

Do concentration processes lead to the abuse of market power? Evidence from vertical price transmission in the Polish agri-food chain

The agri-food sector produces goods that satisfy fundamental human needs and is one of the basic sectors of national economies. For years it **has been undergoing transformations caused by the processes of globalization, climate change or shifts in macroeconomic conditions**. It is well illustrated in relation to Poland. Over the last 30 years the importance of agriculture has decreased, while the level of concentration in the food industry and retail trade has increased. An expansion of retail chains has been observed and the role of discount stores has grown, stimulating a change in consumers' shopping habits. All this has an impact on the formation of relations between market participants, and thus on food and agricultural commodity prices, as well as on the development of links between them.

The analysis of vertical price transmission, i.e. the influence of price changes in a given stage of the agri-food chain on prices in other stages, by enabling to trace price movements, allows to determine whether there are disturbances in these reactions, e.g. whether food prices rise under the influence of agricultural commodity prices, but when agricultural prices fall, the reaction of retail prices is small - this means an asymmetrical reaction of prices and has a negative impact both on farmers and consumers.

The main objective of the project is to determine the impact of concentration processes in the agri-food chain on the exercise of market power by market participants. These relationships will be shown by analyzing price transmission on the example of selected stages of the chain: agricultural producer - processor - retailer. This analysis provides an **opportunity to address the discussion on the existence and possible abuse of market power (defined as the ability to unilaterally influence the price, either by the supplier or by the buyer) by the participants of each stage of the agri-food chain, for example by the operators of retail chains.**

The above mentioned aim will be realized in several steps. In the first step the level of concentration of the food industry and retail trade in Poland and its changes over time in 1995-2022 will be determined. Then, on the basis of historical prices and selected econometric methods (**VECM, ARDL-ECM**) the nature of price transmission in the agri-food chain in Poland will be evaluated. These two steps will allow to assess the impact of competitive conditions on the process of price adjustments. Here qualitative and quantitative (using **IPVAR** model) methods will be applied.

The novelty of this research consists in the fact that the analysis referring to different markets will be carried out with one methodology, comparable data and the same time frame. The study will allow to assess to what extent the concentration processes in the sector are reflected in the strength and asymmetry of price adjustments and thus in the exercise of the market power. **Based on the results of the research recommendations on regulatory practices related to competition policy or supporting the agricultural sector may be formulated.**