Digitized but disconnected: CSR platform governance and environmental exclusion in oil-producing villages of Indonesia

Zulfa Harirah[1]*, Gusmansyah[2]

[1]Department of Political Science, Universitas Gadjah Mada, Sosio Yustisia Street No.1, Yogyakarta 55281, Indonesia

[2]Department of Government Affairs, Universitas Rokania, Raya Pasir Pengaraian Street, Riau 28557, Indonesia

*Corresponding author, email: zulfa.harirah.m@mail.ugm.ac.id

Article History
Received: 20 November 2025
Revised: 23 February 2026
Accepted: 18 March 2026
Published: 30 April 2026

Keywords
Corporate social responsibility
Digital platforms
Environmental governance
Oil-producing villages
Participatory governance

Abstract
This study examines why digitally mediated corporate social responsibility (CSR) governance has failed to address structural and ecological problems in oil- and gas-producing villages in Riau Province, Indonesia. Oil and gas corporations formally articulate commitments to social and environmental responsibility in official policy documents; however, their corporate social responsibility (CSR) initiatives are predominantly symbolic in nature and tend to be constrained to short-term, project-based interventions such as vocational training, food assistance, and basic road infrastructure development. These interventions do not engage with the structural drivers of environmental degradation, persistent poverty, and the absence of a locally grounded green transition. Methodologically, the research employs a qualitative design, drawing on semi-structured interviews with village authorities, residents, and officials from the Riau Provincial Government. The analysis further incorporates a documentary review of policy texts, CSR implementation reports, and digital CSR governance platforms. The data were analyzed to identify exclusionary mechanisms and disjuncture between formal governance architectures and actual CSR practices. The findings demonstrate that although digital CSR systems formally enhance transparency and open channels for participation, villagers' engagement is largely confined to the submission of administrative proposals, with no meaningful avenues for deliberation, co-decision-making, or inclusive oversight. Decision-making authority remains concentrated in the hands of corporate actors and local elites, frequently mediated through political recommendations issued by local government leaders. In response to these dynamics, the study advocates a reconfiguration toward "participatory digital governance," in which digital CSR platforms are mandated to incorporate community-led monitoring, binding feedback loops, and direct accountability mechanisms.

How to cite: Harirah, Z., & Gusmansyah, G. (2026). Digitized but disconnected: CSR platform governance and environmental exclusion in oil-producing villages of Indonesia. *Journal of Environment and Sustainability Education, 4*(2). 298–308. doi: 10.62672/joease.v4i2.163

1. Introduction

Indonesia is one of the countries with abundant natural resources, especially oil and gas. (Wahyudi & Palupi, 2023). Oil and gas production spread across various regions contributes significantly to the economy, both for the centrOilvernment, provincial governments, and oil and gas companies (state-owned and private). However, this significant economic contribution is not always accompanied by equitable benefits for local communities residing in the surrounding production areas (Putri & Rye, 2024). Many oil and gas producing regions actually experience poverty and severe environmental damage (Apergis & Katsaiti, 2018; Boulanouar & Essid, 2023; Hajad et al., 2023). Additionally, they are marginalized in corporate social responsibility governance, which should bridge the interests of companies, the government, and the community (Ebisi et al., 2025; Frynas, 2010).

In many cases, corporate social responsibility is employed as a tool for corporate legitimacy, demonstrating concern for the environment and society (Dong et al., 2024; Pfajfar et al., 2022; Zheng et al., 2015). Several regions have adopted digitalization, including online platforms, applications, digital reporting, and social media. The digitization of corporate social responsibility is considered a modern solution that offers transparency, access to information, and public participation (Atanasov et al., 2023; Liu et al., 2024). However, the question remains: does the digitization of corporate social responsibility truly reduce exclusion, or does it deepen it, especially for local communities that have limited access to technology, digital literacy, and regional political influence?

doi: 10.62672/joease.v4i2.163

ISSN: 3025-0714

Various studies emphasize that the digitization of corporate social responsibility is a crucial instrument for enhancing corporate transparency, accountability, and legitimacy (Jiang et al., 2023; Jinyoung Hwang, 2024). The use of online media, interactive applications, and various digital platforms can deliver social and environmental data more quickly, cheaply, and efficiently than conventional reports (Famularo, 2023; Kocurikova et al., 2024). Companies are also increasingly encouraged to align their corporate social responsibility reports with international standards, such as the Global Reporting Initiative (GRI) and Environmental, Social and Governance (ESG), to strengthen their credibility with investors, regulators, and the public (Fernández et al., 2022; Zhou et al., 2024). The latest bibliometric trends even confirm that CSR research in the last decade has increasingly focused on digitalization issues, particularly those related to data transparency and stakeholder engagement (Cristyano et al., 2025).

In addition to promoting transparency, CSR digitization also enhances the efficiency of cross-actor coordination and expands public participation (Aamir, 2024). Digital technology opens up opportunities for the community, NGOs, and local governments to propose or evaluate CSR programs without relying on face-to-face forums that are geographically limited (Morsing& Schultz, 2006). Digitally built communication can contribute to the improvement of companies by involving all stakeholders (Han et al., 2024). By using digital applications, communication and reporting systems become more open (Atanasov et al., 2023). In the context of the oil and gas sector, digitalization offers significant benefits for aligning digital policies with public expectations regarding the fulfillment of their needs (Brunnschweiler et al., 2025).

Although the digitization of corporate social responsibility is widely praised for increasing transparency and accountability, other studies have also found that this digitization has the potential to cause social exclusion (Ragnedda et al., 2022). Communities facing limited digital access, low digital literacy, or other barriers often struggle to access and engage meaningfully with corporate social responsibility platforms (Brunnschweiler et al., 2025). The result is an illusion of transparency, where technical information is available but does not practically intersect with those most affected (Van Dijk, 2020). In many cases, in resource-rich regions, weak digital infrastructure means that CSR platforms primarily serve to enhance the company's image and meet investor needs rather than addressing the needs of local communities (Van Dijk, 2020). As a result, digitization risks creating a new layer of exclusion, where affected residents are only symbolically included through data visibility but are structurally excluded from decision-making processes and the distribution of benefits (Van Dijk, 2020; Warschauer, 2004).

This phenomenon is essential to study in the context of resource-rich regions, such as Riau Province. Oil production in Riau reaches 300,000 barrels per day, while gas production reaches 500 million cubic feet per day. Riau Province contributes 30% of the total national oil production. The economic contribution of regencies and cities that produce oil and gas resources influences the financial conditions of Riau. The regency that contributes most significantly to Riau's economy from crude oil is Bengkalis Regency. Bengkalis' contribution to the gross regional domestic product (GRDP) in 2023 was 16.39%. Other responsibilities that contribute to oil and gas production are Pelalawan and Rokan Hulu. However, the natural wealth that was expected to bring widespread prosperity has instead left contradictions at the local level. These oil and gas-producing areas, namely Rokan Hulu, Bengkalis, and Pelalawan, have experienced systemic ecological damage, contributing to poverty in the province of Riau, as shown in Table 1 below.

Table 1. Poverty by District/City in Riau Province for 2023-2024

Regency/City	Poverty Indicator					
	Number of Poor People (Thousands)		Poverty Depth Index		Poverty Severity Index	
	2023	2024	2023	2024	2023	2024
Kuantan Singingi	26.10	25.56	1.17	0.91	0.25	0.20
Indragiri Hulu	27.40	27.53	1.14	0.61	0.33	0.09
Indragiri Hilir	40.86	41.05	0.68	0.84	0.13	0.22
Pelalawan	45.30	49.20	1.05	1.12	0.28	0.21
Siak	26.99	26.72	0.66	0.56	0.14	0.08
Kampar	63.84	63.74	0.72	0.91	0.14	0.19
Rokan Hulu	74.38	75.89	1.54	0.96	0.38	0.18
Bengkalis	36.10	36.56	1.03	0.72	0.23	0.12
Rokan Hilir	53.04	53.49	1.22	0.85	0.29	0.19
Kepulauan Meranti	43.82	44.34	3.86	3.59	1.06	0.88
Pekanbaru	37.67	38.17	0.38	0.34	0.09	0.06
Dumai	10.15	10.02	0.36	0.20	0.06	0.03
Riau Province	485.66	492.25	1.00	0.97	0.24	0.21

Source: Official Statistics News, Riau in Figures 2025 – Riau Province BPS

Various oil and gas companies operating in these three districts claim to have implemented corporate social responsibility programs as a form of contribution to local economic development and environmental preservation. Each district has developed its own corporate social responsibility governance model with various

approaches. In the Pelalawan District, three corporate social responsibility models are implemented, namely a memorandum of understanding between the local government and companies, an interactive application platform, and community proposals with recommendations from the regent. In Bengkalis Regency, the corporate social responsibility model consists of manual reporting through Bappeda and the e-TJSP Tanjak Bermasa application. Meanwhile, in Rokan Hulu Regency, it consists of manual methods and the use of the Pelikat application, which aims to facilitate reporting, monitoring, and enable community participation in proposal submissions.

The presence of various corporate social responsibility governance models in these three districts shows that the state and companies have developed mechanisms that formally support the implementation of social responsibility. However, these mechanisms do not guaranty the participation and fulfillment of the needs of oil and gas-producing communities in each district. These three districts have adopted technology- and application-based systems, which, on the one hand, seem to reflect progress and openness; however, on the other hand, local communities have experienced alienation from the decision-making process, program proposals, and supervision. Digital channels, such as Pelikat in Rokan Hulu, e-TJSP Tanjak Bermasa in Bengkalis, and interactive platforms in Pelalawan, are expected to increase transparency and participation. However, many communities still lack control over corporate social responsibility agendas that affect their lives.

Corporate social responsibility governance at the district level is packaged in a collaborative framework, where local governments, companies, and local communities are positioned as equal partners in program planning and implementation. This collaboration is evident in models such as community proposals approved through regent recommendations, inter-agency coordination, and corporate social responsibility forums. However, in the context of power relations, this claimed equality requires review. Corporations remain the dominant actors that control budget allocation, set priority agendas, and define what constitutes legitimate participation. Meanwhile, local governments face two demands: fulfilling their public mandate while also being dependent on corporate incentives. Under these conditions, communities with limited power are more often passive recipients of programs designed without considering their authentic aspirations (Brunnschweiler et al., 2025). This indicates that existing governance can perpetuate old power inequalities in new forms, where deliberate spaces are created, but substantive control remains in the hands of dominant actors.

This study is situated within the theoretical framework of digital tokenism and elite capture in the context of environmental governance. Digital tokenism refers to the deployment of technological platforms to simulate participation and transparency while withholding substantive decision-making authority from marginalized stakeholders (Arnstein, 1969; West, 2004). This phenomenon is frequently intensified by elite capture, whereby local power configurations comprising corporate actors and village elites appropriate digital infrastructures to consolidate their own interests instead of addressing broader communal grievances (Platteau, 2004). By integrating these conceptual lenses, the research advances a framework of “Double Exclusion,” positing that villagers in Riau experience marginalization not only from the material benefits of corporate social responsibility (CSR) initiatives but also from the digital arenas ostensibly designed to represent their voices and interests.

Based on the above explanation, the governance of corporate social responsibility digitization in oil and gas-producing regions cannot be understood solely in terms of administrative progress or technological innovation. The bargaining position of oil and gas-producing villages directly affected by exploitation has actually weakened because digital mediation benefits actors who have access, control, and technological capacity (Brunnschweiler et al., 2025). Behind the narrative of transparency, efficiency, and participation of existing corporate social responsibility platforms lies a mechanism that perpetuates exclusion in the form of limited participation, ecological marginalization, and political subordination of local communities (Putri & Rye, 2024). To investigate these dynamics, this study addresses three interrelated research questions. First, it explores how the digitalization of CSR in Riau Province creates an 'illusion of transparency' that effectively excludes villagers from meaningful participation. Second, it examines why existing CSR mechanisms continue to facilitate elite capture and political recommendations despite the implementation of digital oversight platforms. Finally, the study analyzes how the failures in digital-based CSR governance contribute to persistent poverty and environmental degradation in the affected villages.

2. Method

This study adopts a descriptive–analytical qualitative design to examine the dynamics of digital corporate social responsibility (CSR) governance in Riau Province. Data were collected through two principal techniques to enhance the validity, reliability, and analytical depth of the findings. First, in-depth semi-structured interviews were conducted with 15 local government officials, comprising 5 representatives from each of the three selected regencies: Bengkalis, Pelalawan, and Siak. Informants were purposively selected from the Regional Development Planning Agency (Bappeda) and CSR facilitation teams to capture institutional and bureaucratic perspectives on the implementation and operation of digital platforms. Second, Focus Group Discussions (FGDs) were convened at village offices with 20 participants representing a broad spectrum of

community stakeholders, including village officials, youth leaders, members of women's welfare organizations (PKK), and religious authorities. The integration of individual interviews and FGDs facilitated the identification of tensions and discrepancies between formal governmental policy frameworks and the everyday experiences of communities at the grassroots level.

Data collection continued until theoretical saturation was achieved, indicated by the point at which information obtained from additional participants no longer produced substantially new patterns, categories, or themes. Data analysis followed a systematic qualitative–inductive framework to ensure robust interpretive rigor. After the verbatim transcription of all interview and FGD materials, the researcher conducted a process of thematic data reduction, retaining only those segments most closely aligned with the research questions and objectives. The analytical procedure involved iterative and meticulous coding, through which the data were structured to reveal key structural patterns, including barriers to technological access, elite-dominated mechanisms of proposal submission and decision-making, and the limited environmental and social benefits generated by digital CSR platforms. To strengthen the credibility, dependability, and confirmability of the findings, the study employed source triangulation by comparing and cross-validating community narratives with official government policy documents, corporate CSR reports, and real-time information obtained directly from the digital platforms. This researcher-driven analytic strategy enabled a nuanced and contextually grounded interpretation of the structural disjuncture between digital innovation in CSR governance and the actual welfare outcomes experienced by communities in resource-rich regions.

3. Results and Discussion

3.1. The Digitalization of Corporate Social Responsibility and the Illusion of Transparency

Corporate Social Responsibility (CSR) practices in Indonesia have been deeply ingrained in corporate governance, particularly in the extractive sectors, including oil and gas. Since the enactment of Law No. 40 of 2007 on Limited Liability Companies, companies involved in the exploitation of natural resources are required to conduct social and environmental responsibilities (Corporate Environmental Responsibility – CER). Recently, there has been strong encouragement from the government and business actors to digitize CSR programs through online platforms, which are claimed to make CSR practices more transparent, accountable, and participatory. The digitization of CSR is formally considered a new means of legitimacy in company-government-public relations.

The digitization of corporate social responsibility in three oil and gas-producing districts in Riau Province, namely Rokan Hulu, Bengkalis, and Pelalawan has emerged as a modern governance innovation. Local governments have developed applications to record, report, and coordinate corporate CSR programs. The presence of this application is promoted as a response to demands for transparency, efficiency, and participation. However, the digitization of CSR functions more as an administrative symbol than as a space for the democratization of development.

In Bengkalis Regency, e-TJSP Tanjak Bermasa operates as an internal reporting channel. Companies upload program data, Bappeda verifies it, and the government displays it as information in annual reports. The public has almost no access, except to brief official documents. The transparency produced is limited, only recording who did what without opening space for social control. This reflects symbolic transparency that is procedural but not substantive.

In Pelalawan Regency, an "interactive" application was designed so that the community could submit proposals. In practice, however, access to this application is limited. The proposal process must be facilitated by village officials or the bureaucracy, rather than being conducted directly by the community. To date, the "interactive" application continues to experience frequent technical issues, including server stability problems and limited digital literacy among the community. The interaction that was envisioned as citizen engagement has instead become a bureaucratic process that filters the community's voices before they reach the company. The application, which was expected to strengthen community participation, has instead strengthened dependence on bureaucratic intermediaries.

Unlike Bengkalis and Pelalawan Regencies, Rokan Hulu Regency has introduced the Pelikat application, which is more open. The public can access lists of companies, program reports, and areas of intervention. In terms of accessibility, Pelikat is more advanced. However, transparency is still one-sided. The public can view data but does not have a formal mechanism to propose programs and evaluate their implementation. In other words, Pelikat presents data as a showcase rather than a space for deliberation. The public is provided with information but remains powerless to change the direction of corporate social responsibility policies.

The technical characteristics identified in the e-TJSP and Pelikat platforms in Riau exemplify what Ragnedda (2015) conceptualizes as "digital tokenism" (Ragnedda, Massimo; Muschert, 2015). Empirically, these platforms operate predominantly as administrative façades rather than as instruments of substantive civic empowerment. Although data are formally accessible, villagers in Bengkalis and Pelalawan are effectively relegated to the role of passive recipients of digital information, rather than being incorporated as active agents in deliberative or decision-making processes. This resulting "illusion of transparency" indicates that the digitalization of corporate social responsibility (CSR) does not, in practice, democratize governance. Instead, it reproduces and intensifies the "digital divide" by instituting a technologically mediated bureaucratic layer that further alienates marginalized communities from the very resources ostensibly allocated for their welfare.

This phenomenon can be interpreted as an illusion of transparency. Digital corporate social responsibility applications create the impression that governance has become more modern and inclusive. However, behind the scenes, the power structure remains unchanged. Companies continue to dominate in determining program priorities, while local governments function as administrative facilitators, and the community remains a passive recipient. This illustration of transparency is reinforced by the logic of the digital divide, whereby communities producing oil and gas often lack access to the internet or sufficient digital literacy to use the application actively. As a result, this digital platform widens the exclusion gap, further marginalizing communities and preventing them from determining policy directions that meet their needs.

The structure of digital applications can be read as both a medium and a result of bureaucratic and corporate practices. These applications restructure power relations, but rather than opening new spaces, they reproduce old patterns in new forms. Unequal power relations persist, merely packaged in a modern guise. Technology becomes a symbol of progress, but its essence is only to perpetuate the dominance of actors with great power.

3.2. Corporate Social Responsibility Mechanism

One aspect that is most often mentioned by local governments and oil and gas companies when discussing CSR governance is the claim that the mechanisms implemented are collaborative in nature. This narrative of collaboration has become the dominant jargon in official documents, activity reports, and public exposés. Local governments emphasize that CSR planning is conducted through joint forums, in which companies, governments, and communities are positioned as equal partners. In fact, formal mechanisms such as Memoranda of Understanding (MoUs), community proposal systems, and regent recommendations are cited as evidence that CSR is being managed in a participatory and democratic manner.

However, upon closer scrutiny, this claim of collaboration is not based on a real distribution of power. What is happening is the reproduction of old power relations in a new package. Mechanisms that appear inclusive on the surface are, in practice, controlled by elites, both corporate and local political elites. In other words, CSR governance in Riau Province presents a simulation of inclusion or an illusion of collaboration, despite the provision of participatory procedures. However, substantive decisions remain in the hands of dominant actors.

In the Pelalawan District, one of the formal CSR mechanisms is a memorandum of understanding (MoU) between the local government and companies. This MoU is expected to serve as an umbrella agreement on the amount of CSR contributions, priority areas, and distribution procedures. From a formal perspective, the MoU gives the impression that there is a mutually binding moral understanding. However, in practice, the MoU has no legal consequences. Companies are not legally obligated to comply with the contents of the MoU, and there are no clear sanctions for failing to fulfill their written commitments. The MoU functions more as a political symbol than as a social contract. It is used by local governments to demonstrate that a formal mechanism is in place when, in fact, companies remain dominant in substantive terms. The MoU creates the illusion of collaboration while the power structure remains unequal.

This is evident from the low level of corporate compliance with CSR forums. Data show that in Rokan Hulu, only 67 out of 147 companies (47%) are partners in CSR, in Bengkalis, 36 out of 91 (40%), and in Pelalawan, 15 out of 52 (28%). These low participation rates reflect the weakness of the MoU as a governance instrument. Companies may be present at the signing, but in practice, they are free to decide for themselves whether to implement the program. The following table shows data on company involvement in Corporate Social Responsibility programs (Table 2).

Table 2. Percentage of Companies Involved in Corporate Social Responsibility Programs

No	Regency	Number of Companies	CSR partner companies	Percentage
1	Rokan Hulu	147	67	47%
2	Bengkalis	91	36	40%
3	Pelalawan	52	15	28%

Source: FITRA Riau, 2024.

The level of corporate compliance with Corporate Social Responsibility programs remains low. Companies have not fully implemented Corporate Social Responsibility. In terms of regulations, all districts have a comprehensive regulatory framework in place. Existing policies cover regulations related to Corporate Social Responsibility program priorities, planning mechanisms, implementation, synchronization, coordination, and reporting, as well as corporate social responsibility forums.

Another mechanism often cited as evidence of community participation is the proposal system. In Pelalawan, for example, villagers can draft proposals to submit to CSR programs. However, these proposals cannot be submitted directly to companies. They must go through bureaucratic and political filters, including recommendations from the regent, approval from relevant agencies, and the blessing of local officials. As a result, the aspirations of villagers most affected by oil and gas activities do not reach the decision-makers' table in an authentic manner. Residents' proposals must first pass through layers of filters determined by the local political elite. Proposals that align with the local government's agenda or are consistent with the company's image will be prioritized, while proposals that are overly critical or require ecological restoration are often overlooked.

The sustained predominance of “political recommendations” in the allocation of CSR resources, as documented in this study, suggests that the phenomenon of “elite capture” (Platteau, 2004) has undergone functional adaptation in the digital era. Rather than opposing technological change, local political and economic elites in districts such as Pelalawan have strategically appropriated and reconfigured digital infrastructures to reproduce and consolidate pre-existing patron–client and brokerage arrangements. Digitalization, which is frequently theorized as a mechanism for disintermediating governance processes and reducing opportunities for corruption and clientelism, has, in practice, been repurposed as an instrument of elite legitimation. As a result, the shift to digital platforms tends to formalize and reinforce existing asymmetries of power, thereby ensuring that CSR project selection and implementation continue to reflect the political priorities and interests of local power holders, rather than responding primarily to the acute ecological vulnerabilities and environmental justice claims of oil-producing communities.

This process creates elite capture, whereby the voice of the community is absorbed, filtered, and redefined by the elite before reaching the company. Citizen participation is not entirely lost, but it becomes tokenistic, a mere formality to legitimize decisions that have already been directed by the elite (Arnstein, 1969; Gaber, 2019). In the literature on participation, this kind of practice is classified as tokenism; "participation" is extended to the community, but decisive power is not granted to that participation. Even the communities closest to the extraction sites cannot determine their own views and needs (Putri & Rye, 2024)

The digitization of CSR through applications such as Pelikat in Rokan Hulu or e-TJSP Tanjak Bermasa in Bengkalis further reinforces the illusion of collaboration. These applications are designed to document CSR programs; in the case of Pelikat, the community can even view a list of companies, types of activities, and areas of intervention. However, the space for community participation in the application remains minimal. They can "see" the data, but they cannot "determine" the direction of the program.

This situation creates false transparency. The application displays information but does not provide substantive control over the data. For companies and local governments, the application serves as a tool of legitimacy, demonstrating that their CSR practices are documented, transparent, and accessible. However, for the community, the application only reinforces their position as spectators, not actors. With limited digital literacy and internet access in oil and gas villages, the exclusion gap continues to widen.

In all mechanisms, such as memoranda of understanding, proposals, and applications, villagers, as the most affected parties, are formally in the weakest position. They lose land due to oil and gas exploitation, face environmental damage that reduces their livelihoods, and bear long-term socio-economic impacts. However, in CSR governance, their position is that of passive recipients, not decision-makers. If they submit proposals, they must go through the regent's filter. If they wish to participate in CSR forums, their role is limited to that of invited participants rather than decision-makers. If they want to monitor programs, the application only provides data without allowing for intervention. Thus, mechanisms that appear collaborative reinforce the subordination of villages.

The use of various digital applications still faces significant challenges. These applications have not been optimally utilized, and as a result, they do not reach the intended community. Many companies do not report on their CSR activities. This makes it difficult for local governments to monitor their implementation. Corporate initiatives and contributions are not well documented. Companies often do not report their total budget allocation and operationalization of CSR. The paradox of digitalization becomes evident in this lack of reporting: technology that is claimed to open space for participation instead becomes a tool for unilateral legitimization, obscuring unequal power relations.

3.3. Poverty and Environmental Degradation in Oil and Gas Producing Villages

The data presented by companies and local governments through digital applications do not address the structural problems faced by communities in oil and gas-producing regions. Existing CSR programs take various forms, ranging from consumptive assistance to infrastructure development. Upon closer inspection, the pattern that emerges is one of symbolic programs, such as short training courses, basic food assistance, religious assistance, road construction, or building renovations. These programs do indeed provide a positive image and are easy to document in digital applications. However, they do not address the fundamental problems faced by these communities due to oil and gas exploitation, such as ecosystem damage, a lack of energy transition, and reduced economic independence.

Although there are several programs of significant value, such as workforce training with a budget of billions in Rokan Hulu or the construction of roads worth billions in Pelalawan, these programs have not succeeded in addressing the existing structural poverty issues. First, the scope of the programs is minimal. For example, the roads that are built benefit companies more than the community. Second, they are sporadic and unsustainable. Third, there is no comprehensive ecological restoration agenda, such as forest restoration, water quality improvement, or the restoration of former mining sites.

For example, the corporate social responsibility financing program in Bengkalis shows a disparity between the scale of the activities and their impact on the community. Most programs are small in scale and ceremonial in nature, reflecting social concern but having limited impact in alleviating poverty and ecological damage. Several other medium-value programs, such as housing renovation, sanitation, and MSME support, have been implemented and have the potential to strengthen welfare. However, they are still partial, short-term in nature, and insufficient to change the structural conditions that underlie socio-ecological vulnerability.

Meanwhile, large-scale programs with budgets of hundreds of millions of rupiah were conducted in the form of elephant conservation, agroforestry, stunting prevention, and scholarships for Indigenous peoples. These programs appear strategic but do not fully address the community's priority needs and are not based on proposals submitted through the available digital CSR application. As a result, the large allocation of funds does not directly contribute to poverty alleviation and the ecological problems faced by local communities. This is presented in Table 3.

Table 3. Classification of Corporate Social Responsibility Programs

Program Scale	Example Activities	Budget Value	Limitations in Addressing Structural Issues
Small (≤ IDR 10 million)	Flower boards, Ramadan safaris, basic food assistance, and goat sacrifices	IDR 300,000 – IDR 6 million	Ceremonial, short-term impact; does not address the root causes of poverty or environmental degradation.
Medium (Rp 10–100 million)	House renovation, sanitation, and equipment for Micro, Small, and Medium Enterprises	Rp 30–50 million	Meets basic needs but is partial and limited in scope; it does not sufficiently address structural vulnerabilities
Large (≥ Rp100 million)	Sakai Scholarship, Micro, Small and Medium Enterprises 4.0, elephant conservation, stunting prevention	Rp 362 million – Rp 912 million	A strategic program, but not entirely based on local needs; its impact on poverty and ecological issues remains limited.

Source: Compiled from the TJSP Activity List Report of Bengkalis Regency (Tanjak Bermasa), 2024

This situation illustrates that corporate social responsibility programs are being increasingly utilized as a tool for social and political stabilization. Consumptive assistance is intended to ease public unrest. Large-scale infrastructure projects are designed to showcase the company's contributions, whereas reporting on digital applications primarily serves to provide administrative legitimacy. This does not address the root causes of poverty and ecological damage, which are a daily reality for the community.

Rokan Hulu Regency has the largest oil and gas reserves, accounting for approximately 60% of the total oil production in Riau Province. The Rokan Block is the mainstay of oil and gas production in this regency. In 2024, 570 new wells will be added to the national oil reserves in the Rokan Block. Thus, the Rokan Block has become one of the backbones of national production, contributing 161,623 barrels of oil per day. Currently, the Rokan Block contributes 24% of Indonesia's total oil production. Additionally, the Rokan Block boasts abundant gas reserves, reaching 300 million cubic feet per day (Riau, 2024).

Although Rokan Hulu receives substantial revenue-sharing funds (DBH) from the central government, these funds have not been used to improve the community's economy. The poverty rate in Rokan Hulu remains high. The allocated funds are spent on employee salaries rather than on community needs. The majority of the community works in agriculture and plantations, with palm oil as the primary commodity. The oil and gas sector, as the primary contributor to the gross regional domestic product (GRDP), does not provide jobs or absorb local labor. In terms of accessibility and infrastructure, Rokan Hulu remains in poor condition, making it difficult for

the community to access basic services such as education and healthcare. Thus, Rokan Hulu still faces challenges despite the promising potential of the oil and gas sector.

Pelalawan Regency also makes an essential contribution to the oil and gas industry. The main oil and gas blocks in Pelalawan Regency are the Siak Block and the Coastal Plains and Pekanbaru (CPP) Block. Pertamina Hulu Energi Siak manages the Siak Block with a production of 50,000 barrels per day. The oil and gas potential in Pelalawan contributes significantly to the national and regional economy. In the gas sector, Pelalawan has a methane gas content of over 97%. This certainly affects local revenue (PAD) and is expected to boost the economy (Riau, 2024). Like Rokan Hulu, Pelalawan Regency also faces poverty issues. Existing poverty alleviation programs merely continue programs initiated by the central government and have not yet utilized the proceeds from oil and gas management. Pelalawan also faces environmental degradation due to the exploitation of natural resources. The areas have experienced deforestation and water pollution because of oil and gas industry activities.

Bengkalis Regency also has significant oil and gas reserves, although not as large as those in Rokan Hulu and Pelalawan. The main oil and gas block in Bengkalis Regency is the Bentu Block, which produces 30,000 barrels of oil and 200 million cubic feet of gas per day. There is one company engaged in oil and gas mining, namely PT Pertamina Hulu Rokan (PT. PHR). Oil revenues are the largest source of income in the Bengkalis Regency Regional Budget (Riau, 2024). The distribution of mining permits from the Riau Province ESDM Office in Bengkalis Regency covers an area of 510,893.69 hectares. The contribution of the mining sector has declined from 83.37% in 2005 to 52.62% in 2022. As a result, the poverty line in Bengkalis is 7.10% higher than that of Riau Province (Bengkalis, 2025).

The most obvious paradox of corporate social responsibility governance in Riau Province is that poverty persists despite hundreds of billions of rupiah being invested in corporate social responsibility programs every year. Corporate social responsibility programs are not designed to address existing poverty. Livelihoods continue to decline due to environmental degradation, limited access to land, and a lack of economic diversification. However, the solutions offered by corporate social responsibility programs are consumptive in nature rather than long-term strategies that restore the local economic base.

Corporate social responsibility (CSR) governance in the oil and gas sector is formally designed and implemented at the district level. However, the most visible consequences are felt in the villages where the wells are located. Communities in Rokan Hulu, Bengkalis, and Pelalawan live with the daily realities of environmental degradation, limited infrastructure, and persistent poverty. The introduction of digital CSR platforms is often portrayed as a breakthrough to enhance transparency and accountability. However, in practice, these initiatives rarely bring tangible improvements, as villagers remain excluded from shaping the programs that affect their lives.

The vulnerability of oil-producing villages becomes even clearer in the classification introduced by FITRA Riau, which divides villages into concentric rings of impact. Ring I refers to villages with active wells that directly bear the burden of extraction. Ring II includes supporting or former extraction sites. Ring III comprises villages that are indirectly affected socially, economically, or environmentally. Ring IV in Pelalawan refers to other surrounding villages with the least direct impact. This classification reveals a hierarchy of exclusion: the closer a town is to oil wells, the greater the burden it carries, but this proximity does not translate into greater access to benefits or stronger bargaining positions.

However, such recognition through classification has not been matched by fair redistribution mechanisms. Oil revenue sharing (DBH) schemes typically stop at the provincial and district levels, leaving producing villages outside the direct flow of resources. Recent initiatives in Pelalawan and Rokan Hulu have begun allocating a small portion of DBH to villages through the so-called Special Oil and Gas Village Fund Allocation (ADD Khusus Migas). However, these efforts remain limited and symbolic, with villages still positioned at the very end of the distribution chain. Table 4 shown a classification of oil and gas producing villages.

Table 4. Classification of Oil and Gas Producing Villages

Ring Category	Definition	Pelalawan	Rokan Hulu
Ring I	Villages with active oil wells are directly exposed to extraction impacts	5 villages	16 villages
Ring II	Supporting villages or former extraction sites	7 villages	26 villages
Ring III	Villages indirectly affected (social, economic, environmental)	15 villages	107 villages
Ring IV*	Peripheral villages with the least visible impacts	77 villages	–

* Ring IV classification applies only in Pelalawan (Perbup No. 41/2023).
Source: FITRA Riau, 2024.

This table shows that villages located closest to extraction activities, categorized as Ring I, bear the heaviest burdens of pollution, environmental degradation, and socio-economic risks; yet they do not receive commensurate compensation. Villages in Ring II and Ring III are far more numerous, but they also remain

excluded from meaningful access to development benefits. In Pelalawan, an additional 77 villages fall under Ring IV, a category that is almost invisible within redistribution schemes. This pattern highlights a hierarchy of exclusion: the closer a town is to oil wells, the heavier the burden it carries; however, such proximity does not translate into greater benefits or bargaining power. Conversely, as the circle of impact expands, more villages become marginalized within the governance of resources.

This situation underscores the double exclusion faced by oil-producing villages. Through digital CSR, they are only "included" symbolically, visible in data and reports, but lacking agency in decision-making. Through fiscal redistribution, they are also sidelined, as the bulk of DBH benefits are captured at the provincial and district levels. In other words, villages bear the risks and losses of extraction without ever receiving commensurate benefits. Without more substantive integration of CSR, DBH, and village development agendas, the promise of resource-based prosperity will remain disconnected from the lived realities of local communities.

Digitalization, which is intended to expand inclusion, actually closes the space for participation; the community can see but cannot decide. The consequences of this situation are most clearly evident in oil and gas-producing villages. They are at the forefront of the impact of extraction, enduring most of the pollution, environmental damage, and recurring poverty, yet remain excluded from decision-making and the distribution of benefits. First, communities in oil and gas-producing areas lose their economic independence because corporate social responsibility programs often fail to address the restoration of local production that has been damaged. Second, ecological damage remains unaddressed because there are almost no programs that address forest restoration or improve clean water quality. In other words, corporate social responsibility programs not only fail to reduce poverty and improve the environment but also reinforce structures of exclusion.

The persistent inability to mitigate poverty and environmental degradation (as presented in Table 1) is interpreted in this study as the outcome of a 'Double Exclusion' framework. Local communities experience a two-tiered deprivation. First, 'digital exclusion', arising from restricted access to and limited literacy regarding corporate social responsibility (CSR) digital platforms. Second, 'fiscal and ecological exclusion', resulting from their limited capacity to participate in or influence decisions on resource allocation. The interaction of these forms of exclusion generates a self-reinforcing structural cycle in which environmental degradation remains inadequately addressed, as those most affected are effectively silenced by the very technologies ostensibly designed to empower them. In the context of Riau, digital CSR functions primarily as a performative mechanism that obscures and reproduces systemic exclusion rather than addressing the structural determinants of poverty and ecological decline.

4. Conclusion

Based on the empirical findings, the digitalization of corporate social responsibility (CSR) governance in oil and gas–producing regions of Riau Province has not produced a direct, substantive impact on transparency, public participation, or ecological sustainability. Digital platforms such as e-TJSP Tanjak Bermasa, Pelikat, and e-CSR Interactive although normatively framed as inclusive governance innovations have, in practice, generated new modalities of exclusion. The digitalization of CSR governance operates predominantly as an administrative and symbolic instrument to enhance the legitimacy of corporate actors and local government authorities, rather than as an effective mechanism for articulating and responding to community aspirations. As a result, the anticipated causal linkage between digital transparency and community empowerment has instead materialized as a "digital disconnect."

Moreover, existing CSR initiatives remain largely palliative and do not address the structural determinants of chronic poverty or the underlying drivers of ecological degradation. Claims of participatory governance manifested through instruments such as Memoranda of Understanding (MoUs), CSR forums, and community proposal mechanisms are still heavily mediated and controlled by political and corporate elites, thereby constraining authentic grassroots participation. In this context, digital platforms function primarily as "data showcases," reproducing and legitimizing preexisting exclusionary power relations in a new, digitized format. The study thus concludes that CSR digitalization has intensified a "double exclusion" of local communities from both decision-making processes and the material benefits of CSR programs.

To mitigate these governance failures, the paper argues for a comprehensive institutional reform agenda that transcends purely technical or platform-based solutions. Such reform should include: (1) the legal formalization and protection of community-led monitoring mechanisms; (2) the decentralization of CSR decision-making processes to reduce elite capture and redistribute decision-making authority toward affected communities; and (3) the integration of mandatory, standardized ecological restoration indicators within digital reporting systems to enhance verifiable corporate accountability and environmental outcomes.

Notwithstanding these contributions, the study is subject to several limitations. First, the empirical concentration on three districts within Riau Province constrains the external validity and limits the generalizability of the findings, particularly in relation to regions that display distinct socio-political

configurations, institutional capacities, or environmental governance regimes. Second, due to its qualitative research design, the analysis is unavoidably influenced by stakeholder subjectivities and remains susceptible to researcher bias, particularly in the stages of data interpretation and thematic coding.

Future research should adopt longitudinal and/or comparative research designs to investigate the long-term dynamics and inter-regional variations of digital CSR governance across multiple provinces. The integration of quantitative indicators such as systematically measured CSR financial allocations, ecological performance metrics, and social outcome indices together with geospatial methodologies, including GIS-based mapping, would facilitate a more fine-grained spatial analysis of the degree of alignment (or misalignment) between CSR resource distribution and empirically observed environmental recovery requirements.

Author Contributions

All authors have equal contributions to the paper. All the authors have read and approved the final manuscript.

Funding

No funding support was received.

Declaration of Conflicting Interests

The author declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

Data Availability

The datasets generated during and/ or analyzed during the current study are available from the corresponding author on reasonable request.

Declaration on AI Use

The authors declare that no artificial intelligence (AI) or AI-assisted tools were used in the preparation of this manuscript.

References

Aamir, A. A. (2024). *Digital media's corporate social responsibility (CSR) and public perception of brands*.

Apergis, N., & Katsaiti, M.-S. (2018). Poverty and the resource curse: Evidence from a global panel of countries. *Research in Economics, 72*(2), 211–223. https://doi.org/10.1016/j.rie.2018.04.001

Arnstein, S. R. (1969). A ladder of citizen participation. *Journal of the American Planning Association, 35*(4), 216–224. https://doi.org/10.1080/01944363.2018.1559388

Atanasov, A., Chipriyanova, G., & Krasteva-Hristova, R. (2023). Integration of digital technologies in corporate social responsibility (CSR) activities: A systematic literature review and bibliometric analysis. *Journal of Risk and Financial Management, 16*(8). https://doi.org/10.3390/jrfm16080373

Badan Perencanaan Pembangunan Daerah Kabupaten Bengkalis. (2025). *Kajian lingkungan hidup strategis Kabupaten Bengkalis*.

Badan Pusat Statistik Provinsi Riau. (2025). *Riau Province in figures 2025*. Badan Pusat Statistik.

Boulanouar, Z., & Essid, L. (2023). Extending the resource curse hypothesis to sustainability: Unveiling the environmental impacts of natural resource rents and subsidies in fossil fuel-rich MENA countries. *Resources Policy, 87,* 104330. https://doi.org/10.1016/j.resourpol.2023.104330

Brunnschweiler, C., Lujala, P., Putri, P., Scherzer, S., & Wardhani, I. (2025). When petroleum revenue transparency policy meets citizen engagement reality: Survey evidence from Indonesia. *Ecological Economics, 230,* 108529. https://doi.org/10.1016/j.ecolecon.2025.108529

Cristyano, C., Suryadi, S., & Riyanto, R. (2025). Mapping the evolution of corporate social responsibility research (2015–2024): A bibliometric analysis based on Scopus. *Journal of Governance and Public Policy, 12*(2), 206–222. https://doi.org/10.18196/jgpp.v12i2.25936

Dong, C., Huang, Q., Ni, S., Zhang, B., & Chen, C. (2024). Constructing care-based corporate social responsibility (CSR) communication during the COVID-19 pandemic: A comparison of Fortune 500 companies in China and the United States. *Journal of Business Ethics, 192*(4), 775–802. https://doi.org/10.1007/s10551-023-05531-9

Ebisi, E. A., Guo, Y., & Soomro, Z. A. (2025). Environmental conservation and corporate social responsibility (CSR): Insights from the Nigerian oil and gas industry using stakeholder and environmental justice theories. *Administrative Sciences, 15*(7). https://doi.org/10.3390/admsci15070275

Famularo, J. (2023). Corporate social responsibility communication in the ICT sector: Digital issues, greenwashing, and materiality. *International Journal of Corporate Social Responsibility, 8*(1). https://doi.org/10.1186/s40991-023-00082-8

Fernández, P., Hartmann, P., & Apaolaza, V. (2022). What drives CSR communication effectiveness on social media? A process-based theoretical framework and research agenda. *International Journal of Advertising, 41*(3), 385–413. https://doi.org/10.1080/02650487.2021.1947016

Frynas, J. G. (2010). Corporate social responsibility and societal governance: Lessons from transparency in the oil and gas sector. *Journal of Business Ethics, 93*(Suppl. 2), 163–179. https://doi.org/10.1007/s10551-010-0559-1

Forum Indonesia untuk Transparansi Anggaran (FITRA) Riau. (2024). *Optimalisasi dana bagi hasil migas dan corporate social responsibility di Provinsi Riau*. FITRA Riau.

Pemerintah Kabupaten Pelalawan. (2023). *Peraturan Bupati Pelalawan Nomor 41 Tahun 2023 tentang pengelolaan tanggung jawab sosial perusahaan*. Pemerintah Kabupaten Pelalawan

Gaber, J. (2019). Building "a ladder of citizen participation": Sherry Arnstein, citizen participation, and model cities. *Journal of the American Planning Association, 85*(3), 188–201. https://doi.org/10.1080/01944363.2019.1612267

Hajad, V., Ikhsan, I., Herizal, H., Latif, I. R., & Marefanda, N. (2023). Poverty and the curse of natural resources in Indonesia. *Journal of Contemporary Governance and Public Policy, 4*(1), 41–58. https://doi.org/10.46507/jcgpp.v4i1.92

Han, S., Liu, Z., Deng, Z., Gupta, S., & Mikalef, P. (2024). Exploring the effect of digital CSR communication on firm performance: A deep learning approach. *Decision Support Systems, 176,* 114047. https://doi.org/10.1016/j.dss.2023.114047

Jiang, W., Wu, J., & Yang, X. (2023). Does digitization drive corporate social responsibility? *International Review of Economics & Finance, 88*, 14–26. https://doi.org/10.1016/j.iref.2023.06.010

Hwang, J. (2024). Corporate social responsibility (CSR) in the digital age: Investigating the challenges and future insights. *GSC Advanced Research and Reviews, 21*(1), 503–518. https://doi.org/10.30574/gscarr.2024.21.1.0383

Kocurikova, A., Kopriva, J., & Tetrevova, L. (2024). Unlocking the power of corporate social responsibility communication in the online sphere: A systematic exploration. *Sustainability, 16*(6). https://doi.org/10.3390/su16062296

Liu, H., Han, P., & Wang, S. (2024). Enhancing corporate social responsibility in the digital economy era: Evidence from China. *Heliyon, 10*(1). https://doi.org/10.1016/j.heliyon.2023.e23459

Morsing, M., & Schultz, M. (2006). Corporate social responsibility communication: Stakeholder information, response, and involvement strategies. *Business Ethics: A European Review, 15*(4), 323–338.

Pemerintah Kabupaten Bengkalis. (2024). *TJSP activity list report (Tanjak Bermasa).* Pemerintah Kabupaten Bengkalis

Pfajfar, G., Shoham, A., Małecka, A., & Zalaznik, M. (2022). Value of corporate social responsibility for multiple stakeholders and social impact: A relationship marketing perspective. *Journal of Business Research, 143*, 46–61. https://doi.org/10.1016/j.jbusres.2022.01.051

Platteau, J.-P. (2004). Monitoring elite capture in community-driven development. *Development and Change, 35*(2), 223–246. https://doi.org/10.1111/j.1467-7660.2004.00350.x

Putri, P. S., & Rye, S. A. (2024). Understanding the role of place in local extractive industries transparency: Evidence from an oil-rich district of Indonesia. *The Extractive Industries and Society, 19,* 101511. https://doi.org/10.1016/j.exis.2024.101511

Ragnedda, M., & Muschert, G. W. (2015). *The digital divide: The Internet and social inequality in international perspective*. Routledge.

Ragnedda, M., Ruiu, M. L., & Addeo, F. (2022). The self-reinforcing effect of digital and social exclusion: The inequality loop. *Telematics and Informatics, 72,* 101852. https://doi.org/10.1016/j.tele.2022.101852

Riau Province Government. (2024). *Optimalisasi daerah penghasil migas*.

Van Dijk, J. (2020). The digital divide. Polity Press.

Wahyudi, H., & Palupi, W. A. (2023). Natural resources curse in Indonesia. *International Journal of Energy Economics and Policy, 13*(2), 349–356. https://doi.org/10.32479/ijeep.14077

Warschauer, M. (2004). *Technology and social inclusion: Rethinking the digital divide*. MIT Press.

West, D. M. (2004). *E-government and the transformation of service delivery and citizen attitudes*.

Zheng, Q., Luo, Y., & Maksimov, V. (2015). Achieving legitimacy through corporate social responsibility: The case of emerging economy firms. *Journal of World Business, 50*(3), 389–403. https://doi.org/10.1016/j.jwb.2014.05.001

Zhou, J., Ye, S., Liu, X., & Tang, Y. (2024). The role of social media in CSR performance: An integrated institutional and resource dependence perspective. *Journal of Business Research, 184*, 114880. https://doi.org/10.1016/j.jbusres.2024.114880