

Expanded abstract

Determinants of Agricultural Producers' Integration into Agri-food Cooperatives: The Case of the Region of Murcia

This study examines the factors that determine the decision of agricultural producers in the Region of Murcia to integrate into agri-food cooperatives, a relevant issue given the social and economic contributions of these organizations. Agri-food cooperatives play a crucial role in rural areas, not only due to their capacity to generate employment and improve the competitiveness of members' agricultural enterprises, but also due to their contribution to sustainable development and social cohesion. These cooperatives help mitigate market challenges for producers by offering advantages like improved product marketing, access to input, and advisory services. This model is key in the Region of Murcia, where the cooperative sector represents an important economic driver, significantly impacting agricultural production and commercialization.

In Murcia, agri-food cooperatives have shown a notable impact, especially in the fruit and vegetable subsector, the primary activity of cooperatives in this region. Nationally, Spanish cooperatives generated over 43 billion euros in revenue in 2022. In Murcia, these organizations bring together over 15,000 members, generate approximately 1.5 billion euros annually, and account for 57% of regional agricultural production. The sector's importance also lies in its ability to provide stable employment, with an average of 65 workers per cooperative, surpassing the national average.

The study aims to understand why certain producers decide to become members of these cooperatives while others remain outside. The findings could contribute to more effective strategies to attract new members and consolidate existing ones. For this purpose, an empirical analysis was conducted based on data from a survey of 225 agricultural producers in Murcia, of whom 123 were cooperative members and 102 were not. The methodology includes estimating a Probit regression model, analyzing the likelihood of cooperative membership based on observable characteristics of the producer and their operation.

The study's theoretical framework identifies several variables the literature has highlighted as influential in farmers' decisions to join cooperatives. These variables fall into three main categories: sociodemographic characteristics of producers, characteristics of operations, and behavioral factors. Among sociodemographic characteristics, variables like age, education level, gender, and experience are most relevant in literature. Some studies suggest that age may be positively associated with cooperative membership, partly due to the lack of generational turnover in the agricultural sector. However, age's impact on cooperative participation is not uniform and varies by context. Education level is also relevant, with some authors suggesting it positively influences cooperative membership, though others have not found a significant relationship.

Similarly, studies indicate that women are less likely to join cooperatives due to cultural barriers and additional responsibilities, like household care. Another key factor analyzed in this study is risk aversion. Cooperatives can act as a safety net for agricultural producers, protecting them against market volatility and other sectoral risks. However, some authors argue that risk aversion may also reduce cooperative membership, as these organizations often encourage riskier, profitable activities, potentially discouraging cautious producers.

The characteristics of operations also play a role in the decision to join a cooperative. Factors like farm size and the percentage of family income derived from agricultural activities are key determinants. Some studies suggest that small producers have a greater propensity to join cooperatives, as they offer them a competitive edge over large producers. However, there are also studies suggesting the opposite: that larger producers are more likely to participate due to their greater economic dependence on the farm and need for stable income management.

The study's results confirm that certain factors significantly affect the likelihood of membership in a cooperative in Murcia. In particular, the Probit analysis reveals that higher economic dependence of the household on agriculture and a preference for long-term commercial relationships increase cooperative membership. These findings align with previous studies show that producers who rely economically on agriculture view cooperatives as a stability source amid market fluctuations.

Another finding is the influence of the type of product on membership likelihood. Producers specialized in olive oil and dairy products are more likely to join cooperatives, while those marketing livestock show a lower likelihood of membership. This result may be due to differences in value chains and the market opportunities available for each product type. Agri-food cooperatives offer greater benefits in terms of marketing and cost reduction to producers of certain products, thus encouraging their participation.

Conversely, alternative marketing options and higher risk aversion reduce cooperative membership likelihood. The presence of other marketing options, like auction houses and agri-food industries, allows producers to choose the alternative that best meets their needs, limiting cooperative membership. Regarding risk aversion, the results suggest that more risk-averse producers are less likely to join cooperatives, which may be due to the challenges and commitments that membership entails.

This study has significant implications for cooperative managers, sector organizations, and public administration. By providing a detailed profile of agricultural producers in Murcia, the results facilitate more effective strategies to attract new members and strengthen the integration of current ones, adapting better to market realities and producers' specific characteristics. Furthermore, the findings highlight the importance of considering both economic and behavioral factors in strategy design and the role of farm characteristics in the membership decision.

Finally, the study acknowledges some limitations, such as sample size and the lack of qualitative variables that explore producers' perceptions and beliefs, which could offer a deeper understanding of motivations and barriers in membership decisions. These limitations open opportunities for future research to explore these aspects in greater detail and to conduct comparative studies in other regional or international contexts. Such studies could help identify general patterns and specific characteristics of the cooperative sector in different environments, enriching knowledge on the factors driving cooperative integration in the agri-food sector.