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INTERNATIONAL
CLIMATE
INITIATIVE

based on a decision of
the German Bundestag

Bengkarek Village

Towards Sustainable Peatland Village



#PahlawanGambut

Village Livelihood Characteristics

Access to Livelihood Capital



Human Resources

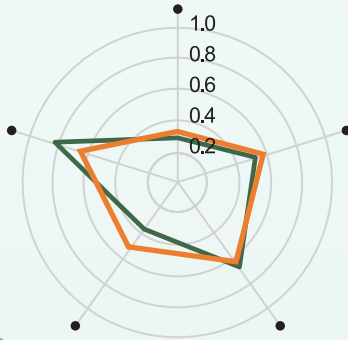
The village lacks active extension officers, resulting in limited access to agricultural information and a deficiency in extension activities and business training.



Social



The village has a well developed social institution system, shown from the activity of farmer groups, women's groups, and the village fire rescue team.

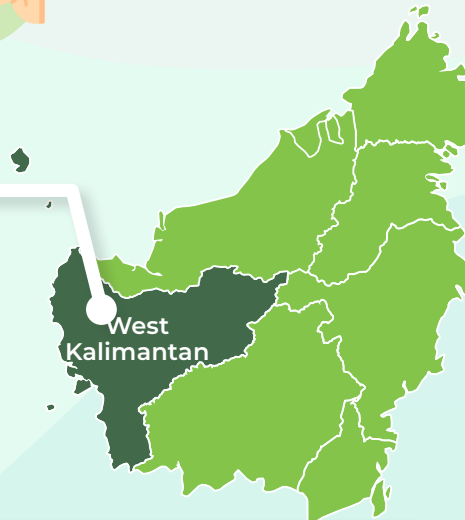
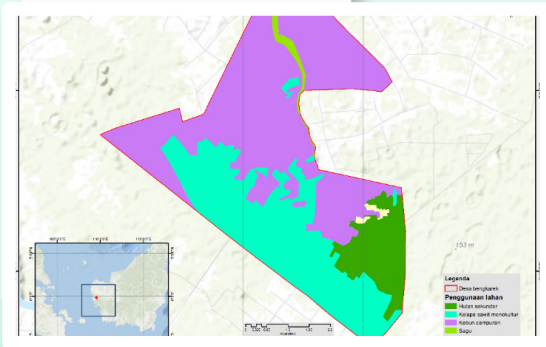


— Bengkarek
— Average index of 27 villages



Land Use Dynamics

Bengkarek Village



5 Land Covers

- Secondary forest
- Annual crops
- Oil palm monoculture
- Mixed farming
- Sago farming

Dominant Farming System

Oil palm monoculture

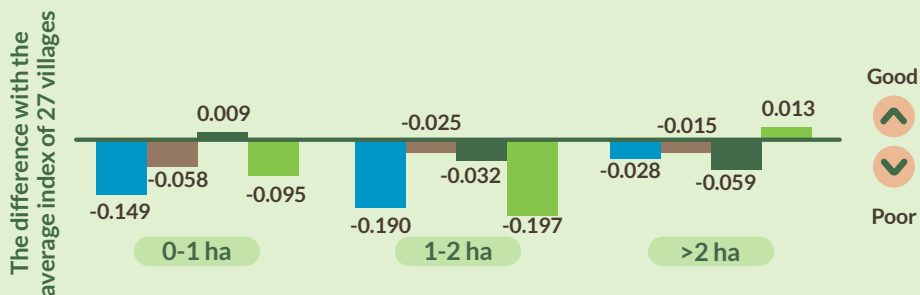
Covers 300-400 ha out of a total area of 11,600 ha.
The most widely practiced by the community.

Mixed rubber

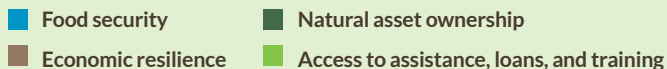
and Ginger Monoculture
Covers approximately 150 ha.

These 3 farming system
are the main sources of the community
livelihood, contributing up to 80% of
their income.

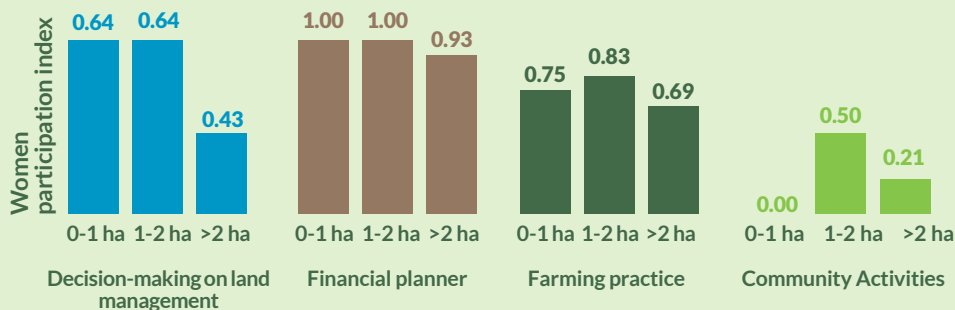
Livelihood Strategies and Outcomes



Household groups by land ownership



Comparison of household achievement levels between household group



Index of women's participation in household and community activities based on different household groups

Sustainable Livelihood Improvement Strategy

Aggressive Strategy (AS)

- AS1** Expanding both farming and non-farming businesses.
- AS2** Strengthening the institutional capacity of women's groups through continued assistance.
- AS3** Establishing cooperation between Farmers' Groups and Credit Unions (CU) to provide farming business capital
- AS4** Strengthening the capacity of the Fire Concerned Community Group (MPA) to mitigate land fires.

Turnaround Strategy (TS)

- TS1** Strengthening the capacity and roles of women's groups in farming business development, including post-harvest management and handicrafts.
- TS2** Improving capacity to obtain government and corporate assistance/programmes for agricultural inputs, firefighting equipment, road infrastructure repair, and zero-burning land management.
- TS3** Repairing road infrastructure to facilitate the distribution of agricultural products.

Opportunities

Strengths

- Dis1** Implementing agroforestry systems that produce diverse commodities.
- Dis2** Creating innovative food processing and handicrafts to strengthen women's role in non-farming businesses.
- Dis3** Creating innovative processing and promotion of post-harvest commodity products.

Diversification Strategy (Dis)

Weaknesses

- Des1** Replanting rubber plantations to reduce land-use changes.
- Des2** Developing partnerships and implementing zero-burning land management programmes.
- Des3** Increasing agricultural production using high-quality seedlings.
- Des4** Encouraging the Agriculture Office to invite Agricultural Extension Workers (PPL)

Defensive Strategy (Des)

Threats

Roadmap and Behavior Change Intervention

Options for Developing Farming Practices



Improving agroforestry cultivation by enriching fruit tree and annual crops species through technical training programmes from cultivation to post-harvest processing.



Increasing the productivity of rubber, ginger, and coffee by improving the quality of seedlings and fertilisers, enhancing pest and disease control, and providing other agricultural inputs through comprehensive assistance and training from cultivation to post-harvest processing.



Replanting old rubber plantations to prevent conversion to palm oil plantations by preparing land without burning, using technology, equipment assistance, and funding facilities.



Strengthening farmers' capacity in processing commodity derivative products.

Within 1-3 years with funding from Village Funds, grants, and Corporate Social Responsibility (CSR).

Options for market and value chain



Developing a rubber auction market requiring latex quality meets company standards.



Selling processed agricultural products such as ginger and coffee supported by product processing training.



Establishing partnerships with supermarkets to support or facilitate the marketing of farmers processed and packaged coffee and ginger products.

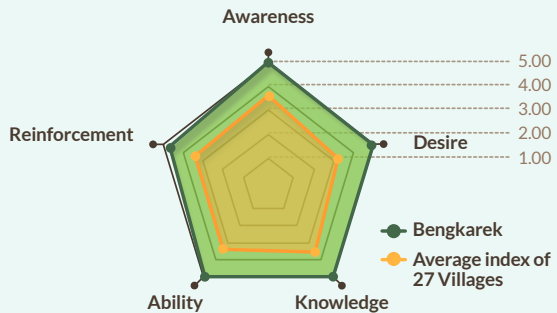


Improving village infrastructure to facilitate and minimise the cost of agricultural product shipments via waterway.

Within 3-5 years with funding from Village Funds, CSR, grants, and Regional Budget (APBD).

Values Above the Average Index of 27 Villages

It is important to prioritise training programmes on farming methods suitable for peatlands and provide enabling conditions, including funding, to enhance the community's ability to implement Good Agricultural Practices (GAP).



Star diagram illustrating community behaviour in Bengkarek Village towards sustainable peatland management.

Description of Farming System Improvement Options

Program options	Link to strategy	Actor	Women involvement	Time scale	Enabling factors	Fund source options
Improving agroforestry cultivation by enriching fruit tree and annual crops species through technical training programmes from cultivation to post-harvest processing.	Dis1 Dis3 AS1	Plantation and Livestock Office, Kubu Raya Forest Management Unit (KPH), Food Security and Agriculture Office	Engagement in land management processes, Processing of agricultural products.	3 years	<ul style="list-style-type: none"> • Research on land suitability. • Allocation of village land for agroforestry 	Village Fund, grants, and CSR
Increasing the productivity of rubber, ginger, and coffee by improving the quality of seedlings and fertilisers, enhancing pest and disease control, and providing other agricultural inputs through comprehensive assistance and training from cultivation to post-harvest processing.	Dis1 Des3 AS1	Food Security and Agriculture Office, Plantation and Livestock Office, Rubber processing companies, and Trade, Cooperatives, Small and Medium Enterprises Office (DKUKMPP)	Nursery, applying fertiliser, tapping, harvest, and post-harvest handling	1 year	<ul style="list-style-type: none"> • Continuous mentoring and assistance in post-harvest processing to farmer groups and women's groups 	Village Fund, grants, and CSR
Replanting old rubber plantations to prevent conversion to palm oil plantations by preparing land without burning, using technology, equipment assistance, and funding facilities.	Des1 Des2	Food Security and Agriculture Office, Plantation and Livestock Office, and Regional Disaster Management Office	N/A	3 years	<ul style="list-style-type: none"> • Collaboration with PPL in accompanying to revitalise and implement GAP • Provision of agricultural inputs 	Village Fund and grants
Strengthening farmers' capacity in processing commodity derivative products	TS1 AS1 Dis3	Women's Empowerment Office, Industry Office	Processing derivative products of coffee and ginger	1 year	<ul style="list-style-type: none"> • Identification of derivative product markets • Provision of production tools • Promotion training and product packaging design 	Village Fund and financial assistance

Description of Market and Value Chain Improvement

Program options	Link to strategy	Actor	Women involvement	Time scale	Enabling factors	Fund source options
Developing a rubber auction market requiring latex quality meets company standards.	SP1	DKUKMPP, Rubber processing companies	Rubber marketing	3 years	<ul style="list-style-type: none"> Obtaining permit from local government Formation of joint marketing groups 	Village Fund and Regional Budget
Selling processed agricultural products such as ginger and coffee supported by product processing training.	SP1 SP3 SA1	Plantation and Livestock Office and DKUKMPP	Processing ginger and coffee products	3 years	<ul style="list-style-type: none"> Market identification Capacity building and mentoring in product processing Provision of means of production 	Regional Budget and grants
Establishing partnerships with supermarkets to support or facilitate the marketing of farmers processed-packaged coffee and ginger products.	SP3	DKUKMPP and supermarkets	Product promotion and marketing	5 years	<ul style="list-style-type: none"> Facilitation by the local government to connect with companies 	Regional Budget and CSR
Improving village infrastructure to facilitate and minimise the cost of agricultural product shipments via waterway.	ST3 ST2	Public Works Office and Food Security and Agriculture Office	N/A	5 years	<ul style="list-style-type: none"> Infrastructure improvement to facilitate distribution and marketing of agricultural products 	Regional Budget, CSR, and Village Fund

About Peat-IMPACTS

Peat-IMPACTS Indonesia Programme (Improving Management of Peatlands and Capacities of Stakeholders in Indonesia)

Peat-IMPACTS is a program supported by the German Federal Government through the German Federal Environment Ministry –BMU-IKI. This activity will run for four years from 2020 to 2023. Peat -IMPACTS aims to support the realization and management of sustainable peat, through strengthening technical and institutional capacity as well as aligning roles between the public and private sectors.

Peat-IMPACTS activities in South Sumatra are also supported by the South Sumatra Watershed Forum and the Soil Research Institute, as part of the #PahlawanGambut effort in South Sumatra. #PahlawanGambut is a movement to gather knowledge, learning, understanding and various ideas related to sustainable peat management by activists, researchers, business actors, farmers and the younger generation in South Sumatra and West Kalimantan.

Methods and Process of Village Profile Development (Sustainable Peatland Roadmap)

Sustainable peatland roadmap is developed through the Assessment of Livelihood and Landscape to Increase Resilience (ALLIR). The objectives of ALLIR are listed below:

1. Characterize agricultural-based livelihood capital components (capital, access, strategy, and outcomes) of specific community groups under local context in peatland landscapes
2. Understand the process: (1) how capital and access can be modified; (2) decision making in choosing livelihood strategies in conditions of trends and shocks; and (3) how strategies shape livelihoods
3. Identify intervention options for specific community groups, community groups in general, landscapes and regions
4. Induce behavioural change from stakeholder groups to increase adoption and achieve desired outcomes of sustainable livelihood intervention options
5. Monitor and evaluate changes in outcomes and behaviour as a result of the intervention

The ALLIR framework consists of five livelihood capitals, livelihood strategies and towards livelihood outcomes. This process will support the achievement of healthy ecosystems and environmental services. The five livelihood capitals referred to are Human Resources (HR), Natural Resources (SDA), Financial, Physical (facilities), and Social.

The scope of the ALLIR study is agricultural-based livelihoods in peat areas, with a multi-disciplinary and multi-scale approach. ALLIR also carries out quantitative and qualitative analysis, through six integrated tools, namely: VILLAPOT, AFLIC, LUCBI, LISTRA, IBUSS and LIGOTS.

World Agroforestry (ICRAF) Indonesia Country Program

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