delegated to Ibrahim Nurbati, son of Saleh Nurbati, who in 1947 became the Head of the Lonthoir Village. But the proceeds were never given to the owner because, in 1947, the owner took part in the revolution against the Dutch in Java with Hatta and Sharir, while the Nurbati family collaborated with the Dutch colonial government (NICA) in Banda. Ibrahim Nurbati became rich from the results of nutmeg for several years while ruling Keli Norwegen so that he could go on a pilgrimage and buy plantations in the Ulu Wero area on Gunung Api from the Branz family. Then the Norwegin Keli plantation was used as a storage center for illegal nutmeg that was stolen from the Dutch nutmeg plantations and then sold as if it came from the Norwegin Keli garden (Alwi, 2006).

During the Dutch occupation, there were 480,000 nutmeg trees. Finally, the number of nutmeg trees managed by PT Perkebunan Pala Banda is only 31,000, and even then, there are many nutmeg trees that are 70 years old because there are no new plants, and there are many wild nutmeg trees that grow from bird droppings (the nutmeg is eaten by birds, then the nutmeg seeds come out). again from his stomach, Dan fell to the ground. To obtain germplasm, it must be taken from trees aged 9 to 20 years; above that, it is not good for superior seeds. With great difficulty, PT Banda Permai succeeded in obtaining germplasm and began to plant nutmeg on a large scale. Since



the end of the war, this is the first time that the nutmeg trees have been rejuvenated up to 50,000 nutmeg trees.

Since the VOC occupation until 350 years of Indonesian independence, the Dutch have built a nutmeg plantation facility regularly and planted 500,000 nutmeg trees. Even though the price of nutmeg has dropped drastically, Banda is able to export around 1,200 tons per year by CHV and other small nutmeg companies in Banda. But all of this was destroyed by the corrupt, incompetent, and mentally degenerate Indonesians themselves. The Banda Naira Heritage and Culture Foundation was noticed by the President with Presidential Decree of the Republic of Indonesia Number 43 of 1997 to rejuvenate the nutmeg trees in Banda with a set budget of 2,000,000 US dollars, but due to the monetary crisis it became 400,000 US dollars, or only 1/5 of the set budget. This Presidential Decree was issued because the outside world had observed a decline in exports of nutmeg to only 80 tons per year (Alwi, 2006).

#### The System of Distribution of Nutmeg Plantation Land in Post-Colonial

The implementation of land distribution for plantations was not based on proper maps, so the boundaries of the plantations were often unclear. Both the VOC rulers in Banda and the perkeniers had maps of the entire Banda area, but they had no local maps of the individual islands. The absence of measurements carried out by the VOC rulers, land maps made, and the installation of guardrails, accompanied by the absence of a loan letter, has become a source of complex problems to be resolved (Thalib & La Raman, 2015:166–167).

Ai Island, which was first conquered by Jan Dircksz't Lam on April 10, 1616, has 31 nutmeg gardens, in which there are 775 people. After that, Lontor, with 34 gardens accommodating 800 people, and Naira, with 3 gardens accommodating 75 people, Due to the policies of the VOC rulers and other reasons, the number of gardens decreased. At the end of the XVII century, the island of Ai only had 6 gardens, Lontor had about 25 gardens, and the island of Naira did not experience a change in the number of gardens occurred, but at the beginning of the XIX century, the number decreased again, as in the XVII century (Usman Thalib & La Raman, 2015).

The reasons for the decline in the number of gardens are quite varied. Perkenier, who initially owned small plots of land, but because of his success in managing gardens and earning a surplus, immediately purchased small gardens or plots of land that had not been managed to be combined into a Perkener. So the number of gardens decreased; on the other hand, some gardens increased in size. Garden reduction is also due to other reasons. Several small gardens were combined with large gardens, both for reasons of economy and to simplify administration in Naira. Only the names of the large gardens are still remembered, and the names of the small gardens are soon forgotten (Usman Talib & La Raman, 2015).

Each perkenier at that time paid attention to his own garden so that it became similar to a large plantation and not just cultivated land. Feeling proud of owning a nutmeg plantation, the plantation owners immediately gave their plantations a beautiful name, an attempt to differentiate the identity of one token from another with the aim of passing it on to their descendants as a family treasure. These perkeniers were very proud and



felt like royalty on their plantation land, and they were no longer suitable to be treated like sailors or soldiers who wore helmets on their heads but instead ruled vast land complexes (Usman Thalib & La Raman, 2015).

Giving perken names such as De Zoete Inval, Waltevreden, Welgerust, and De Verwachting, which are reminiscent of the names of pesantren (rest) in the Netherlands. Others are content with the names of local mountains, villages, and towns (*Tutra, Orang Datang, Samar*) or the names of the plants and fruit trees that grow in abundance in their gardens (*Tanjong, Cinke, Kabon Durian*). Some perkeniers give other people's names to their gardens (*Pieter Diau, Lust, Everts*) (See Usman Thalib & La Raman, 2015).

According to Usman Thalib & La Raman (2015), the naming of nutmeg or Perken plantations for the western end of Lonthoir and the eastern tip of Lonthoir island is as follows:

No.	Perken on the inside of the East End of Lonthoir	Perken in the West End of Lonthoir
1	Boyauw	Weltevrede
2	Waling kecil	Simonwa
3	Waling besar	Gunung Tambua
4	Spantjeby	Namaolu
5	Keysertorn	Keli dan Noorwegen
6	Combir	Samar
7	Ranan	Sogo Atap
8	Boerang	Lackey
9	Celamme (De ZoeteInval)	Takkermoro
10	Weltevreden atau Tanjung Cinke	Welgerust
11	Reria	Orang Datang (Ortatang)
12	Walie	
13	Dender Hilir	
14	Dender Hulu	
15	De DrieGebroeders	
16	BabieMandie	
17	Lemon Manis	
18	Boetong	
19	Everst	
20	Tamboekoe	
21	KanarieKamiri	
22	Perklust	
23	De GoedeWelkomst	
24	Toetra	
25	Laotang	
26	Batu Panjang	
27	Layar	

Table 1. Names of nutmeg plantations in Banda E	Besar Island
---	--------------

The number of gardens in Lonthoir is not 34 but 39, of which two are owned by poor people. These 34 gardens are those throughout Banda with an abundance of nutmeg, while the other five are small gardens and yield little. Namely: tambuku, De



GoedeWelkomst, Tanjung Cinke, Walie, Mount Tambua, and Sweet Lemon are very small gardens that do not exceed the yards of old Indian houses (Thalib & La Raman: 2015).

Lonthor, as the main island, has many nutmeg orchards, and some are quite famous. For more details on situational data such as garden area, yield, slaves, and number of educators, as well as the value of several gardens in Lontor, look at the following table:

Garden   Wide/   Yield/Pounds   Yield Value   Slav   Resi   Estat							
Names	Roed			es	dent	Value (rit)	
Boyauw	1.100	9.000 fuli& 36.000 pala	1408,37 dan 563,22	100	60	12.000	
Walingen kecil	840	8.000 fuli& 32.000 pala	1252,12 dan 541	90	45	14.000	
Orantate	750	6.000 fuli& 24.000 pala	939,6 dan 375,31	100	64	10.000	
Spaantjeby dan ColhaBok	2.000	4.000 fuli& 16.000 pala	1225,12 dan 541	150	70	15.000	
Kaytortore	1.800	6.000 fuli& 24.000 pala	939,6 dan 375,31	170	80	15.000	
Combir	1.200	4.000 fuli& 16.000 pala	626,4 dan 250,20	100	65	5.000	
Ranan	1.400	5.000 fuli& 20.000 pala	782,29 dan 313,2	90	55	10.000	
Calamme	2.200	4.000 fuli& 16.000 pala	626,4 dan 250,20	70	64	8.000	
Calamme II	700	3.000 fuli& 16.000 pala	469,27 dan 187,39	44	30	4.000	
Denner	1.100	5.000 fuli& 20.000 pala	782,29 dan 313,2	80	50	8.000	
Denner hutan	1.200	4.000 fuli& 16.000 pala	626,4 dan 520,20	60	45	7.000	
Babi mandi	1.200	7.000 fuli& 28.000 pala	1095,31 dan 428,12	70	40	10.000	
Van dermoor	3.000	7.000 fuli& 28.000 pala	1095,31 dan 428,12	90	60	11.000	
Streenrots	840	2.000 fuli& 8.000 pala	313,2 dan 125,10	45	30	4.000	
Buton	700	3.000 fuli& 12.000 pala	469,27 dan 187,39	44	30	5.000	
Lautan	3.000	8.000 fuli& 32.000 pala	1252,12 dan 541	120	84	14.000	
Orin	700	3.000 fuli& 12.000 pala	469,27 dan 187,39	44	30	4.000	
Tutra	1.400	3.000 fuli& 12.000 pala	469,27 dan 187,30	35	80	4.000	
Sameren	800	5.000 fuli& 12.000 pala	782,29 dan 313,2	40	45	5.000	
Van lot Baris	1.200	6.000 fuli& 24.000 pala	939,6 dan 375,31	100	60	10.000	

#### Table 2. Situation of several gardens in Lonthor in 1687



Lucas claazen	1.000	7.000 fuli& 28.000 pala	1095,31 dan 428,12	90	50	11.000
Lucas brandt	1.200	8.000 fuli& 32.000 pala	1252,12 dan 541	110	40	12.000
Roos	1.000	5.000 fuli& 20.000 pala	782,29 dan 313,2	60	60	9.000
	2.400	12.000 fuli& 48.000 pala	1878,16 dan 7991,20	200	120	20.000

Source: (Thalib and La Raman, 2015: 175)

As garden managers, perkeniers made an important contribution to the VOC in the spice trade. For the services of the perkeniers, the VOC provided protection and guaranteed their interests by establishing forts on several islands as well as several fortifications. However, the guarantees given by the VOC were reciprocal, namely that the perkenier was subject to daily maintenance obligations, including white painting, greasing, and cleaning up dirt for the forts and fortifications. Repairs and renovations should be the responsibility of the VOC. Pekenier's duties to care for the forts and fortifications of the VOC were divided as follows:

- 1. Perkenierselamon (Calamme) is required to take care of the fortifications of Lilinenburg and Selamon (Celamme).
- 2. Perkenier De DrieGebroeders, BabieMandie, and Boetong, looking after Wayer's fort.
- 3. Perkenier Loetang and Lemon Manis are obliged to look after the fortifications in the area around Laoetang.
- 4. PerkenierLust and Everts, required to carry out the maintenance of the fortifications at Ourien.
- 5. Perkenier Lontor, Ortatan (Oranttate), and Boyauw are required to carry out maintenance of the Hollandia fort and the Lacquoy stronghold.

Pekenier Waling Besar, Waling Kecil, and Raning are required to take care of the Waterplaats fort and the Combir fort (the Combir garden has a source of water and running water, which with bamboo tubes is channeled to the beach for the benefit of ships). For this reason, the location is called Waterplaats. Thalib & La Raman (2015)

Currently, the division of nutmeg plantation land is carried out evenly with various applicable provisions; this statement is in line with what was conveyed by Mr. Arman Abdullah, who said that the division of nutmeg plantation land was based on the amount of nutmeg given to each block holder and that the number of nutmeg trees distributed was around 40 nutmeg trees per block. The distribution of nutmeg blocks is by drawing lots and is intended for people who are already married due to the necessities of life that must be met.

Based on current data, plantation land in the Banda Islands has an area of 3,470 hectares, consisting of the islands of Naira, Banda Besar (Lonthoir), and Ay. The plantation located in Banda Besar (Lonthoir) has a land area of 3,000 hectares and has 21 nutmeg plantations consisting of: (1) Keli Nurwegen, (2) Takarmoro, (3) Simonual, (4) Lakui, (5) Waterpreden (6sed on current data, plantation land in the Banda Islands has an area of 3,470 hectares, consisting of the islands of Naira, Banda Besar (Lonthoir), and Ay. The plantation located in Banda Besar (Lonthoir) has a land area of 3,470 hectares, consisting of the islands of Naira, Banda Besar (Lonthoir), and Ay. The plantation located in Banda Besar (Lonthoir) has a land area of



3,000 hectares and has 21 nutmeg plantations consisting of: (1) Keli Nurwegen, (2) Takarmoro, (3) Simonual, (4) Lakui, (5) Waterpreden (6), ODB (Boiyauw), (7) Tutra, (8) Uring, (9) Lautang, (10) Pagar Buton, (11) WaerBaby Madi, (12) WaerJatijati, (13) Dender, (14) Selamong, (15) Raning, (16) Cumber, (17) Kakatoro, (18) Spancibi, (19) Spanciby, (20) Walang Kecil, (21) Walang Besar.

Each holder of nutmeg blocks is enforced since the division occurs and is marked with a work agreement letter (SPK) issued by PT. Banda Permai, which has been entrusted by the Maluku provincial government.

### Model of land management for nutmeg plantations

Nutmeg is known as a spice plant that has economic value and is multipurpose because every part of the plant can be used in various industries. Seeds, mace and nutmeg oil are export commodities and are used in the food and beverage industry. Oils derived from seeds, mace and leaves are widely used for the pharmaceutical, perfume and cosmetic industries. Nutmeg has a round yellow skin when it is old, white flesh. The seeds are thin-skinned rather black-brown wrapped in a deep red mace. The contents of the seeds are white, when dried they become dark brown with a characteristic aroma.

Nutmeg consists of flesh (77.8%), mace (4%), shell (5.1%), and seeds (13.1%). Commercially, nutmeg and mace are the most important parts of nutmeg and can be made into various products, including essential oils and oleoresins. Another possible product made from nutmeg seeds is nutmeg butter, namely trimyristin, which can be used for edible oils and in the cosmetic industry. Nutmeg flesh can be used to be processed into sweets, pickles, lunkhead, jam, wine, and nutmeg juice (syrup).

Nutmeg belongs to the Myristicaceae family, which consists of 15 genera (clans) and 250 species (types). Of the 15 genera, 5 are in tropical America, 6 are in tropical Africa, and 4 are in tropical Asia (Rismunandar, 1990). The nutmeg plant is a mediumstemmed plant with a height of up to 18 m and oval or oval-shaped leaves that are always green all year round. Nutmeg trees can grow in tropical areas at altitudes below 700 m above sea level in humid and hot climates with rainfall of 2,000–3,500 mm without experiencing a real dry season. The main nutmeg-producing areas in Indonesia are the Maluku Islands, North Sulawesi, West Sumatra, Nanggroe Aceh Darussalam, West Java, and Papua. In Indonesia, there are several types of nutmeg plants, namely;

- 1. *Myristicafragrans*, which is the main species and dominates other species in terms of quality and productivity. This plant is native to the island of Banda.
- 2. *Myristica argenta Warb*, better known as Papuanoot, is originally from Papua, especially in the bird's head area. It grows in forests, and its quality is below that of Banda nutmeg.
- 3. Myristica Scheffert-Warb, found in the forests of Papua.
- 4. *Myristicaspeciosa*, found on the island of Bacan. This species has no economic value.
- 5. *Myristicasucceanea*, found on the island of Halmahera. This species has no economic value.



In the context of the Banda Islands (Banda Besar, Lonthoir), the nutmeg plant is of the Myristicafragrans type by as much as 97% and MyristicaargentaWarb by as much as 3%. The stages in the management of trees and nutmeg plantations are as follows:

## Nutmeg Harvesting

Nutmeg harvest is carried out twice a year, in June–July and October–November. At harvest time, the people of Banda do it in the traditional way by using tools like gaigai bubu, tukiri, and knives (especially splitting nutmeg). Nutmeg can be picked directly from the tree when it is ripe and can also be picked from fruit that has fallen. Nutmeg that has fallen should be picked up as early as possible because it can be contaminated with Poecilipsmyristiceae seed powder pests and fungi, which can cause the nutmeg seeds to rot. The way to harvest nutmeg fruit that is located high is to use a pole (gai-gai bubu) that is equipped with a fruit basket at the end, or you can also use a pole with a buttress-shaped end. Sometimes people climb nutmeg trees to make it easier to pick nutmeg.



Figure 2: (a) Mace, (b) young nutmeg (crimpy/wrinkled), and (c) old nutmeg (super) (Documentation by Supriyadi 2020)

According to Mr. Ponky Van Denbroeke, the process of harvesting nutmeg in the Dutch Colonial era was carried out by taking nutmeg that was open or physiologically ripe with the aim of producing good-quality nutmeg. Apart from that, this can be done by climbing a tree, taking the nutmeg using a pole (gai-gai bubu), and then directly splitting it on the tree without having to drop it on the ground. Nutmeg that is contaminated with soil can affect the quality of the nutmeg.

### Drying Nutmeg and Mace

The mace is removed from the seeds, spread on a clean mat, and then dried in the sun. Nutmeg is dried in several ways, namely, the first method is smoked and the second method is dried under the hot sun. Based on the information provided by Mr. Rajab Saleh and Kardi Husin, nutmeg that is dried through smoking is more durable (free from mold) or lasts for years compared to nutmeg that is dried through drying under the hot sun.



The smoking process is carried out for 3–4 days using medium heat at a distance of 2-4 meters from the smoking area, and even then, depending on the amount of nutmeg smoked, During smoking, the smoked nutmeg must be stirred to produce an evenly dry nutmeg. Some of the assumptions made are that nutmeg that is dried through an improper drying process is very susceptible to nutmeg fungi, namely alfoxins, which are very dangerous for the human body and can cause cancer if consumed by humans.

Drying under the hot sun takes about 2–3 days if the weather is sunny. In unfavorable weather conditions, drying will be delayed and will produce mace of poor quality due to moldy and dull colors. To avoid the above, during the rainy season, drying can be done using a dryer with a low temperature of not more than 60 oC to prevent the drying process from being too fast, which will cause the mace to become brittle and lose some of the essential oils. After drying, mace is stored in a dark warehouse for about 3 months.

The color of the mace, which was originally fiery red, changed to dark red and finally became dark yellow to orange. The average dry mace is 10% of the nutmeg seed weight. To improve the quality, a sorting process is carried out to separate the intact mace from the incomplete, which is then packed in clean and dry packaging.

In October 2019, the Indonesian Ministry of Agriculture provided assistance with an agricultural dryer, namely the Solar DryerDome, to farmer groups in communities in the Banda Islands. The tools were given to the villages of Boiyauw and P. Run to dry the crops, namely cloves, nutmeg, and mace. Besides being able to dry cloves, nutmeg, and mace, Solar DryerDome can also dry all types of agricultural products, namely: bananas, chilies, ginger, seaweed, bananas, or tomatoes.



Figure 3: (a) Inside view of Solar DryerDome, (b) SDD nameplate, (c) Outside view of SDD, and (d) Inside view of mace and nutmeg drying (Documentation by Supriyadi 2020)



The advantages of the solar dryer dome are that it does not use electricity or gas at all because it only uses solar power. There are eight benefits to the Solar Dryer Dome, namely:

- 1. Shorten drying time to save time. For example, mace, which usually takes 1-2 days, can take 2-3 hours.
- 2. Frequent losses (products known to water or decay) when the product is being dried can be reduced by up to 50%.
- 3. The product becomes cleaner: it is protected from dust, pollution, mold, and animal waste.
- 4. Weather "resistant": Wind and rain are no longer a hindrance.
- 5. Much better production quality: this drying system can better retain its original color, skin, and taste.
- 6. It can retain 80–95% of the nutrients (depending on the type of plant) contained in it.
- 7. The temperature inside the solar dryer dome can be adjusted as needed.
- 8. Create more value: higher profits by manufacturing dry products

### CONCLUSION

In the early days, the processing of Banda nutmeg by PNP XXVIII was ruined due to mismanagement, kidnapping, cutting of protective trees, and rampant corruption by PNP XXVIII employees based in Makassar. In 1985, all assets previously confiscated by the VOC, called perks, were given to the local government at level I, including privately owned gardens with Indonesian citizenship. Then, in 1986, the Maluku Regional Government, led by Governor Hasan Selamt, formed PT Perkebunan Pala Banda. In 1994, PT Perkebunan Nutmeg Banda collapsed and went bankrupt, leaving debts due to mismanagement. After that, based on the Decree of the Minister of Home Affairs Number 573.71-036, PT Banda Permai was formed in collaboration with the Maluku Regional Government and the Yayasan Warisan dan Budaya Banda (YWBB).

The process of dividing the land for nutmeg plantations was carried out by lot and was intended for people who were already married due to the necessities of life that had to be met. Meanwhile, in the management of nutmeg plantations, from harvesting to drying, it is carried out by smoking and drying under the hot sun, which of course produces different qualities of dried nutmeg.

The presence of nutmeg in the Banda Islands has had a huge impact on the people of the Banda Islands, both positive and negative. The positive impact is to make life prosperous for the people in the Banda Islands, but the negative impact is that there was resistance that resulted in bloodshed that claimed the lives of most of the people in the Banda Islands.

#### REFERENCES

- Alwi, Des. (2006). Sejarah Banda Naira. Pustaka Bayan &Yayasan Warisan dan Budaya Banda Naira. Malang
- Amry, Eka Sari. (2016). Perkembangan Produksi Pala dan Pelestarianbya di Kepulauan Banda Abad ke-19 sampai Abad ke-20. Skripsi STKIP Hatta-Sjahrir: Banda Naira.



- Bustaman, S. (2007). Prospek dan Strategi Pengembangan Pala di Maluku. Jurnal Perspektif. Volume 6 No 2
- Bustaman, S. (2008). Strategi Pengembangan Bio-etanol berbasis Sagu di Maluku. Perspektif. 7(2): 65-79
- Daliman. (2012). Metode Penelitian Sejarah.Penerbit Ombak : Yogyakarta
- Departemen Pertanian. (1986). Pala dan Pengolahannya. Pustaka Deptan Diakses pada 20 Mei 2010. 158 Hal
- Farid, Muhammad. (2019). *Ritus Panunggu Sebagai Kecerdasan Ekologis Masyarakat Pulau Rhun untuk pelestarian lingkungan pesisir*. Mungga: Jurnal Ilmu Perikanan dan Masyarakat Pesisir 5(1): 1-12.
- Farid, Muhammad. (2020). Pelestarian Warisan Sejarah Melalui Sinergi Antarstakeholder dan Digitalisasi Warisan Sebagai Model Pengembangan Pariwisata Banda Naira, Kamboti: Jurnal Sosial dan Humaniora 1(1): 44-58. [DOI: 10.51135/kambotivol1iss1pp44-58.]
- Farid, Muhammad. (2021). *Tana Banda; Esai-esai tentang mitos, sejarah, sosial, budaya Pulau Banda Naira*. Jakarta: Penerbit Prenada Media Group
- Film indonesia terbaru 2019 *Banda The Dark Forgotten Trail*. Diakses melalui <u>https://www.youtube.com/watch?v=16YfDSq\_mH8</u> pada bulan Agustus 2019.
- Herwindo. (2012). Pusat Penelitian dan Pengembanngan Perkebunan. Jawa Barat
- Husodo, S. Y. (2007). *Potensi Pemulihan Ekonomi*, <u>http://www.republika.co.id</u>, 07 Januari 2008
- Latani, Winto. (2016). *Penaklukan Banda oleh Jan PieterszoonCoen pada tahun 1621*. Skripsi STKIP Hatta-Sjahrir. Banda Naira
- Milton, Giles. (2018). Pulau Run Mangnet Repmah-Rempah Nusantara yang Ditukar dengan Manhattan. PT Pustaka Alvabet : Ciputar Tangerang Selatan.
- Miftakhuddin. (2019). Kolonialisme: Eksploitasi dan Pembangunan Menuju Hegemoni. Jawa Barat : CV Jejak.
- Moeljadi, David & dkk. (2016). *Kamus Besar Bahasa Indonesia* (Edisi Kelima) V 0.3.2 Beta (32). Badan Pengembangan Bahasa dan Perbukuan, Kementrian Pendidikan dan Kebudayaan Republik Indonesia.
- Nugraheni, Endang & Pangaribuan, Nurmala. (2008). pengelolaan lahan pertanian gambus secara berkelanjuan. Universitas Pajajaran : Bandung
- Nurdjannah, Nanan. (2007). *Teknologi Pengolahan Pala*. Badan Penelitian Dan Pengembangan Pertanian.
- Pranoto SW. (2010). Teori dan Metodologi Sejarah. Graha Ilmu. Yokyakarta
- Praptanto, Eko. (2013). Sejarah Indonesia Zaman Pendudukan Jepang dan Kemerdekaan Indonesia. PT. Bina Sumber Daya MIPA : Jakarta.
- Rinaldi, Decky. (2013). Pengolahan Lahan Kelapa Sawit Dalam Meningkatkan Pendapatan Kelompok Plasma Di Serawai. Universitas Tanjungpura : Pontianak.
- Sjamsuddin. (1996). Metodologi Penelitian Kualitatif. Bandung. Remaja Rosdakarya.
- Sjamsuddin, Helius. (2012). Metodologi Sejarah. Penerbit Ombak : Yogyakarta
- Thalib, Usman. La Raman. (2015). Banda dalam Sejarah Perbudakan di Nusantara, Swastanisasi dan Praktik Kerja Paksa di Perkebunan Pala Kepulauan Banda Tahun 1770-1860. Ombak. Yogyakarta.
- Van Donkersgoed, J., & Farid, M. (2022). *Belang and Kabata Banda: The significance of nature in the adat practices in the Banda Islands*. Wacana: Journal of the Humanities of Indonesia, 23(2), 415-450

Wasino & Sri Hartatik, Endah. (2018). *Metode Penelitian Sejarah Dari Riset Hingga Penulisan*. DI Yogyakarta: Magnum Pustaka Utama.