# Analysis of the Attitudes of Coastal Communities in Sasi Management in Leihitu District, Central Maluku Regency

Simona Christina Henderika Litaay<sup>1,\*</sup>, Andi Agustang<sup>2</sup> and Muhammad Syukur<sup>2</sup>

<sup>1</sup>Faculty of Social and Political Sciences, Department of Sociology, Pattimura University, Indonesia

Abstract: Sasi is a belief system, rules, and rituals that involve temporary prohibitions on the use of specific resources or areas. Social, economic-political, and ecological pressures are the background for the dynamics of Sasi. This study aimed to explain the impact of the Attitudes of the Coastal Community on Sasi Management in Leihitu District, Central Maluku Regency. This research used a descriptive qualitative method, and it was conducted in the Leihitu sub-district, Central Maluku district. The research location was selected by purposive sampling. The results showed that most of the coastal communities in the Leihitu sub-district accepted/supported Sasi's implementation. The knowledge about Sasi and communication affects the coast in the Leihitu sub-district, Central Maluku District. At the same time, the closing of the Sasi distinguishes the implementation of Sasi. The opening of the Sasi is carried out by traditional, religious, or a combination. The monitoring, accountability, and enforcement mechanisms carried out in traditional coastal resource management are generally carried out within the community, with the community observing the violations that occur.

**Keywords:** Coastal Communities, Sasi, Leihitu District.

#### 1. INTRODUCTION

Indonesia is a maritime country with a water area of ± 6,315 million km2, or the equivalent of three times the land area of Indonesia, namely 1 913 578.68 million km2 (KKP, 2015; BPS, 2018). Indonesia is also known as a maritime country and mega-biodiversity because it is dominated by marine ecosystems and the diversity of resources therein (Dahuri, 2003). Six thousand eight hundred sixty-nine marine life species were identified, including marine plants (mangroves, algae, and seagrass), divided into 77.87% fauna, 14.14% algae, 2.08% flora, and 5.91% marine microbes (BPS, 2017). The recognition of indigenous peoples in Indonesia has been slow since the state acknowledged this community's existence in the constitutional amendment. Several studies have discussed the effectiveness of the practice of sea Sasi in Maluku. Rugebregt 2013) analyzed the revitalization of marine Sasi and its sustainability in managing marine and coastal resources in Maluku.

Sangadji (2010) sees the threat of marine Sasi's sustainability due to the tendency for the loss of social capital in people's life systems. In another dimension, (Tuhumuri 2010) examines the effectiveness of marine practice in ensuring natural resources conservation through local knowledge of the community. Meanwhile (Mony, Satria, and Kinseng 2015) saw the impact of power relations on the sustainability of marine Sasi practices in Maluku. As for institutional changes resulting from changes in social relations in society and with external parties, it is also a factor in weakening Sasi (Novaczek et al. 2001). These researches are the primary basis for analyzing the sustainability of marine Sasi practices in Maluku in ensuring the sustainability of coastal resource management. Previously (Ruddle 1993) has analyzed the external effects on communitybased fisheries management in the Asia Pacific region. Changes to the (country's) macro-political system have played an important role in undermining traditional fishing practices. The social, economic-political, and ecological pressures that are the background for the dynamics of Sasi need to be examined more deeply to see the patterns of change that have occurred and how they affect people's livelihoods. Various discussions that have been conducted have shown the degradation of the Sasi institution due to the decreasing legitimacy of local authorities and the competent leadership over the Sasi institution, as happened in Central Maluku (Harkes and Novaczek, 2002) and Raja Ampat (McLeod et al., 2009). Sasi has also mainly been abandoned in most areas of the Kei archipelago, Maluku, except in a few areas on the east coast of Kei Besar (Adhuri, 2013). Sasi is a traditional institution that applies conservation principles, which regulates the maintenance and harvesting of sea cucumbers, Batulaga, Lola, and others within a certain period. According to Sztompka (2004), tradition is everything (including customs, beliefs, habits, teachings, and others) that goes on from generation to generation and is inherent in life. The process of social construction regularly makes Sasi Laut develop and experience

E-ISSN: 1929-4409/20

<sup>&</sup>lt;sup>2</sup>Faculty of Social and Political Sciences, Department of Sociology Makassar State University, Indonesia

<sup>\*</sup>Address correspondence to this author at the Department of Sociology, at Pattimura University, Indonesia; Tel: +6281343004304; E-mail: simona.litaay@gmail.com

changes, either strengthening or weakening as social dynamics. The fact is that of the eleven villages in the Leihitu sub-district that have implemented Sasi; now, there are only three villages that still implement marine Sasi, while land Sasi is still being maintained. How is the Attitude of the Coastal Community Towards the enforcement of Sasi in Leihitu District, Central Maluku Regency?

#### 2. LITERATURE REVIEW

## 2.1. Sasi Institution

This Sasi institution is a social institution built based on knowledge, cultural behavior, and the religious system they believe in. Sasi is generally known as a traditional natural resource management system implemented by communities in Eastern Indonesia, including Maluku and Papua. Sasi is a belief system, rules, and rituals that involve a temporary ban on the use of specific resources or areas (Adhuri, 2013). Sasi is an environmental institution and a form of customary law that supports sustainable development, conservation, and social equality (Zerner, 1994). Sasi is also defined as a social institution. In modern sociology, social institutions tend to be seen as the relationship between norms and values surrounding human activities. Sasi is defined as a social institution containing provisions that regulate the prohibition of taking and community members' ability to manage natural resources and the environment within a certain period (Anonymous, 2002). Nahuway (2007) states that Sasi is a good way of managing or conserving natural resources, which has been used and has been running since our ancestors' time the present means that It sasi as something that exists outside the individual has become one with the individual and becomes a part of his life.

The regulations in the implementation of this prohibition also concern the regulation of human relations with nature and between humans in the area subject to the prohibition, so Sasi is essentially an effort to maintain social manners, including efforts towards equal distribution of income from the source surrounding natural resources to all residents or residents (Kissya, 1993). Sasi's three institutional objectives (Zerner, 1992 in Satria, 2002), namely: (1) Ensuring equal opportunities for local communities to carry out fishery activities in coastal areas. (2). Ensuring the effectiveness of fishery resource management in coastal waters sustainably; (3). Ensure opportunities for community members to preserve the

subsistence and economic values of their territorial waters. It means that there are certain management rights over a water area, while communities outside the area are prohibited from carrying out fishing activities in the area where Sasi is enforced.

## 2.2. Implementation of Sasi

Sasi is a tradition of the Maluku people in environmental conservation, which lives and develops together with traditional village institutions, whose implementation is related to the role in the customary government structure held by several traditional officials, namely the King, Kepala Soa, Mauwang, Sansiri. Negeri, Landlord, Head of Kewang, Anak Kewang, and Marinyo. Natural resource management using the Sasi costum is still found in almost all villages. The location of the Sasi is an area of ownership of the village's traditional territory or certain clan groups in the form of waters of bays, headlands, and small islands. Natural resource practices like this are also found in the Indo-Pacific region ( Cohen & Foale, 2013). Sasi is an example of a social institution formed to maintain the use of natural resources, which prohibits residents from taking forest or marine products in a particular place and time (Mansoben 2003). In most villages in Central Maluku, Sasi's regulations and the determination of the Sasi and open Sasi closings are regulated in a regular meeting or village meeting (meeting Saniri Negara).

The implementation and supervision of all provisions of the customary law of Sasi are the duties and functions of the Kewang (village police). Kewang is a customary institution whose personnel are elected from the village community (country children) based on the Saniri Besar country lineage (adat council). Implementing the Sasi, which includes the length of time for closing and opening the Sasi, depends on Sasi's resource. As long as the Sasi is closed, it is prohibited for villagers and outsiders to take (disturb) the Sasi resource.

The resources allocated are different for each village in Maluku. In general, Sasi resources include plants and animals, on land (such as coconut, nutmeg, pineapple, areca nut, cuscus) and sea (fish, Lola, sea cucumber, seaweed). In further developments, currently in several villages in the Central Maluku district, Sasi is also being applied for natural resources such as sand, gravel, coral, and other large rocks. Zerner (1994), in Soselisa (2001), Sasi for marine commodities, such as Lola or round milk snail (Trochus

Niloticus), is thought to be essential before the late 1950s or after. Marine resources are claimed as public property (communal) in public areas, then the Sasi for marine resources is the state Sasi or general Sasi. It can be said that almost all villages in Maluku have implemented Sasi in their daily life. In general, the functions/benefits of implementing Sasi are:

- 1. So that all the fruits planted in the hamlet are taken when the fruits become old and ripe.
- 2. To reduce all disputes within the hamlet, namely between the children of the data center and the head of the dati, between the heirloom children and the heirloom head is essential.
- 3. The land of the country and the port (sea) can be adequately preserved for use by residents of the country themselves.
- 4. So that theft is reduced (Anonymous, 1990).
- 5. The function of Sasi, when studied in-depth, the following substantive values can be found:
- 6. Appropriate use of a person's rights according to the time determined to harvest the produce from his village.
- 7. Maintenance and preservation of the natural environment (sea and land) for the sake of increasing mutual welfare.
- 8. Obligation to indulge plants.
- 9. Preventing disputes (land and water) between neighboring rural / country communities.
- 10. Avoiding accidents for women with work tasks in addition to men.
- 11. Reducing the possibility of a crime in the form of theft.

# 3. METHOD

This study used a constructivist paradigm and qualitative research methods. This paradigm seeks to understand social reality by developing subjective meanings for individual experiences in the study (Creswell 2016). This research was conducted in the Leihitu sub-district. Central Maluku District was selected by purposive sampling. The data used are primary data and secondary data (Sugiyono 2013). Primary data was a source of data that is directly

obtained by researchers from the results of observations (observations), in-depth interviews (indepth interviews), and Focus Group Discussion (FGD). Secondary data was obtained from documents related to research, such as documents in government offices, data on conservation areas and Sasi management from NGO offices and Marine Conservation Area Technical Service Units (UPT KKP), documents supporting the wealth of theories, regulations, and empirical facts from printed documents and electronic data, such as data from the Central Statistics Agency (BPS), final reports and research journals. Data were analyzed by three concurrent flow of activities: reduction, presentation, and drawing conclusions or data verification. First, the reduction stage sets the data into groups of categorical notes according to the research objectives. Second, the presentation stage is to organize information and data grouped into words, charts, pictures, and tables. Finally, concluding the results of data processing and verification can be carried out. All three are related activities carried out before, during, and after data collection.

#### 4. RESULT AND DISCUSSION

Maluku Province, known as the Thousand Islands Province, has an area of 851,000 km2 and has 1027 large and small islands. Ninety percent of Maluku's area consists of oceans. The vastness of the oceans rather than the land has resulted in the community living and developing along the island's coast so that they depend more on the sea, both as fishermen and farmers. Besides that. Maluku's characteristics as an archipelago province require a cultural approach based on customs and customary law in the development of the Maluku region that is environmentally sound. Leihitu sub-district is one of several sub-districts in the administrative area of Central Maluku district in Maluku province whose people live and live along with the coastal areas, so that people's lives are more dependent on natural resources, in this case, marine resources. A life that depends on natural resources with a livelihood as fishermen and farmers encourage people to manage natural resources. It requires public awareness that can and want to use the natural environment rationally and responsibly in such circumstances.

#### 4.1. Implementation of Sasi in Leihitu Sub-District

The implementation of Sasi in the Leihitu subdistrict started more or less since the colonial era; most of them began to experience a shift in value so that not all villages implemented the Sasi system, which is already a community tradition. The foundation and organizational structure of the implementation of Sasi (sea and land) in the Leihitu sub-district is more based on goals, norms (rules), behavior, and organizational structure.

#### Goal:

- Protect resources from exploitation by others
- Protects tradition
- Increase village income
- Maintain orderliness and management of nature and the environment.
- Appropriate use of a person's rights, according to the time determined to harvest marine products and gardens.

#### Norm:

- Collection can be carried out when the sasi is opened
  - Sanctions/penalties for violating sasi
  - Prohibition of natural resources that have
  - Economic value for people's lives.

## Behaviour:

- The opening and closing of the sasi are

Coordinated by the village government, traditional and religious leaders

- Unlock sasi by auction (special commodity).

## Organization:

- Arranged in writing by village decree Structure
- Implemented by the village government
- Monitoring by the kewang (village police).

The foundation and organizational structure for implementing Sasi in the Leihitu sub-district are to protect traditions and protect resources, increase village income, and prohibit the taking of land and sea products when Sasi is closed. Implementation is coordinated through village decisions carried out by the village government through Kewang supervision. Sasi

regulations are implemented under the Kewang, mosque, and village administration supervision, based on adat as a traditional law. The land size is divided into the land ownership of each family. Sasi operational regulations control the harvest of several land commodities that are commercial in nature (land sasi) and marine resource commodities (sea sasi). Types of land commodities whose harvest period is regulated by the sasi system, among others:

- Coconut - Pineapple that is still young

- Nutmeg - Manggoo

- Durians - Walnuts

- Sango leave - Orange

- Pineapple - Banana

The closing of the sasi distinguishes the implementation of sasi. The opening of the sasi is carried out by traditional, religious, or a combination of both. Close sasi is closing or prohibiting an area for a specific time from fishing activities. Conversely, Opening sasi is an opportunity to capture marine resources in an area that was previously closed from activities. In an emergency, if someone asks to open sasi on their land, usually they will be permitted to take some of the produce. Types of marine commodities whose harvest period is regulated by the sasi system, among others

- Bia Iola - Sea Cucumber

- Seaweed - Ornamental fish

- Coral feels - Sand and gravel

- Batulaga - Root bahar

- Oysters

Based on adat, the Kewang and village government have the right to prohibit outsiders from fishing in the Petuanan area or ask for payment before resource extraction occurs. The opening and closing of the sasi are carried out in a traditional ceremony attended by the village government, traditional leaders, the Kewang institution, and religious leaders in locations that have been determined as places for the placement of the sasi symbol. The symbol of land sasi is marked by coconut leaves and leaves from the sasi plant and coconut fruit hanging from a prepared place made of tree trunks stuck in the ground. The symbol of sea sasi

is a young coconut leaf (yellow coconut leaf) wrapped in a circle around a stick of wood, which is then embedded in the sasi sea area's coastal area.

A traditional ceremony marks the opening of the sasi as is the custom of closing the sasi at the location where the sasi symbol is placed. After the ceremony, the kewang ceremony removes the sasi sign, thus all commodities that are sated can be taken. The time or length of time the sasi is opened depends on the type of commodity being sasi; coconut is usually once every three months while Lola and sea cucumber every 2-3 years, depending on its growth. The implementation and supervision of all provisions of the customary law of sasi are the duties and functions of the Kewang (village police). Kewang is a customary institution whose personnel are elected from the village community (country children) based on lineage (soa) in saniri Besar Tanah (adat council).

The primary function of the Kewang is to supervise the sasi area, but if there is theft, it is the village head who will collect the fine or decide whether the violation should be reported to the police. Kaihena (1988) explains that the one who is responsible for holding. supervising the running of the sasi gives sanctions to the person who makes the violation is the father of the king (village head) as the customary holder who in its implementation gives this authority to the kewang (village police). The villages in Leihitu sub-district whose sasi institutions are no longer run are caused by several factors that affect the system's loss. As the ICLARM report (1998) results in Norimarna et al. (1998) show, that sasi has faded since the 1940s. The factors that cause the loss or erosion of sasi are:

- 1. government unit limitation material
- 2. No Separation of village government from the structure of customary cultural institutions
- 3. Conflict within the village of the structure of customary cultural institutions
- 4. Peru has an effective enforcement of sasi
- 5. Disobedience caused for reasons of economic necessity
- 6. Increase in the human population.
- 7. Village location close to the city center.

The monitoring, accountability, and enforcement mechanisms carried out in traditional coastal resource

management are generally carried out within the community, with the community observing the violations that occur. At the same time, it makes one of the reasons that emphasizes the role of communitybased coastal resource management institutions as potentially more effective agencies in managing resources than with a centralized management system. Apart from the high cost of monitoring, various evidence has also shown the failure of a centralized coastal management system, which separates users from the resources used (Berkes, 1994).

## 4.2. The Attitude of Society Towards Sasi

The results showed that the community's attitude towards the implementation of sasi was related to the implementation of sasi, although in reality, at this time, sasi was not implemented. The community views sasi as something positive for the conservation of natural resources. However, the condition of the economic crisis and the post-riots that hit Maluku resulted in the community having to try and work hard in fulfilling various necessities of life. The increase in agricultural commodities (coconut and nutmeg) encourages people to sell continuously. In some people's circumstances, the implementation of sasi is considered to hinder the community from increasing their income and needs. When studied in-depth, this situation violates the meaning of sasi, which is said to be the fundamental legal values of the sasi institution (Anonymous, 1990). These legal values include

- Appropriate use of a person's rights according to 1. the time determined to reap his village's rewards.
- 2. Preventing disputes (land and water) between residents of the country and residents of bordering countries.
- 3. Maintenance and preservation of the natural environment (sea and land) for the sake of enhancing mutual welfare
- Obligation to pamper plants as a source of 4. fulfillment.
- 5. Reducing the possibility of crime in the form of theft.

Public assessment of sanctions for violators of sasi rules is deemed necessary and very important so that people respect and respect the sasi institution. Sasi, as a form of local wisdom in the conservation of natural resources, most of Seith Village people think there is a

need for an inheritance for the next generation. Ureng village, which still implements sasi (land and sea), its people think sasi is something positive. This understanding is formed because sasi has become a part of community life passed down from ancient times from generation to generation. Another thing that can be seen from the implementation of sasi in Ureng village is that sasi is still being implemented based on customary regulations whose implementation still supports religious and government institutions. Even though sasi is a cultural thing, it still exists and lives in society because reforming agents (traditional, religious, and community leaders) are still actively spreading innovation into the social system.

## 4.3. Knowledge of Sasi

The more openness of the lives of local communities in the Leihitu sub-district to the outside world, the more their understanding of the socioeconomic and cultural values associated with their life patterns will encourage participation in conservation management areas. Although the local indigenous people do not know the terminology of conservation, they have applied modern conservation principles in their daily lives. This effort is based on the fact that natural resources have limitations and deserve to be passed on to the next generation.

The conventional or sasi aquatic resource management system is based on ecological knowledge or understanding, rich in traditional knowledge and management. Knowledge about sasi is meant here about how respondents understand what sasi is and its institutions in regulating and managing natural resources in the village. The results showed that most people who formed attitudes towards sasi in the Leihitu sub-district received knowledge about sasi from their parents from generation to generation.

#### 4.4. Communication about Sasi

This sasi institution is a social institution built based on knowledge, cultural behavior, and the religious system they believe in. Sasi is a non-formal institution of society, in this case, a traditional society. Sasi allows interactions between humans and nature to run in harmony. The results showed that the implementation of sasi communication was not routinely carried out. Generally, respondents know about sasi from their parents, friends or relatives, and their own experiences, through the media (radio and television), and magazines/brochures provided by environmental

conservation organizations (government or NGOs). Meanwhile, the general public seldom follows communication about sasi because they feel it has no benefit for them.

Communication about sasi generally includes members of the Kewang, traditional leaders, and village government elements. Zerner (1994), in his writing, explains that the codification of Sasi that occurred in the past was most likely carried out by the colonial government so that Sasi could be used as an instrument for enforcing regulations related to natural resource management based on economic interests. In the next stage, when Sasi has begun to disappear in many areas, efforts to revive the Sasi discourse and reconstruct the narratives and values of local wisdom are carried out to promote local community autonomy in resource management, as a response to the increasing dominance of the central government and the private sector that exploit resources on a large scale in various regions in Indonesia. Sasi is an alternative control of resources (generally under the central government) by local communities with economic and ecological dimensions and has broader cultural and political dimensions.

# 4.5. Institutional Relationship of Sasi with other Institutions

Sasi is a form of communal and traditional control over the Maluku community's biological resources based on traditional institutions. Over the years, the practice of Sasi in Kaimana has undergone many changes. The results showed that the relationship between traditional institutions (kewang) and religious institutions (mosques) is excellent. The role of religious institutions in implementing sasi is essential so that the whole community can obey it. The data obtained shows that people who violate the rules of sasi, are not given sanctions following the regulations stipulated in the implementation of sasi and explosives in fishing, theft of garden products that are being confiscated. The inability of the authority to pay is evident from the fact that sanctions for violations of sasi are getting weaker and even tends not to be enforced.

The implementation of sasi is jointly arranged between the kewang and the mosque. This collaboration, the function of cultural norms in sasi, does not disappear because it is handled jointly between the kewang and religious institutions. So far, the formal legality of sasi has not been determined, but informally it is recognized as living and valid in the

community's life. The formal determination needs to be considered as deeply as possible because, in the future, the existence of this traditional resource management system will be eroded by various conflicts of interest along with the development of the population and the increasing economic investment that enters this area. Adhuri (2013) notes that the sasi system in the large Kei Island of Maluku Province does not work well due to conflicts over ownership of marine areas between and within indigenous peoples.

## 5. CONCLUSION

Sasi is Management is a form of community-based resource management that has long been applied to the Leihitu sub-district. Sasi is a communal and traditional form of control over biological resources practiced by the Maluku community based on traditional institutions. Over the years, Sasi's practice has undergone many changes. Most of the coastal communities in the Leihitu sub-district accept/support the implementation of sasi. The knowledge about sasi and communication about sasi individually or partially affects the coast in the Leihitu sub-district, Central Maluku district.

#### REFERENCES

- Adhuri, Dedi Supriadi. (2013). Selling the Sea, Fishing for Power: A Study of Conflict over Marine Tenure in Kei Islands, Eastern Indonesia. ANU E Press. https://doi.org/10.22459/SSFP.02.2013
- Badan Pusat Statistik. (2017). Statistik Sumber Daya Laut dan Pesisir 2017.
- Badan Pusat Statistik. (2018). Statistik Sumber Daya Laut dan Pesisir 2018.
- Berkes, Fikret, Colding J, Folke C. (2000). Rediscovery of Traditional Ecological Knowledge as Adaptive Management. Ecological Applications .10(5), p. 1251-1262 https://doi.org/10.1890/1051-0761(2000)010[1251:ROTEKA]2.0.CO;2
- Berkes, Fikret. (1994). Property Rights and Coastal Fisheries. In Pomeroy (ed.) Community management and common property of coastal fisheries in Asia and the Pacific: concepts, methods and experiences. ICLARM Conference Prosiding, p.
- Berkes, Fikret. (2009). Community conserved areas: policy issues in historic and contemporary context. Conservation Letters 2(1), p.19-24 https://doi.org/10.1111/j.1755-263X.2008.00040.x
- Clark, Marshall and Sally K. May. (2013). Macassan History and Heritage: Journeys, Encounters and Influences. ANU E Press https://doi.org/10.22459/MHH.06.2013
- Cohen, Philippa J., Simon J. Foale. (2013). Sustaining Small Scale

- Fisheries with Periodically Harvested Marine Reserves. Marine Policy 37, p.278-287 https://doi.org/10.1016/j.marpol.2012.05.010
- Creswell JW. (2016). Research Design Qualitative, Quantitative, and Mixed Methods Approaches. Fawaid A, Pancasari RK, penerjemah. Yogyakarta (ID): Pustaka Pelajar Yogyakarta.
- Dahuri R. (2003). Keanekaragaman Hayati Laut. Aset Pembangunan Berkelanjutan Indonesia. Jakarta (ID): PT Gramedia Pustaka
- Harkes, Ingvild, dan Irene Novaczek. (2002). Presence, performance, and institutional resilience of sasi, a traditional management institution in Central Maluku, Indonesia. Ocean & coastal management .45(4), p.237-260. https://doi.org/10.1016/S0964-5691(02)00057-1
- Huwae, Ruth. T, (2008). Analisis Perilaku Masyarakat dan Manfaat Ekonomi Kawasan Sasi Laut di Desa Nolloth Kecamatan Saparua Kabupaten Maluku Tengah (Skripsi), Fakultas Perikanan dan Ilmu Kelautan, Universitas Pattimura, Ambon.
- Kementrian Kelautan dan Perikanan. 2015. Laporan Kinerja Kementrian Kelatan dan Perikanan.
- Mansoben JR. 2003. Konservasi sumber daya alam Papua ditinjau dari aspek budaya. Jurnal Antropologi. 2(4):1-12.
- Mansoben JR. 2010. Kebudayaan dan pembangunan dalam kerangka otonomi khusus. Simposium Nasional Papua: pembangunan berbasis masyarakat berkelanjutan". April 7-9. Jakarta.
- McLeod E, Szuster B, Salm R.( 2009). Sasi and marine conservation in Raja Ampat, Indonesia. Coastal Management. 37(6):656https://doi.org/10.1080/08920750903244143
- Mony, Ahmad, Arif Satria, and Rilus A. Kinseng. (2015). Political Ecology of Sasi Laut: Power Realation on Society-Based Coastal Management. Journal of Rural Indonesia .3(1).
- Norimarna, (1998). Sasi dan Pengelolaan Lingkungan Hidup Masyarakat Maluku, PSL Unpatti. Ambon.
- Ruddel K. (1999). The role of lokal management and knowledge systems in small-scale fisheries. The Journal of Policy Studies. 7: 101-108.
- Sangadji, Maryam. 2010. "Penguatan Eksistensi Budaya Sasi Sebagai Upaya Menjaga Keberlanjutan Ekonomi (Tinjauan Perspektif Modal Sosial)." *Universitas Pattimura*.
- Satria A. (2009). Pesisir dan Laut untuk Rakyat. Bogor (ID): IPB Press
- Soselisa, H, (2001). Sumber Daya Alam dan Jaminan Sosial, Sasi Laut di Maluku, Pemilikan Komunal dan Hak-Hak Komunitas dalam Manajemen Sumber Daya Kelautan. Pustaka Pelajar, Yogyakarta
- Sugiyono. (2013). Metode Penelitian Kuantitatif Kualitatif dan R&D. Bandung (ID): Alfabeta
- Sztompka P. (2004). Sosiologi Perubahan Sosial. Jakarta (ID): Prenada Media
- Tuhumuri, Evelin. 2010. Keefektifan Kearifan Tradisional Sebagai Upaya Konservasi Sumberdaya Alam: Evaluasi Peraturan Dan Pelaksanaan Sasi Di Negeri Haruku Kabupaten Maluku Tengah. in Prosiding FMIPA Universitas Pattimura. Ambon: Fakultas Ilmu Matematika dan IPA Universitas Patimura
- Zerner, Charles. (1994). Through a green lens: The construction of customary environmental law and community in Indonesia's Maluku Islands. Law and Society Review, p.1079-1122. https://doi.org/10.2307/3054024