

# Alluvial Island Herbal Plant Landscape And The Ethno-Medico Malay Tradition Of Binamulia (Study Of The Bomoh Tradition-Based Medicine System In Malay Villages, Meranti Islands Regency, Riau)

Yusmar Yusuf<sup>1</sup>, Resdati<sup>2\*</sup>, Rd Siti Sofro Sidiq<sup>3</sup>, Muhammad Riskiansyah<sup>4</sup>

<sup>1,2,3,4</sup> FISIP, Universitas Riau, Indonesia

\* Corresponding author:

Email : resdati@lecturer.unri.ac.id

---

## **Abstract.**

*This study aims to identify and analyze various types of herbal plants around the Sago forest ecosystem which are often used as traditional medicine by the people of the Meranti Islands. This study uses qualitative methods, with data collection techniques through interviews and direct observation in the field. The result was found a lot of herbal plants around the sago ecosystem that have many benefits and extraordinary benefits. However, nowadays traditional medicine with herbal ingredients has started to disappear due to the development of chemical drugs and the decreasing number of people who understand and understand traditional medicine. Therefore, this is where the importance of this research is to explore and examine and introduce efficacious herbal plants so that they can be preserved. This study aims to identify and analyze various types of herbal plants around the Sago forest ecosystem which are often used as traditional medicine by the people of the Meranti Islands. This study uses qualitative methods, with data collection techniques through interviews and direct observation in the field. The result was found a lot of herbal plants around the sago ecosystem that have many benefits and extraordinary benefits. However, nowadays traditional medicine with herbal ingredients has started to disappear due to the development of chemical drugs and the decreasing number of people who understand and understand traditional medicine. Therefore, this is where the importance of this research is to explore and examine and introduce efficacious herbal plants so that they can be preserved.*

**Keywords:** Herbal Plant, and The Sago Forest Ecosystem

---

## **I. INTRODUCTION**

The Meranti Islands Regency is the capital of the Long Strait. Selat Panjang City itself has the nickname Sago City. This is because the Long Strait is one of the areas for developing national food security based on sago cultivation. Even the Meranti Islands Regency is the largest producer of sago starch in Indonesia. The results of sago starch are also sent to Cirebon, and some are exported to Malaysia, Singapore, and Japan (Andriani, Rosnita dan Yulida:2018).<sup>1</sup> Based on data from the Central Bureau of Statistics of Riau Province in 2016 stated that sago plantations in Riau province have an area of 83,256 hectares with production in 2013 reaching 126,145 tons. The surrounding community uses sago to meet their daily needs. It can be said that on average they live from the results of farming Sago. In the Meranti Islands Regency Regional Regulation Number 1 of 2019 concerning the Meranti Islands Regency Industrial Development Plan for 2019- 2039, in article 5 regarding Regional Leading Industries, the sago industry is mentioned in the first point out of ten points in it, this shows that Meranti Regency has an industry. The most superior is the sago industry, among other developing industries in the Meranti Islands Regency. Not only sago produce that they use, it turns out that in the sago garden ecosystem there are various types of herbal plants. Herbal plants are medicinal plants that can be used for traditional medicine. Traditional medicine itself is a method of treatment carried out by the community since ancient times which continues to be passed down from generation to generation.

Various herbal plants that exist by the community have been widely used to treat various types of diseases such as fever, cough, heart, high blood pressure, cancer, hair loss, stamina enhancer and various other diseases. The prescriptions for these herbal medicines they get from the old gatherers or shamans are passed down from generation to generation. Since ancient times, people have processed this nutritious herbal plant in a simple way, such as boiled, cut the roots, ground and then the juice is taken and some are directly kneaded and mixed with water. This is a form of local wisdom of the Meranti Islands district community. Wisdom is a positive behavior from human relations with nature and the surrounding environment.<sup>2</sup> However, with the development of today's era, most people have started to leave the tradition of traditional medicine with these herbal ingredients. They often go to the village doctor or midwife for treatment. This causes the number of herbal plants that have extraordinary properties to decrease because they are not cultivated, even destroyed during land clearing as a result of ignorance of their benefits and properties. Then also the number of parents or shamans who understand and understand this treatment is decreasing. This further reduces the knowledge of traditional medicine using herbal ingredients. Whereas traditional medicine with natural herbal ingredients should develop rapidly, because it is supported by the availability of rich and diverse biological resources in Indonesia, especially in the Meranti Islands Regency. In addition, the use of traditional herbal medicines has a low effect compared to the use of artificial chemical drugs. This is where the importance of this research is to explore and examine various types of existing herbal ingredients and plants so that the wider community has knowledge of traditional medicine, the types and parts of plants that can be used, processing methods and evaluating the status of the rarity of the plants used.

## II. METHODS

This study uses a qualitative research method by determining the sample size selected by purposive sampling. Data collection techniques used in this study were interviews and direct observation in the field.

## III. RESULT AND DISCUSSION

### 1. Herbal plants around the sago garden ecosystem. Pohon Ara (*Ficus Carica*)

Fig tree (*Ficus Carica*) is a type of tropical plant that inhabits various ecological niches. The vegetative characteristics of the fig tree are quite distinctive, namely soft and when parts of this tree are injured it will secrete white to yellowish sap (latex). Figs have a sweet enough taste that they are an important food source for a number of fruit-eating animals. Figs are high in nutrients and antioxidants. Local people use this fruit to improve digestion, control heart and blood vessel health and prevent cancer. In addition to the fruit, the water from the roots of this tree can also be used as a medicine for internal heat. The trick is to cut the roots, then put a container to collect the water. Usually people cut it in the afternoon, then take it in the morning and drink it right away..

### 2. Seletup (*Physalis minima*)

Seletup (*Physalis minima*) or commonly called Ciplukan is one type of plant that is highly sought after because of its many properties. This plant is easy to find in vacant lands, yards of people's houses, land that is not too wet, such as the edge of a ditch, the edge of a railroad track, and the edge of a river. The fruit is covered by flower petals or commonly called mosquito nets by the surrounding community.

This plant has a lifespan of approximately one year. The characteristics of ciplukan plants are as follows:

1. This plant has a height of 30-50 cm.
2. The stem of this plant is green square, and branched.
3. The leaves are alternate and notched, stem 7-25 mm, elongated ovoid, pointed, 3.5-10 cm long, and 2.5 cm wide. Looks green on the upper surface of the leaf, while light green on the lower surface and has fine hairs.

The young ceplikan fruit protected by the petals of the fruit cover. The Fruit is lantern-shaped, yellow when ripe, and tastes sweet, slight sour. The whole of this plant can be used for medicine ranging from fruit, leaves, stems to roots. The surrounding community very often looks for and uses it. Especially those who have small children or babies who have a fever. Ciplukan fruit contains chemical

compounds such as chlorogenic acid, Vitamin C, ascorbic acid, alkaloid, tannin, ascorbic acid, fisalin, kriptoxantin, gula, and oleic acid. Some diseases that can be cured with traditional herbs set up/ciplukan cure influenza

#### Cure Influenza

- a. Take all parts of the ciplukan plant, then wash it clean.
- b. Cut into pieces 3-4 cm in size, then dried in the sun.
- c. In order not to damp, after drying immediately wrapped.
- d. Take immediately about 9-15 grams of the dried ciplukan plant, then boil it.
- e. Drink boiled water three times a day or as needed.

### 3. Daun pohon Kayu putih mata (*Eucalyptus*)

Eucalyptus is one type of tree that is often used for medicine, because of its considerable properties. This tree itself originates from Australia, but currently grows throughout the world including Indonesia with more than 700 species. Its characteristics are smooth, green, gray and brown stems and oval-shaped leaves. This plant is rich in antioxidants and the greatest benefit comes from the oil extracted from its leaves. The leaves of this tree are used by local people to treat head lice and hair loss. The method of processing is very simple, namely by squeezing the leaves with water and then rubbing it on the head. Another advantage of this leaf is that it can last up to a year even though it has been picked from the tree.

### 4. Kayu Geronggang (*Cratogeomachra*)

Geronggang wood (*Cratogeomachra*) is a native plant of Indonesian forest ecosystems and is often found in Riau Province. This plant grows well on peat soil. This plant can reach a height of up to 40 meters with a diameter of 60 centimeters. This wood is quite strong and easy to work with. Geronggang wood has good wood grain, is often used as raw material for charcoal and has long been used for carpentry. In addition to the benefits of the wood, geronggang is also useful as an antimicrobial, anti-oxidant and free radical scavenger. The local community has used the bark, leaves, roots and resin to treat itching, wounds and stomach aches.

### 5. Sendudu (*Melastoma malabathricum*)

Sendudu (*Melastoma malabathricum*) is a plant with many mentions in each area such as Harendong in Sunda, Senggani in Java. Plants are shrubs that have purple flowers and are very easy to find in open ground

This wild plant has benefits including:

\* Wound medicine

Chew a few leaves or can also be ground, then smeared on the wound

Treat food poisoning.

- a) Cut the roots that are in the ground,
- b. Prepare a receiver
- c. After the water is collected, please drink it directly.

\*Toothache medicine

- a. Cut the roots and boil
- b. Then use the boiled water to gargle.

### 6. Sirih Hutan (*Piper Aduncum*)

Forest Betel (*Piper Aduncum*) is a plant that propagates on other tree trunks. This plant is native to Indonesia. This plant can reach a height of 15 m, betel stems are round, segmented, and greenish brown. The single leaf is shaped like a heart, the tip is pointed, and gives off a pleasant aroma when squeezed. The content of essential oil (betlephenol), starch, sesquiterpenes, kavicol, tannin, sugar and tanning substances in the essential oil of betel leaf has the power to kill germs, antioxidants and fungicides, as well as anti-fungal. People often use the leaves of this plant to treat itching due to mosquito bites. You do this by crushing the leaves and then applying it to the itchy part of the mosquito bite. Then the stems can also be used to repel mosquitoes, by burning them until they emit smoke. The smoke will repel mosquitoes, because mosquitoes do not like the smell.

## 7. **Ilalang (*Imperata cylindrica*)**

Islands. Here are some characteristics of the reeds:

1. Plant height 3-180 cm.
  2. Stems erect to form one inflorescence and dense.
- The leaves are single, ribbon-shaped, sharp pointed ends, rough, erect, sparse hair, and measuring about 12-80 cm x 35-18 cm.
4. The arrangement of flowers is compound, slightly curved, 6-28 cm long, 2.5-5 cm flower branches, 1-3 mm flower stalks and each branch has two spikes.
  5. The size of the stamens 2.5-3.5 mm and purple or yellowish white.
  6. The pistil looks like the shape of a chicken feather.
  7. The seeds have a length of more than 1 mm and are oblong.
  8. January to December is the flowering time of the weeds.

*Imperata cylindrica* is a type of sharp-leaved grass, which often grows wild in forests or vacant land and becomes a weed in agricultural land. This plant can Reeds are often used as ingredients for traditional medicines that can cure various diseases, such as acute kidney inflammation, shed urine, treat fever, reduce fever, stop bleeding, skin softener, blood purifier, appetite enhancer, treat venereal disease. (blood urine, gonorrhea, king lion), high blood pressure, neurological diseases, and others. Based on the test results, in the reed plant found various chemical content that is useful for the human body. The ingredients include glucose, mannitol, saccharose, malic acid, anindom, citric acid, anindo, coixol, and many others.

The part of the reeds commonly used for medicinal purposes is the rhizome. Here are some traditional herbs made from reeds that can cure diseases:

\*Treating Acute Kidney Inflammation

- a. Take the roots of the weeds that are still fresh 60-120 grams.
- b. Wash the ingredients until clean and cut into pieces as needed.
- c. Boil until boiling three cups of water to leave one cup.
- d. Drink boiled water 2-3 times a day on a regular basis.

\* Treats Nosebleeds

- a. Take the roots of the weeds that are still fresh to taste, then wash and clean.
- b. Mash and squeeze the water until it collects 100 cc, then drink it.
- c. Or it could be by taking 30 grams of fresh roots of reeds, wash thoroughly, boil in three cups of water until the remaining one cup, and drink

The part of the reeds commonly used for medicinal purposes is the rhizome. Here are some traditional herbs made from reeds that can cure diseases:

\*Treating Acute Kidney Inflammation

- a. Take the roots of the weeds that are still fresh 60-120 grams.
- b. Wash the ingredients until clean and cut into pieces as needed.
- c. Boil until boiling three cups of water to leave one cup.
- d. Drink boiled water 2-3 times a day regularly.

\* Treats Nosebleeds

- a. Take the roots of the weeds that are still fresh to taste, then wash and clean.
- b. Mash and squeeze the water until it collects 100 cc, then drink it.
- c. Or it could be by taking 30 grams of fresh roots of reeds, wash thoroughly, boil in three cups of water until the remaining one cup, and drink

## 8. **Akar Sekunyit (*Arcangelisia flava*)**

Berberine which acts as an antibacterial, anticancer, and hepatoprotector.

Many of the benefits of this turmeric root include improving liver function, curing hepatitis, lowering high blood pressure, curing diabetes, malaria, asthma and increasing endurance. How to use it:

- a. Take 3-5 pieces of turmeric root

- b. Then wash until clean
- c. Boil with three glasses of water for ten minutes until the cooking water is yellow.
- d. Strain the water, cool it and drink it
- e. For prevention and treatment, it is enough to drink once a day. For treatment taken 3 times a day.

This plant is also very efficacious for all health problems of women. So it is often said to be the King of women's medicine.

#### 2. Menstrual Medicine

Materials that can be used are Api guruh perepat, Temu kuning, Sulemangroves 3 Cekak (Cekak is the size of a handful of hands).

For Drinks:

1. Mumbang Coconut.
2. Leaf stump. 3. Pukuk Senresiden.
4. Cucumbers.
5. Peak Guava Stone.
6. The Top of the Bird's Head.
7. Turmeric.

#### 3. Cancer Curea. Cancer

The material used is the betel nut, then remove the leaves, just take the midrib, cut it into pieces and boil it, then drink the water regularly. See the changes within 2 weeks.

#### b. Breast cancer (milk coals)

The material used is 1 piece of corn removed from the skin, burned until charred and then mashed, after that it is sifted, then coconut oil is added. After thick black, apply on the sore.

#### 4. Removing reinforcements

Apart from being used as traditional herbal medicines, according to the belief of the people around the plants around the sago garden are also used to ward off evil, including:

1. Nipah shoots are placed on the edge of the door, then black sugarcane, black taro, seganda deer, jeluang or yellow fighting, inggu, sulfur, blacksmith, jerangau, red ginger and special prayers are read.

We must believe that forests always provide tremendous benefits if we are able to care for them. From the forest we get various necessities of life such as food, to medicine. Natural wealth and its benefits will be maintained if it continues to be preserved.

## IV. CONCLUSION

There are many herbal plants that live around the sago ecosystem. For some types of plants are not difficult to find. Even some types of plants are often considered as wild plants that must be cleaned such as weeds and sadudu. The people of Meranti used to always use herbs and animals around the sago ecosystem to cure various diseases, to ward off evil, even to increase stamina. Traditional medicine recipes they get from generation to generation from parents or shamans who understand this. But now people rarely know and use herbal plants to treat diseases. This is due to the growing development of chemical drugs and the fewer parents or traditional healers who understand the prescription of traditional medicine.

## REFERENCES

- [1] Agustin, Yeni., Edy Sapada., Mayaranti Wilsya. 2012. *Uji Efek Hipoglikemik Ekstrak Tanaman Senduduk Pada Tikus Putih Jantan*. STIK Siti Khadijah Palembang.
- [2] Andriani, Yulia, Rosnita, & Roza Yulida. (2018). *Penanggulangan Kebakaran Lahan di Desa Tanjung Peranap Kecamatan Tebing Tinggi Timur Kabupaten Kepulauan Meranti*. 9(2), 244-250.
- [3] Ani, Novi., Immy Suci Rohyani., & Maulana Ustadz. 2018. *PENGETAHUAN MASYARAKAT TENTANG JENIS TUMBUHAN OBAT DI KAWASAN TAMAN WISATA ALAM MADAPANGGA SUMBAWA*. *Pijar MIPA*, Vol. 13 No. 2, September 2018: 160 – 166 DOI: 10.29303/jpm.v13i2.751.
- [4] Arini, Diah I.D. 2017. *PENGETAHUAN LOKAL MASYARAKAT SULAWESI UTARA DALAM PEMANFAATAN POHON HUTAN SEBAGAI BAHAN OBAT TRADISIONAL*. *Jurnal Masyarakat & Budaya*, Volume 19 No. 2

- [5] Badan Pusat Statistik Provinsi Riau. (2016). *Kabupaten Kepulauan Meranti dalam Angka. Riau.*
- [6] Badan Riset Dan Inovasi Nasional. 2020. *Tanaman Melastoma malabathrium L./Harendong Sebagai Tanaman Obat Alternatif Alami.*
- [7] Emrinaldi, Tengku. Dkk. 2019. *Peningkatan Sensitivitas Sensor Koil Datar Mempergunakan Soft Magnetic Vitrovac. Jurnal Online Of Physic* 5(1), 57-61.
- [8] Falah, Faiqotul., Tri Sayektiningsih., & Noorcahyati. 2013. *KERAGAMAN JENIS DAN PEMANFAATAN TUMBUHAN BERKHASIASAT OBAT OLEH MASYARAKAT SEKITAR HUTAN LINDUNG GUNUNG BERATUS, KALIMANTAN TIMUR. Jurnal Penelitian dan Konservasi Alam* Vol. 10 No. 1.
- [9] Husna, Maisarotil. Dkk. 2022. *Pemanfaatan Rempah Herbal Di Desa Sungai Lekop Kabupaten Bintan. JPPM Kepri : Jurnal Pengabdian Masyarakat Kepulauan Riau.*
- [10] Istigfar, Stevi., Defri Yoza., Rudianda Sulaeman. 2017. *Keanekaragaman Jenis Tumbuhan Obat di Hutan Adat Rimbo Tujuh Danau Desa Buluh Cina Kabupaten Kampar Provinsi Riau. JOM Faperta UR* Vol. 4 No 1.
- [11] Iswandono, Elisa., dkk. 2015. *Pengetahuan Etnobotani Suku Manggarai dan Implikasinya Terhadap Pemanfaatan Tumbuhan Hutan di Pegunungan Ruteng. Jurnal <http://journal.ipb.ac.id/index.php/JIPI> DOI:10.18343/jipi.20.3.171*
- [12] Mulyani, Hesti., Sri Harti Widyaastuti., Venny Indria Ekowati. 2016. *Tumbuhan Herbal Sebagai Jamu Pengobatan Tradisional Terhadap Penyakit Dalam Serat Primbon Jampi Jawi Jilid 1. Jurnal Penelitian Humaniora* Vol. 21 No. 2.
- [13] Naemah, Dina., Eny Dwi Pudjawati. 2021. *Keragaman Tanaman Berkhasiat Obat Di Kawasan Hutan Dengan Tujuan Khusus (KHDTK) Rantau. Jurnal Hutan Tropis Universitas Lambung Mangkurat* Vol. 9 No. 1.
- [14] Noorhayati, S.H., dkk. 2021. *Khasiat Tumbuhan Akar Kuning Berbasis Bukti. Nas Media Pustaka*
- [15] Nuranda, Apri., Chairul Saleh., & Bohari Yusuf. 2016. *Potensi Tumbuhan Ciplukan (physalis angulata Linn) Sebagai Antioksidan Alami. Jurnal Atomik Universitas Mulawarman* 01 (1) hal 5-9.
- [16] Purnama, Yuzar. 2016. *Kearifan Lokal Masyarakat Jatigede Dalam Pengobatan Tradisional. Patanjala* Vol. 8 No. 1.
- [17] Rasy, Viksan. (2013). *30 Tanaman Herbal Untuk Pengobatan Tradisional. Yogyakarta : Sakti.*
- [18] Sembiring, Salmen., Sismudjito. 2015. *Pengetahuan dan Pemanfaatan Metode Pengobatan Tradisional Pada Masyarakat Desa Suka Nalu Kecamatan Barus Jahe. Jurnal Perspektif Sosiologi* Vol. 3, No.1.
- [19] Sinapoy, Sabaruddin., Basrin Melamba., & Herman. 2021. *Ekologi Budaya Dan Nilai Kearifan Lokal Pohon Sagu Dalam Dimensi Masyarakat Suku Tolaki. Jurnal Sosial dan Budaya* Vol. 10, No.3 : 323-342.
- [20] Yunanda, T.S., Defri Yoza., Rudianda Sulaeman. 2017. *IDENTIFIKASI JENIS KAYU DALAM PEMBUATAN KERAMBA BERDASARKAN PERSEPSI MASYARAKAT DI DESA BULUH CINA KECAMATAN SIAK HULU KABUPATEN KAMPAR PROVINSI RIAU. JOM Faperta UR* Vol.4 No 2.
- [21] Yuniati, Eny., Muhammad Alwi. 2010. *Etnobotani Keanekaragaman Jenis Tumbuhan Obat Tradisional dari Hutan Di Desa Pakuli Kecamatan Gumbasa Kabupaten Donggala, Sulawesi Tengah. Jurnal Biocelebes Fakultas Matematika dan Ilmu Pengetahuan Alam Universitas Tadulako.*