

# Collaborative Governance in Village Cooperation to Realize Sustainable People's Oil Palm Plantations in East Kotawaringin Regency

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**Abstract.** This study aims to determine the success of the collaboration carried out by Karang Tunggal and Beringin Tunggal Jaya Villages, Paranggean District, East Kotawaringin Regency in realizing sustainable smallholder oil palm plantations by Presidential Regulation Number 44 of 2020 which mandates that all oil palm plantations must be certified by Indonesia Sustainable Palm Oil (ISPO) by 2025. The analysis used a qualitative descriptive method. The results of the study, the two villages succeeded in realizing sustainable smallholder oil palm plantations, obtaining ISPO and RSPO certification, and improving the welfare of their communities, most of whom work as independent oil palm farmers by implementing a form of collaborative governance through a multihelix approach with actors consisting of the government (province, district, village), private sector (SPOS Indonesia, JAVLEC Foundation, PBKS), universities (UGM, UPR), oil palm farmer groups, media, and KUD, and village heads implementing a transformational leadership style.

**Keywords:** Collaboration, Cooperation, Sustainable People's Oil Palm Plantation, Village

## 1 Introduction

Village development continues to be carried out starting from providing basic needs, building facilities and infrastructure, developing local economic potential, allocating village funds, forming local financial institutions, BUM Desa, and other efforts. However, various efforts that have been made have not been able to resolve multiple problems in the village, sustainable local village independence, and the achievement of village community welfare [1; 2]. This is because village development is more complex than cities. Each village has different regional characteristics, resources, potential, values, different cultures, relatively low levels of education, and a homogeneous society [3]. This implies that efforts to achieve village development goals cannot be carried out only by the village, village government, or village community itself, but village development and sustainable village community empowerment need to be carried out synergistically with the support of other stakeholders. Good cooperation, collaboration, and synergy are needed between stakeholders such as government, private sector, academics, community, media, and other stakeholders, or in this case also called Collaborative Governance.

Collaboration between stakeholders is based on village values, culture, character, and norms [4]. The keys to successful village development include collaboration networks, the strength of village cooperation and collaboration, institutions, human resources, and policies [5]. Cooperation and collaboration are influential in overcoming knowledge asymmetry, facilitating fact-finding, and building public trust [6]. Collaborative governance can support

participatory governance, especially in policy-making from various stakeholders including non-governmental organizations [7; 8].

Indonesia is one of the countries with the largest palm oil plantation area in the world and is the largest producer of palm oil in the world. The area of palm oil plantations in Indonesia tends to increase every year, which can be seen in Figure 1.

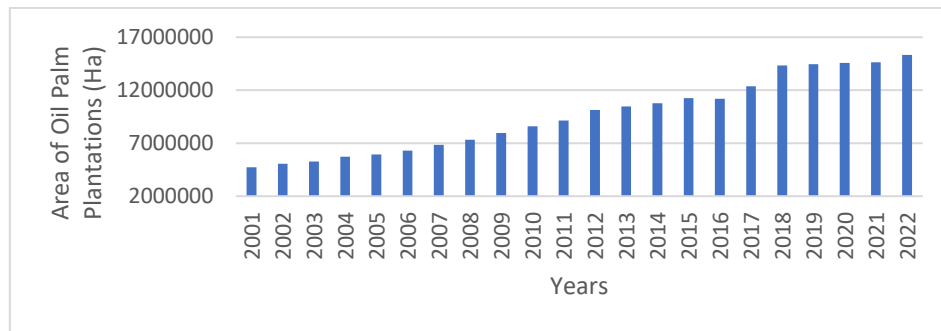


Figure 1. Area of Development of Indonesian Palm Oil Plantations 2001-2022

Source: [9]

One of the provinces in Indonesia that has the largest area of oil palm plantations is Central Kalimantan, which is in third place after Riau and West Kalimantan [9]. The largest area of oil palm plantations in Central Kalimantan is in East Kotawaringin Regency with 566,000 Ha in 2023, of which 23% are smallholder plantations. East Kotawaringin Regency is also the regency with the largest area of oil palm plantations in Indonesia [10] and oil palm is its leading commodity. The development of the oil palm economy has encouraged an increase in the area of independent oil palm plantations. On the other hand, this development has implications for new problems, namely the issue of land use and its legality.

There are several problems related to smallholder oil palm plantations in East Kotawaringin, namely land use, land legality and cultivation (its existence in the state forest area), vulnerability to land use conflicts between farmers or farmers with oil palm plantation companies, low capacity of independent farmers related to the principles of sustainable oil palm cultivation compared to companies and plasma farmers, and the readiness of areas for sustainable oil palm plantation management [11]. In addition to the gap in sustainable oil palm management, there is also a gap in welfare between plasma farmers and independent oil palm farmers. The welfare of independent oil palm farmers is relatively lower, this implies that the goal of village development related to equitable community welfare, and improving the quality of life according to Law Number 6 of 2014 has not been achieved.

Presidential Regulation Number 44 of 2020 concerning the Sustainable Oil Palm Plantation Certification System mandates that all oil palm plantations in Indonesia, including smallholder oil palm plantations, must meet ISPO (Indonesia Sustainable Palm Oil) certification. Smallholder oil palm plantations are targeted to meet ISPO certification by 2025. ISPO certification aims to implement good plantation practices, environmental sustainability, social-labor responsibility, and continuous productivity improvement, increasing the competitiveness of palm oil in the world market. Another policy related to sustainable oil palm plantations is the RSPO (Roundtable Sustainable Palm Oil) which is a global multi-stakeholder initiative on sustainable palm oil, but this RSPO is not required by the government but is voluntary.

The government has also issued Regulation of the Minister of Agriculture Number 38 of 2020 concerning the Implementation of Sustainable Oil Palm Plantation Certification in Indonesia as a form of commitment to realizing the sustainability of Indonesian oil palm where the regulation also explains the role of local governments regarding ISPO certification. In addition, the government has issued a Decree of the Directorate General of Plantations Number 105 of 2018 concerning Guidelines for Issuance of Plantation Business Registration Certificates for Cultivation (STDB), as one of the documents for ISPO certification. Responding to the direction of central and regional government policies, the Head of Karang Tunggal Village for the 2017-2023 period and Beringin Tunggal Jaya, Parenggean District, East Kotawaringin Regency, collaborate and work together with other stakeholders who have the resources and expertise.

Karang Tunggal and Beringin Tunggal Jaya Villages realize that villages have limited resources, so they need to collaborate with other stakeholders to realize the mandate of Presidential Regulation Number 44 of 2020 and improve the welfare of the community, which generally works as oil palm farmers. By strengthening collaboration and partnerships, Karang Tunggal and Beringin Tunggal. The Village Head started by participating in the SPOS Indonesia workshop program, then followed up by collaborating and working together. The welfare of independent palm oil farmers is important to achieve as a form of equitable development, increasing economic growth, improving the quality of life, independence, welfare, and empowerment, as well as environmental balance. Until now, the oil palm plantations of Karang Tunggal Village have been RSPO and ISPO certified, while Beringin Tunggal Jaya Village has been RSPO certified, and the process towards ISPO certification and there has been an increase in the capacity and welfare of independent oil palm farmers so that it is hoped that it can be implemented in oil palm plantation villages in other areas.

Cooperation in the field of village development and empowerment of village communities is discussed briefly in the Regulation of the Minister of Villages, Disadvantaged Regions, and Transmigration Number 21 of 2020. However, to expand the success of village cooperation in implementing village development and empowerment of village communities, the Ministry of Villages, which has duties and functions in the field of village development and empowerment of village communities, as well as assisting village and rural cooperation, does not yet have instructions/technical guidelines related to village cooperation in the field of village development and empowerment of village communities per sector, namely based on village potentials such as agricultural, plantation, forestry, mining, renewable energy, and other natural resources. Therefore, it is necessary to consider the preparation of instructions/technical guidelines so that the Regulation of the Minister of Villages, Disadvantaged Regions, and Transmigration Number 21 of 2020 is more implementable for regional and village governments, and develops aspects that have not been covered in previous regulations in the context of village cooperation. The success of village development through collaboration and cooperation between stakeholders can be seen in the two villages and is expected to be input for relevant stakeholders in formulating policies related to village collaboration and cooperation in the field of village development and empowerment of village communities, especially in oil palm plantation villages in other areas.

## **2 Literature Review**

### **A. Collaborative Governance**

One form of collaborative governance in a series of processes and structures of public policy formulation, decision-making, and public management by involving the role of government actors as public bodies, non-government such as the private sector, industry, academics, and community elements in the public space to achieve public goals or welfare that cannot be achieved if relying only on one party is called collaborative governance [12;13]. Collaborative Governance according to [8] consists of elements that have an impact on collaboration, namely starting conditions, institutional design, facilitative leadership, and collaborative processes which can be seen in Figure 2 below.

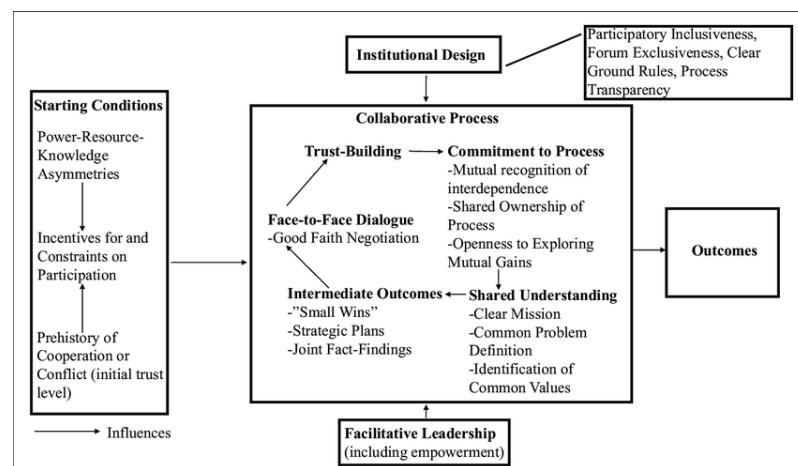


Figure 2. Elements of collaborative governance Ansell and Gash  
Source: [8]

The collaboration process according to [8] consists of five indicators, namely:

- Face-to-face dialogue
- Trust building
- Commitment to the process
- Shared understanding
- Intermediate outcomes

The helix concept is based on the idea that innovation is an interactive result involving various types of actors. Each actor contributes according to their institutional function in society. The early development of the helix concept introduced the concept of the triple helix system. The basic components of the triple helix are universities/academics, industry, and government. The development of innovation in a region is created from collaboration between government, intellectuals, and business actors.

The triple helix was then developed again by adding one component, namely civil society, called the quadruple helix. There are four main sectors in the quadruple helix model, namely academia, industry, government, and society [14]. Academic institutions are responsible for research and teaching. Industry or companies are involved in research and innovation and seek to profit from the results of these discoveries. The government is responsible for creating policies and regulations that govern innovation and providing financial support and infrastructure for the development of innovation. Civil society as a group or individual involved in decision-making in the utilization of innovation results and acting as an end user. With

community involvement, priorities aimed at social impacts and broader social welfare benefits can be more considered [15]. Penta helix is an extension of the quadruple helix which adds the media and communication sector as the fifth pillar responsible for the dissemination of information and public participation in the development of innovation. The penta helix concept is the answer to how technology can be developed and adapted in people's lives effectively and sustainably, and provide greater benefits to society as a whole [16].

With the development of science and increasingly complex problems, this helix concept and the stakeholders contained in the concept can continue to develop and grow. Multi-helix is a form of development of a more complex helix model and includes more actors in the development of innovation and overcoming a public problem. This model is a development of the triplehelix, quadruple helix, penta helix, and previous models which carry the idea that the innovation developed is not only determined by the academic, industrial, and government sectors, but also by various other actors such as civil society, non-governmental organizations, international organizations and the like [17].

Multi-helix actors into 12 categories, namely academics, industry, government, civil society, non-profit organizations, financial organizations, technology organizations, ipsilateral organizations, international organizations, media organizations, FDI or foreign investment, and ethnic or religious groups [14]. The implications of adopting the multi-helix model are the formation of cross-sector and cross-border partnerships in innovation development, as well as sensing and resolving conflicts of interest and demands between actors [18]. By the governance paradigm, the multi-helix perspective has the ultimate goal of solving the problems of marginalized communities such as the poor, underdeveloped, remote, disaster-affected, and other communities who receive unfair and arbitrary treatment.

## **B. Village Cooperation**

Village cooperation in the field of government is regulated in the Regulation of the Minister of Home Affairs Number 96 of 2017. Based on [19] concerning Villages, the scope of inter-village cooperation as referred to includes the fields of government, development, and community. The scope of village cooperation includes cooperation between villages, and/or cooperation with third parties. The Ministry of Villages, Development of Disadvantaged Regions, and Transmigration has duties and functions in the field of village development and village community empowerment, as well as assisting village and rural cooperation, has general guidelines for village development and village community empowerment in developing village cooperation regulated in the Regulation of the Minister of Villages PDTT Number 21 of 2020, but does not yet have technical or operational instructions, as well as cooperation per sector.

Villages can carry out inter-village cooperation according to their authority. Village cooperation with third parties can be carried out in the fields of improving the economy of Village communities; improving education services; health; socio-culture; peace and order; utilization of natural resources and appropriate technology with attention to environmental sustainability; employment; public works; village boundaries; and other cooperation that is the authority of the Village. Village cooperation with third parties can be carried out with government agencies private companies or individuals according to the object of cooperation. Village cooperation with third parties is determined by Mutual Agreement.

## **C. Sustainable Palm Oil Plantation Certification**

The implementation of sustainable palm oil plantation practices at the international level is called the Roundtable on Sustainable Palm Oil (RSPO), where members voluntarily participate in the RSPO mechanism to produce and use sustainable palm oil. Plantation practices that adhere to the principle of sustainability prioritize legality, the environment, and long-term socio-economic feasibility. RSPO certification can only be carried out on land that has a permit and RSPO requires its member plantation companies to comply with relevant national laws and regulations, including complying with land use rights requirements.

In Indonesia, to ensure sustainable practices in oil palm plantations, the government through the Ministry of Agriculture has issued the Indonesian Sustainable Palm Oil (ISPO) policy as the basis for certification of sustainable oil palm products [20]. Based on [21] concerning the Indonesian Sustainable Oil Palm Plantation Certification System in articles 3 and 4, it is stated that ISPO is a system of Oil Palm Plantation Business that is economically feasible, socio-culturally feasible, and environmentally friendly based on the provisions of laws and regulations,[21]. The main objectives of the Indonesian Sustainable Palm Oil Certification System (ISPO) are as follows [22]: (a) Implementation of a system to ensure that the Indonesian palm oil sector is run sustainably based on a vision; (b) Legal compliance is the first step to achieving these objectives, where this system is one of the instruments to ensure that all Fresh Fruit Bunches (FFB) of oil palm circulating in Indonesia or for export purposes, come from legal sources and are processed and distributed by applicable policies and laws and regulations; (c) Improvement of governance in the palm oil plantation sector.

The mandatory implementation of ISPO certification for all palm oil plantation business actors is a concrete step by the Government to improve the governance of sustainable palm oil plantations. The government hopes that through this policy, Indonesian palm oil products will become more accepted and competitive in the global market. However, the implementation of ISPO is not easy because the level of plantation groups to carry out certification is still very low. There are still many obstacles or constraints that must be resolved at the plantation level to realize a sustainable palm oil industry [23]. In its implementation, ISPO is mandatory for palm oil plantation companies in Indonesia while RSPO is voluntary. The ISPO and RSPO certification systems have the following elements: Requirements/standards that must be met Conformity assessment by independent auditors Certification bodies accredited by the Accreditation Body Conformity Assessment Bodies that carry out activities in Indonesia must be legal entities in Indonesia by the laws and regulations in the territory of the Unitary State of the Republic of Indonesia.

### **3 Methodology**

The data in this study used primary data and secondary data. Primary data were obtained through face-to-face interviews and focus group discussions with predetermined respondents. Secondary data were obtained from supporting data through literature studies. The data analysis used in this study was qualitative descriptive analysis. The stages of qualitative research data analysis include data collection, reduction, interpretation, and conclusion [24]. Data validation was carried out by triangulation [25]. The addition of information sources and evidence was also carried out to increase the validity of the findings [26].

### **4. Results and Discussion**

The degree of collaboration consists of networking, coordination, cooperation, and collaboration [26]. Based on the degree of collaboration, efforts to realize sustainable smallholder oil palm plantations are already at the collaboration level, because there has been an exchange of information, changes in activities, sharing of resources, and mutual benefit [26]. This collaboration and cooperation concerns the governance of sustainable smallholder oil palm plantations, mapping and data collection of smallholder oil palm, and assistance in certification of sustainable smallholder oil palm plantations (ISPO/RSPO) in East Kotawaringin Regency. Based on the results of the data obtained, there are several stakeholders who collaborate and work together to realize sustainable smallholder oil palm plantations in Karang Tunggal and Beringin Tunggal Jaya Village, namely the Government (Central Kalimantan Province, East Kotawaringin Regency, Beringin Tunggal Jaya Village and Karang Tunggal), Private Sector (SPOS Indonesia, JAVLEC Foundation, Large Oil Palm Plantations, Universities (Gadjah Mada University and Palangka Raya University), Community (Oil Palm Farmer Groups/Associations), Media, and KUD.

Based on the actors involved in the helix approach, collaboration in realizing sustainable smallholder oil palm plantations is a multi helix concept [17]. The actors involved in the multiple helix approach are sustainable government, sustainable industry, sustainable entrepreneurship, university, and civil society [14]. Collaboration is one of the keys to sustainable success in village development and revitalization interventions [27]. In collaborative governance of sustainable smallholder oil palm plantation management, the main actors are the Village Government in this case the Village Head of Karang Tunggal for the 2017-2023 period, and Beringin Tunggal Jaya who initiated collaboration with various stakeholders related to the sustainability of smallholder oil palm plantations in their villages. The roles of stakeholders involved in resolving the problem of sustainable smallholder oil palm plantations can be seen in Table 1.

Table 1. Actors involved and their roles

Actors	Roles
<b>Government</b>	
1. Central Kalimantan Provincial Government	<ul style="list-style-type: none"> <li>- Implementing presidential policies and regulations by issuing Central Kalimantan Governor Regulation Number 53 of 2020</li> <li>- Providing socialization and training for oil palm farmer human resources.</li> </ul>
2. East Kotawaringin Regency Government	<ul style="list-style-type: none"> <li>- Implementing presidential policies and regulations, as well as the governor by issuing East Kotawaringin Regency Regent Regulation Number 39 of 2020 concerning the Regional Action Plan for Sustainable Oil Palm Plantations for East Kotawaringin Regency for 2020-2024.</li> <li>- Mapping and Data Collection of Smallholder Oil Palm Plantations.</li> <li>- Providing STDB services, and assistance in STDB registration.</li> <li>- Conducting counseling related to smallholder oil palm plantations to independent oil palm farmers.</li> <li>- Providing training for independent oil palm farmers human resources.</li> </ul>

	<ul style="list-style-type: none"> <li>- Facilitate the formation of Village Regulations on forest protection and others.</li> <li>- Provision of fertilizer needs for oil palm plantations.</li> <li>- Coordinate with the village government, socialization of PKSP, SARPRAS, AND HR from BPDPKS Funds.</li> <li>- Become a mediator in plantation conflicts between communities or communities with large private palm oil companies (PBSKS) as a form of protection for the community.</li> <li>- Monitoring and evaluation of the implementation of sustainable oil palm plantation policies.</li> </ul>
3. Village Government	<ul style="list-style-type: none"> <li>- Initiate collaboration with various stakeholders related to the sustainability of smallholder oil palm plantations in their villages.</li> <li>- Build the trust of smallholder oil palm farmers in their villages to cooperate with the sustainable oil palm plantation certification program.</li> <li>- Encourage independent oil palm farmer cooperatives to participate in the ISPO and RSPO certification process</li> <li>- Consolidation to conduct socialization and organization of oil palm farmers/farmer groups.</li> <li>- Collaboration with SPOS Indonesia, the JAVLEC Indonesia Foundation, Large Private Oil Palm Plantations around the village, NGOs, universities, cooperatives, smallholder oil palm farmer groups, and others.</li> <li>- Collaboration with the Agriculture and Plantation Service related to increasing oil palm productivity, human resource capacity of oil palm farmers, facilities and infrastructure, seed assistance, farm roads, and others.</li> <li>- Supervision and enforcement of government regulations.</li> <li>- Development of local regulations at the village level.</li> <li>- Become a mediator in plantation conflicts between communities or communities with PBSKS as a form of protection for the community.</li> <li>- Mapping and data collection of smallholder oil palm plantations.</li> <li>- Socialization and facilitation of ISPO/RSPO certification training for KUD and oil palm farmer groups..</li> </ul>
<b>Private sector (SPOS Indonesia and JAVLEC Foundation)</b>	<ul style="list-style-type: none"> <li>- Private sector (SPOS Indonesia and JAVLEC Foundation) - Facilitating and assisting local governments in accelerating policies and conducting studies for broad development and policy advocacy.</li> <li>- Mapping and data collection of smallholder oil palm plantations and assistance in accelerating the issuance of STDB.</li> <li>- Assistance in proposing and registering STDB.</li> </ul>



	<ul style="list-style-type: none"> <li>- Assistance and assistance in ISPO/RSPO certification for smallholder oil palm plantations.</li> <li>- Facilitation of complete legality and legal compliance in the oil palm business.</li> <li>- Assisting KUD to increase organizational capacity, development of internal control systems (ICS), organization and consolidation of farmers and farmer groups that are members of KUD, and implementation of sustainable practices in oil palm plantation management in the field.</li> <li>- Assistance in the preparation of regional action plans for sustainable oil palm plantations/RAD-KSB.</li> <li>- Facilitating organizational strengthening processes both in terms of management and cultivation techniques.</li> <li>- Implement training to increase the cultivation capacity of independent oil palm farmers in an effort to improve sustainable oil palm management.</li> <li>- Establishment of oil palm plantation demonstration plots with good agricultural practices in 5 villages.</li> <li>- Facilitation of land tenure settlement in forest areas (PTKH) and agrarian reform.</li> <li>- Development of community businesses through the production of compost and red cooking oil.</li> <li>- Preparation of village land use.</li> </ul>
<b>Large Palm Oil Plantation Companies (PBKS)</b>	<ul style="list-style-type: none"> <li>- Provide training, education, and guidance to smallholder oil palm farmers related to sustainable agricultural practices, plantation management, environmental maintenance, selection of superior varieties, and use of pesticides.</li> <li>- Assist smallholder oil palm farmers in accessing wider markets and ensuring sustainability in marketing their palm oil products, as well as building mutually beneficial strategic partnerships.</li> <li>- Transfer knowledge and technology that can increase the productivity and quality of smallholder oil palm.</li> </ul>
<b>Universities (Gadjah Mada University and Palangka Raya University)</b>	<ul style="list-style-type: none"> <li>- Develop a pilot plantation of the long-term strategy (SJB) supported by the village government as a learning medium for farmers who have oil palm plantations in forest areas.</li> <li>- Provide knowledge through training and technical guidance, form villages fostered by universities, technology transfer.</li> <li>- Place students to assist in the implementation of the village development process through the KKN program by creating activities that have a direct impact on village development efforts and increasing the capacity of Village HR, or oil palm farmer groups..</li> </ul>
<b>Independent Oil Palm Farmer Groups</b>	<ul style="list-style-type: none"> <li>- Participate in decision-making related to sustainable smallholder oil palm plantations, and prepare village activities and regulations.</li> <li>- Active and participate in oil palm farmer institutions/groups.</li> </ul>

		<ul style="list-style-type: none"> <li>- Follow policies and regulations related to sustainable smallholder oil palm plantation certification</li> <li>- Follow the sustainable smallholder oil palm plantation certification program that has been attempted by the village government.</li> <li>- Follow training to increase sustainable oil palm cultivation capacity.</li> <li>- Implement sustainable oil palm cultivation.</li> <li>- Coordinate between farmers and the government, private sector, and other stakeholders.</li> </ul>
<b>Media</b>		<ul style="list-style-type: none"> <li>- Delivering information and providing counseling to the public so that it can provide understanding and education to create a wider impact.</li> <li>- Providing access to information for other stakeholders involved in collaborative governance</li> </ul>
<b>Village Cooperatives</b>	<b>Unit</b>	<ul style="list-style-type: none"> <li>- Preparing ISPO/RSPO certification requirements for oil palm farmers/farmer groups who are members.</li> <li>- Actively conducting social consolidation to KUD farmer groups to be involved in KUD and prepare land for ISPO/RSPO certification.</li> <li>- Developing economic diversification of oil palm derivative products.</li> </ul>

Source: Processed data (2024)

Multihelix collaboration does not make the village government the sole actor in determining interventions for village development but provides space and a negotiation process for other stakeholders to play a role in intervening in village development and improving the welfare of village communities by the objectives of the Village Law. This perspective allows for more holistic synergy and problem-solving, producing better results in problem-solving because each actor has different roles and knowledge [17].

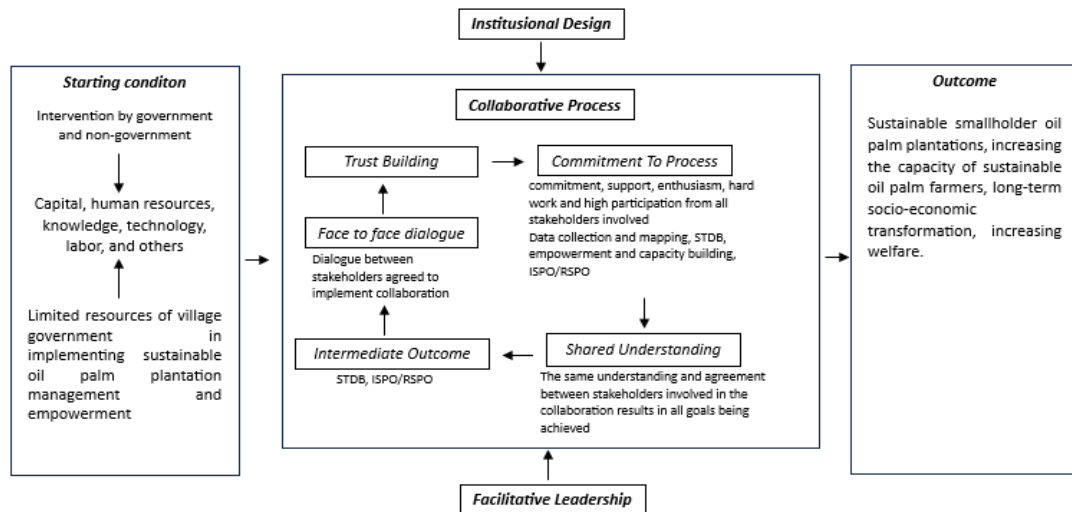


Figure 3. Implementation of Collaborative Governance related to sustainable smallholder oil palm plantations in East Kotawaringin

Source: Processed data (2024) and Adoption [8]

Based on Figure 3, several variables can determine the success of collaborative governance, the process of which begins with:

1. Initial Conditions

The initial conditions before collaboration and cooperation were that the village government had limited resources in implementing and socializing the management and cultivation of sustainable smallholder oil palm plantations, empowering independent oil palm farmers, did not have definitive data on smallholder oil palm plantations, had difficulty to resolving land conflicts, and were unable to diversify oil palm derivative products. In addition, from the perspective of the village community, who generally work as oil palm farmers, they have an individualistic character in oil palm cultivation, the management of smallholder oil palm plantations is not environmentally friendly, incomplete plantation documents, limited knowledge and capacity for sustainable oil palm cultivation, limited access to capital, did not understand STDB, and various other problems faced by independent oil palm farmers. The village government, in this case, the village head, aims to develop the potential of natural resources in his village and has the authority to encourage KUD to more easily accommodate smallholder oil palm farmers/farmer groups to participate in the ISPO/RSPO certification process. This process begins with socialization, farmer consolidation, farmer organization, data collection, and mapping of community oil palm plantations in their villages related to distribution, area, ownership, and cultivation status which are also important for the Village Spatial Planning Plan (RTGLD) in collaboration with stakeholders as explained previously. In addition to KUD, the Javlec Foundation facilitates the submission of STDB for farmers.

2. Facilitative Leadership

The Village Heads of Karang Tunggal and Beringin Tunggal Jaya in the collaboration act more as facilitators than supervisors. The Village Heads in the two villages have advantages including being full of initiative, and innovation and being able to create networks with

other stakeholders in managing and overcoming problems in their villages. One informant stated that this collaboration initiative involving KUD was a personal idea of the Head of Karang Tunggal Village (Rohmat) who is also the head of KUD, but he did not want to prosper alone and invited oil palm farmers/farmer groups in his village to participate in this collaboration to get opportunities for wider livelihood improvements.

### 3. Institutional Design

All collaborations between the village government and SPOS Indonesia, the Javlec Foundation, the East Kotawaringin Regency Government, Universities, Independent Oil Palm Farmers/Farmers Groups in the village, KUD, and the media are based on mutual agreement. The role of each stakeholder has been regulated based on mutual agreement. In addition, there are other stakeholders involved outside the collaboration for sustainable community oil palm plantation certification, namely Large Private Oil Palm Plantations whose role is to buy oil palm produced by farmers.

### 4. Collaborative Process

In the process of forming collaboration and cooperation, all parties involved must adhere to the principles of transparency [32]. Based on [8] the collaboration process takes place in several stages, starting from face-to-face dialogue, building trust, commitment to the process, mutual understanding, and results. Dialogue between stakeholders agrees to carry out collaboration with each other with objectives formulated transparently. With a strong consolidation process for oil palm farmers and full of family, as well as good coordination with SPOS Indonesia, JAVLEC Foundation, East Kotawaringin Regency Government, KUD, Universities, village heads have succeeded in building the trust of oil palm farmers/independent farmer groups in the village and other relevant stakeholders who are competent in their fields to collaborate regarding the fulfillment of sustainable oil palm plantation certification standards. The result is ISPO/RSPO-certified oil palm plantations and increased welfare.

The benefits of the collaboration results were received by all parties, especially farmers, village governments, and district governments, as can be seen in Table 2.

Table 2. Benefits of Collaboration for Farmers, Village Governments, and Regional Governments

Actor	Benefit
Independent Oil Palm Farmers	<ol style="list-style-type: none"> <li>1. Have STDB</li> <li>2. Have ISPO/RSPO certification</li> <li>3. Reposition production with increased collectivity and social capital</li> <li>4. Increase the capacity of farmer organizations</li> <li>5. Learning and knowledge as well as economic diversification and income sources</li> <li>6. Social transformation and increased welfare</li> <li>7. Sustainable and environmentally friendly land management</li> <li>8. Resolving land conflicts</li> <li>9. Improving the economy and welfare of life</li> </ol>
Village Government	<ol style="list-style-type: none"> <li>1. Have data on smallholder oil palm plantations</li> <li>2. Facilitate identification of village problems and potentials</li> </ol>

	<ol style="list-style-type: none"> <li>3. Improve village status</li> <li>4. Increase the welfare of village communities</li> <li>5. Increase the capacity of village planning and services to oil palm farmers</li> <li>6. Provide information on potential tax levies that have not been identified so far</li> <li>7. Proactively provide support to independent oil palm farmers and become the SPOS Indonesia program as a means of realizing the vision of village development</li> </ol>
Local Government	<ol style="list-style-type: none"> <li>1. Strengthen governance, coordination, service systems, and planning related to sustainable oil palm plantation management</li> <li>2. Increase capacity and data management</li> <li>3. STDB service system that effective</li> <li>4. Improved coordination between OPDs in developing support programs for smallholder oil palm plantations</li> <li>5. Preparation of the Regional Action Plan for Sustainable Oil Palm Plantations at the Central Kalimantan Province and East Kotawaringin Regency levels</li> <li>6. Resolution of smallholder oil palm problems at the provincial and district levels has become more intensive.</li> </ol>

*Source: Processed data (2024)*

The success of village collaboration and cooperation in East Kotawaringin Regency was also influenced by the leadership of the Village Heads of Karang Tunggal and Beringin Tunggal Jaya, which is a transformational leadership style. A leader in transformational leadership has the ability and will that be strong enough and tough enough to bring about change in the organization he leads [28]. Since the beginning of his leadership, the village head has made many changes for the better, innovating in his village despite challenges, one of which is this collaboration. The result is that his village has become a pilot and field study location for the implementation of ISPO certification, all smallholder oil palm plantations in his village have been ISPO certified and smallholder oil palm plantations in Beringin Tunggal Jaya Village have been RSPO certified, and are currently in the process of ISPO certification, and there has been an increase in the capacity and welfare of smallholder oil palm farmers. The two villages currently have independent village status.

The changes before and after collaboration and cooperation related to sustainable smallholder oil palm plantations are summarized in Table 3.

Table 3. Changes Before and After Collaboration and Cooperation

Before	After
There is no data and mapping of smallholder oil palm plantations in villages and districts	There is data and mapping of smallholder oil palm plantations consisting of location distribution, ownership identity and area based on name and

	location, and oil palm cultivation status in villages and districts.
Limited human resources to handle data, as well as obstacles to cross-sectoral coordination related to the development of the STDB service system	<ul style="list-style-type: none"> <li>- Strengthening of STDB governance and service systems for independent oil palm farmers</li> <li>- Improvement of governance and coordination, service systems, and development planning, especially related to the arrangement of smallholder oil palm plantations</li> </ul>
Regulations related to sustainable smallholder oil palm plantations are inadequate	<ul style="list-style-type: none"> <li>- There is a Regulation of the Regent of East Kotawaringin regarding the Regional Action Plan for Sustainable Oil Palm Plantations for 2020-2024</li> <li>- Planning and support for programs that lead to the management of sustainable smallholder oil palm plantations</li> </ul>
<ul style="list-style-type: none"> <li>- Oil palm farmers have an individualistic character in farming</li> <li>- Farmers are less active in institutions</li> </ul>	<ul style="list-style-type: none"> <li>- Farmers form groups, strengthen social capital, conduct joint learning, and collectively develop business and organizational arrangements</li> <li>- Strengthening the organization both in terms of management and cultivation techniques</li> <li>- Improvement and Organization of Institutions Independent Oil Palm Farmers</li> <li>- Increasing awareness of the importance of data, land legality, and cultivation</li> </ul>
<ul style="list-style-type: none"> <li>- Palm oil cultivation patterns tend to be isolated</li> <li>- Farmers' capacity to carry out sustainable palm oil cultivation is very low</li> </ul>	<ul style="list-style-type: none"> <li>- There are new methods and techniques in sustainable palm oil management (economically productive and environmentally friendly)</li> <li>- There are improvements in governance and increased capacity for farmers and organizations related to sustainable palm oil cultivation</li> </ul>
The issue of legality of land use and conflicts	Vulnerability to land use conflicts is reduced
	<ul style="list-style-type: none"> <li>- There is a socio-economic transformation related to the process of changing values and structures (governance) of a social, economic, and cultural system.</li> </ul>
	<ul style="list-style-type: none"> <li>- Having STDB as a form of legality of cultivation and land</li> <li>- ISPO/RSPO certified</li> <li>- Increased productivity and production of palm oil</li> <li>- The growth of economic diversification from palm oil derivative products such as organic fertilizer from palm oil waste produced and marketed by BUM Desa</li> <li>- Development of demonstration plots as a means of learning good palm oil cultivation techniques (good agriculture practice)</li> </ul>

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- Access to obtaining certified superior seeds is easier
  - Access to cooperation is easier, getting premiums from RSPO
  - Sawikita application
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Source: Processed data (2024)

In addition to the positive changes that have occurred in independent oil palm farmers, farmers hope for the continuation of training programs and technical guidance carried out by the village, because training and technical guidance have ended along with the end of collaboration and cooperation with the private sector, and the Ministry of Villages, Disadvantaged Regions and Transmigration needs to formulate technical guidelines/instructions related to village cooperation in the field of village development and empowerment of village communities per sector that is by village potentials such as agricultural potential, plantations, forestry, mining, renewable energy, and other natural resources because currently villages are still hesitant and confused about their implementation. It is hoped that with these guidelines or technical instructions, villages can prepare development programs or activities and community empowerment to achieve village development goals by [19].

## 5. Conclusions

Based on the background, description of the problem, and policy analysis carried out, it is known that the success of the village in realizing sustainable community oil palm plantations by implementing collaborative governance with a multi-helix perspective with actors involved consisting of the government (province, district, village), private sector (SPOS Indonesia, JAVLEC Foundation), universities, independent oil palm farmer groups, media, and KUD. The results of this collaboration show results that are by the objectives of the collaboration and prove that collaborative governance with a multi-helix perspective provides optimal results in solving problems by the objectives of the collaboration. The recommendations for developing village collaboration and cooperation are:

1. The Ministry of Villages, Disadvantaged Regions and Transmigration in Village Development and Village Community Empowerment, as well as developing cooperation in oil palm villages, can do:
  - a. Prepare technical guidelines/instructions related to village cooperation in the field of village development and village community empowerment per sector that is by village potentials such as agricultural potential, plantations, forestry, mining, renewable energy, and other natural resources based on the helix concept and stages of implementation of this policy brief cooperation.
  - b. Prepare a program for developing village cooperation in the field of village development and village community empowerment, and coordinate its implementation with related agencies and local governments, facilitate collaboration between villages, the private sector, non-governmental organizations, and other related parties support the development of village cooperation by local potential and needs.
  - c. Provide incentives and technical assistance for the ISPO/RSPO certification process in villages by the duties of the Ministry of Villages, Disadvantaged Regions, and

Transmigration in the field of village development and village community empowerment.

- d. Cooperate with other Ministries/Institutions related to planning and development of oil palm plantation infrastructure by village authority.
  - e. Provide technical assistance and guidance to villages in planning, implementing, and evaluating village cooperation.
  - f. The program to increase the capacity of independent oil palm farmers as a form of empowerment of village communities in oil palm plantation villages.
2. The village government needs to prepare programs/activities to increase capacity and training on land management and sustainable smallholder oil palm farming practices, helping farmers gain access to better markets.
  3. The Village Head is a key actor in implementing collaboration and cooperation in the village so that the village needs a transformational leader for the success of village cooperation with other related stakeholders.
  4. The local government can play a role in the formation of regulations to realize sustainable smallholder oil palm plantations; the formation of village forums and public consultations to identify problems and find joint solutions; provide training in sustainable plantation techniques, land management, and field assistance; integrated supervision and evaluation; encourage villages to collaborate with related parties in the field of village development and village community empowerment.
  5. Increasing the role of the media in collaboration and cooperation related to sustainable smallholder oil palm plantations in terms of disseminating educational information, monitoring and transparency, facilitating dialogue and collaboration, and policy advocacy.
  6. This collaborative governance model can be implemented more widely in villages with other oil palm plantation potentials in Indonesia.

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