

Strategy for Development of Ecological Citizens by Walhi Yogyakarta through Community-Based Education in Communities Gunung Sewu

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Abstract

The issue of environmental damage is one of the issues of global concern, occurring in almost all countries. Indonesia is one of the countries that have experienced environmental crises in a row every year. Burning forests, pollution and garbage are some things that until now have not found the right solution. This was compounded by the emergence of infrastructure development that escaped ecological awareness, both in the construction of roads, airports and expansion of urban areas. Environmental damage occurs almost everywhere, including the Gunung Sewu karst area which is threatened by mining and tourism. There are several factors causing environmental damage including the lack of ecological education programs carried out by the government to the community, the role of schooling that has not been optimal in environmental-based learning to the level of public awareness that is still low on sustainable development. Therefore it is important to form ecological citizenship that is responsible and able to be wise in protecting, managing and destroying the environment. From the point of view of Civic Education (Civics) the effort is an effort to develop civic virtue within the scope of Ecological citizenship. This study aims to determine the efforts made by the Yogyakarta walhi in conducting guidance to the Gunung Sewu community in the preservation of the Gunung Sewu karst area. The research method uses a qualitative approach. Research informants were members of the Yogyakarta walhi and Gunung Sewu Community. This research will show a variety of community development programs that include community development, providing information to the community and socialization of the preservation of the Gunung Sewu karst

Keywords

ecological citizenship; community empowerment; sustainable development



I. Introduction

Ecological citizenship is a new idea that is strived to shape the awareness of citizens in forming a whole human being in the involvement of protecting the environment. Deane Curtin (Engin F ISin, 2002) The emergence of the idea of ecological citizenship is a manifestation of world conditions that are experiencing a prolonged ecological crisis. The term "ecological citizenship" was first used in 1990 by environmental institutions in Canada. Based on the Canadian environmental institution, it was revealed that some of the global citizens who do not have a good history in an effort to manage the surrounding environment properly. (Mariyani, 2017) Michael Bell (Bell, 1998) writes about 'ecological dialogue', pointing out the fact that ecological crises materially occur stemming from human ideals in society, so to make this approach and provide a real change to environmental crises, need to understand and aim at sociological basis. From the standpoint of environmental sociology,

environmental crisis is a material problem with ideological roots (Boyd, 2003).

Indonesia's National Development aims to create a prosperous and just society ; however, in order to realise these objectives the government strives to make various policies and development programs which are oriented either towards village development or towards city development (Badaruddin et al, 2020). Kariono et al (2020) states that in this era of development, local wisdom cannot be separated from the socio-economic demands that must be met. Development is a long-term educational process that uses systematic and organized procedures that managerial study of conceptual and theoretical knowledge to achieve general goals (Thoha in Sulasmi, 2020). Development according to Suprianto as quoted by Mankunegara (2003) is an activity to improve the ability of employees by increasing knowledge and understanding of general knowledge including increasing mastery of theory, decision making in dealing with organizational problems.

In Indonesia the idea of Ecological Citizenship has become an important study in the world of education, even though the implementation of ecological citizenship learning is not contained in the majority of curricula in formal schools. However, studies on ecological community development have been carried out even practiced by government and non-government institutions, for example the Indonesian Forum for the Environment (WALHI) Walhi is a non-governmental organization that focuses on environmental studies. Starting from a team of 10, Walhi is now the largest Not Government Organisation (NGO) in Indonesia with 28 Regional Executives and One National Executive. On his journey Walhi cooperated with Friends of Earth International (FOEI) so it can be said that Walhi is a FOEI representative in Indonesia. The focus of Walhi's studies and advocacy is not only focused on the environment, but broader than that, Walhi focuses on the study and advocacy of living space, so the causes of environmental damage such as politics, economics and culture are the focus of Walhi's studies. In Yogyakarta Walhi was established in 1986, focusing on the activities of mentoring community residents, member institutions and escorting karst in the Gunung Sewu. In some cases Walhi Yogyakarta was also involved in advocating the rejection of airports in Kulonprogo.

Karst is a German term derived from Slovenian which means rocky arid land (T.N Adji, 26-27 October 1999). The term actually describes the conditions that are often found in many areas of carbonate rock or other rocks that have soluble properties. More specific definitions are expressed by Ford and Williams who define karst as a field with hydrological and landform characteristics caused by a combination of rock which is soluble and has well-developed secondary porosity (Williams, 2007). Karst in the Gunung Kidul region was first introduced by Danes (1910) and Lehmann (1936) and is world-renowned as the karst of Gunung Sewu. This karst is characterized by the development of the karst dome (kegelkarst), a positive landform better known as the sinusoidal dome. (Sari, 2011) Gunung Sewu can also be categorized as an open karst (bare / nackter karst) in the form of conical hills that are not found in other karst regions throughout the world. The Gunung Sewu karst area is also one of the very unique karst areas in Indonesia and is proven by the award from the Asia Pacific Forum on Karst Ecosystems and World Heritage as World Natural Heritage. One system that requires management of this unique area is its groundwater.

According to the director of the Yogyakarta Forum for the Environment (Walhi Yogyakarta) Khahik Sandera in an interview said that almost all of Gunung Kidul Regency and parts of Wonogiri Regency and Pati are part of the Gunung Sewu karst landscape. It needs special attention because in reality the destruction of the Gunung Sewu karst landscape continues, both due to the ignorance of the community and government and private projects

that carry out development without considering the ecological aspects of an area. As Tempo described in the news on 2 March 2017 that the exploitation of karst continues to be carried out specifically for tourism development which is indeed a special concern of the local government in Gunungkidul. In a joint interview the other day, Khalik who also doubles as the coordinator of the Gunung Sewu Concerned Community Network (JMPPS) said it would be a great loss if exploitation of the karst landscape was carried out without considering ecological sustainability. That is because the Gunung Sewu karst landscape serves as water infiltration that deviates millions of kilo liters of water for the Gunung Sewu community water reserves in the future. (Tempo Investigation, 2017).

In the various environmental studies conducted by WALHI found three main threats overshadowing the sustainability of the Gunung Sewu karst, the first is the Southern Cross Road (JJLS), Limestone Mining and the construction of tourism support facilities namely resorts, hotels and other facilities (Detik News, 2017).

Based on these considerations, in November 2018 at the Yogyakarta Walhi Work Meeting, Walhi began to include the conservation of the Gunung Sewu karst in the annual work program. In the work program that was built, Walhi Yogyakarta included two important things that Walhi Yogyakarta would do in the vulnerable period of 2018 until 2020. Namely advocacy and capacity building for community building in the effort to preserve the Gunung Sewu karst. The program is carried out in at least three districts namely Gunungkidul, Wonogiri and Pacitan. This community building capacity building program is the focus of this research. From the point of view of Civic Education (Civics) the effort is an effort to develop civic virtue within the scope of Ecological citizenship (Ecology citizenship).

II. Research Method

This study uses the interview method, document review, using a qualitative approach which is a research method based on the philosophy of postpositivism, used to examine the natural conditions of objects where the researcher is a key instrument, sampling data sources is done purposively. Qualitative research places more emphasis on meaning rather than generalization (Sugiyono, 2009). Collecting techniques with interviews were conducted with four sources, namely the Yogyakarta walhi director, the avocation division, the walhi program manager and the walhi media division assigned to establish visual communication with the Gunung Sewu community. Interviews were conducted from 5 November to 6 November 2019. Document review was an important part of this research. The document review in question is dissecting the Yogyakarta walhi program documents as primary data and online media reporting as secondary data.

III. Discussion

3.1 Ecology Movement

2019 became an important year where the ecological movement reached the peak of resistance. The issue of environmental damage is not even popular among environmental activists but is starting to become an issue discussed in many communities. One interesting example is the statement of pop band from London Coldplay, decided to postpone the tour of their new album "Everyday Life" because of concerns over the environmental impact caused by the concert.

In Europe a 15-year-old activist Greta Thunberg from Sweden started the 'School Strike for Climate' movement, which was joined by thousands of students and parents who have attracted worldwide attention. Like other social movements, the ecological movement

continues to grow in line with the escalation of issues and community organizing. Movement action will always develop when human life experiences problems that occur in an event. Movements involve many people and events that play a role in strengthening social change (Shiva, 1997: 87) Organizing and mobilizing ecological movements tend to be easier than other political movements. In addition to the role of the media which is quite massive and supported by world popular figures, the ecological movement also has evidence that is quite real and felt by the community directly, namely climate change.

Ecological movements also cannot be separated from other social movements, because the true ecological movement is also part of the social movement itself. Every social movement will certainly have its own consequences. Namely with the existence of community contradictions, social conflicts and power or even movements that end in violence. Social movements are synonymous with change and violence. According to Eisenstadt (1986: 3) the process of revolution is understood as a process that is extraordinary, very hard and is the most integrated movement of all other social movements. However contemporary social movements tend to be more lenient and even far from violence. This is influenced by the development of contemporary media that are able to represent aspirations without vandals such as most social movements in the Nineties and below.

The ecological movement continues to develop and organize itself in the midst of society, alongside other social movements such as the peasant, labor and student movements. Organizations that are closely related to the environmental movement include government or government-sponsored groups, professional associations and scientific organizations (Beulle, 2000: 282). The environmental movement in Aditjondro's study shared three important components in carrying out its 17 roles. The first component, organized environmental movements or voluntary environmental movements, for example Walhi in Indonesia. The second component, the public environmental movement which is a form of community-based movement, daily actions expresses aversion or fondness to ecosystems. The third component, the government-based environmental movement or institutions formed by the government regarding efforts to address environmental problems such as the environmental service in Indonesia (Aditjondro, 2003: 166). From these various movements then developed into community communities, such as the Gunung Sewu. Community Care Network (JMPPS) in Gunung Kidul. JMPPS and Walhi Yogyakarta continue to be consistent in guarding environmental issues, especially related to the preservation of the Gunung Sewu.

A true social movement is capable of articulating fundamental socio-political processes and responding to existing social and political problems. This movement must provide appropriate alternatives for the community at large, not only for the community itself (Hikam, 1996: 154). The civil society movement is a worldwide movement for example in the nature preservation movement which includes the strengths of non-governmental organizations that are widely known by the people themselves to preserve their environment (Tilar, 2004: 41). In this case, it is exactly like the JMPPS and Walhi Yogyakarta movements that consistently guard the preservation of the Gunung Sewu..

Community organizing must continue to be carried out by the ecological movement. The involvement of local communities is important as the main pillar of preserving the environment. Environmental institutions and community activist associations are always limited to supporting the struggle or often referred to as solidarity. However, an organized movement formed with the aim of opposing the power and circumstances of the environmental crisis is very much needed by the community. The problem according to Kalidjernih (2011: 160) environmentalist movements has important implications for the conception of citizenship. Whereas Vasi (2011: 37) explains the environmental movement can pressure various organizations to buy green power through petitions, lawsuits, boycotts,

and protests. This requires the right to just survival and peace through petitions, lawsuits and policy protests that are detrimental to the environment. As explained earlier, ecological movements are political movements for a non-violent world order in which nature is preserved for survival. Ecological movement that deeply touches every personal, economic, political, and philosophical problem (Shiva, 1997: 48; Naess, 1989: 32) Ecological movement is also much influenced by various ideologies, or even precisely is that almost all ideologies in the world place ecological movements as movements important and worth fighting for.

3.2 Ecological Citizenship Development through Community Based Community Education By Walhi Yogyakarta

Environmental education is a staple in the development of ecological citizenship. What is expected in the development of ecological citizenship is the development of ecological culture, the development of community initiatives, and collectivity. So environmental education is education that emphasizes citizenship as the primary mission of environmental education (environmental education) especially those that advocate the development of environmental values and environmentally responsible behavior (Berkowitz, et al, 2005: 227)

The environment is committed as an appropriate and important focus for formal and non-formal education (Palmer, 2003: 228). The objectives of environmental education UNESCO (1977) formulated there are three as follows.

- 1) To foster clear awareness about economic, social, political and ecological interdependence care in urban and rural areas;
- 2) To give every community the opportunity to obtain the knowledge, values, attitudes, commitment and skills needed to protect and improve the quality of the environment;
- 3) To create new patterns of behavior of individuals, groups and societies as a whole to the environment (Palmer, 2003: 135-136).

The purpose of community-based environmental education is to increase public awareness of the importance of protecting the environment. Making community community with nature is an inseparable unity. Community-based environmental education must be able to provide rational and wise solutions to the use of natural resources. Both the use of karst to meet the needs of water, mining and tourism are the main orientation of the administration of the Gunung Sewu community, especially in the Gunung Kidul Regency Government.

Attention to civic education can be done through formal, non-formal and informal education (Cogan, 1998: 13). Meanwhile in Indonesia, the study team of the Directorate General of Learning and Student Affairs of the Ministry of Research, Technology and Higher Education of the Republic of Indonesia (2016: 268) mentioned that citizenship education can be carried out through formal channels (schools and colleges) and non-formal channels (social community)). Citizenship education is a form of education that influences someone to make independent decisions and is responsible for all decisions based on important components to be integrated in the training or education of non-formal education instructors (Wahyudin, et al, 2016: 248). In the context of Walhi, citizenship education is indirectly carried out in the community empowerment program, by expressing opinions about politics, economics and culture that are oriented to the development of ecological societies. Green politics has been the focus of Walhi's attention in recent years, even culturally many of the members of Walhi have been involved in the development of the Green Party even though the implementation has only been carried out individually and apart from Walhi as a non-governmental organization. Green politics is an entry point where institutional work becomes political work and public education work that introduces the community of citizens to government programs that are ecological or not at all.

3.3 Development of Ecological Citizenship

Environmental damage is the issue that most attracts a lot of human attention today. Several incidents related to natural disasters have not escaped a serious discussion and are often associated with the destruction of nature due to human negligence in managing nature. Therefore, the government and the existing environmental institutions should encourage the formation of citizens who care about the environment. The importance of forming ecological citizenship through personal commitment to learn more about the environment is then able to take action in maintaining, managing and preserving a responsible environment (Szerszynski, 2006). Society or within the scope of the State is said to be a citizen having a key role in environmental preservation. The formation of ecological citizenship is important, that citizens today must have multidimensional characteristics that have the characteristics of having identity; freedom to obtain certain rights; fulfillment related to obligations; interest and involvement in public affairs; and ownership of the basic values of society this is one of the concepts to form an ecological citizen through the role of government, schooling and community role (Cogan, 1998) Development of ecological citizenship is a solution according to the Yogyakarta Walhi given the threat to the natural preservation of the Gunung Sewu karst in the the years to come will be even greater. There are a number of factors revealed by the Yogyakarta walhi that pose a serious threat to the conservation of the Gunung Sewu.karst, the first being the construction of JLS, construction of tourism facilities and mining activities.

The issue of environmental damage in communities around the Gunung Sewu.has not was a particular concern. In the past, the area was an isolated area with problems of poverty and drought that occurred almost every year. The character of the karst area is indeed different from other regions, so for the majority of people who work as farmers, karst is not an ideal place for farming. The difficulty of finding solutions to these problems is the reason for poverty in the communities around the Gunung Sewu. The problem that arose later was the use of karst that was not environmentally friendly. Traditional mines have sprung up, followed by the introduction of beaches in Gunung Kidul and Pacitan, which are used by the community as work fields. In the process, this tourism facility becomes a problem, because the karst hills are cut to become roads and hotels.

Dobson's study (2003: 90) considers ecological citizenship to be more intellectually attractive than environmental citizenship (environmental citizenship) from the point of view of citizenship (citizenship). Ecological citizenship is largely determined by efforts to expand the discourse of social welfare to recognize universal principles relating to environmental rights and to centrally include them in law, culture and politics (Dobson, 2003: 95). The separation of the struggle of the community groups with the government and educational institutions, making the movement to preserve the Gunung Sewu is very difficult for the general public. Not without reason, some criticism emerged over the environmental campaign efforts carried out by Walhi Yogyakarta. The criticism is criticism of environmental campaigns that often forget the economic factors of society so that people have enough reason to carry out karst mining activities. Therefore, Walhi began evaluating himself by involving non-environmental community groups to conduct community studies that cover general ecological issues.

Smith & Pangsapa (2008: 9) explained that ecological citizenship is part of a new generation of citizenship that takes political obligations seriously. The new generation makes ecological citizenship part of the type of citizenship. However, ecological citizenship is not directly taught in schools or universities. What exists is learning about a very normative and general environment. While ecological citizenship is not only limited to that, but more broadly covers other social aspects including economic and political aspects.

In many studies of ecological citizenship is the concept of state life which is responsible for the sustainability of life that is always side by side with nature. Then it becomes important that ecology is included in the legislation. Smith & Pangsapa (2008: 80) argues that ecological citizenship presupposes humans to have obligations to animals, trees, mountains and biotic communities. This is not without reason. Humans as part of nature, have an obligation to care for the preservation of nature around them for the survival of their own lives. The consequence of ecological citizenship is the ecological awareness of human development. Development must be accompanied by environmental awareness and consideration of development impacts. Law Number 32 Year 2009 Concerning Environmental Protection and Management Article 22 Paragraph 1 Said that "Every business and / or activity that has a significant impact on the environment must have an Environmental Impact Assessment". The concern of this Article is the cumulative nature of development impacts, which consist of the number of people affected, the intensity and duration of impacts and the extent of the spread of development impacts.

3.4 Karst preservation programing by Walhi Yogyakarta

Since 2017 Walhi Yogyakarta began to be involved in several advocacy of karst conservation which is directly related to the community. In fact Walhi Yogyakarta involved several elements of the community in the advocacy process. The establishment of JMPPS is the initial milestone of the involvement of the Yogyakarta walhi in the preservation of the Gunung Sewu karst. At a work meeting in 2018, Walhi Yogyakarta began to include a karst preservation program in the annual program. The program is divided into two important parts of work, the first is a community advocacy program involving JMPPS and a community building capacity building program that is carried out through the assistance of youth groups, farmer groups and tourism awareness groups in Gunungkidul. The following is a Walhi Yogyakarta proraming table related to the Gunung Sewu karst.

Table 1 Karst Preservation Program 2018-2020

No	Program	Forms of activity	Target	Person in charge
1	Community Advocacy	<ol style="list-style-type: none"> 1. Inventory regulation of karst protection in the Gunung Sewu 2. Case Inventory 3. Strengthening JMPPS 	<ol style="list-style-type: none"> 1. Centralized data on cases of environmental violations 2. Strengthening the organization of JMPPS 3. Environmental Lawsuit. 	<ol style="list-style-type: none"> 1. Advocacy Department 2. JMPPS
No	Program	Forms of activity	Target	Person in charge
2	Increased community building capacity	<ol style="list-style-type: none"> 1. Establishment of an environmentally conscious community 2. Making karst infographics 3. Assistance from farmer groups, youth and youth groups 	<ol style="list-style-type: none"> 1. The existence of a forum that facilitates community learning spaces 2. The existence of an information center that is affordable to the public 	<ol style="list-style-type: none"> 1. Media department 2. The advocacy department 3. Anang Saptoto

			3. Establish intensive communication with community groups	
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Based on what is shown in table 1, aside from advocacy activities, there are three programs that become the priority of Yogyakarta walhi in the development of ecological citizenship of the Gunung Sewu community. The first is the formation of environmentally conscious communities, making karst infographics and assisting community groups. Some of the program trips were explained by the responsible parties through a direct interview at the Yogyakarta Walhi office.

a. Formation of Environmental Conscious Communities

The environmentally conscious community involves several elements that were previously involved in JMPPS. Automatically more involved in the development of environmentally conscious communities is the Yogyakarta advocacy department. Himawan Kurniadi as the head of the advocacy department explained that organically the environmentally conscious community was formed in line with various activities carried out by walhi in Gunung kidul before. JMPPS is a core part of the formation of this community, in which JMPPS is also involved in the Gunung kidul Student Association (IMG) and several student organizations that are currently helping to build environmentally conscious communities in communities in the Gunung Sewu, especially in the already established Gunung kidul area. Until now, only one environmentally conscious community has been formed, namely the Watu Kodok community in Gunung kidul.

b. Formation of Environmental Conscious Communities

The intended infographic is non-digital infographic. That is a simple poster that is mass-produced and distributed at several points in three districts that are part of the Gunung Sewu karst area, namely Gunung kidul, Wonogiri and parts of Bantul. Infographics are handled directly by poster artist Anang Saptoto. There are several obstacles which become the reasons so that until now the dissemination of information through infographic a poster has not yet been realized. The lack of accurate data and research that continues to be delayed is the main reason so that infographic material has not been maximally collected. Yet according to Anang Saptoto, infographics are the spearhead of building public awareness, because some of the problems in preserving karst always start from ignorance and lack of knowledge about karst itself.

c. Community Group Assistance

The number of walhi activities that are directly related to the community opens a communication space between walhi and community groups, namely farmers' groups, tourism awareness groups and cadets. Some community groups that directly networked with WALHI and began discussing karst preservation in the regular program were the Watu Kodok farmer group, the Bandarejo farmer group, Karang Taruna Semanu and several tourism-aware groups around the Indrayanti coast. This community group facilitation is considered the most effective, because the membership material has been formed a long time ago, even though it is like that but there are still many shortcomings because the focus of the group is split with other focus which is precisely the main focus of their community.

V. Conclusion

Ecological citizenship is increasingly popular in the world as the issue of environmental destruction becomes increasingly global. There are several factors that make environmental issues easily accepted by the community, first is an internal factor, which is a self reflection that increasingly feels far from nature, feels the difference in weather and subjective discomfort. The second factor is an external factor, namely an external impetus in the form of a campaign carried out by environmental activists and an objective condition in which there is an injustice that is environmental destroyers in the capitalist economy, who never get proper punishment as a destroyer of the environment.

The ecological citizenship development effort undertaken by the Yogyakarta walhi is an effort to realize the importance of maintaining karst for the sake of the continuation of the lives of the Gunung Sewu communities in three districts namely Gunung kidul, Wonogiri and part of Bantul. The effort is very visible that what Walhi is doing is creating a defensive wall against threats that are in sight. So in the end some of these development efforts were hampered, because the focus of the walhi was drained into advocacy programs in line with the ongoing karst destruction. For writers who are urged to be carried out by the Yogyakarta walhi and other environmental activists in the Gunung Sewu area, it is to solve economic problems and drought with environmentally friendly technology. Scientific findings about the function of karst as a reservoir of water must be proven by raising surface water so that it can be used by the community. By solving the economic problems of the community, the possibility of exploitation of karst will be even smaller, of course with continued awareness through the community that has been programmed by the Yogyakarta walhi.

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