

COOPERATIVE MODELS OF DOING BUSINESS AND THEIR ROLE IN FARMING COMMUNITY DEVELOPMENT

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ABSTRACT

A collective business model with a specific character, distinguishing it from personal and capital companies is the cooperative. The cooperative model has been refined over the years and has become one of the widespread models for managing factors of production and providing services to its members in almost all economic sectors and countries around the world. A cooperative is a voluntary association of natural persons who, through mutual assistance and cooperation under equal responsibility and rights, transfer part of their functions to a common enterprise. Co-operation has proven to be a successful business model for building joint production facilities for processing the primary plant and animal products of farmers, thus creating additional income for them. Based on the broad scope of the subject, I limit the purpose of development to highlight the advantages of the cooperative model for doing business in association (unification) of farmers on the example of several European countries. A main conclusion of the study is that cooperatives play a crucial role in the prosperity and socio-economic development of the farming community they serve and the rural areas in which they are located.

Key words: cooperative, model, farm, development, advantages.

INTRODUCTION

The cooperative is a collective/social model for a legal business, which has its own specific features, which are not inherent in personal (general and limited partnerships) and capital companies (LLC, AD). A model that has been perfected over the years and today occupies an essential place in modern business relations. The cooperative has been established as one of the most widespread collective models for managing factors of production and providing services to its members in almost all economic sectors.

There are many definitions given for the cooperative, both by Bulgarian and foreign researchers over the years (Pashev, 1936; Kanev, 1943; Palazov, 1946; Kanchev, 2000; Kanchev and Doichinova, 2006; Yovkova, 2007; Aleksandrov, 2007; Boevski, 1997, 2016, 2020; Kaufman, 1907; Sombart, 1919; Baranowski, 1921; Draheim, 1952; Bottcher,

1980; Aschoff, 1995; Wilson, 2017; etc. (11, 7, 8, 9, 6, 14-16, 13, 17)), as well as from the legislation of a number of countries where it is defined as a social model for doing business.

It is generally understood that a cooperative is a voluntary association of individuals who, through mutual assistance and cooperation under equal responsibility and rights, transfer part of their functions to a common enterprise. Unlike personal and capital companies, its main purpose is to support member-cooperators and satisfy their needs, not profit. Because of this feature, Casselman and Schaarz, 1980 call it an "economic system with social content."(12)

On the occasion of the International Year of Cooperatives (2012), the European Economic and Social Committee assesses the role of cooperatives as follows: "...they manage change in an economically efficient and socially responsible way, contribute to social and territorial cohesion and create innovative business models, to increase their competitiveness."(5)

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Based on the above, as well as taking into account the wide scope of the researched topic, I limit the purpose of the current development to highlighting the advantages of the cooperative model for doing business when associating farmers on the example of several European countries.

ADVANTAGES OF COOPERATING FAMILY FARMS

The cooperative business model (cooperative) in the agricultural sector is one of the examples that, through its specific legal form and its management, creates prerequisites for uniting farmers in the supply of raw materials and materials for production, for the purchase and processing of agricultural products, for the application of the principles of the circular economy and contributes to the revitalization of rural areas.

The advantages that cooperative membership provides over the development of family farms without such membership can be explained by the immanent nature of this model, where:

- Each farmer can become a member or leave the cooperative at his own will. Voluntary membership in it is a personal choice of the farmer, which does not limit his freedom to manage his own farm and make decisions about its development.
- The farmer-members of the cooperative build a joint cooperative enterprise with common ownership outside the boundaries of their farms. The profits from the enterprise's activity are used for its development and for the creation of a reserve fund, a part of which is indivisible. This is a specific characteristic of the cooperative, which was introduced by Friedrich Raiffeisen - expressing the social essence of the cooperative.
- The management of the cooperative enterprise is carried out by a supreme body the General Assembly of cooperative farmers. In it, every farmer has the right to one vote in making management decisions, despite the differences in the size of the activity carried out and the share owned. The cooperative is managed democratically and does not harm the interests of its members.
- There is autonomy in carrying out the economic activity of the cooperative. The general assembly of cooperative farmers delegates the right to the managers of the

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- In the cooperative enterprise, the members/farmers are only responsible for the money they put into it. They are not responsible for debts or other obligations of the cooperative. Even if the cooperative goes bankrupt, its members will only lose what they have already invested in it. They will not bear responsibility related to the payment of the obligations of the cooperative.
- Each member-cooperator (farmer) has the right to education and information a characteristic that is not inherent in personal and capital companies. It has a social orientation, providing opportunities to increase the knowledge and skills of the farmer and his relatives.
- The cooperative supports its members to build and develop larger structures of economic activity - branch, regional, national and international unions, which lead to an increase in the benefits for the farmer members.

The a priori listed main advantages resulting from generally accepted principles in the construction and development of cooperatives highlight their social nature. This social business model is immanently not inherent to any of the other business models - capital and personal. (2) A posteriori, this statement is confirmed by the studied three examples of association of family farms in selected European countries.

COOPERATIVE BUSINESS MODELS UNITING FAMILY FARMS

TheCooperativemodel"Avebe"(Netherlands), (18, 19):

"Avebe" Cooperative is an association of family farms producing potatoes, founded in 1919 in the Netherlands, under the motto "Together we can do it". The main purpose of its creation is to strengthen the position of farmers in the market and to counteract the processors who harm the producers. It started as a marketing cooperative, but developed and expanded, and gradually covered the entire business process from the producer to the customer. In 1979, the cooperative took over the manufacturing industry and now covers all value streams with approximately 2,300 members and 1,300 employees, with production facilities in North West Europe and a global sales organization. Through significant investments, the cooperative implements innovative products from the processing of potatoes, obtaining potato starch, proteins for human and animal food, etc. Therefore, that in 2023 it already offers non-traditional plant-based products such as yogurt, cream cheese, potato proteins for plant-based meat.

The advantages of cooperating are manifested in several directions:

- *Increasing economic benefits for potato producers.* Following the suspension in 2021 of the EU's CAP support for potatoes, the cooperative, through the applied management approaches to support farmers, manages to pay the highest price for the raw material. The realized benefit from potato starch and potato proteins is due to the farsighted management policy of the cooperative.
- Sustainable agronomy is implemented. The collaboration allows Avebe to build its own Agronomy Department. The results of his work guarantee farmers higher average yields of potatoes, which amount to 280 € more per hectare with a reduction of 1 hour of labor of the farmer per day. Higher yielding varieties are grown using fewer resources while increasing potato starch vield per hectare. The "Optimeel" program was developed and implemented in the "Avebe" cooperative and allows farmers not only to improve their own results, but also to contribute to its development. The program is part of the so-called "3×10 of Avebe", expressed in: 10% higher yield of starch and protein per hectare; 10% less carbon emissions and 10% less negative impact on the environment.
- Sustainable biomass flow. Avebe is also trying to face the main challenges of ensuring sustainable potato production and reducing greenhouse gas emissions. A sustainable flow of biomass cannot be ensured without breeding new varieties and providing healthy seed material. As a result, the starch content of Avebe cooperative varieties is doubled compared to other potato varieties. Improved disease resistance leads to reduced use of pesticides.
- *Innovation Center*. In 2018, Avebe opened an Innovation Center at the Zernike campus

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in Groningen. About its role and its importance for the cooperative and the farmers, J. ten Bolscher (its director) says: "Innovation happens together, both in the cooperative and along the supply chain, from the soil to the customer - from the farmer to the final product with the support of our partners." The Center has laboratories, test facilities, start-up companies in the field of the food industry, etc. The location of the center was not chosen by chance. It is in direct collaboration with research teams from the University of Groningen, the Hanseatic University of Applied Sciences and the Institute for Sustainable Process Technology in Amersfoort, the Netherlands. (22-24) Scientific research and development activity of cooperative "Avebe" is carried out by nearly 130 people (10% of the total staff). Their work is focused on innovation in potato production, developing new products that benefit farmers and consumers.

• Cooperative Strategy for Decarburization. The production lines used by the cooperative are a source of 360 thousand tons/year carbon emissions (equivalent to pollution caused by 120 thousand cars). In this regard, from 2012 to the present stage, the cooperative has been making efforts to overcome the problem through investments in energy efficiency and new technologies, which reduce carbon emissions by 25% per ton of final product. In 2021, the cooperative opens its Solar Park Hollandia Nieuw-Buinen - one of the largest in Europe.

On the occasion of the centenary history of the cooperative, its member-farmers define their development as follows: "After a century of working together, the best that can be extracted from the potato, we have obtained it, that is why we have been awarded a Royal Award, and we can call ourselves Royal Avebe."

The Cooperative model "Cooperfrutas" (Portugal), (20):

"Cooperfrutas" was founded in 1989 in the western part of Portugal, in Maçã de Alcobaça. It arose from the idea of several farmers who wanted to join together to build a common equipped enterprise for the processing of the produced fruits, to improve their quality, as well as to realize them according to the requirements of modern distribution. At the beginning of 2023, 95 farmers, producers of apples, pears, plums and peaches of various varieties, united under the motto "Fruit is our passion" are members of the cooperative. The construction and development of the cooperative helps farmers achieve four main goals: production and processing of quality products; resource efficiency; implementation of innovations and partnerships for product promotion.

Now the raw fruits are processed into fruit puree in the cooperatives established joint production facilities. Waste from fruit processing is used to produce bio-compost, which is used in farmers' orchards. The cooperative produces a quality final product that is sold on the market. Cooperfrutas currently exports its fruit purees to 15 countries (Brazil, Germany, Ireland, England, France, Spain, Middle East, Netherlands, Belgium, Morocco, Poland, Russia, Romania, etc.). Over the years, not only additional income is created for the farmers but also their costs are reduced. At the same time, through the mediation of the cooperative, the processed fruit from the farmers also reaches two large chains in the Portuguese market. Farmer association thus helps to build and operate new value streams. "Cooperfrutas" today is a circular business model that is impossible to realize at the level of an individual farmer.

The pursuit of energy efficiency in fruit processing forces the cooperative to build a photovoltaic system with a capacity fully satisfying the needs of the entire production process. Energy from renewable energy sources allows the cooperative to reduce carbon dioxide emissions by about 85 tons.

The Cooperative model "PINDOS" (Greece), (21):

In 1958, seven farmers from the prefecture of Ioannina, southwest of Thessaloniki, Greece decided to diversify their activities by raising poultry as an additional income. This is how the "APSI PINDOS" cooperative was started.

During the 65-year development of the cooperative, many things have changed. What remains constant are the vision, principles and values of the founders of "APSI PINDOS". From 7 founders of the cooperative at the beginning, it now has over 500 farmers as members. Initially, it employed 2 employees, and currently there are more than 1200. From the production of 5 thousand chickens per week, now their number has increased 170 times and

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reached 850 thousand. By the end of 2021, the cooperative provides 30% of chicken meat production in Greece. In 2020, the turnover of the cooperative amounted to 265 million euros, and in 2021, it exceeded 286 million euros, which ranks it in the top ten in terms of turnover among the largest food industries in Greece.

The poultry cooperative is managed by a 15member Board of Directors with a mandate of 4 years, elected by the General Assembly of members/farmers and a 3-member Supervisory Board.

"PINDOS" cooperative today is a vertically integrated business that includes poultry farms, a slaughterhouse, a hatchery and a mill wholly owned by the cooperative. The cooperative's products are sold in Athens, Central Greece and the Peloponnese. A fleet of more than 60 trucks with refrigerators was built for their transportation.

Poultry farms of "PINDOS" cooperative are equipped with the most modern technological facilities. The established internal order allows full control of each building. They meet EU standards for this sector. Their activity is specialized in four categories:

- *Parent farms* fully automated, from selected flocks of birds, providing annual production of more than 60 million eggs with very high hatchability;
- *Fattening farms* that are established in mountainous areas with an altitude of more than 700 m, thus producing chickens with a special taste of meat. Annual production in these farms reaches almost 22 million fattened birds;
- *Free-range poultry farms*. They are located throughout the prefecture of Ioannina. The birds are fed only certified corn-rich feed and their diet is supplemented by grazing. This gives the meat a bright yellow color and a unique authentic taste;
- *Organic farms*. They breed organic chickens in a traditional way with a fattening period of around 81 days. The birds are fed with certified organic food, and during the day, they go out to graze.

"PINDOS" veterinarians check the health of the birds on all farms daily, and the agronomists are responsible for the origin and quality of the feed. The ISO 22000 and AGROCERT (100% plant-based nutrition) certification is proof of the high quality of "PINDOS" products.

The cooperative also develops development activities in cooperation with the University of Ioannina and with foreign companies with the aim of improving production technologies in poultry farming and increasing the quality of the products offered on the market. It has a modern microbiological laboratory, where daily microbiological and chemical tests of the raw materials and the final product are carried out.

CONCLUSION

From the studied three examples of cooperative models for unifying family farms, several important conclusions can be made:

- Cooperatives play a crucial role in the prosperity and socio-economic development of the farming community they serve and the rural areas in which they are located.
- Co-operation has proven to be a successful business model for building joint production facilities for processing the primary plant and animal products of farmers, thus creating additional income for them.
- Farmer cooperatives can function as a circular business model that is impossible to implement at the individual farmer level.
- Innovation in farming communities can be successfully implemented when working collaboratively, along the chain from land to end user (from farmer to finished product) in partnership with research institutions (universities and institutes).
- Farmer cooperatives can help reduce carbon emissions and protect the environment for future generations.

In conclusion, the studied cooperative models for unifying farmers can be a good example for protecting their interests and increasing their social status, for implementing innovations in guaranteeing security and reducing their vulnerability, in limiting the individual risk of each producer and replacing it with the collective risk of the cooperative enterprise.

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