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Analysis of Social Networks in Resource Management during the Covid-19 Pandemic: Ethnographic Perspective to View Complex Communities

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Abstract

Along with the process of globalization, a perspective is needed to see an increasingly complex and heterogenous community. This article argues that the perspective of Social Network Analysis (SNA) can be a solution to see the ever-changing community. Using synchronic and diachronic approach before and during the Covid-19 pandemic, this article discusses how the dynamics of actors survive as elite capture in a community social network in the context of resource management. The case being studied was Kampung Laut community in Cilacap, Indonesia. Quantitative data on social networks before the pandemic served as the basis for ethnographic explanations on the post-Covid-19 pandemic period. Research has found that although Kampung Laut community was physically isolated, they can still access resources from within and outside their environment. This condition was due to the role of actors from the community who build and maintain social networks to manage resources. With the coming of the pandemic, actors who have reputation, trust, and social capital survived as elite capture in the community. Theoretically, this research shows that SNA is relevant for describing complex communities with fading cultural boundaries. Methodologically, SNA research can use an ethnographic work to produce a holistic explanation in anthropology.

Keyword: complex society, elite capture, ethnography, social network analysis

Introduction

This article argues that the perspective of Social Network Analysis (SNA) is a solution to see the ever-changing community. Along with the fading of the intercultural boundaries of an increasingly complex and heterogeneous society, a perspective is needed to create a holistic ethnography. As Barton (1968) wrote in Freeman (2004):

For the last thirty years, empirical social research has been dominated by the sample survey. But as usually practiced, using random sampling of individuals, the survey is a sociological meat grinder, tearing the individual from his social context and guaranteeing that nobody in the study interacts with anyone else in it. It is a little like a



biologist putting his experimental animals through a hamburger machine and looking at every hundredth cell through a microscope; anatomy and physiology get lost, structure and function disappear, and one is left with cell biology.... If our aim is to understand people's behavior rather than simply to record it, we want to know about primary groups, neighborhoods, organizations, social circles, and communities; about interaction, communication, role expectations, and social control.

Barton's statement is still relevant today, although according to Freeman (2004), human social relations are not the same as the hamburger assumption.

The study of SNA began in the early 1960s as a response to the hegemony of "functional structures." Beginning with Max Gluckman, the SNA approach clashed directly with the theories and methods of structural-functionalism (Agusyanto 2007; Wolfe 1978; Bossevain 1972; Mitchell 1969). The structural-functional perspective understands that social relations are too determined by legitimate social norms. Gluckman identifies and documents empirical evidence of social relations that do not conform to the rules. Looking at examples from kinship studies, SNA anthropologists point out that the rules that institutionalize and govern society can conflict with one another. Conflict between rules gives individuals the opportunity to increase their discretion in forming relationships (Holland & Leinhardt 1976). As a result, anthropologists committed to the SNA place social relations at a privileged starting point: social relations cannot be reduced to social norms and institutions (Emirbayer 1997).

When anthropologists began to direct their attention to more complex societies, they had difficulty with the structural-functional approach they used. This difficulty is due to the fact that the approach was being built from studies of isolated tribal societies with slow social change. Difficulties become more pronounced as societies become more complex with cultural boundaries increasingly blurring. Society can no longer be seen as a structure embedded with functions. Based on these constraints, anthropologists need a perspective that is able to understand social phenomena in a cross-border and increasingly complex manner.

Why is the network of social relations important? There is no human being who is not part of a social relation network. Humans, on the one hand, always build social relations with the others, since they cannot live alone. On the other hand, they are unable to establish social relations with all other humans so that their relationships are always limited to a number of people. Humans do not necessarily use all of their social relations to achieve their goals. They only need to adapt some to a specific space and time or their social context.

SNA is a valuable tool for studying social structures and relations. It can be used to understand how individuals or groups interact with each other, how information flows within a network, and how social capital is distributed. Based on the development of the latest studies on SNA, there are several reasons why the study of SNA is important and urgent (see Sabon, et al. 2021; Beseler, et al. 2020; Valeri & Baggio 2020; Contandriopoulos, et al. 2019). First, understanding social dynamics: SNA can help us understand how social networks are structured, how information is exchanged, and how individuals are connected. This understanding can be used to develop strategies to promote positive social dynamics and prevent negative ones, such as social isolation and discrimination. Second, identifying key influencers: social networks are often characterized by a few individuals who have disproportionate impacts on the group. By identifying these key influencers, we can better



understand how social change occurs and develop targeted interventions to influence behavior. Third, addressing social problems: SNA can be used to address a wide range of social problems, such as public health issues, crime prevention, and poverty reduction. By understanding the social structures that underlie these problems, we can develop more effective interventions to address them. Fourth, improving organizational performance: SNA can be used to analyze communication patterns and social capital within organizations. This can help to improve collaboration and decision-making, leading to better organizational performance. The urgency of SNA lies in its potential to help us better understand the complex social structures that underlie many of the problems faced by society and develop more effective interventions to address them (*see* Parsram & McConney 2011; Wolfe 2011; van der Hulst 2009; Ennett, et al. 2008; Durland & Fredericks 2005).

Kampung Laut community lives in the Segara Anakan area, a struggle area containing a "battle" space for actors fighting each other over valuable resources (including natural resources, political resources, access and control). As a "struggle area," Segara Anakan is inseparable with changes in the landscape caused by the process of sedimentation from six major rivers emptying into its lagoon. This condition is exacerbated by the emergence of population pressure and increasing economic needs. In such condition, changes in tenure occur. The water area that was previously a public fishing area has turned into a sedimentary land and is controlled by certain actors as private property (Sanjatmiko 2015). Likewise, due to its remoteness, Kampung Laut has turned into a "beautiful princess who has been asked by many aid donors." The Government's decision to make Kampung Laut a remote indigenous community (*Komunitas Adat Terpencil*/KAT), further legitimizes the continuation of assistances from various donor agencies, both from the government and the private sector, to this community. As the Covid-19 pandemic hit, Kampung Laut was turned into a target area for many social assistance programs aiming at overcoming the hard time.

Kampung Laut community was able to control and utilize the newly formed land as private property and to manage various social assistance programs during the Covid-19 pandemic because of the power relations between actors inside and outside the community. This phenomenon can be understood through the SNA perspective to investigate how actors utilize and maintain their social networks and the trust they have in managing valuable resources in Segara Anakan area. Why the actors? Ribot and Peluso (2009) see that some people and institutions can have control over resources, while others maintain their access to the resource through those who are in control. Some people or institutions benefit from resources (land, goods, and so on), with or without ownership of these resources.

The process of sedimentation of the water area has occurred massively and turned some of it into land, especially since the 1980s. The Covid-19 pandemic in 2020s has intensified the actors' struggle for resources in the area. These contestations over resources can be explained more dynamically through the SNA perspective, regardless of the actors' control and ownership of the resources.

Ribot and Peluso (2009) see that some sort of access network arrangement shapes the social networks of actors. This account allows other experts to map the process of change and the access to resource relationships. The concept of access here is used to analyze who actually benefits from something and through what process they do. Empirically, the analysis of access focuses on who gets what, in what way, and when to benefit from resources.



Previous studies noted the role of actors in social networks in the context of the tenure of valuable resources (Agrawal 2020; Pomare, et al. 2018; Abbsaian-Hosseini, et al. 2017; Wäsche, et al. 2017; Shi, et al. 2017; Hamada 2014; Campregher 2010; Trauger 2009; Sullivan & Xie 2009; Cowan & Carr 2008; Koschade 2007; van der Pennen 2005; Agusyanto 1990; Mitchell 1969; Barnes 1969; Neubauer 1975; Crowder 1991). Although these studies have left the structural-functional tradition, they still emphasize the role of actors in social networks in competing for resources in a given context. Accordingly, this article discusses the role of actors in competing for resources before and during the Covid-19 pandemic. The Kampung Laut community as a remote community in Segara Anakan lagoon is the focus of the case study of this research. This article argues that the dynamics of the roles of actors in elite capture can survive in managing resources before and during the Covid-19 pandemic.

Research Method

This article is the result of diachronic and synchronic research on the social networks of Kampung Laut community in accessing resources from within and outside their environment. The database of the Kampung Laut social networks from the past five years was used to analyze the track record of actors involved in the struggle for resources as the Covid-19 pandemic engulfed the community.

Ethnography was employed in this SNA research. It didn't just quantitatively connect the actors in the networks. In-depth interviews and observations as the data collection techniques, as well as field notes as the materials for data analysis, were used in this research to explain the contextual aspects of social networking in the community (see Sanjatmiko 2021a). This is an *ex post facto* research, in which the researcher explores information by conducting interviews with informants about events and experiences in the past (which have occurred).



Figure 1. Map of the Segara Anakan area (Source: Google Earth)

Segara Anakan Landscape Transformation: The Emergence of Sedimentation Land

Kampung Laut community lives in a remote area. To reach this area, we must use a boat with a travel time of about two hours. This public boat transportation operates twice a day, i.e. in the morning and afternoon. Although Kampung Laut is physically limited for access to and from the area, cellular phone and internet facilities are available, enabling the community to freely access information from the outside world.

In the Segara Anakan area, sea water enters the lagoon through the both ends of the Nusakambangan Strait (Plawangan) which extends from east to west. In the Segara Anakan lagoon, the sea water of the Indian Ocean meets with the fresh water that flows from some rivers that cross the southern coast of Java, such as Citandui River, Cibeureum River, Cikonde River, and Cimeneng River. In addition to supplying fresh water during the rainy season, these rivers also carry eruption mud to the Segara Anakan lagoon. The mud cannot flow into the sea because of the strong pressure of the Indian Ocean current so that the mud settles and undergoes a sedimentation process in the waters of Segara Anakan (Khuriyati 2009). The process of sedimentation makes the waters of Segara Anakan shallower so that the land surface rises and is overgrown with various types of mangrove plants.

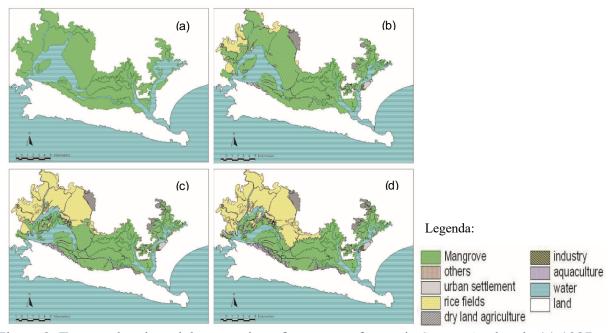


Figure 2. Temporal and spatial conversion of mangrove forests in Segara Anakan in (a) 1987, (b) 1995, (c) 2003, and (d) 2006 (Ardli & Wolff 2008a, 2008b, 2008c).

The sedimentation process in Segara Anakan gave rise to several valuable new resources in the form of sedimentation land (White, et al. 1989). This sedimentary land was then used by actors to benefit from several types of land use, such as mangrove ecosystem, rice fields, ponds, industry, settlements, agriculture, and others. This development of sedimentary land use increased rapidly from the early 1980s to the 2000s.

The following is a table of landscape changes in the Segara Anakan lagoon with the existing social context from year to year:



Table 1. Changes in the Segara Anakan Landscape and Social Context by Time Period

| | s in the Segara Anakan Landscape and Social Context by Time Period | | | | | |
|-------------|---|--|--|--|--|--|
| Time Range | Landscape Change | | | | | |
| | The depth of the waters of Segara Anakan reached 20 meters. Various types of big marine animals, such as sharks, whales, and rays, still pass in this process. | | | | | |
| Before 1970 | in this waters. Residential settlements are still in the form of houses on stilts. | | | | | |
| 201010 1770 | Fishermen's daily catch (fishes and shrimps) can reach 50-60 kg. At the time of the 1965 incident, corpses of murdered victims were often found floating from the rivers in the upstream area with daily count in | | | | | |
| | average was one body, usually with visible injuries. | | | | | |
| 1970–1980 | The mainland of Java and the mainland of Nusa Kambangan, which are opposite to each other, have begun to be invisible from Segara Anakan, since they are blocked by mangrove plants that grow in the sedimentary soil. Big marine animals like dolphins and stingrays still entered the Segara Anakan area. The water depth reached about 12 meters. | | | | | |
| | In 1982 Mount Galunggung (approximately 100 km from Segara Anakan) erupted. At the time of the eruption, volcanic ash covered Kampung Laut, making the area as dark as night. The people of Kampung Laut marked the eruption as a momentum for the massive sedimentation process in Segara Anakan. People have noticed that since then small fishes such as catfish (<i>keting</i>) have sprung up in the waters, and the number have increased over time. At the same time, it was becoming increasingly difficult for fishermen to produce a decent catch of cap prawns as the basic ingredient for making shrimp paste. People suspected that <i>keting</i> fishes prey on cap prawns, drastically reducing their population size. | | | | | |
| 1980–1990 | In 1983 several prisoners from the Nusa Kambangan detention center escaped. The escape attempt failed, because Segara Anakan was still difficult to access unless using boat. | | | | | |
| | In 1986 there was mysterious shooting incident, known as <i>Petrus</i> (<i>penembakan misterius</i>). At the time, unidentified bodies were often found in the Segara Anakan waters, washed away from the river in the upstream area. In a week, residents can bury up to five bodies, most likely shot to death. As a result of the frequent discovery of unidentified corpses in the waters of Segara Anakan, the market for fish caught by Kampung Laut residents has been sluggish. Fish buyers from the city were reluctant to make purchases, as they think that fish from Segara Anakan have been contaminated with corpses. | | | | | |



| | Around 1988 a religious institution carried out social activities for the people of Kampung Laut. They built an embankment to reduce seawater abrasion, provided clean water, and sent villagers to school outside the Kampung Laut area. |
|-----------|---|
| | Along with the increasing conversion of sedimentary land to agricultural plots, in 1988 a rice harvest was carried out by the government. It was also a moment that confirmed that the Segara Anakan sedimentary soil could be planted with rice. |
| 1990–1995 | The Regency Government attempted to limit the number of residents in the Kampung Laut in 1995. It gave residents' houses number, so that unnumbered houses would be considered illegal and demolished. The government has also cut off road access connecting several villages by destroying seawater embankments. It was purposefully done to make life in Kampung Laut more difficult. |
| 1997–1998 | Along with the emergence of land with brackish water, there was a large-scale clearing of pond land. Investors from outside the region invested their capital. This moment ended with the looting of fish ponds by a group of community members. In 1998, the reform movement (<i>Reformasi</i>) also reached Kampung Laut, which experienced social inequality. |
| 2000–2015 | Farming and plantations in the island of Nusa Kambangan began to be carried out by residents. They planted seasonal crops such as chilies and corn, along with perennials such as <i>petai</i> , <i>jengkol</i> , <i>durian</i> , and albizia (<i>sengon</i>). Some of the people of Kampung Laut began to shift their livelihoods from fishing to agriculture and plantations on the hills of Nusa Kambangan Island. |

Currently, Segara Anakan lagoon is a wetland area where most of the land is covered by 56 species of mangrove plants and is inhabited by 45 species of fish (Sanjatmiko 2021b). Its mangrove forest has the most complete and widest composition and structure on the island of Java. The existence of this mangrove plays a crucial role in the life cycle of marine life due to its ability to produce nutrients for them. This is a place for breeding, foraging, and raising for a lot of marine life, such as shrimps, crabs, lobsters, full-blooded clams, squids, octopuses, cuttlefishes, eels, red groupers, white pomfrets, white snappers, beltfishes (*layur*), rays, sharks, as well as seventeen types of migratory fish such as sea eels. As they grow and mature enough, many make their exit into the open sea where some are caught by fishermen and some enter the food chain in the Indian Ocean. Throughout their lives, the people of Kampung Laut have lived in the Segara Anakan area, interacting harmoniously with the surrounding nature (Sanjatmiko & Supriatna 2020; Sanjatmiko 2021b).



Covid-19 Pandemic in Kampung Laut

News about COVID-19 in Indonesia came to the fore after the country's first positive case in March 2020. Initially, Indonesian media only broadcast news about COVID-19's spread via television and social media (Djalante et al. 2020; Sanjatmiko et al. 2022). At that stage, news and information on COVID-19 circulating in both offline and online media mostly embraced controversial perspectives, such as discussing the rate of virus spread and the number of victims, rather than reporting the pandemic from the perspective of disaster and epidemic mitigation. This form of reporting caused the public to panic, worry excessively, and lose trust in the government due to the impression that they were not handling the pandemic seriously (Obi-Ani et al. 2020; Sanjatmiko et al. 2022).

The government's inability to manage social media caused local media to spread COVID-19 'virus' information that attacked the cognition and psychological condition of the people. Local media framing invoked stigma, discrimination, and other invalid perceptions or understandings in conveying information on COVID-19 to the public. As a valuable resource, information through the media was also used by Western media to frame COVID-19 in ways that stigmatized the Chinese population and diaspora (Mamuji et al. 2021; Xu et al. 2021; Sanjatmiko et al. 2022). Moreover, the responses of local communities to COVID-19 also created stigma and discrimination for people who lived or came from areas affected by COVID-19. The lack of both trusted news on COVID-19 and recommendations from health workers to prevent and deal with the virus appropriately and wisely resulted in misinformation and poor perceptions about the virus, disease, and the humans themselves. In this context, information from the media became a trigger for chaos and panic due to limited access to digital literacy and guidance from local health workers (Casero-Ripollés 2020; Sanjatmiko et al. 2022).

Although it is not easy to travel to Kampung Laut, the intrusion of communication media into the community is unstoppable. As the Covid-19 pandemic spread globally, the news about the pandemic also entered Kampung Laut and was stored in the community's cognitions. This cognitive treasure can then be actualized through their attitudes and actions.

The ubiquitous pandemic coverage was also experienced by the people of Kampung Laut. Despite limited communication infrastructure in the Segara Anakan area, they attempted their best to access internet through a cell phone. Living in a remote place around Nusa Kambangan Island was disadvantageous for them, for it makes it difficult to access phone signals, let alone internet services. To solve the problem, many efforts were made, ranging from hanging a transmitting plane (wifi) on a power pole, to installing an antenna on the top of the bridge or the hill to pick up signal. Such efforts were not in vain. It was evident that the Kampung Laut community could access various information through the internet, apart from television and radio.

Eventually, the installation of cell phone transmitter in the village facilitated the ease of internet access for Kampung Laut community. Through the internet, they learned how Covid-19 has killed hundreds of thousands of people around the world. They also learned that China, the US, and Spain were the most affected by the Covid-19 pandemic.





Figure 3. A wedding in Kampung Laut; people were aware of the transmission of the Covid-19, since they learned about the virus from media coverage (Source: Research Documentation)

As an effort to prevent the wider spread of Covid-19, the government established the Task Force for the Acceleration of Covid-19 Handling (*Gugus Tugas Percepatan Penanganan Covid-19*), from the national levels, district level, sub-district level, down to the village level. At the village level, the head of the task force is the village head, while the village consultative body (*Badan Permusyawaratan Desa*/BPD) serves as the deputy chair and the village secretary as the secretary of the task force. The main task of this task force is to prevent the spread of Covid-19 at the village. The mechanism implemented was mostly monitoring and detecting the traffic of people in and out of the village, including migrant workers who return from the city due to the Covid-19 pandemic.

If there are migrant workers returning from the city, the officers at the dock would immediately check their body temperature. If their body temperature is normal, then they would be asked immediately to report themselves to the central command post (*Posko*) at the village office. Subsequently, they need to carry out self-isolation at their home as people under supervision (*Orang Dalam Pengawasan*/ODP). Accordingly, those whose body temperature is more than 37.50 °C would be immediately referred to the community health center (*Puskesmas*). At the health facility, they need to be examined and undergo a swab test, were then given medication and asked to carry out self-isolation at home as patients under supervision (*Pasien Dalam Pengawasan*/PDP). The task force was also responsible to enforce the necessary measures to prevent the transmission of Covid-19, such as wearing masks, diligently washing hands with soap, keeping a distance from each other, and leaving the house only for an urgent need such as going work.

However, the Covid-19 pandemic has also brought some benefits in the form of various social assistance schemes disbursed by the Government of Indonesia through the village administration. These aid programs include the so-called *Program Indonesia Pintar* (Smart



Indonesia Program), *Program Bantuan Jaminan Kesehatan Nasional* (National Health Insurance Assistance Program), *Program Keluarga Harapan* (Hopeful Family Program), *Bantuan Pangan Non Tunai* (Non-Cash Food Assistance), *Bantuan Langsung Dana Desa* (Village Fund Direct Assistance), *Bantuan Sembako* (Basic Food Assistance), *Bantuan Sosial Tunai* (Cash Social Assistance), *Bantuan Biaya Listrik* (Electricity Cost Assistance), and *Kartu Prakerja* (Pre-Employment Cards).

The main target of those assistance programs was the disadvantaged communities. During the Covid-19 pandemic, someone who is considered poor can receive several assistances at once, such as the Hopeful Family Program and the Smart Indonesia Program or a combination of several other assistance programs. The amount received by the recipients was considerably not small. People may receive IDR 1.89 million from the Hopeful Family Program annually, and IDR 450 thousand to IDR 1 million from the Smart Indonesia Card annually for educational expenses.

The list of the beneficiaries was produced by the central government, but the source was provided by the village government. The list of potential recipients of the assistance was arranged through several stages, starting from the neighborhood associations (*Rukun Tetangga*/RT), the community associations (*Rukun Warga*/RW), hamlets, up to the village level. The neighborhood association (RT) is the lowest level of village apparatuses that is considered to be the most knowledgeable to assess those who are entitled to receive social assistance, since they have empirical knowledge about the socio-economic condition of their residents due to their day-to-day interaction. One RT usually consists of between 20–30 households. Although the initial decision to accept aids rests with the RT level, control at the next level is no less important. The level of RW, hamlet, to village will make further considerations to decide whether someone gets social assistance or not.

Social Network of Actors in Managing Resources

The social networks featured in this section are established from five years ago, before the Covid-19 pandemic. These networks depict actors who enter the social field in Kampung Laut as an elite capture. The Covid-19 pandemic has changed the social order in Kampung Laut, along with the emergence of local resistance in the form of "weapon of the week" against the hegemony of neoliberalism (Sanjatmiko 2021b). By analyzing the social networks before and during the Covid-19 pandemic, the following sections will deliver a discussion on how the dynamics of the actors who enter the field as an elite capture disappear or survive, and what capitals do they use to survive as an elite capture.

Kinship Networks

Kinship networks describe the presence or absence of kinship relationships between actors in the village. In general, the kinship network of the Kampung Laut community shows that almost all of the actors in the village have a kin relationship with one another. There was one actor, namely NUR, who was excluded from the network, since he was a government official from outside the village but was assigned there.



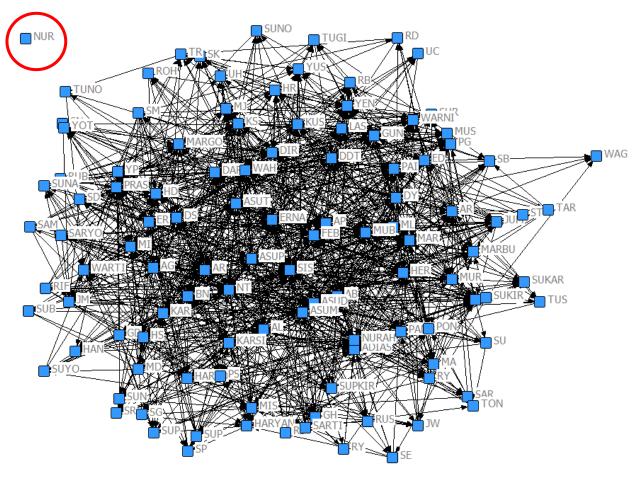


Figure 4. The Orang Kampung Laut Kinship Network

The existence of a "thick" kinship between actors in the village strongly bonds them together as a community. Durkheim (1997) called it mechanical solidarity. In such solidarity, people know each other in detail, so one's social and economic condition is relatively known to the others. Information spreads quickly due to intense interactions, both orally or through social media such as Whatsapp. Those who should not be eligible for a government social assistance but nevertheless receive it, will quickly get a reaction from their community. Likewise, to those who should be eligible for assistance but do not receive it, the reaction from the community will also emerge quickly.

In a community with mechanical solidarity, the decision-making process in implementing a program becomes easier. Competition between actors to gain access to power in the village becomes less intense. For an instance, the decision-making concerning the embankment construction program to prevent sea water from entering the rice fields in the village was easier to conduct thanks to the existence of kinship relationships and shared needs among actors. Likewise, a dispute resolution to end conflict between neighbors was easier to produce through kinship mechanism, so that they do not need to proceed with legal measures.

To gain more detailed illustrations on the kinship networks, we will proceed with the example networks of two actors, namely SIS and WAH.

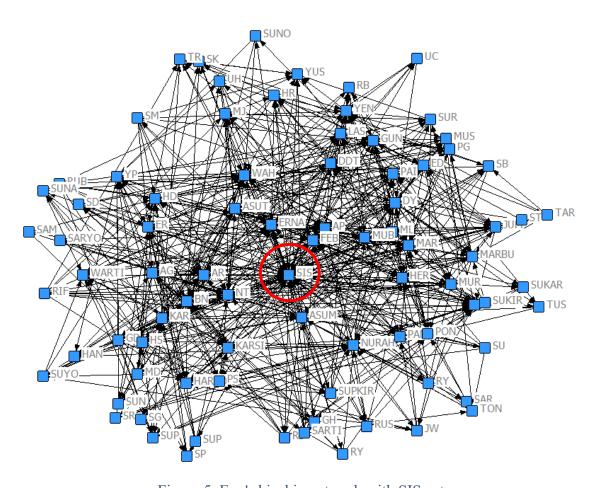


Figure 5. Ego's kinship network with SIS actors

Figure 4 displays a kinship network where SIS is placed as the ego. With his position in the kinship network, SIS occupied the highest score of 50, which means that there were 50 actors in the network who recognize him as their relative. In addition to the villagers' recognition, his position was also reinforced by the statement of the Royal Palace of Surakarta confirming that SIS is a direct descendant of an important "founding" figure who gave birth to the name Kampung Laut. This figure is believed to be the leader and protector of Kampung Laut's territory in the past. SIS's position as the highest-scored actor in kinship network and his role as a government employee in the sub-district office give him more legitimacy than other actors, especially as a reference for resolving legal issues experienced by the villagers.

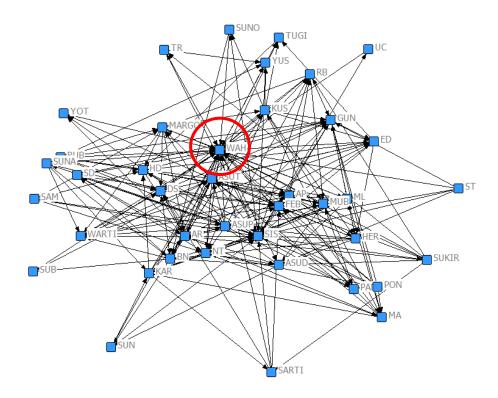


Figure 6. Ego Kinship Network of WAH Actor

Figure 5 displays the kinship network of WAH. WAH claimed second rank in the village kinship network, after SIS's position. WAH's score was 37, which means that there were 37 villagers in the social network who admit to having a kin relationship with him. Like SIS, WAH not only scored high in terms of kinship, but also held a formal position in the village administration, giving him informal and formal legitimacy in carrying out his roles in the community. Villagers feel more comfortable taking care of their problems when they have to deal with formal leaders who are also their relative.

Charismatic Recognition Network

A charismatic network is a network that describes the charismatic nature of actors' position which is recognized by the community. The higher an actor's score in charismatic networks, the more recognized their charismatic nature by the community.

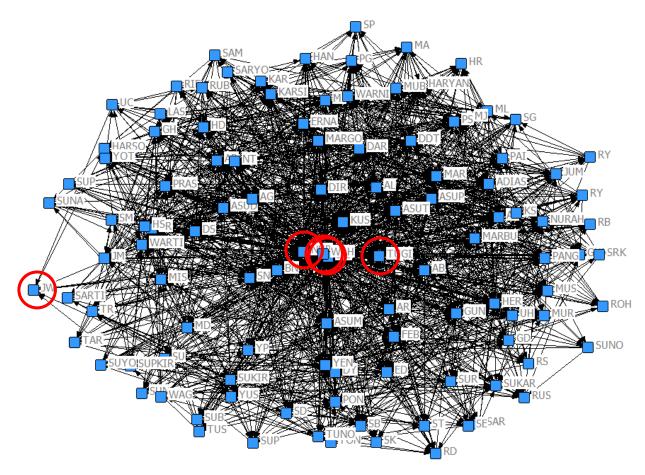


Figure 7. The Charismatic Recognition Network of Actor X

Figure 7 shows that SIS, WAH, and TUG have the highest scores in the charismatic recognition network, namely 112, 112, and 111 respectively. The scores suggest that SIS, WAH, and TUG were the role models for other actors in the village. Unsurprisingly, SIS, WAH, and TUG have the highest scores in the kinship networks and served as government officials. NUR ranks next in the network with a score of 100, even though he had no kin relationship with other actors in the village. However, NUR was the highest-ranked government official in the region. A different case was JW who only got a score of 4 in the charismatic recognition network. JW was a former village head in the previous term. His lower score, compared to other actors, was due to the villagers' perception that viewed him as a renegade. During the election campaign in the village, JW once promised a program to build a dike to prevent the sea tides from entering people's rice fields. But until the end of his tenure, the promise was never realized.

Network of Capability to Execute Programs

Network of Capability to Execute Programs is a network of recognition to actors' capability in carrying out programs with good results. These programs include village development programs, aid managements, and other matters concerning the management of existing resources in the village.



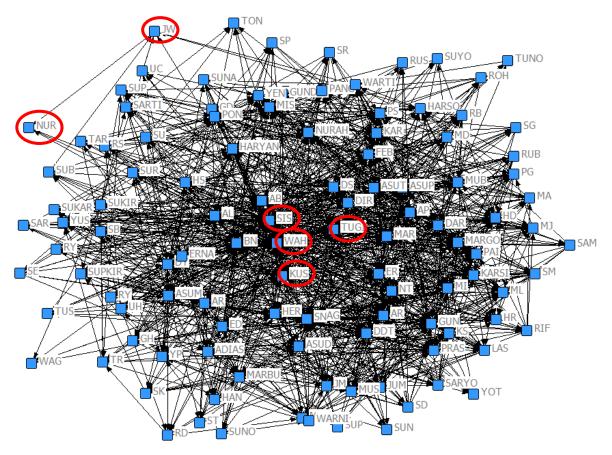


Figure 8. Network of Capability to Implement Programs from Actor X

In this network, WAH occupied the highest rank with a score of 62, followed by SIS with a score of 54, KUS with a score of 40, and TUG with a score of 39. It means that these actors were considered by their community to be capable of implementing development programs in the village. JW, formally the highest-ranked official in the village, only got a score of 5, while NUR's score was only 3. Considered as the most capable in implementing village development programs and resource managements, WAH had high kinship and charismatic network scores. In practice, he was the formal village official who manage assistances from the government and other parties.

Interestingly, JW and NUR, as a formal leader, scored far below those of WAH, SIS, KUS, and TUG. JW was viewed as an actor who have broken his promise when he served as the head of the village, resulting in the low assessment of villagers in terms of his ability to implement development programs. Like JW, NUR had also a low score. In spite of being the highest-ranked official in the governmental structure in Kampung Laut, and having a high assessment of villagers in terms of charismatic nature thanks to the position, people didn't know much about his background and track record. Thus, even though they were the highest formal leaders in the village, they were less recognized as actors who can properly implement development programs.

Elite Capture in the Kampung Laut Community Social Network during the Covid-19 Pandemic

Elite capture involves a number of actors who have political and economic power to control the distribution and allocation of resources, either for the benefits of the masses or the interests of certain group. Elite capture is an intangible phenomenon that cannot be captured or measured by itself. Therefore, it must be understood through certain tangible forms. The origin of elite capture phenomenon, according to Laffont and Tirole (1991), can be traced to the "interest group capture" paradigm in the works of Marx, Stigler, and Peltzman. Laffont and Tirole (1991) argue that interest group capture happens because of information asymmetry and inefficient regulation or allocation of resources. Actors who become "members" of elite capture or "interest group capture" must have trust capital to enter the elite capture network.

WAH, SIS, KUS, and TUG were included in the elite capture group five years ago, before the coming of the Covid-19 pandemic to Kampung Laut. It can be seen from their kinship network, charismatic recognition network, and the network of the ability to implement programs. WAH, SIS, and TUG gained informal and formal legitimacy as elites. Their informal legitimacy was derived from the kinship network, as demonstrated by their high scores in such network. This implies that they were supported by their relatives. Regarding their formal legitimacy, their positions as formal leaders in the village contributed to it. This was not the case with KUS, who only had informal legitimacy. Before the coming of the pandemic, KUS was not a formal leader in the village and was critical of the village government's development policies, but had a quite strong kinship network. Being outside the elite capture, NUR and JW only had legitimacy from the formal side. NUR's formal legitimacy was derived from his position as district leader, while JW was the village leader.

The global Covid-19 pandemic has changed the social order of Kampung Laut. On the one hand, the free circulation of various information in the time of pandemic has led to the so-called "tragedy of the open society" which raises fear, prejudice, and discrimination among people (Sanjatmiko 2022). On the other hand, the pandemic has also "brought in" various assistance programs for Kampung Laut people, in addition to the local resources which continue to be used for livelihood.

The management of the assistance programs during the pandemic and the use of local natural resources for livelihood in Kampung Laut cannot be separated from the role of the actors belong to elite capture. How was the composition of elite capture in Kampung Laut after the Covid-19 pandemic, then? WAH, SIS, and TUG remained in the elite capture ranks in the village. Meanwhile, KUS, NUR, and JW were no longer parts of them. Why could it be?

People viewed WAH, SIS, and TUG as having a good track record in carrying out social responsibilities as the village's formal leaders. WAH was a member of the Covid-19 handling task force in the village and gained a positive perception from the people due to his ability in dealing with problems that arose during the pandemic. He had a firm and accommodative attitude towards the villagers' interests and maintained a transparency in managing government social assistances to reduce the impact of the pandemic.

WAH also gained a positive response for his position as the chair of the mangrove farmer group. He was considered successful in creating job opportunities during the Covid-19 pandemic through the sale of mangrove plant seeds. Through the network built by WAH with



external parties, mangrove seedlings become the main commodity to meet the demand of various mangrove conservation organizations in the coastal areas of Java.



Figure 9. Producing and selling mangrove seedlings to create jobs

SIS was considered to have a concern for the villagers' interests. With his important formal position in the sub-district government structure, SIS was considered capable of bridging the interests of the sub-district government and the village through his role in facilitating communication between the government and the people during the Covid-19 pandemic. SIS have made efforts to ensure that villagers were not left in getting updated information and gaining government assistances.

TUG was still in the village's elite capture too. His roles as the highest formal leader in the village as well as the chair of the Covid-19 handling task force were carried out well through coordination with fellow village officials, fellow members of the task force, and the government institutions responsible for the distribution of social assistances. The distribution of social assistances carried out directly by the government to the villagers was successful thanks to the coordination carried out by TUG with various parties.

NUR and KUS were no longer in the ranks of elite capture during the Covid-19 pandemic. As the highest-ranked official at the sub-district level, NUR was transferred to another area at the time. KUS, on the other hand, was elected as one of the village's formal leaders during the pandemic.

The survival of WAH, SIS, and TUG in the elite capture ranks in the village in the period before the dam after the coming of the pandemic, was due to their track records. They have successfully built social capital and gained trust from other parties. RUS (50 years old), an informant who was also in the WAH, SIS, and TUG social networks, said:

I have no direct family relationship with Mr. SIS, Mr. WAH and Mr. TUG. But I know exactly, these three people are people who have a sense of devotion to others. Even though these gentlemen have positions in the village and are respected, they have a

commitment to help the poor (wong cilik).... Quite often, they solved people's problems, which makes people trust them from time to time.

Referring to the social networking before and during the Covid-19 pandemic, Doreian and Stokman (2005) saw the existence of structures and processes in social networks. Structure is defined as a set of actors with social relations formed by them. Process is defined as (a) a series of actions or operations use in making or manufacturing or achieving something, (b) a series of change, and (c) a course of event over time. As a social change, process involves aspects of actors, relationships, and time. Social network analysts can use a set of networks to characterize two structures and compare them. For this reason, data on network structures at one point in time can be used to study the subsequent time point (Hammer in Doreian & Doreian 2005).

A social network with a certain theme, at a certain time, has members with a certain context as well. However, through a good track record and reputation, actors can continue to survive in an elite capture structure. Otherwise, actors who fail to build a reputable track record and a good social capital in social networks will be excluded from the elite capture.

Networks of Actors: Theoretical Implications of Seeing a Boundless Community

Segara Anakan has special features in terms of physical and social environment. Such conditions make the nature and community of Kampung Laut become "inviting" to many parties to provide assistances. In fact, Kampung Laut is classified by the government as a remote indigenous community, a status that encourages private sectors and government agencies to provide assistance programs, considering their difficulties in accessing many social facilities.

The presence of various assistances to build public facilities, improve community welfare, and overcome the impact of the Covid-19 pandemic opened opportunities for actors to take part in the program implementations. The actors who successfully secured their part were those who had relations in social networks such as kinship, socio-cultural, and political connections. Actors who hold formal positions in governmental structure were not necessarily considered as legitimate actors in the networks by the village community.

The process of converting common properties into private properties was carried out by actors with various historical backgrounds and interests using access and power relations. The findings of my previous research show that there were actors who, without having to own or control resources, actually get more benefits through the power relations they have (Sanjatmiko 2015). Therefore, an actor approach emerged to explain their role in social networks.

Actors use their social networks to access and take advantage of existing resources. SNA can be used to analyze actors in using their social networks. As a method, network analysis in social science is divided into four typologies (Borgatti, et al. 2009), namely similarities, social relations, interactions, and flows. Each of these typologies has a specific purpose in doing the explanation.

Table 2. Tipology of Network Analysis

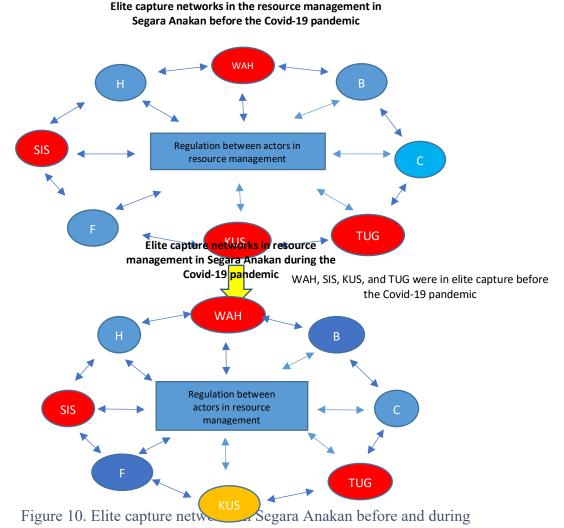


| Similarities | | | Social Relations | | | | Interacti | Flows |
|--------------|---------|---------|------------------|---------|---------|---------|-----------|-----------|
| | | | | | | | ons | |
| Locati | Members | Attrib | Kinsh | Other | Affecti | Cogniti | e.g. | e.g. |
| on | hip | ute | ip | Role | ve | ve | | |
| e.g. | e.g. | e.g. | e.g. | e.g. | e.g. | e.g. | | |
| Same | Same | Same | Moth | Friend | Likes | Knows | Sex with | Informati |
| spatial | club | gender | er of | of | | | | on |
| and | | | | | Hates | Knows | Taked to | |
| tempor | Same | Same | Siblin | Boss of | | about | | Believes |
| al | event | attitud | g of | | | | Adviced | |
| space | | e | | Competi | | Sees as | | Personne |
| | Etc. | | | tor of | | Нарру | Helped | l |
| | | Etc. | | | | | | |
| | | | | | | Etc. | Harmed | Resource |
| | | | | | | | | S |
| | | | | | | | Etc. | |
| | | | | | | | | Etc. |

(Borgatti, et al. 2009)

In the context of Segara Anakan, kinship, charismatic recognition, and trust in the social program implementations were the very fabric of social networks that provide accesses to the management of resources in the village. Each actor had an access type with a certain value and was related to each other as shown in the following chart:





the Covid-19 pandemic
WAH, SIS, and TUG were surviving in elite capture
during the Covid-19 pandemic; while KUS was no longer
in there

The chart of actor relationships (Figure 10) illustrates that among the actors in social networks, there are elite captures who have the ability to access and relate to the networks. Elite capture in the period before and during the Covid-19 pandemic had a different composition. The actors who survived as an elite capture member before and during the Covid-19 pandemic were those who have a good track record, social capital and trust from other parties.

In SNA, elite capture refers to a situation in which a small group of individuals or organizations control most of the connections and interactions in a social network. This can have important implications for understanding how information flows through a network, and can also impact the overall structure and function of that network. The function of studying elite capture in SNA is to identify the central actors or nodes in the network, and to understand how their position and influence can shape the dynamics of the network as a whole (Mtero, et al. 2023; Lorch 2021).



By analyzing the patterns of connection and interaction among network members, anthropologists can identify which actors have the most power and influence, and which nodes are the most important for the flow of information or resources. Understanding the role of elite capture in social networks is important for a variety of purposes, including identifying potential gatekeepers or intermediaries who may be able to facilitate or hinder the dissemination of information or resources within networks. This is useful for identifying opportunities to promote a more equitable and democratic network structure, by targeting interventions towards nodes that are currently marginalized or underrepresented in the network.

The urgency of analyzing elite capture in SNA lies in its potential to undermine the goals and objectives of the network as a whole. When a few powerful individuals or groups dominate decision-making, they may prioritize their own interests over those of the larger community, leading to a lack of inclusivity, fairness, and transparency. This can result in a breakdown of trust and cooperation within the network, as well as a failure to achieve its intended outcomes. Elite capture can be a barrier to social change, as it can perpetuate existing power imbalances and prevent marginalized groups from having a meaningful voice in decision-making processes. By identifying and addressing the factors that contribute to elite capture in a network, SNA can help to promote greater equity, participation, and accountability, and ultimately lead to more effective outcomes for the network and its members.

The actors in the network had certain relationships in various contexts that gave them the ability to manage and utilize resources in Segara Anakan. In addition, they also had certain regulations that were used among them to carry out or build legitimacy for their role in the ownership and/or management of the resources.

The emergence of actor approach in social networks is an answer to the criticism of the structural-functional perspective that has been developed since the 1960s. When anthropologists at the time began to point to a more complex society, they began to experience many difficulties or feel the shortcomings of the structural-functional approach that was built through studies of tribal and simpler societies. It makes this approach less relevant for understanding a complex society that is changing rapidly.

Structural-functional perspective tends to see social systems or structures that operate between individuals, groups, or institutions as static and works by adopting the organism of human body as a model (see Radcliffe-Brown 1952). Social systems work like organism consisting of individuals or groups as its organs arranged in a network of relationships that are integrated through each function and role.

Starting in the 1960s, when empirically there were no truly isolated societies in the world, anthropologists began to abandon the orientation of structural-functional approach completely (Saifuddin 2005). At that time, the model of social action was "successful." Bailey, who articulated the direction of Radcliffe-Brown's new theory, assumed that individual behaviors are constrained by societal norms and rules. Bailey argues that in real life most of us commit ourselves to walking between prevailing norms. This does not mean that these norms and rules do not exist. Rather, as a being who thinks, feels, and acts, humans are constantly manipulating the normative order. Norms are among the resources available to actors to use later to their advantage. In a society consisting of individuals or actors with various roles and functions, as well as social, cultural, economic, and political backgrounds, the structural-functional perspective becomes less relevant to use because of their complex and



heterogeneous living conditions. Individuals use all the resources that exist within and outside themselves to achieve their interests in certain contexts.

Doing research with the SNA perspective needs an ethnographic work. This research does not only seek data on the relationships between actors in a social network. Each actor has a different social, political, and cultural background. Likewise, each social network has a different context of relationships between actors, time period, and location. Explanation of the context of the existing social network is constructed through ethnographic work using in-depth interviews and observations as data collection techniques, as well as field notes as the materials for data analysis (see Sanjatmiko 2021a).

The relevance of ethnography and SNA studies lie in their ability to provide complementary perspectives in understanding social phenomena. Ethnography is particularly useful for understanding the cultural and social context in which people live and interact, while SNA provides insights into the structural aspects of social relations. By combining these approaches, researchers can gain a more comprehensive understanding of social behavior and the factors that shape it (Edwards 2010). Referring to this, research on SNA is a holistic ethnographic explanation in anthropology.

Conclusion

The study of SNA is an ethnographic work. Ethnographic research aims "to grasp the native point of view, his relation to life, to realize his vision and his world" (Malinowski 1922). The combination of ethnographic work and SNA can provide complementary perspectives in understanding socio-cultural phenomena. Ethnography is useful for understanding the social and culture context of people's interaction, SNA provides insights into specific structural aspects of social relations. The combination of the two approaches will produce a holistic ethnographic picture of socio-cultural behavior and the factors that shape it.

Globalization has been taking us humans to the world with no solid boundaries between places and cultures. This article demonstrated how relevant the SNA perspective is to view the heterogeneous global world community. The SNA perspective offers a solution to see actors' interests in utilizing resources in a certain social context that go beyond the boundaries of the actors' cultural attributes. Therefore, this perspective provides a more holistic picture to see the social networks where actors engaged in resource utilization to achieve their interests.

This article has demonstrated that the SNA perspective can produce an ethnographic work with a contextual expansion. The study of social networks is always carried out in conjunction with ethnographic fieldwork. Field research captures various types of relationships through interviews and direct observations. In a practical setting, the SNA approach, as demonstrated by this article, is based on the context to sort out the relationships between actors in certain social relations. This provides a more detailed picture to inform the management of future social developments.

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