Local Community Participation in Support of the Existence and Sustainability of Ecotourism Development Geopark Ciletuh-Palabuhanratu

Aris Munandar  
Assc. Professor of Sociology  
aris.munandar@civitas.unas.ac.id

Erna Ermawati Chotim  
Lecturer in Sociology  
erna.ermawatichotim@civitas.unas.ac.id

Adilita Pramanti  
Lecturer in Sociology  
adil.pramanti@civitas.unas.ac.id

Faculty of Social and Political Sciences  
Jakarta, Indonesia

Abstract
This paper is the result of an exploratory study on the ecotourism development of the Ciletuh-Palabuhanratu Geopark in the Sukabumi Regency. Especially observing the involvement of local communities as one of the main stakeholders who will determine the sustainability of these ecotourism development activities. The Ciletuh-Palabuhanratu Geopark has been designated by UNESCO as a global geopark because it is considered to have advantages and uniqueness in geological diversity, biological diversity, and cultural diversity. To support the sustainability of this geopark, the local government has been developing Ciletuh-Palabuhanratu tourism with the principles of conservation, community empowerment, and collaboration to become an international-class tourist destination. This tour is managed by the Ciletuh-Palabuhanratu UNESCO Global Geopark Management Agency (CPUGGp) under the Sukabumi Regency Government, West Java.

Keywords: geopark, ecotourism, sustainability, community participation, empowerment

1. Introduction
Geopark is a management concept for sustainable area development that harmonizes geological, biological, and cultural diversity through existing conservation and spatial planning principles (Yanuar et.al. 2018). The Ciletuh-Palabuhanratu Geopark located in Sukabumi Regency, West Java has an area of 126,100 Hectares or 1,261 km², covering 74 villages in 8 sub-districts namely: Cisolok, Cikakak, Palabuhanratu, Simpenan, Ciemas, Waluran, Ciracap, and Surade (PPGK-Geologi UNPAD, 2019). Ciletuh Palabuhanratu Geopark is one of the geoparks in Indonesia that was designated as a National Geopark on December 22, 2015. In 2018, the Ciletuh-Palabuhanratu Geopark was approved as part of the Global Geopark Network in one of the commission sessions at the 204th Unesco Executive Board in Paris, France on April 14, 2018. This recognition has become the pride of the government and society, especially in Sukabumi Regency and this achievement has stimulated positive and creative responses from various groups. In its development, the existence of the Geopark has become a very potent factor in empowering the socio-economic life of the community so that it contributes to the sustainability of the Ciletuh-Palabuhanratu UNESCO Global Geopark development.

Three important aspects that make a geopark unique: geological diversity, biological diversity, and cultural diversity are natural and community heritage that must be preserved. Geopark attraction is not only a recreational tourism object but also an educational tourism object that provides knowledge about the unique nature and culture around the geopark area for the community. Therefore, the existence and sustainability of this Geopark are very dependent on the seriousness of the managers and the community to maintain and anticipate environmental damage by various possible threats, including the increase in the volume of plastic waste as a consequence of the increasing number of tourists visiting this location.
The Ciletuh-Palabuhanratu geopark area is divided into three development areas according to their respective characteristics of geological, biological, and cultural diversity, namely the southern part includes Surade District, Ciracap District, Partly Waluran, and Ciemas Districts. The middle part includes Simpena District, Partly Ciemas, and Waluran Districts. The northern part includes the Districts of Cisolok, Cikakak, and Palabuhanratu (PPGK-Geology UNPAD, 2017).

To support the sustainability of Geopark development as an ecotourism-based tourism destination, the West Java Provincial Government established the Ciletuh-Palabuhanratu Geopark Management Agency (BPGCP) which is in charge of designing and supervising programs carried out in geoparks such as; conservation, education, and community empowerment under the geopark motto "Glorifying the Earth for the Prosperity of the Community" (PPGK-Geology UNPAD, 2017). However, in its development, this Agency was completely handed over to the Regional Government of Sukabumi Regency under the coordinator of the Regional Secretary as its leader.

1.1. Objectives

This study aims to describe the participation of local communities in supporting the sustainable development of the Ciletuh-Palabuhanratu Geopark. Geopark as a tourism sector based on the natural environment is very dependent on the support of local communities who are in the tourist environment everyday which is also a source of their livelihood. Therefore, local communities must be the main concern in Geopark development by empowering and strengthening capacities that enable them to participate in supporting the existence of Geoparks, and on the other hand the continuity of their livelihoods is also guaranteed in a sustainable manner.

2. Literature Review

One of the important problems faced in economic development is between meeting development needs and efforts to maintain the environmental sustainability. Economic development based on natural resources that do not pay attention to aspects of environmental sustainability will ultimately harm the environment itself. Because natural resources and the environment have a limited carrying capacity. In other words, economic development that does not pay attention to the capacity of natural resources and the environment will cause development problems in the future.

The concept of sustainable development has long been a concern of experts. However, the term sustainability only emerged a few decades ago. Sustainability issues became a global issue after the World Commission on Environmental Development (WCED) introduced sustainable development in 1985. Munasinghe in 1993 (Rogers et al. 2008:23) introduced three approaches to sustainable development known as components, namely economic, ecological, and socio-cultural.

In the context of tourism development, the issue of sustainable development has led to a paradigm shift in tourism from mass tourism to new environment-based tourism - ecotourism. This shift is shaped by questions related to tourism and sustainable development (Asmin, 2018). The development of new types and forms of tourism is driven by three main issues, namely unequal and unfair development, power relations, and globalization (Mowforth & Munt, 1998).

Along with the development of ecotourism, there are three key elements in defining ecotourism, namely (1) focusing attractions on the natural environment or specific areas, (2) emphasizing learning as a form of interaction between tourists and nature, and (3) being sustainable (Weaver, 2001: 105). Ecotourism also has important benefits in efforts to improve the concept of mass tourism towards more responsible tourism. Weaver (2001) well illustrates the relationship between eco-tourism and mass tourism, particularly those concerning diversifying tourism products, promoting more responsible tourism, and implementing sustainability principles and practices.

Ecotourism without the participation of local people is a mistake. Participation must provide opportunities, encourage willingness, and improve community capabilities in ecotourism development (Ferdinal Asmin, 2018). Three basic conditions must be met in the development of sustainable tourism, namely: (1) opportunities to capture economic benefits must be structured in a culturally acceptable manner so that they are accessible to residents, (2) ecotourism must support tenure security and communities can make decisions. land use, and (3) ecotourism should promote more concrete social and political justice (Chamley, 2005).

Local community participation is one component of sustainable development in general and ecotourism in particular (Drake, 1991). Therefore, to encourage local community participation, it is necessary to have ecotourism policies and plans that can stimulate and provide space for communities to develop their socio-economic potential. These include new jobs, additional income, markets for local products, improvements to infrastructure, community facilities and
services, new technologies and skills, increased cultural and environmental concerns, protection and conservation, and improvements in land use patterns (Dowling and Fennell, 2003).

Thus, ecotourism is a form of development that is participatory, based on local communities. However, the success of participation depends on the goals and ideologies of the stakeholders. The role of government to ensure local community participation is a strategic role for tourism sustainability (Mohan and Stokke 2000).

3. Methods

This research uses a qualitative approach with field studies as the main method. Researchers conducted observations, interviews and discussions with a number of resource persons representing stakeholders related to the ecotourism development of the Ciletuh-Palabuhanratu Geopark. Interviews were conducted with a number of resource persons representing stakeholders related to the construction of the Ciletuh-Palabuhanratu Geopark. They consist of representatives from the Tourism Office, the Environment Agency, the Geopark Management Agency, tourism business actors, tour guides, and local community leaders. In addition to individual interviews, FGDs were also conducted to unite the perceptions and expectations of stakeholders in efforts to develop sustainable ecotourism. All the data obtained were confronted with documents related to the existing Geopark development plan.

4. Results and Discussion

4.1. Development of Geoparks as Tourist Destinations

Geoparks are designed with a focus on the feasibility of the main components, namely: protection and conservation; infrastructure development related to tourism; and socio-economic development using sustainable regional development strategies. Geoparks were introduced as a new strategy to achieve sustainable development and further improve socio-economic status through the continuous participation of local communities in Geopark activities.
Likewise, the determination of Ciletuh-Palabuhanratu to become a UNESCO Geopark Global (UGG) NESCO has encouraged the local government to develop Ciletuh-Palabuhanratu tourism with the principles of conservation, community empowerment, and collaboration so that it can become a world-class tourist destination that is expected to become a magnet for local and national tourists, and international. This tour is managed by the Ciletuh-Palabuhanratu UNESCO Global Geopark Management Agency (CPUGGp) under the Sukabumi Regency Government, West Java. There are 64 leading tourism potentials spread over eight sub-districts in the CPUGGp area. These potentials are quite diverse from geological panoramas, waterfalls, and beach tourism (Sukabumi Regency Tourism and Culture Office, 2019).

Based on data from the Sukabumi Regency Tourism and Culture Office, the number of tourists for the 2014-2019 period can be seen in Table 1 below.

### Table 1. Number of Tourists to Sukabumi Regency 2014-2019

<table>
<thead>
<tr>
<th>No.</th>
<th>Year</th>
<th>International</th>
<th>Domestic</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>2015</td>
<td>119,750</td>
<td>3,374,682</td>
<td>3,494,432</td>
</tr>
<tr>
<td>2.</td>
<td>2016</td>
<td>120,593</td>
<td>3,521,487</td>
<td>3,642,080</td>
</tr>
<tr>
<td>3.</td>
<td>2017</td>
<td>122,810</td>
<td>3,657,767</td>
<td>3,780,577</td>
</tr>
<tr>
<td>4.</td>
<td>2018</td>
<td>127,145</td>
<td>3,719,483</td>
<td>3,846,628</td>
</tr>
<tr>
<td>5.</td>
<td>2019</td>
<td>130,960</td>
<td>3,831,068</td>
<td>3,962,028</td>
</tr>
</tbody>
</table>

Source: Department of Tourism and Culture District of Sukabumi

The data above shows a fairly significant development in the number of tourists in five years (2015-2019). This development cannot be denied as an implication of tourism development in Sukabumi Regency, in particular the existence of the UNESCO Global Geopark Ciletuh-Palabuhanratu. However, the case of the Covid-19 pandemic that occurred in early 2020 greatly affected the flow of tourists to the Sukabumi Regency, resulting in a significant decline. According to data from the Department of Tourism and Culture of West Java Province, the number of tourists visiting Sukabumi Regency in 2020 was 2,081,964 people, consisting of 49,985 foreign tourists and 2,031,979 domestic tourists. A decrease of 48.70% compared to the number of tourists in 2019.

A further positive impact of the development of geopark tourism is the empowerment of the community in aspects of their socio-economic life. The existence of this geopark tourism has also invited several medium-scale investors from outside Sukabumi Regency to build infrastructure that provides economic benefits, such as building inns (hotels and homestays) and restaurants that provide accommodation needs for tourists. Along with the development of the geopark tourism sector, it also creates job opportunities in various fields, including tour guides, creative economy businesses, and other tourism services.

Table 2 presents data on the absorption of local workers in the tourism sector in the Sukabumi Regency for the 2015-2019 period.

### Table 2. Labor Absorption in the Tourism Sector

<table>
<thead>
<tr>
<th>Year</th>
<th>Type of Tourism Business</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Hotel</td>
<td>Restaurant</td>
</tr>
<tr>
<td>2015</td>
<td>159</td>
<td>114</td>
</tr>
<tr>
<td>2016</td>
<td>218</td>
<td>142</td>
</tr>
<tr>
<td>2017</td>
<td>299</td>
<td>176</td>
</tr>
<tr>
<td>2018</td>
<td>315</td>
<td>228</td>
</tr>
<tr>
<td>2019</td>
<td>467</td>
<td>309</td>
</tr>
<tr>
<td>Total</td>
<td>1,458</td>
<td>969</td>
</tr>
</tbody>
</table>

Source: Department of Tourism and Culture District of Sukabumi

It is undeniable that the existence of Geopark tourism stimulates the growth of the economic sector which provides opportunities for local communities to obtain economic and social benefits to empower their lives and livelihoods. The growth of the new job sector was responded to by the Tourism Office by providing training to improve skills that support their work in the tourism sector. The training includes; basic training on tourism awareness, tour guide (guide), and creative economy. Table 3 shows data on training recipients by type of training for the 2017–2019 period.
Table 3. Tourism Training Period 2017-2019

<table>
<thead>
<tr>
<th>Type of Training</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Travel awareness</td>
<td>45</td>
<td>68</td>
<td>80</td>
<td>193</td>
</tr>
<tr>
<td>Guide</td>
<td>57</td>
<td>79</td>
<td>86</td>
<td>222</td>
</tr>
<tr>
<td>Creative Economy</td>
<td>49</td>
<td>53</td>
<td>65</td>
<td>167</td>
</tr>
<tr>
<td>Total</td>
<td>151</td>
<td>200</td>
<td>231</td>
<td>582</td>
</tr>
</tbody>
</table>

Source: Department of Tourism and Culture District of Sukabumi

4.2. Community Participation in Supporting Geopark Sustainability

The participation of local communities in the development and development of tourist villages is essential to build independence and maintain the sustainability of tourism village activities. To support this goal, the West Java Provincial Government has disbursed Rp 96 billion in 2016 to build a road from the entrance to the geopark area of Waluran. In 2017, road construction was continued from the Loji entrance to the geopark area with a budget of up to IDR 217 billion. In 2018 the West Java Government added Rp 90 billion to build a road to the geopark friend from the direction of Paltiga. Meanwhile, the Central Government is planning the construction of Sukabumi airport to support the Ciletuh-Palabuhanratu Geopark, because the airport is one of the requirements for an international geopark (Raseuki and Choiriyati. 2019)

The community needs to be involved from the start, in the tourism development planning process. Of course, these efforts were not carried out by the local community themselves. The involvement of stakeholders in tourism development is an integral part of these efforts. Nevertheless, local communities are still the main stakeholders in the community-based ecotourism (EBM) development activities. Other stakeholders are government, the private sector, media, and academia; known as the Penta helix concept (Dasman, Amirulloh, and Sampurna. 2020).

The concept of Penta Helix Geopark Ciletuh-Palabuhanratu Sukabumi is a concept used by the Sukabumi Regency Tourism and Culture Office for geopark development. There are 5 components in the Penta Helix concept, namely, government, community, business entities, academics, and mass media. The five components have different roles in geopark formation. First, the Government is in charge of providing regulations, government elements include the Central Government, West Java Provincial Government, Sukabumi Regency Government, the West Java, and Banten Natural Resources Conservation Center, Kostrad. Second, academics are tasked with educating and carrying out community empowerment because local community awareness is very weak, so community empowerment is needed, academic elements include Padjadjaran University (UNPAD) and Indonesian Education University (UPI). Third, business entities are tasked with providing and improving infrastructure, of course, not only business entities but government elements also participate in infrastructure provision activities, elements from business entities include PT Bio Farma, PT PLN, BJB, Telkom, and Hospitality. Fourth, the community is tasked with educating the same as academics, the community also has the same role but the community consists of local people who help educate other people, community elements include the Pakidulan Sukabumi Nature Association (PAPSI), the Tourism Driving Community (Kompepar), and HPL. Fifth, the mass media has a very big role in promoting the Ciletuh-Palabuhanratu Geopark, elements of mass media include TV, Social Media, Radio, and Newspapers-Majalah (Raharjo et.al, 2019).

Forms of community participation in geopark tourism activities include providing accommodation facilities in the form of homestays, providing tourist consumption needs, tour guides, providing local transportation, performing arts, and others. The provision of tourism services by local communities increases economic income significantly, thereby encouraging an increase in community welfare. Therefore, the development of tourist villages is part of the implementation of tourism that is directly related to services that require cooperation with various components of tourism organizers, namely the government, private sector, and the community. Efforts to build tourism by encouraging the role of the community are vital.

The number of homestays and rental prices per unit/night for the 2015-2018 period in Ciletuh-Palabuhanratu can be seen in table 4.
The data above shows that the number of homestays has increased along with the development of the number of tourists, although it is not necessarily accompanied by an increase in rental values. Rental prices are relatively cheap and rational, an attraction for tourists to take advantage of the existence of homestays built by local people.

### 4.3. Community Empowerment: Asep Hidayat as Pioneer of Hanjeli Tourism Village

The existence of the Geopark has provided space for the development of local economic activities based on traditional agriculture, one of which has later become a community-based ecotourism power, namely "hanjeli" agriculture. In Indonesia, this plant is also known as "jelai" or "jali". In Java, it is known as "jali corn". Its scientific name is Coix lacryma-jobi.

Asep Hidayat is a local actor who has succeeded in re-popularizing this forgotten food plant and even succeeded in making “hanjeli” the main attraction of the tourist village that he developed with the residents. Initially, Asep was a migrant worker in Saudi Arabia who later returned home in 2010 and chose not to return to work abroad. He chose to live in his village, Waluran Mandiri Village, Waluran District, Sukabumi Regency, a place where he cultivates hanjeli together with the people in his village.

When in 2018, UNESCO included the Ciletuh and Pelabuhan Ratu areas as part of the UNESCO Global Geoparks, the consequence was that this site had to make use of its geological heritage with all other aspects of its natural and cultural heritage. The aim is to raise awareness about the main issues facing society today, such as sustainable use of resources, mitigating the impacts of climate change, and reducing the risk of natural disasters. In line with this, Waluran Village, where Asep realizes his ideas about food security are included in the Ciletuh Global Geopark zone and Asep's idea in developing the potential of his village is following UNESCO's vision of community-based nature conservation, natural heritage, and local culture. Armed with this potential social and cultural capital, Waluran Village was later developed into an educative tourism village based on local culture. Currently, one area in Waluran Village has been developed into a tourist destination, known as the Hanjeli Tourism Village. In this tourist village, visitors can enjoy a package of hanjeli rice dishes and various food products made from hanjeli, such as porridge, lunkhead, or tapai hanjeli.

Asep is considered instrumental in empowering villagers in terms of food security, introducing alternative food ingredients, and also improving the welfare of residents through the development of tourist villages. He received this award in conjunction with the commemoration of World Food Day 2019. Asep also received the 2019 Sukabumi Award as an outstanding Small and Medium Industry business actor.

### 4.4. Waste Management in Geopark Area

The existence and sustainability of Geopark tourism depend on the seriousness of the managers and the community to maintain and anticipate environmental damage. There are two important things to note concerning tourism and the environment. First, the environment can be disturbed by tourism activities, both the natural environment and the socio-cultural environment, and the environment continues to have a dialectic of interests, namely in the form of a conflict or conflict between the preservation of nature and material interests. Second, the environment and tourism synergize and support each other, in which the preservation of nature is maintained, followed by an increase in the progress of the community. These two assumptions can only be implemented if the stakeholders are aware that it is the quality of the environment that is the basis of the selling value for tourists (Sukabumi Regency Environmental Service Report, 2020).

---

1 Extracted from the results of an interview with the Public Relations of the Hanjeli Museum in Waluran District, November 10, 2021
Concerning the environmental quality of the Ciletuh Geopark, the maintenance of the natural environment is a priority. Because the damage to the Geopark environment will have an impact on the overall environmental damage that threatens the sustainability of Geopark tourism itself. Therefore, public awareness around the Ciletuh Sukabumi Geopark area needs to be grown and maintained, while increasing the capacity of its human resources in managing the environment of the tourist area. The environmental damage is mainly caused by the threat of plastic waste which tends to increase, along with the growth in the number of tourists from time to time. Anticipating this, the Sukabumi Regency Government has issued Regional Regulation Number 13 of 2016 concerning Waste Management and Retribution for Waste/Cleaning Services; and Regent Regulation Number 81 of 2020 concerning Transfer of Cleanliness through the Clean, Orderly, and Beautiful (Bestari) Sukabumi Movement.

However, waste processing still applies the conventional 3R method; reuse, reduce, and recycle. In principle, waste is still considered used goods that have no value (residual) so they must be disposed of. The government and society have not developed concepts and technologies to process waste so that it has economic value that provides job opportunities and empowers the community to gain economic benefits. The use of conventional approaches in managing waste has implications for the use of large funds for transportation and provision of final disposal sites (TPA). According to the Environment Agency, overall, the amount of waste in the Sukabumi Regency that was successfully managed was 75.46 tons per month or 905.52 tons per year in 2020. This needs to be continuously improved to achieve the targets of Regional Policies and Strategies for Household Waste and Waste Management A type of Household Waste (Jakstrada) in Sukabumi Regency, namely in the form of reducing waste by 30 percent and handling waste by 70 percent by 2025 (Sukabumi Regency Environmental Service Report, 2020).

Data from the Sukabumi Regency Environmental Service (DLH) stated that at the beginning of 2020 there were 54 Waste Banks and Reduce, Reuse, Recycle Waste Management Sites (TPS3R). By the end of August 2021, the 3R Waste Bank and TPS had grown to 72 units. Thus there is an increase in the growth of Waste Banks by 40.74 percent. The scope of services for the Waste Bank and TPS reaches 50 villages and 31 sub-districts. Meanwhile, for waste management in the Ciletuh-Palabuhanratu Geopark tourist area, the Sukabumi Regency Environmental Service collaborates with community groups and companies to manage waste through the waste bank concept. There are 10 waste banks spread over 4 sub-districts in the Ciletuh-Palabuhanratu area, namely Cisolok, Palabuhanratu, Surade, and Simpenan. Specifically for processing plastic waste, the Sukabumi Regency Government has made a regulation that prohibits the use of plastic bags in modern shops, as stated in Article 11 of Perbup No. 18 of 2020, which takes effect on November 11, 2020. With this ban, Sukabumi Regency was able to reduce plastic waste by 98.32 tons per year or 8.19 tons per month. This number comes from 404 supermarkets, minimarkets, and department stores spread throughout the Sukabumi Regency. Especially for the Cietuh-Palabuhanratu Geopark tourist area, there is no separate data regarding the amount of plastic waste in the region (Sukabumi Regency Environmental Service Report, 2020).

5. Conclusion

The existence of the Ciletuh-Palabuhanratu UNESCO Global Geopark as a tourism icon based on the natural and cultural environment is not only the pride of the people in the Sukabumi Regency but also for the people of Indonesia because it is part of the promotion of national tourism to the international community. The government and local communities provide positive and creative responses to support the sustainability of the geopark tourism development through constructive participation in various aspects of the economy, culture, and environmental management, which at the same time empowers the socio-economic potential of local communities.

In line with this, local governments facilitate the participation of local communities through the provision of infrastructure to develop the socio-economic potential of the community, including the development of transportation access, development of cultural-based tourism villages and rural economies, creative economy training and tour guides, all of which support sustainability. geopark tourism and also socio-economic empowerment of local communities.

However, the involvement of these stakeholders has not worked optimally. This is due to several factors, especially the limited capacity of regional budgets. Meanwhile, the central government handed over the management of geopark tourism to regional independence. Overcoming these limitations, local governments need to optimally involve the private sector as part of the stakeholders, which should support the sustainability of regional development. On the other hand, community participation also needs to be optimized, especially in terms of increasing tourism taxes which have the potential to contribute to local revenue (PAD). The growth of business sectors such as lodging, homestays, restaurants/restaurants, has not been optimally regulated in terms of retribution taxes and development that provides economic benefits.
References


PPGK-Geologi UNPAD (2017). Geopark Ciletuh-Palabuhanratu. Bandung: Department of Tourism and Culture of West Java Province


Biography

Aris Munandar is an Associate Professor in sociology. Scopus ID: 57202858040. Completed his Master and Doctor of Sociology at the University of Indonesia. His main interests are urban sociology and social planning. Actively conducting research and scientific publications both at national and international levels. Until now, he is actively teaching at the Department of Sociology and Postgraduate Political Science, National University, Indonesia.

Erna Ermawati Chotim is a Lecturer in the Department of Sociology at the National University. Completed Master and Doctorate in Sociology from the University of Indonesia. Her main interests are economic sociology and gender studies. Actively conduct seminars, research and scientific publications both at national and international levels.

Adilitya Pramanti is a Lecturer at the Department of Sociology at the National University. Currently completing a Doctoral study in Rural Sociology at Bogor Agriculture University, Indonesia. Her main interest is in environmental sociology and is the focus of his research and scientific publications.