



Analysis of the system of production, transformation and commercialization of coffee bean, case: Developing Women Association of Nueva Segovia Ocotal (Spanish initials AMDES)

Msc. Raquel Lopez Alonso and MSc. Francisca Membreño

Summary

The research was carried out with the families of the members of the association (AMDES), located in the city Ocotal, Nueva Segovia, in the town Dipilto, in the communities Dipilto Viejo, El volcán and La Laguna. The population of the research was 49 partners, 224 members in total; the size of the sample was a 30%. The objective was to explain the way that AMDES members have been redefining their forms of organization, productive objective and their methods to face the contextual situations. We analyzed the socio economic characteristics of the families, the composition of the family units, the size of the parcels, the agricultural and livestock production, and were used to analyze the descriptive statistical information and the analysis of content.

The results show that the partners do not participate in all stages of the productive chain; they have a weak organization, since they have no feeling of possession of the organization in the project of coffee.

AMDES has been supported by different financial organizations along its existence, but it has not been able to strengthen the women organization, and the execution of projects has not allowed them create sustainable

actions; the president of the organization accepts that they do not have a strategic planning that allow them be sustainable.

The association does not count on a strategy that encourages the partners to improve the sub system coffee; their vision is reduced to the commercialization in the community.

It is necessary to lead the production and to improve the quality according to the agro ecological potential where the small farms are located, principally when there is no farming diversity that permits to get other economic incomes.

It is necessary to start a process of training that permits them improve their knowledge in the management of crops, post crop management, and commercialization of coffee improving the coffee productive chain. The training to all levels on the organizational process is necessary in order to strengthen the organization.

It is necessary to improve the functions of the organizational structure, and it should be demanded by the general assembly of the association in order to improve.

Key words: coffee, production, commercialization, organization, association.



Introduction

Characterization of the researched zone

The research was carried out in the Women Association for the Development of Nueva Segovia AMDES. The association has 166 members. They join the organization looking for the credits for the production, transformation and commercialization of coffee.

The communities Dipilto Viejo, El Volcan and La Laguna are approximately 15 Km from Ocotol City. They have a subtropical-semi dry climate with two well defined seasons; rainy and dry seasons, it has a wavy and irregular topography.

The vegetation is abundant in pine trees, oak trees, pastures and bushes. This area was declared a natural reserve protected by laws, as the members of the association say; it was deforested 20 years ago, not completely. The forest has forest trees, banana plants, fruit trees, and the coffee is the major plantation (Coffea arabica), the prevailing varieties are Caturra and Borbón. This plantation have been renewed 3 to 5 years ago since.

Materials and methods

The Developing Women Association was selected for the research. The unit of analysis was the peasant economic unit through the study of the peasant family and its system of production.

The research was carried out in three stages: Exploratory, compiling of

qualitative and quantitative information and analysis of the obtained information.

First stage: Exploratory

This stage comprises visits to the association of women aiming to know the logic of work of the organization; number of members, compiling of secondary information and coordination of the activities in order to make the study. We decided to take a 30% of the members as a sample.

Second Stage: compiling of qualitative and quantitative information

We applied different tools: a questionnaire to all family leaders that showed the main tendencies of the peasant economy, above all the composition of family units, the size of parcels and the agricultural and livestock production.

The tendencies were deeply studied by a diachronic study through interviews to get information in the transformation and commercialization as part of the productive chain.

As a second instrument, the technique of open interview combined with transversal visits in order to obtain the qualitative information.

The third tool was to organize participation workshops, in which the members of the cooperative built the concept of productive chain, its importance, and through this understanding, the strength, opportunities, weaknesses, and threatening, of the organization within the productive chain.



Third Stage: analysis of the information of the different sources.

The analysis of the data of different sources, together with the secondary information was made. This allowed us visualize the different interrelations of productive systems in the farms, the transformation and commercialization of the association.

In this stage a first analysis was made, (statistical information of the surveys, interviews, and workshop) a preliminary document was written and presented to the members of the cooperative to be analyzed and discussed in order to elaborate the final report.

Results and discussion

The analysis of the peasant economic unit (PEU) starts in the family when considering, as Chayanov did (1974), that the peasant family is the prevailing factor of the organization of the entire unit where the decisions are taken.

Regarding the age of the family, 58% of the members are less than 20 years of age. There is no university educational level, and only 10% has secondary education, but the majority of them have primary school. The houses where the families live have the next characteristics: tile roof (44.9%) and (53.1%) zinc. Adobe walls predominate, 10.2% are block, and 4.1% are brick. The majority, 72.1 have ground floor, and 27.9 tilled floor. The majority of the houses are less than 30 square meters and 76% have access to running water. 55% have access to electricity, 94% have access to mass media, 37% have TV sets, and 67% to radio. 84% have latrines, and 96% have access to nearby schools. The material conditions

mentioned so far, allow us say that the majority of the peasant families that were studied in the community of Dipilto have houses with acceptable basic services in comparison to other rural areas that are poorer and that do not have access to basic services nor dignified houses.

Regarding the average number of members of the researched families and the size of houses, they present a high level of promiscuity, due to the fact that two or more members sleep in one room. 10% says that they have migrated to other countries during the last five years. The majority of the producers (72%) have less than one hectare of land, and 86% of them are landowners. Nevertheless 52% of them say they do not have documents and that received the properties by inheritance. 86% say they have small rudimentary tools and 35% pumps for fumigation. Very few producers have bovine cattle, oxen, oxcarts, nor tools to prepare the soil and assist the plantations.

The productive activities in the farms of the association are performed individually, and they are concentrated in the primary sector, led principally to the consumption and commercialization of coffee bean. 98% say they are coffee bean producers, but only 62% of them consider the coffee bean as their main source of incomes, the second activity is salaried work. Curiously, regarding the use of time, the first activity that the members of the family do is to study and to work in the house.

The process of transformation of the coffee bean in the organization is made in the peasant economic units, in a coffee processing plant where the



coffee flesh is removed. Later the coffee bean in husk is sent to the association, they say they do not process the coffee bean beyond threshing. They do not sell grinded coffee or any other transformation of the bean. They also say that some of the members do not know the quality of coffee bean they sell, they say it is the buyers who test the quality of the coffee according to the following features: aroma, drying, washing, and the altitude of the farm.

Analysis of the chain vs. the organization

According to Gibson (1989). “In the context of the theory of systems, the organization is considered as one of several elements that interact in mutual dependence. The flow of reinvestments and products is the basic starting point to describe the organization”. The productive chain as part of the system of production that AMDES enhances, through the COFFEE BEAN PROJECT in Dipilto, initiates with the decision taking by the board of directors, the partners are suppliers of raw material as a first linkage of the productive chain. Even though they have little knowledge on the process, they guaranty, in one way or another, the coffee bean that passes to a second linkage. It starts with the process of the coffee in husk that later goes to the industry to be toasted and grinded, after this process it is packed, with the logotype of the association on.

The third linkage is made through the commercialization of pre industrial coffee bean and the industrialized one; the industrialized coffee is destined to the national and international market, Spain and the USA and to secure

markets through contracts made by the organization.

If we analyze the first linkage, production of raw material in the productive units the association has very little influence for their members, only Arabic coffee is produced in two varieties: Caturra and Borbon, with little or no management, the yielding is relatively low (6 quintals per hectare). The interviewed people consider this is a result of the low prices of the coffee in the market during the last years; there fore they do not have the economic resources to farm the coffee. The majority of the members removes the coffee flesh and washes the grain in their farms; this activity determines the quality of the product, for example the uniformity of the size of the grain or its ripeness, the fermentation and the drying. There fore, many times the product of the members does not reach the uniform standards of quality.

After obtaining the coffee bean in husk in the farms, the members send it to the association; they take it to a thresher, where it is classified and packed to be sold through the association, and the members receive the money once AMDES has commercialized the product. The price of the coffee is established according to the price in the stock market of New York, once the coffee is sold, the cost of the threshing is subtracted and the rest of the money is given to the members, in the cases when the members have not sold the production in advance.

In the transformation stage AMDES has a coffee toaster machine that was donated by AID, to give additional value to the product. This project is about one year and is not working in its full



capacity, and the members of the association do not know the production capacity of the toaster machine.

The low prices during the last years have provoked a decrease of interest to invest in this activity, and there is a decrease of quality and production in the near future.

Conclusions

AMDES is an association that was born as a result of the needs of a group of women who look for an economic alternative, trying to survive and improve their living conditions.

Women participate in the projects in a passive way because they are not aware of their duties as members of the association, and this has not allowed the project be totally successful.

Though the research we could visualize that the coffee bean project has not been designed aiming the women to be able to become owners of the organizational process and that they participate in the whole process of the productive chain, but as suppliers of raw material. Another of the reasons is that the board of directors of AMDES is not able enough to create capacities in its members so that they have access to the decision taking during the transformation and commercialization.

The above said has to do with the non efficient flow of information to the members about the actions of the association and its problematic.

The participation of women in all the stages of the process is weak. The absence and/or lack of access to adequate financial sources, causes

severe loss of additional values to the production of the members.

The partners participate in the first linkage as suppliers of raw material, the second and third linkage that has to do with the transformation and commercialization do not participate because it is designed to be managed by the administrative staff.

AMDES does not have norms of quality in the productive chain.

Even though AMDES has been supported by financial organizations, it actually has economical problems and it is not self sustainable due to different problems detailed as part of its history.

The lack of training by the association does not allow the women to have a good knowledge on the marketing laws. The lack of experience in commercialization is a problem, since their vision is reduced to the sale of the product in the community.

Recommendations

The production of coffee is a small and traditional agro industrial system, which the association should take better care of, and they should improve the quality according to the agro ecological potential where the small farms are located, principally when there is no farming diversity.

A good strategy searching a sustainable farming of coffee should be defined; they should diversify the small farms so they can produce other economic incomes through other products in addition to those generated by the coffee production.



**ASOCIACIÓN PARA LA INVESTIGACIÓN DEL
DESARROLLO SOSTENIBLE DE LAS SEGOVIAS
ADESO "Las Segovias"**

Nº RUC: 041295-9574
Nº Perpetuo: 616

Telefax: 0-7133550
Apto. 60 – Estelí

It is necessary to make a systematization of the association actions in order to define strategies of attention, and this way to give a better attention to their members.

The association has to start a process of training for their members, so they can improve their knowledge and become owners of the project and the organization. It is necessary to improve the functions of the organizational structures.

They have to create a small laboratory or to train one of the associate members as coffee tester who provides the characteristics and quality of the final product to the organized group.

The technical staff should be trained on the process of coffee flesh removal, so that they assist this process when the technical assistance is supplied and this way to improve the quality of the production.

They should have programs of consciousness and environment control, in order to avoid the damage that they are causing to the river Dipilto, which supplies water to the city of Ocotal. These problems should be avoided enhancing technologies for the management of coffee flesh and the hydromel that is poured to the water sources.

The inefficient organization should be counteracted in order to be able to commercialize major amounts of coffee and there fore obtain better prices; they might even become in a certain moment coffee bean exporters, this organization is the starting point for the coffee bean project, since we have proved the prevailing lack of organization in the sector. The new

conditions of economic opening undoubtedly favor the process of organization, since the members are realizing that if they continue to work in isolation, it will be very difficult to survive.

Bibliography

Boucher, F y Muchnick. 1995. Agroindustria Rural. Instituto Interamericano de Cooperación para la Agricultura (IICA), Centro Internacional de Investigaciones para el Desarrollo (CID), San José Costa Rica. 504p.

Chayanov. A. La organización de la unidad Económica Campesina: "Introducción en Economía Campesina". Centro de Estudios y Promoción de Desarrollo (DESCO), Lima. 1979pp 107-135.

Falguni guharay, et (all) "manejo de plagas del cultivo del café". CATIE, 2000. 272pp

Gibson. I. "Organizaciones, Conducta, Estructura y Proceso" México. 1990.

Membreño, Francisca. "Proceso Organizativo de la Microempresa PLAMCYTT, Productora Campesina de Plantas Medicinales". Tlaxcala, México. Tesis de Maestría. 2002.

Unión nicaragüense de cafetaleros, UNICAFE "Manual de Caficultora de Nicaragua", Managua Nicaragua 1996.