

Analysis of Social and Environmental Responsibility (CSR) to Local Communities Based on Social Capital and Triple Bottom Line Approach in Geothermal Working Area, Dieng, Indonesia

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Abstract: This research focuses on the effectiveness of PT Geo Dipa Energi (Persero)'s CSR activity coverage in the Dieng working area of Indonesia using the SCL and TBL approaches. The specific objectives of the implemented CSR programmes are to improve the welfare of communities in the target areas, protect the environment, and promote local economic development. Based on ethnographic qualitative design and non-probabilistic sampling through semi-structured interviews with local informants, this study identified that social capital is critical in realising the success of CSR initiatives and in particular, the company's relationship with the community. The findings show that PT Geo Dipa's CSR programme has considerable positive impacts on economic, social, and environmental aspects, but related to equitable benefit sharing and environmental issues are still under-examined.

Keywords: Corporate Social Responsibility, Social Capital, Triple Bottom Line

1. Introduction

As part of its vision 'Caring for the Environment', PT Geo Dipa Energi (Persero) manages its Corporate Social Responsibility (CSR) activities in an integrated manner. The mission of a socially responsible company is to realise business intertwined with social welfare by optimising state assets for the benefit of society. To concretise this vision, PT Geo Dipa Energi also promotes environmental management through Corporate Social Responsibility (CSR) projects that aim to increase positive impacts for stakeholders during the implementation of operational activities and minimise negative effects. As the company has become increasingly recognised through its generating units, it has established sustainable partnerships with community members to include them. Notably in their Corporate Social Plan (CSP) and Corporate Strategy, there is a prioritisation towards development articulated as three pillars, people (community), pure forever (earth), and profit (business) which are all embedded in the concept.

Companies are faced with not only the need to fulfil economic returns but must also improve the well-being of communities and the environment. To implement the sustainable development model, PT Geo Dipa needs to actively implement the strategies of capital economy, social responsibility, and environmental protection, while continuously raising

internal awareness of sustainable principles. This commitment is designed so that the company's business is not only relevant in the present but also has a positive impact on society, the environment, and increases the company's value in the eyes of stakeholders and shareholders.

Among Geo Dipa's corporate goals in the CSR sector, one important direction remains the collaboration with social infrastructure with the active involvement of business centres. This social capital, in this case, is the relationships, trust and interactions within or between communities or businesses. In the context of corporate social responsibility, this social capital is necessary for the process of engaging communities in corporate programmes. In addition, social capital also aims to strengthen various parties for more harmonious collaboration. This research analysis chose Dieng as the research location. Firstly, Dieng has great energy potential, currently being built Dieng PLTP unit 2 with a capacity of 55 MW to support the increasing need for energy resources. Secondly, Dieng does have a biodiversity protection programme, including the planting of 18,006 trees around this trail programme and an eagle protection programme. Thirdly, compared to Patuk, Dieng's DPLT has been in operation since 2002 with an installed capacity of 60 MW, which suggests that Dieng has a more developed structure for scientific research and new development. Fourthly, at Dieng, changes were made to the method of monitoring partial discharge from generators that eliminated plant shutdowns and restarts, minimising carbon emissions and making the site suitable for renewable energy research.



Figure 1. Comparison of Patuhan and Dieng PTLPs

Renewable energy, especially geothermal energy, integrates CSR into its strategy and approach. However, it is important to emphasise that this is not simply done for ethical compliance but for business needs that enhance sustainability and local stakeholder engagement. This form of organic development can be formulated as a working definition of CSR in the energy sector proposed by [1] where Davids managerial perspective on CSR activities promotes the achievement of sustainable development. By thinking about the development goals of CSR in the energy industry, it indicates the reduction of negative externalities such as acts of pollution and damage to the environment. It also promotes social good as it creates employment opportunities and encourages investment at the local level [2].

On the other hand, CSR's battle with community engagement is also evident. Among other things, it prolongs the social fabric of trust and collaboration defined by [3] as one of the determinants in the relationship between CSR engagement and business outcomes. The trust barrier on the part of those supported must be crossed in the community context in the renewable energy context where local communities are represented during the decision-making process - this enhances the aesthetics of the project which in turn increases the success rate of its implementation. This generally inclusive approach also helps minority members to benefit from the project, fuelling relatively higher social equality [4]. Therefore, building social capital with elements of trust, engagement and co-operation is a critical block in the success of CSR activities and promoting sustainable development.

CSR also plays an important role in the promotion of innovation and sustainable practices in the energy industry. [5] argue that companies that engage in CSR are more likely to develop environmentally friendly innovations, especially in the context of the emerging renewable energy industry. Thus, by promoting CSR, these businesses can realise operational performance gains while supporting the shift towards a more sustainable global energy system [6].

At PT Geo Dipa, the CSR model operates as a platform that integrates business needs and community needs. Similar to the principles of TBL, these programmes prioritise economic benefits and also fulfil their purpose of having a positive impact on the community and the environment. However, in the realisation of these programmes, problems still exist, such as poor social and environmental outcomes of CSR programmes as well as conflicting positions between local leaders and local communities towards the success of these programmes.

The purpose of this study is to investigate the scope of influence of PT Geo Dipa's Community Development regarding its CSR programmes in assisting the national budget, protecting the environment, developing the local economy, and contributing to the social capital formed in the operational area in the Tri-Pe bottom line (TBL) perspective. Specifically, this research aims to resolve several key puzzles in this study including: to what extent does the CSR programme implemented by PT Geo Dipa improve the economy of local residents? How does the CSR programme affect the community in the social aspects affected by the project? How does the CSR programme facilitate the development and strengthening of social capital? and to what extent does the CSR programme contribute to environmental sustainability within the Geothermal work area?

2. Methodology

This research utilises a qualitative case study method in which the community within the PT Geo Dipa Energi Dieng unit is scrutinised to see how Corporate Social Responsibility (CSR)

is operated in relation to Renewable Energy. A qualitative approach allows exploration of the complex interrelationships that exist between a company and the local communities around its operations. It is therefore a very useful technique for uncovering contextual aspects in studies. Cases also help scholars to appreciate the socio-economic and environmental aspects that surround a company's CSR efforts in detail.

The main data of this study was collected through semi-structured interviews with six key informants, namely two sub-district heads as the Geothermal Working Area is located in Kejajar sub-district, Wonosobo district and Batur sub-district, Banjarnegara district. In addition to the sub-district officials, other data was obtained by focusing on four village heads, who are directly located in or within the villages of Sikunang, Ngandam, Buntu, and Pawuhan hamlets, which are residents of PT Geo Dipa's operating area.

Table 1. Informant Profile

Name	Status/Title	Age	Gender	Jobs
Ahmad Shidiq	Development Section Head of Kejajar Sub- district, Wonosobo Regency	Not mentioned	Male	PNS Sub- district
Toha	To Sikunang Hamlet, Kejajar Subdistrict	48 Years	Male	Hamlet Head
Ahmad Basir	Head of Ngandam Hamlet, Kejajar Subdistrict	51 Years	Male	Hamlet Head
Aji Biluroso	Head of Batur Subdistrict, Banjarnegara Regency	Not mentioned	Male	Head of Sub- district
Khoris	Head of Pawuhan Hamlet, Batur Sub-district	Not mentioned	Male	Hamlet Head
Slamet Widodo	Head of Buntu Hamlet, Batur Subdistrict	43 Years	Male	Hamlet Head

The interviews selected were subjects most directly involved in managing the community and those who may be able to shed light on the effectiveness and impact of CSR initiatives at the local level. [7] emphasise that the development of effective CSR in the energy sector must consider local social stakeholders. The emphasis on local leaders allows the research to be more

balanced in terms of understanding the position of CSR in society, which is usually the case in quantitative research.

Semi-structured interviews also allowed interviewees to express other key opinions in the interview and provided the researcher with more information. The semi-structured method allowed the researcher to determine which questions to ask the most based on the responses that emerged. The interviews focussed on three main areas which are the three pillars of TBL: economic, social, and environmental. More specifically, emotions such as trust and collaboration between companies and communities were examined through the lens of directive rather than circular social capital.

In terms of economics, the research specifically sought to discover how PT Geo Dipa's CSR programme articles support local economic development such as job creation, business provision, and community economic growth. This concern can be well connected to [1] that economic sustainability remains one of the key aspects of the TBL framework. The prevailing economic notion will make it possible to examine the extent to which corporate social responsibility helps the promotion of regional economic progress.

In a social perspective, interviews are focussed on establishing how CSR impacts the standard of living of local residents. Sustainability of local interviews include the active participation of people in community activities, social cohesion and the impact of CSR on education, health, and infrastructure. [2] also noted that social capital plays an important role in building and maintaining trust between businesses and local communities. This research takes a social perspective and aims to answer the question of how the CSR initiatives of PT Geo Dipa Energi's Dieng unit can help improve social relations and thus improve interactions between the company and the community.

In terms of the environmental dimension, during the interviews it was mentioned how the company's activities and its CSR activities cause adverse environmental changes. Participants were encouraged to express their opinions regarding natural resource management, industrial emission control, and environmental protection programmes implemented by PT Geo Dipa. As noted by [3], the environmental aspect of CSR is a crucial component in ensuring the sustainability of corporate performance, especially for energy companies. Sales participating in this discussion will underline the extent to which businesses endeavour to halt the objectives of industrial activities with reasonable measures.

The study also collected primary data from interviews, as well as secondary data sourced from official company records, such as CSR and sustainability reports. Although these documents are not primary, they add value to the understanding of PT Geo Dipa Energi Dieng's CSR programme policies, target objectives, implementation areas, and overall scope of application. The purpose of collecting secondary data was to enhance the research results and achieve a better understanding of the case in relation to the TBL framework of CSR in the context in which it is organised.

Using a qualitative approach also creates the opportunity to gain more insight into the different struggles and perspectives that exist around CSR within the company. For example, company representatives may support certain CSR programmes while those living in the village settle for the long term and question the value of such programmes. Describe the range of opinions as if there is a gap between the company's planned actions and the perceived effects on the community as described by [7]. This qualitative information may also help to better understand other issues that PT Geo Dipa faces with regards to its CSR policies towards the community.

[8] also stated that it is important to realise that CSR practices, especially policies, are not always the same in terms of location, which must then take into account the expectations and

conditions of stakeholders in detail. This kind of information involves local officials and village heads to see how CSR can be improved and become more effective. This can ensure that programmes are better able to address community needs related to issues of trust and collaboration between companies and communities.

In this regard, qualitative research is also important in responding to PT Geo Dipa Energi's CSR practices in Dieng. By utilising economic, social, and environmental perspectives in semi-structured interviews, while conducting this research, the author also sought to explore the role of CSR within the community. In addition, the incorporation of secondary data obtained from official company documents enhanced the discussion and helped to establish the context of CSR activities in terms of sustainable development. The results and discussions were then collated with a thematic analysis that used Social Capital and Triple Bottom Line arguments as the analytical framework of the research. The model relies on interviews coded under Social Capital which are then subdivided into spheres of influence - economy, society, and environment - and explains their relationship to emerging social capital themes.

3. Results and Discussion

Corporate Social Responsibility (CSR) has emerged as an important component of contemporary business strategy, affecting not only corporate reputation but also stakeholder engagement and consumer behavior. The impact of CSR programs can be analyzed through various viewpoints, including environmental sustainability, stakeholder relations, and consumer perceptions.

The existence of CSR significantly affects stakeholder perceptions and corporate image. Research shows that effective CSR practices can foster trust and increase a company's credibility among stakeholders (Hüber et al., 2014). This is particularly relevant in transition economies, where consumers are becoming more aware of corporate behavior and its social impact [9]. The authenticity of CSR efforts plays an important role in shaping consumer attitudes; consumers are more likely to respond positively to CSR initiatives that are perceived as genuine, rather than just a marketing ploy [10]. This underscores the importance of transparency and stakeholder engagement in CSR strategies, as companies that actively involve stakeholders in CSR planning and execution tend to achieve better results [11].

As such, the impact of CSR programs is profound, affecting environmental sustainability, stakeholder relations, and consumer behavior. As companies face the complexities of the modern marketplace, the integration of genuine CSR initiatives into their core strategy will be critical to foster trust, enhance corporate reputation, and achieve long-term success.

Table 2. Impact of CSR Program

Aspects	Kejajar Subdistrict	Batur Sub-district
Economy	<p>“The benefits to the community are related to work according to their respective basics, I don't know how many percent are clearly included there.” (Ahmad Shidiq)</p> <p>“The majority of residents here accept the Geo Dipa project. With the introduction of the project and new technology, people finally</p>	<p>“So far, the community has accepted Geo Dipa's project because the need for electrical energy in our country is very important, and the company maintains good relations with the community.” (Aji Biluroso)</p> <p>“Most of the people here receive and benefit, although there are</p>

	<p>understand that this project is safe and brings benefits.” (Toha)</p> <p>“It was difficult at first. It was difficult to ask for help in the past. But alhamdulillah, now it’s better and the residents are more helped, such as the cheap market and other CSR activities. (Ahmad Basir)</p>	<p>some who feel that the impact has not been too evenly distributed... Certain people get jobs” (Khoris)</p> <p>“Because Bakal Village is far from the site, the residents here did not pay much attention to the project. However, assistance from Geo Dipa exists and helps residents in several ways” (Slamet Widodo).</p>
Social	<p>“The relationship between the company and the community is good. Communication is also smooth, and the company’s activities are well received by the community.” (Ahmad Shidiq)</p> <p>“Socialization has increased since 2020, and residents are now more aware and involved in CSR programs, including activities that involve all ages” (Toha).</p> <p>“In the beginning, relations with the company were difficult due to poor communication. But now there has been an improvement and it is more responsive to residents’ complaints.” (Ahmad Basir)</p>	<p>“Geo Dipa’s activities are going well and the company is trying to involve the community. This helps strengthen the social relationship between residents and the company.” (Aji Biluroso)</p> <p>“Residents accept the CSR program and the relationship with village officials is quite good. However, there are some programs that have not been fully maximized.” (Khoris)</p> <p>“Here, residents don’t pay much attention to CSR activities because the location is far away, but social relations are still going well without major conflicts.” (Slamet Widodo)</p>
Environment	<p>“The company conducts good environmental management. Socialization of the risks and benefits of the project is accepted by the community.” (Ahmad Shidiq)</p> <p>“Initially there were concerns about pollution and environmental damage, but now residents are calmer due to intensive company socialization.” (Toha)</p> <p>“There used to be a problem of salty and murky water, but after the balong was repaired, the water quality has returned to normal and the community is satisfied.” (Ahmad Basir)</p>	<p>“The company maintains good relations with the community regarding environmental issues. Residents are beginning to understand and accept the risks of the project.” (Aji Biluroso)</p> <p>“There were concerns about pollution from drilling, but the company’s communication helped ease those concerns.” (Khoris)</p> <p>“There were concerns about air and noise pollution, especially for residents living near the project. However, the company was quick to respond and avoid conflict.” (Slamet Widodo)</p>

Table 2 shows that in the economic aspect, PT Geo Dipa’s CSR program has provided economic benefits in the form of job creation and direct assistance. In Kejajar Sub-district, the jobs are tailored to the abilities of the residents, and the community’s acceptance has increased

as they understand the benefits of the project. Although initially access to assistance was difficult, now residents feel more helped through regularly held activities such as cheap markets. In Batur sub-district, the project was accepted because of its role in national energy needs, but the benefits of the work have not been fully distributed and have only been felt by a few groups. In areas far from the project, such as Bakal Village, residents felt that the assistance received was uneven although assistance was still available to some hamlet areas. Overall, the economic benefits are significant but need to be more evenly distributed so that the impact can be felt by all communities.

On the social aspect, in Kejajar sub-district, communication between the company and the community has improved, since the 2020 socialization which helped increase community involvement in various programs. Although initially there were communication barriers, improvements continue to be made, so the company has become more responsive to community needs. Whereas in Batur Sub-district, in the social aspect; CSR activities help strengthen social relations between the company and the community, although there are several programs that are still not optimal in their implementation. In areas far from the project, community involvement in CSR programs is less visible, but social relations continue to run without the threatening conflicts of the past few years (violence, chair throwing, and so on). Overall, PT Geo Dipa's CSR contributes positively to social engagement, although benefit distribution and participation need to be improved in some of the more remote areas.

In addition, PT Geo Dipa has undertaken environmental management efforts and sought to assuage community concerns through intensive socialization and communication. In Kejajar sub-district, socialization about the risks and benefits of the project was well received, and improvements to environmental issues, such as salty and murky water, have increased community confidence. In Batur sub-district, the company maintains good relations with residents and helps them understand the risks of the project, although there are still concerns about pollution, especially for residents around the project. PT Geo Dipa responds to these concerns promptly, to avoid prolonged conflict. Thus, PT Geo Dipa's intensive environmental impact management and communication helped increase community acceptance.

A. Relationship between Social Capital and CSR

In this analysis, social capital plays an important role in strengthening collaboration between companies and communities, especially in the context of PT Geo Dipa's geothermal working area (WKP) development. The social capital formed through good relations and open communication between the company and the local community is a major factor in the community's acceptance of the project.

According to [12], social capital can be defined as "features of social organization such as networks, norms, and trust that facilitate coordination and cooperation for mutual benefit". In the case of PT Geo Dipa's WKP, the involvement of local stakeholders in decision-making related to Corporate Social Responsibility (CSR) programs is an example of how this social capital is applied. CSR programs implemented by the company, such as social assistance and environmental initiatives, have helped to improve relations between the company and the community, which had previously experienced conflicts over environmental issues such as water quality and air pollution.

[12] states that social capital can strengthen trust and norms in society, which in turn can improve collaboration and coordination to achieve common goals. In the context of PT Geo Dipa's WKP, this social capital can be seen in the way the company interacts with the community, through open communication and programs that have a direct impact on the welfare

of the local community. The existence of strong social capital allows the community to be more accepting of the company's presence, despite initial conflicts related to environmental impacts.

From interviews with six interviewees, the role of social capital became clearer. Ahmad Basir, Head of Ngandam Hamlet, explained that at first the community complained a lot about the water quality that became salty due to Geo Dipa's activities. However, along with the improvements made, the community began to accept the company's presence, especially after the cheap market and free assistance provided to residents. Ahmad Shidiq, Development Section Head of Kejajar Sub-district, also mentioned that the benefits of WKP help reduce the risk of volcanic activity and provide jobs for local residents, thus increasing community acceptance.

Aji Biluroso, Head of Batur Sub-district, stated that although there are some community groups that reject the WKP project due to communication issues, most residents accept the project due to energy needs and the good relationship established between the company and the community through various activities. Khoris, Head of Pawuhan Hamlet, emphasized that most of the community accepts Geo Dipa's project, despite concerns regarding the impact of drilling on the environment. Improved communication between the company and village officials helped increase this acceptance.

Table 3. The Role of Social Capital in the Acceptance of PT Geo Dipa Energi Dieng WKP Project

Source	Position	Key Findings
Ahmad Shidiq	Development Section Head of Kejajar Sub-district	The community initially complained about the water quality, but later accepted Geo Dipa's presence after improvements and social assistance.
Toha	Head of Sikunang Hamlet, Kejajar Subdistrict	The benefits of WKP help reduce the risk of volcanic activity and provide employment for residents.
Ahmad Basir	Head of Ngandam Hamlet, Kejajajr Sub-district	Most residents accepted the project due to energy needs and good relations with the company.
Aji Biluroso	Head of Batur Sub-district	The community accepted the project despite concerns regarding drilling impacts; good communication helped acceptance.
Khoris	Head of Pawuhan Hamlet, Batur Sub-district	The community accepts Geo Dipa for its sustainable economic benefits, despite the impact of air pollution on crops.
Slamet Widodo	Head of Buntu Hamlet. Batur Sub-district	Acceptance increased after the introduction of renewable technologies and increased socialization with the community.

Slamet Widodo, Head of Buntu Hamlet, mentioned that the people of Bakal Village generally accept Geo Dipa's existence because the company is a state-owned enterprise that provides economic benefits. However, there is also a negative side related to air pollution affecting residents' crops, which the company is working to replace. Toha, Head of Sikunang Hamlet, explained that acceptance of Geo Dipa increased after the company introduced renewable technology and increased socialization with the community since 2020. Initial

concerns regarding the risk of explosions and pollution are starting to diminish as the company seeks to be more transparent and involve the community in decision-making.

The analysis in Table 3 shows that the active involvement of local stakeholders in decision-making not only increases community acceptance of company projects, but also builds strong trust between the company and the community. This is in line with Putnam's idea of the importance of trust and cooperation as key elements of social capital [12].

B. Analysis of Social Capital Themes in TBL

Social capital related to the relationship between the community and PT Geo Dipa is shown through the role of community leaders and village officials in bridging communication between the company and residents. Many residents accept the Geo Dipa project because of the assistance, both in the form of health, education, and social activities (CSR), as stated by several interviewees that PT Geo Dipa provides cheap markets and livestock assistance. Residents' concerns related to project impacts occur in the health aspect, such as air and water quality, which are often not responded well by the company. The socialization conducted by PT Geo Dipa to the community is also considered insufficient.

Table 4. People Pillar

Pillar	Source	Key Findings
People	Ahmad Basir	"Preventing the planned demonstration from the community by acting as a liaison to convey the community's complaints to Commission A and PT Geodipa who finally responded to the residents' requests."
	Ahmad Shidiq	"The first is clearly the village government apparatus, religious leaders and youth leaders, the three components."
	Aji Biluroso	"Yes, one side, in my opinion, is still in the language of communication which may not be fully accepted. Both from the community and the management or company."
	Khoris	"mediators who represent the community as well as mediate with PT GDE."
	Slamet Widodo	"Oh yes, because this is an SOE, maybe yes. Like it or not, we have to follow them."
	Toha	"The majority of Sikunang villagers initially had pros and cons towards the Geo Dipa project but over time acceptance increased after the introduction of renewable technology and proven to be safe for the environment."

Based on Table 4, social capital in the "People" pillar can be seen from the relationship built between the community and PT Geo Dipa, as well as the role of community leaders in maintaining social cohesion and resolving conflicts. Many residents accept the project because of social assistance, such as cheap markets, livestock assistance, and community activities organized by PT Geo Dipa. This creates trusting relationships and increases social capital in the community.

The role of community leaders such as dusun heads and religious leaders is crucial in maintaining trust and social stability. Ahmad Shidiq and Toha emphasized that community leaders play a role as a bridge between the company and the community, ensuring community grievances are addressed and calming social unrest. Communication efforts made by community leaders also help communities understand the benefits of the project and reduce conflict. For example, Ahmad Basir was instrumental in preventing a planned demonstration, demonstrating the importance of local leadership for maintaining social cohesion.

Unequal communication between companies and communities is also a major problem. Khoris and Aji Biluroso emphasize that communities sometimes feel less involved in the decision-making process, especially regarding project impacts on the environment and community welfare. As such, social capital here is compromised due to the lack of active participation of communities in decision-making, which can reduce their sense of belonging to the project and lower trust in the company.

In the second pillar, on the environment (planet), social capital is seen in the reforestation and water source improvement efforts undertaken by PT Geo Dipa. However, there are still concerns regarding the environmental damage caused by drilling, such as a decrease in water quality and air pollution. Some interviewees mentioned that springs have become polluted and there is air pollution that affects agricultural crops, more details are as follows:

Table 5. Planetary Pillars

Pillar	Source	Key Findings
People	Ahmad Basir	“At first people complained a lot because the water became salty especially during the dry season but since the repair of the balong-balong the water has returned to normal and people no longer complain.”
	Ahmad Shidiq	“The benefits of WKP are to minimize volcanic risks and access to employment.”
	Aji Biluroso	“The community’s rejection of the PLTP project is likely due to communication problems that have not been fully effective between the management and the community while technical issues related to environmental impacts still need to be studied more deeply.”
	Khoris	“The environmental impacts of PT Geo Dipa’s drilling have not been fully addressed even though the community is starting to receive the benefits of the project.”
	Slamet Widodo	“Pollution from the company, which is pollution in the form of air, we don’t know, the air, we don’t know, sometimes if it affects the plants, it is replaced by Geo Dipa itself.”
	Toha	“The decline in water sources during the dry season is not entirely caused by Geo Dipa but also by the behavior of residents who clear forest land to grow potatoes, so blaming Geo Dipa as a whole is considered unfair.”

Based on Table 5, social capital in the “Planet” pillar relates to the efforts of the community and the company to preserve the environment and repair the negative impacts caused by the project. Ahmad Basir mentioned that the repair of water ‘balong-balong’ (springs) helped to improve the water quality in the area, thereby reducing community complaints about the salty water quality. Community concerns regarding environmental impacts such as air pollution, declining water quality and damage to agricultural crops were expressed by several interviewees, such as Aji Biluroso and Toha. The community feels that these impacts need to be taken more seriously by PT Geo Dipa so as not to reduce the quality of social capital in the area.

Toha emphasized that modern practices such as reforestation carried out by PT Geo Dipa do not always go well due to a lack of supervision and assistance, so that the reforestation carried out often returns to deforestation. Social capital related to the environment is also related to collaboration and community involvement in environmental maintenance efforts. Slamet Widodo and Khoris point out that communities tend to lack trust in the results of environmental impact testing that is only conducted by the company. This suggests a lack of involvement of independent parties in the process, potentially reducing community trust.

Furthermore, in the third pillar on profit, social capital is closely related to economic benefits for the community, for example in the form of employment and social assistance from PT Geo Dipa. Several interviewees mentioned that the community accepted the project because they received economic benefits, both directly and indirectly. However, there are still people who feel that they do not receive direct benefits or feel that the process of applying for assistance is complicated, which has an impact on the community’s trust in the company, according to the findings below;

Table 6. Profit Pillar

Pillar	Source	Key Findings
People	Ahmad Basir	“Now PT Geo Dipa routinely helps the community since the demonstration that was prevented some time ago.
	Ahmad Shidiq	“If asked in this case there is also an economic impact, yes, it helps the community. Is it profitable in this case? Yes, it is profitable”
	Aji Biluroso	“The community accepts the PLTP project because of the important need for electrical energy for the country and the good relationship between the project manager and the community through activities that involve the community.”
	Khoris	“There is assistance from PT Geo Dipa related to education and health but the community must come directly to the company office.”
	Slamet Widodo	“The people of Bakal Village accept the existence of Geo Dipa, because it opens up opportunities for the community”
	Toha	“My son once got a scholarship, but it’s difficult for residents here now. The last

word was that there were some seven people who got scholarships at PT Geo Dipa. But even those of us who are closest to PT Geo Dipa rarely get it.”

Based on table 6, social capital in the “Profit” pillar can be seen from the company’s efforts to provide direct economic benefits to the community, and how the community responds to these benefits. The economic benefits of the project, such as social assistance, cheap markets, and employment, are one of the main reasons for the acceptance of the project by the community. Ahmad Shidiq mentioned that the community accepted the project because of the economic benefits provided, including employment for local residents.

Assistance provided by PT Geo Dipa, such as scholarships and health assistance, also contributes to the welfare of the community. However, Khoris mentioned that the distribution of aid is sometimes uneven, which causes some communities to feel less cared for. Ahmad Basir said that the aid from PT Geo Dipa, which was initially subsidized, is now provided free of charge, which has increased the community’s acceptance of the project.

However, Toha and Khoris noted that despite the economic benefits, many residents found the process of obtaining the assistance difficult or uneven, such as having to come directly to the company office. This shows the limitations of social capital in terms of access to economic benefits for the whole community. In addition, communities feel that the negative impacts of the project, such as damage to agriculture and the environment, are not matched by commensurate economic benefits. Toha mentioned that communities want the involvement of independent parties in environmental impact assessments so that there is fairness in the delivery of project information and benefits.

Overall, social capital in the context of PT Geo Dipa’s implementation of TBL principles plays an important role in maintaining the relationship between the company and the community. First, in the People pillar, social capital is formed from the role of community leaders, involvement in decision-making, and social assistance provided. However, uneven communication and community involvement can weaken social capital in the region. Second, in the Planet pillar, the community tries to preserve the environment by collaborating with the company, but the lack of transparency and involvement of independent parties in environmental impact testing reduces the community’s trust in the project. Third, in the Profit pillar, economic assistance provided by the company strengthens social capital in some communities, but limited access and unequal distribution of benefits can reduce the quality of relationships between communities and companies. Improving social capital across all three TBL pillars requires increased community participation, transparency and the involvement of independent parties in every aspect of the project, so that trust in the company can be built more strongly and sustainably.

4. Implications and Recommendations

CSR programs in the renewable energy sector have important implications for companies, especially regarding stakeholder engagement. Active participation of local communities is key to the success and sustainability of CSR programs. Findings from PT Geo Dipa show that without adequate engagement, companies risk facing resistance from communities. A good relationship between the company and the community, through open communication and

collaboration, can increase acceptance of the project and strengthen social capital in the community.

In addition, the distribution of benefits from CSR programs is often unequal, which can lead to dissatisfaction in some communities. While some communities receive economic benefits, such as employment and social assistance, this distribution is not entirely fair. Inequities in the distribution of benefits can reduce the effectiveness of the program and risk lowering community trust in the company.

Transparency is also a critical aspect of CSR implementation. Lack of transparency, especially in communicating environmental impacts, can damage good relations between companies and communities. In some cases, communities feel uninformed about project risks, such as air pollution or environmental damage. Therefore, companies need to increase socialization and involve independent parties in monitoring environmental impacts to maintain community trust.

Recommendations for companies are to increase community involvement in all stages of CSR programs, ensure a more equitable distribution of benefits, and increase transparency in program implementation. In addition, companies should establish sustainable feedback mechanisms and engage community leaders to strengthen social capital. In this way, CSR programs can be more effective, relevant, and contribute to social, economic, and environmental sustainability in the community.

5. Conclusion

Social capital is a key element in the success of this CSR program measured through the Triple Bottom Line (TBL) approach, especially in building relationships of trust and collaboration between the company and local communities. The active involvement of community leaders and open communication have helped increase acceptance of Geo Dipa's project, although community participation in decision-making could still be improved. To increase the impact of CSR, it is important for companies to continue to improve transparency, expand the range of economic benefits, and strengthen sustainable environmental management.

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