

Implementation of Kawasan Mandiri Pangan (KMP) Program in Border Area Indonesia, and Its Impact on Local Food Security

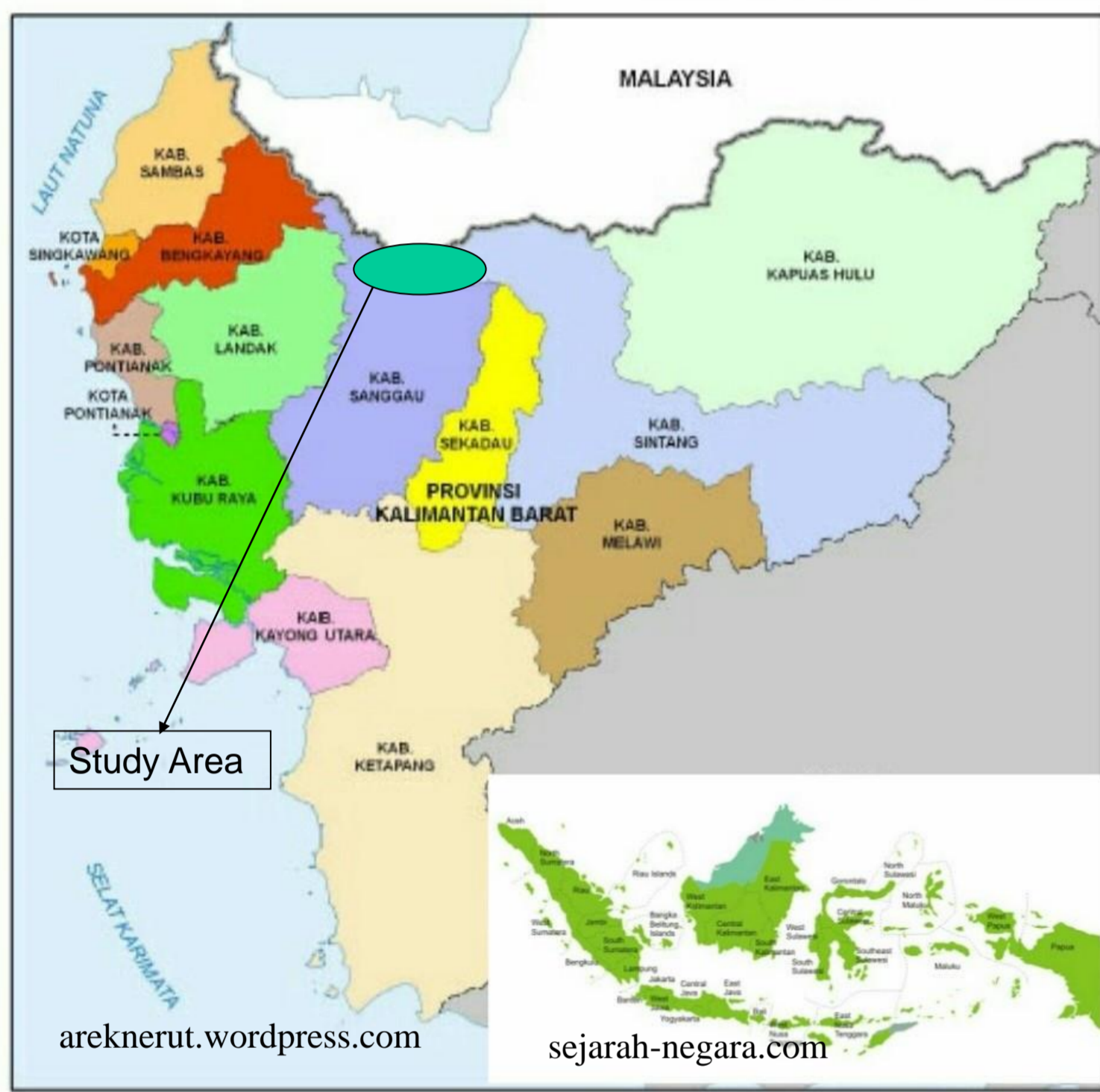
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Introduction

- ❖ More than 27 million families ran family farms (100 million family members) ², were 93% are small, and 1 in 5 of them trapped in poverty (FAO, 2018)³
- ❖ Indonesia Minister of Agriculture Regulation Number: 06/ Permentan/OT.140/1/2014 about *Desa Mandiri Pangan* (DMP) and *Kawasan Mandiri Pangan* (KMP) Guidelines 2014.
- ❖ How is the program impact on local food security? The primary aims are: 1) the implementation of the KMP program, 2) the impact of the program on farmers' decisions of production, marketing, and consumption, and 3) food security analysis on food availability, food accessibility, and food utilization.



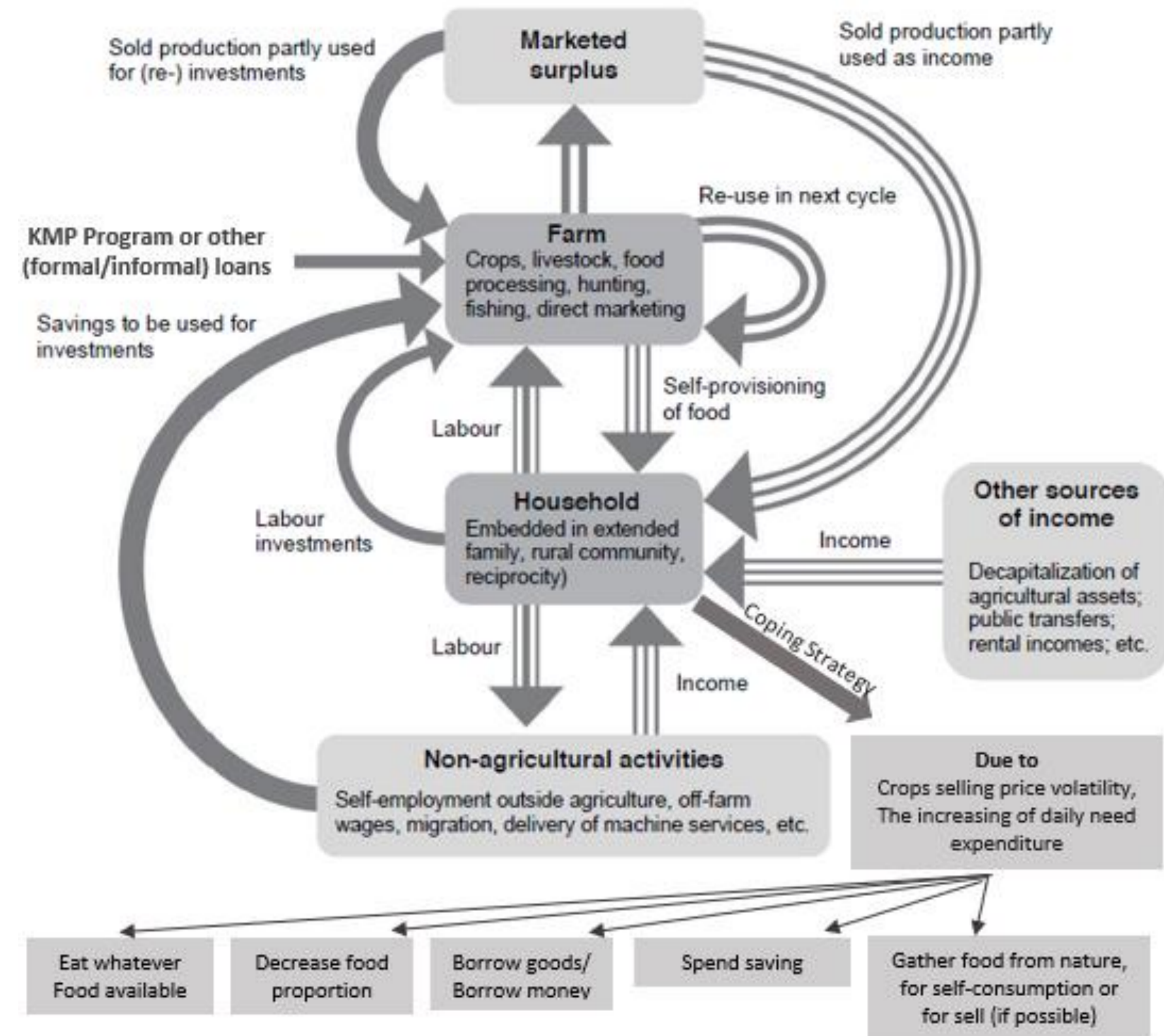
Methods

Qualitative approach: 34 informants, consist of 6 key informants, 15 participant farmers, 4 non-participant farmers and 9 informants for 3 focus group discussion (FGD).

Data collection technique: FGD and in-depth interview for the primary data, and assessment of documents as the secondary data.

Data analysis technique: food security analysis, HDDS⁴, Theory of Change⁵, data analysis by Neuman⁶

The study location is in Sekayam Sub-district, Sanggau District, West Kalimantan Province, Indonesia. It has an area of 841.01 km², with a total population of 34,488 inhabitants. There are 3 hamlets involved in the program.



Small family farms model in the research area (Adapted from HLPE in Grando *et al.*, 2020) ⁷

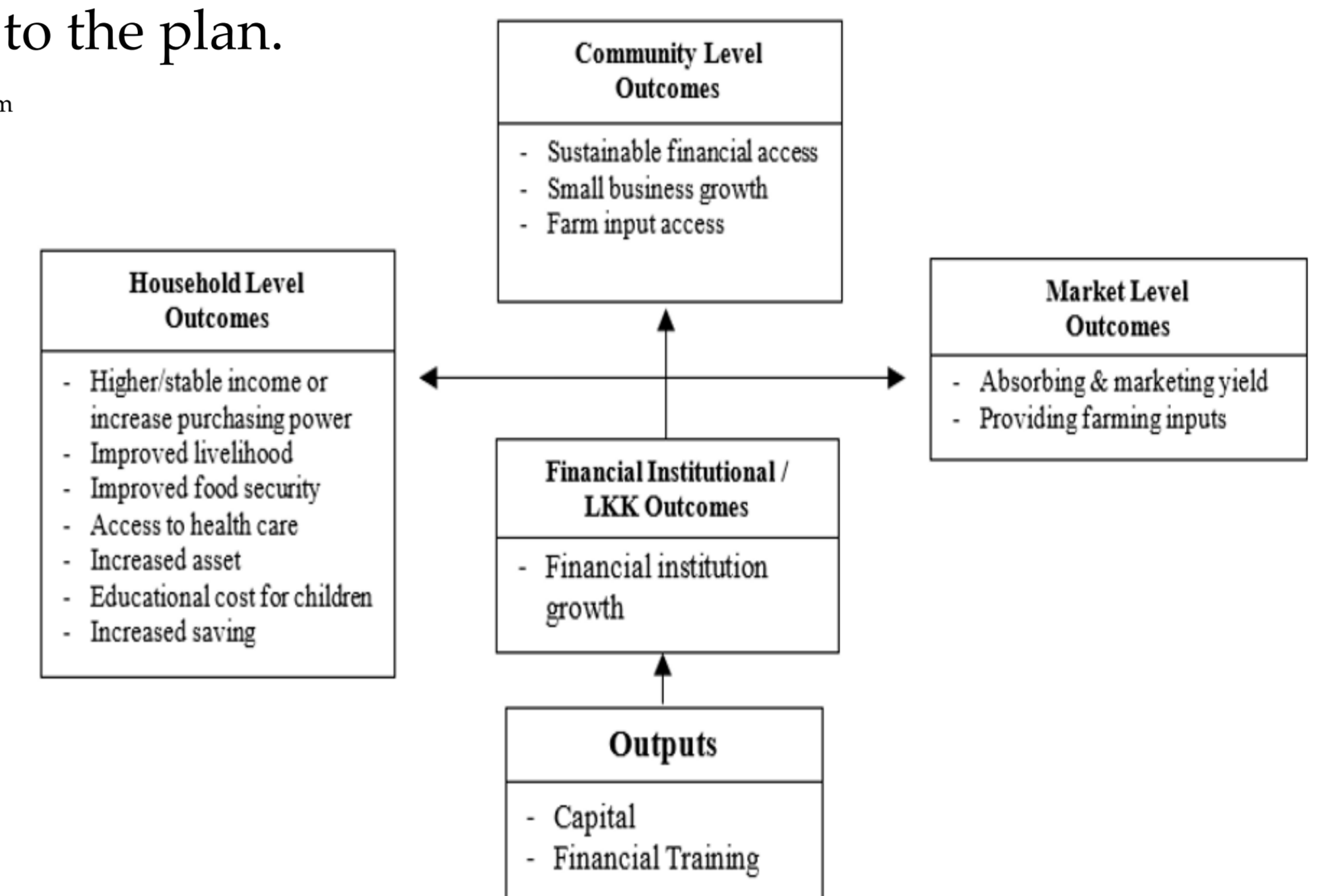
Results & Discussion

1. The implementation of the program

Two groups participating in the program:

Karir group (31 farmers in 2015) – seen in yield, failed to sustain the loan
Sumber Rejeki group (18 members applied the loan from 2015 to 2018) – Succeeded according to the plan.

Change dynamics drawn through KMP program



2. Did the microloan affect farmers' decisions of production, marketing, and consumption?

Decisions of production: local farmer characteristics and crops selling price at the moment, there is no intervention of specific crops commercialization.

Factors affected market decision: the best price, along with relation and commitment.

Consumption decision: local wisdom, not changing food consumption too much, but saved the money for future needs.

3. The impact of the program on food security level among small family farmers

Estimation of additional farming productivity (ton/year) after KMP

No	Community	Additional farming productivity (ton/year) after KMP				
		Rice	Vegetable	Banana	Oil palm	pepper
1	Ruis	1.5		8	80	1.6
	Consumed	90%		5%	-	-
2	Kenaman	12	7			0.2
	Consumed	90%	2%			-
3	Berungkat	10			131.5	2.2
	Consumed	80%			-	-
Total		23.5	7	8	211.5	4
	Consumed	86.66%	2%	5%	0%	0%

Food access increased: increased productivity and reasonable selling price of crops.
Reasonable selling price (2015-2017)
In Ruis 35% additional access to food,
In Kenaman 50% additional access to food,
In Berungkat 65% additional access to food.

They gained more access to food crops and received extra income from selling cash crops

Household dietary diversity score before and after KMP program

No	Community	HDDS			Note
		Before	2015-2017	After 2017	
1	Ruis	4	4	4 (non: 3)	< 4.5 = Low dietary diversity
2	Berungkat	4	5	4 (non: 5)	4.5-6.0 = Medium dietary diversity
3	Kenaman	4	5	5 (non: 4)	> 6.0 = High/ Good dietary diversity

Conclusion

Karir group with 3 sub-groups faced some obstacles, such as distance between hamlets, lack of control, lack of trust among groups, low management capability, and low commitment.

Sumber Rejeki group was successful, being only one group in one community, they knew and trusted each other, good capability of the management and good commitment of the members. The microloan program: not only to increase farming production, but also to meet many needs, such as education, healthcare, family saving, and assets. Thus, this program should be continued in future within only one group for one community.

There is no advance explanation in the program on how more income can enable farmers to purchase more nutritious food for consumption. Increased income motivated farmers to access many needs, hence, the government should use the food security measurement to assess food security at the household level among the participant farmers at the exit program.

In order to prevent price volatility of agricultural commodities, the government could provide a local-owned enterprise to buy their agricultural products, and sell farmer needs at the same time. This may be a viable solution to provide market for small family farmers

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