

Survival Strategies of Peanut Farmer's Households in Kanonang I and Kanonang II Villages in The Covid-19 Pandemic

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Abstract. This study seeks to provide an overview of the peanut farmer's strategy in dealing with this difficult situation during the COVID-19 pandemic. It is hoped that the research can provide an overview of the number of peanut farmers in Kanonang I and II Villages who rely on the management of peanut farming. The data obtained from the research results will be analyzed qualitatively, where the data obtained in the field, is processed and then presented in written form. In accordance with the results of the research and discussion above, some conclusions can be drawn as follows: (1) the cultivation of peanuts in the villages of Kanonang I and Kanoang II has so far been carried out well. The income from each farmer is quite good and profitable; (2) the strategy carried out by peanut farmers in Kanonang I and Kanonag II villages is to cultivate other plants besides peanuts. There are also farmers who apply the strategy by looking for additional income outside of their work as sharecroppers. Where they call it seasonal work which is done from time to time when there is no agricultural activity. This type of work is usually a traveling photographer utilizing the Bukit Kasih tourist attraction.

Keywords. Strategy, Farmers, Peanuts, Survival

1 Introduction

Human life cannot be separated from its environment, both in the environment and in the natural environment [1]. Complementary and interdependence are basic principles of human relations with each other and with their natural environment. Humans and the environment (nature) have a very close relationship, both giving and receiving great influence on each other. The influence of nature on humans is more passive, while the influence of humans on nature is more active.

Humans can exploit nature so as to be able to change it according to what it wants. Although nature does not have the desire and ability to actively-exploitably against humans, slowly but surely what happens to nature, directly or indirectly, will have an impact on human life. One that is managed by humans is farming, where humans need nature/soil as a container for farming.

The people in Kanonang I and II are community groups who in their daily lives also participate and are involved in farming. One type of plant being developed is peanut plant. Like other farmers, in managing their farms, Kawangkoan farmers also strive to make things economically profitable, where the costs incurred can produce maximum production. So that in the end the income of farmers will increase, and by increasing income, automatically the level of welfare of the farmers will increase as well [2].

In Minahasa Regency, Kawangkoan District is a center for peanut production, with a larger area and production than other sub-districts. In Kawangkoan District, Kanonang I and II villages are the villages that produce the largest peanut crop in Minahasa Regency. Peanut plants have a very important role for farmers in Kanonang I and II Villages. Peanut farming in this village has been carried out for a long time and for generations the aim is as the main source of income for farmers in the village. This is because the peanut plant is able to provide relatively higher income compared to the income obtained from other farming branches, because the selling price of raw and dry peanuts received by farmers is relatively high on average. Peanut farmers in Kanonang I and II villages mostly sell peanuts in a raw state rather than selling them dry, even though the farmers are satisfied with the income they receive [3].

However, the current condition is certainly experiencing various obstacles, due to the threat of the Covid-19 Pandemic. Thus, food security during a pandemic is very important as an indication of the availability of access to food sources in fulfilling daily life. In the current condition, the availability of access is slightly disrupted due to many factors. Among them are transportation and economic restrictions that will disrupt the food system that runs in Indonesia, mass layoffs or job losses that cause people's purchasing power to decline, so that the demand for food ingredients also declines due to social restrictions.

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As reported by the Food and Agriculture Organization (FAO), the Covid-19 pandemic has created a new food crisis that affects the food security of a country, especially poor and developing countries. In this case, Indonesia which can still be said to be a developing country will also be affected by the Covid-19 outbreak. In the Covid-19 pandemic which has lasted for almost a year, several business sectors, especially in the field of food crop agriculture, will eventually have a considerable impact on Indonesian agriculture. Whether it's a good impact or an impact that may be much worse.

According to the National Team for the Acceleration of Poverty Reduction or TNP2K, there are several main messages conveyed related to maintaining food security in the midst of the Covid-19 pandemic, namely:

- a. The Covid-19 pandemic not only has an impact on health but also has an impact on various aspects of social and economic life, including the agricultural sector.
- b. The price stability of basic food needs cannot be separated from the adequate supply. The availability of basic foodstuffs in a pandemic condition plays an important role. The government needs to ensure the availability of food in the midst of a pandemic.
- c. The stimulus for the agricultural sector is a necessity in order to maintain socio-economic resilience and accelerate economic recovery.
- d. The government can intervene in agricultural production inputs that have a relatively large contribution, namely fertilizers, superior seeds, and pesticides. Another possible intervention is to provide an unsecured loan program for farmers by empowering Village Owned Enterprises (BUMDes).
- e. The government needs to ensure that the agricultural sector stimulus program can run and implement a contract system for farmers to ensure priority cultivation can run in the next planting season, with the ability to buy agricultural products cultivated in the next harvest season.

In the TNP2K messages that have been conveyed, they generally talk about matters related to agriculture, namely prices, food availability, and the availability of inputs provided.

What is happening at this time of course also has a significant impact on the existence of this pandemic for rice farmers, especially in Kanonang I and I, namely there are difficulties in sending and selling peanuts. Meanwhile, the distribution and delivery of peanuts outside Kawangkoan also encountered various obstacles. Therefore, strengthening farmers and increasing the selling value of agricultural products, especially peanuts, need to be considered so that farmers can still produce and sell their products and people can buy and consume these products for their daily needs. With this limitation, there needs to be a production strategy that is supported by a marketing strategy, either direct marketing (raw products) or semi-finished products as well as online marketing so that the selling value of the product can increase.

The COVID-19 pandemic has had various effects on various sectors of the economy. Peanut farmers are no exception in Kanonang I and II villages. This study seeks to provide an overview of the peanut farmer's

strategy in dealing with this difficult situation during the COVID-19 pandemic.

The urgency or virtue of this research is to provide an overview of the number of peanut farmers in Kanonag I and II Villages who rely on peanut farming management. Knowing the impact of the COVID-19 pandemic on the peanut plant business and the strategies of peanut farmers in dealing with COVID-19. With the results of this research, it is hoped that it can be published in accredited national or international journals.

2 Research Methods

This research is descriptive research with a survey method. According to reference [4], the descriptive method is a method used to describe or analyze a research result but is not used to make broader conclusions. According to reference [5] in the survey research method said that survey research is "research that takes a sample from one population and uses a questionnaire as the main data collection tool."

2.1 Population and Sample

According to reference [4], "population is a generalization area consisting of objects/subjects that have certain qualities and characteristics determined by researchers to be studied and then drawn conclusions". According to [4], "the sample is part of the number and characteristics possessed by the population". So in conclusion, what is meant by population is all objects that will be research material. In this study, the population is all heads of families from two villages that grow peanuts.

2.2 Data Collection Techniques

Observation or Field Survey according to reference [6], explains that field observation or survey is a method and technique of collecting data by systematically observing and recording the symptoms or phenomena that exist in an object of research. This observation can be divided into two, namely direct observation and indirect observation.

In addition, according to reference [7] observation is "to make observations directly to the object of research to see closely the activities carried out". In this study, direct observation was carried out, which means the researcher took part with the object being operated on. In this case, the researcher observed directly how the condition of the research location was to determine the number of peanut farmers in Kanonag I and II Villages who depended on the management of peanut farming. Then find out how the impact of the COVID-19 pandemic on the peanut plant business. Next, to test the strategy of peanut farmers in dealing with covid-19.

2.3 Data Analysis Techniques

The data obtained from the research results will be analyzed qualitatively, where the data obtained in the

field, is processed and then presented in written form. Regarding qualitative data analysis, recommends the following stages in analyzing qualitative data:

1. Data reduction, i.e. filtering the data obtained in the field and then written into the form of a detailed description or report, the report is reduced, summarized, selected, focused on program assistance, and compiled more systematically, so that it is easy to understand.
2. Presentation of data, which is an attempt to show a set of data or information, to see the overall picture or a particular part of the research.
3. The conclusion is a process to answer problems and objectives so that suggestions and input are determined for problem-solving

3 Result and Discussion

West Kawangkoan District, is astronomically located at 110-480 North Latitude and 1240-1280 East Longitude. The average rainfall ranges from 3100 mm per year. It has a hilly and undulating topography. Geographically bordered by:

North Kawangkoan District	:	to the North West
Tompasso District	:	to the South West
Kawangkoan District and West Tompasso District	:	to the East
Tareran District	South	: to the West
Minahasa Regency		

West Kawangkoan District has an area of approximately 19.27 km² and consists of 10 villages, which consist of: (1) Kanonang I, II, IV, and V, Kayuwi village, Kayuwi I, Upper and Lower Tombasian, and Ranolambot village.

The potential possessed by the West Kawangkoan sub-district, among others, is in the form of producing food crops such as corn, peanuts, lowland rice, chilies, and tomatoes. In the plantation sector in the form of cloves and coconut. In the livestock sector, cattle, racehorses, chickens, pigs, and ducks are cultivated. In the inland fishery sector, tilapia and goldfish ponds are being worked on. In the industrial sector is the Minahasa knockdown business. While in the tourism sector, this sub-district has Bukit Kasih tourism objects and Kayuwi waterfalls.

Peanut cultivation in Kanonang I and Kanonang II villages is developing quite well. The peanut seeds used in Kanonang I and Kanonang II villages are local Minahasa varieties with two seeds/pods, which are well adapted to Alfisol dry land such as Kanonang I and Kanonang II. Where the soil conditions are slightly tolerant to drought, resistant to wilt disease, but somewhat sensitive to leaf disease. The average yield is 2.0 tons/ha. Harvest age 90-95 days. Related to this, based on the information obtained by the researcher from one of the informants, it is known that the condition of the Kanonang I and Kanonang II villages has sandy soil and mixed with clay, this is certainly more suitable for planting local seeds. Local peanuts that have

smooth skins can have seeds that are dense and tight so that they can give maximum results compared to hybrids whose fruit is usually not full and when it is moved, it makes a sound.

Agricultural production facilities are a necessity that is used in cultivation. This includes seeds, fertilizers, pesticides, and agricultural tools. Agricultural production facilities for the needs of peanut farmers in Kanonang I and II are generally purchased in the cities of Tomohon or Manado. In Kanonang I and Kanonang II, agricultural production facilities are relatively expensive. Only peanut seeds have a relatively cheap price. From the aspect of soil, weather, and climate, the cultivation of peanuts in Kanonang I and Kanonang II is very suitable because the condition of the soil is sand mixed with clay and loose/light textured and fertile soil. Minahasa Regency in general and Kanonang I and Kanonang II, in particular, have rainfall between 700-1500mm/year with an air temperature of 25 to 32% degrees Celsius. In addition, the soil in the Kanonang I and Kanonang II areas is a lot of sandy soil mixed with clay and wet loose soil. The humidity of the air itself is in the range of 60-75%. Then the sun irradiation in Kanonang I and Kanonang II is full every day. With 2 land clusters, namely the coast and the highlands. With this information, it is clear that Kanonang I and Kanonang II are very suitable for peanut cultivation. Related to this, based on the information obtained by the researchers that "soil conditions, weather and climate in Kanonang I and Kanonang II are very suitable for peanut cultivation. Stable temperature conditions, good soil, and of course good rainfall. In addition, water sources in Kanonang I and Kanonang II are also available. In addition, as usual in the Minahasa region, including the villages of Kanonang I and Kanonang II, the rainy season is shorter than the dry season, so pests and diseases usually appear during high humidity and high rainfall does not occur.

In addition, there is the availability of production facilities in peanut farming [8] which consists of agricultural tools, fertilizers, and pesticides, where agricultural tools to manage land and plants are used tools such as hoes, machetes, sickles, and tractors. A good and correct management system will get better results. Fertilizer is also very necessary for the growth of peanut plants because it will help the plant growth process, with the provision of fertilizer in accordance with the dose given will make the plants more fertile again. Pesticides are used to eradicate pests and diseases in peanut plants, by using excessive pesticides it will make the plant die, and peanut plant pests become resistant/resistant to their immune. The availability of all the above production facilities is one thing that should be appreciated in Kanonang I and Kanonang II villages. Starting from the availability of seeds, fertilizers, and agricultural equipment, everything is supplied by farmer shops and the government itself through the Minahasa agriculture office.

In the villages of Kanonang I and Kanonang II there are already several farmer groups, but these are relatively lacking when compared to some other areas [3]. This means that in Kanonang I and Kanonang II, there are still a few farmer groups that are used as

institutional forums for farmers to carry out their farming activities. This is because the local government has not fully supported the formation of peanut farmer groups. However, peanut farmers always receive government assistance directly or through extension workers. The local government prioritizes forming groups of rice, corn, and soybean farmers and developing the Bukit Kasih Tourism object. However, the existence of farmer groups is one of the hopes of peanut farmers in Kanonang I and Kanonang II. The existence of peanut farmer groups in Kanonang I and Kanonang II will make it easier for relevant agencies to provide assistance, provide guidance to farmers and get counseling that later peanut farmers will be able to increase the empowerment of farmers in managing farming in order to get better production results. One of the important aspects in peanut farming is business capital. Capital is the initial need of farmers in building a production. Farmers cannot produce a form of agricultural commodity if the capital used is not sufficient. The capital available to farmers is generally used to buy seeds that have a fairly high price. In addition, farmers use capital to provide fertilizer and agricultural tools needed in peanut cultivation. So far, farmers in Kanonang I and Kanonang II villages generally say that their capital is good enough compared to previous years, even though the Covid-19 pandemic is currently happening. However, most of the farmers still rely on capital in banks and cooperatives.

Furthermore, from the aspect of processing agricultural products [9] as a form of action to change raw or semi-finished goods into finished or semi-finished goods. Processing agricultural products is a form of approach in order to increase the benefits and usability of an item. In addition, the processing is sometimes used to improve the quality and income of a person. Processing of agricultural products is used in order to make food more useful. And also so that these types of agricultural products are more durable and delicious.

Processing of peanuts on a home industrial scale has long existed in Minahasa Regency. Likewise with the home industry that manages peanuts. From the results of interviews with researchers with informants of peanut processing business actors, the length of time the Home Industry has been operating has been more than 10 years and some have even been almost 20 years. The home industry of processing peanuts based on peanuts is almost evenly distributed in Kawangkoan District which is famous for the motto of the largest peanut producer in Minahasa and even North Sulawesi.

The socioeconomic conditions of peanut farmers [10] in Kanonang I and Kanonang II villages are relatively good. This is because, in addition to a fairly good level of education, most of them are farmers who produce agricultural products taking into account the level of need, so it can be illustrated that peanut farmers prefer how to choose the benefits obtained when peanut production is inadequate. There are two types of farmers who cultivate peanuts in Kawangkoan I and Kawangkoan II, namely farmers who own land and farmers who rent other people's land.

It is known that the farmer is a farmer who converts inputs into outputs that have high selling value. In farming management, every farmer needs sufficient skills and experience. This will affect the quality and quantity of output obtained by farmers. The component that has a major influence on the success of farming is the identity of the farmer which includes age, education level, farming experience, land area and land ownership of respondent farmers, and the number of family members of farmers [11]. All of these components are very influential on the progress of farmers in farming including the application of new technologies that have been suggested by the government, as well as the ability to develop farming [12].

Based on the data obtained, it is known that farmers who own their own land will usually plant other crops other than peanuts. Corn and tomatoes are planted with the intention that when harvesting peanuts, we get less yields, then we can cover it by selling crops such as corn and tomatoes and even rice. This means that the farmers who own the land themselves in the period of waiting for the peanut harvest, these farmers will use other lands for planting rice, corn, and tomatoes. Assuming that if there is a crop failure in the peanut business, then the farmer still has corn, tomatoes, or rice yields. Or there are farmers who own land and lease their land to other farmers to work on the land.

Meanwhile, for sharecroppers, usually the capital to cultivate agricultural land comes from the sharecroppers themselves or the owner farmers with the wages received by the sharecroppers in the form of profit sharing with the owner farmers [13]. So between owner farmers and sharecroppers, there is an agreement or interaction that forms a social relationship. In cultivating agricultural land, the farmers in Kanonang I and Kanonang II also employ several farm laborers to help them cultivate the land until harvest time, this is done because smallholders cannot do the work completely alone because it must feel heavy and take a long time. So that in working on their agricultural land, smallholders need help from other workers to lighten their work, so that the work done is easier and faster.

Based on the results of interviews with several informants, it is known that the number of workers needed by smallholders to cultivate the fields in Kanonang I and Kanonang II is between 4-8 sharecroppers. Meanwhile, for peanut plants, 3-5 farmers are needed. Of course, this condition requires a lot of labor so that the processing of rice fields and planting peanuts becomes faster. According to the informant, the number of workers employed is in accordance with the rice land or peanut plant land to be cultivated, where the larger the agricultural land, the more labor is needed.

The strategy of smallholders in Kanonang I and Kanonang II is to use leased land, it turns out that it is not only one land that is leased, but they will lease several lands. Cultivators in Kanonang I and Kanonang II will usually lease some land. The purpose of renting more than one land is so that they can grow more than 1 type of plant. For example, in this peanut plant business, usually these cultivators waiting for harvest time, usually the farmers also raise chickens, cows, or ducks.

This is also intended so that they can overcome the problem of peanut harvest failure.

4 Conclusion

In accordance with the results of the research and discussion above, some conclusions can be drawn as follows:

1. So far, the cultivation of peanuts in Kanonang I and Kanoang II villages has been well implemented. The income from each farmer is quite good and profitable.
2. The strategy used by peanut farmers in Kanonang I and Kanonag II villages is to cultivate other crops besides peanuts. There are also farmers who apply the strategy by looking for additional income outside of their work as sharecroppers. Where they call it seasonal work which is done from time to time when there is no agricultural activity. This type of work is usually a traveling photographer utilizing the Bukit Kasih tourist attraction.

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