

MECHANISMS FOR THE IMPLEMENTATION OF A CLUSTER SYSTEM IN ENSURING THE COMPETITIVENESS OF AGRICULTURAL PRODUCTS

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ABSTRACT

Cluster development is important with the specificity of the modern innovative economy as a factor in increasing the competitiveness of agriculture and the agro-industrial complex in general. In this regard, this article explains the development of proposals for the introduction of a cluster system in improving the competitiveness of agricultural products.

KEYWORDS: *cooperation, cluster system, strategy, supportive cluster policy, intervention cluster policy, concept, clustering, competitiveness, agro-industrial enterprises, competitiveness of agricultural products, public-private partnership.*

INTRODUCTION

World practice has shown that the clustering of the economy is predetermined and has a decisive impact on increasing competitiveness and the process of accelerating the innovative activity of enterprises.

Decree of the President of the Republic of Uzbekistan dated October 23, 2019 No PF-5853 "On approval of the Strategy of agricultural development of the Republic of Uzbekistan for 2020-2030" pays special attention to the implementation of the following measures, ie "... cooperation and cluster system The system of cultivation, processing, storage and sale of products to domestic and foreign markets will be established."¹

In order to realize the competitive potential of the country's regions, it is necessary to develop a concept of long-term socio-economic development, which provides for the creation of a network of regional production clusters, as well as the formation of a number of high-tech clusters in the country.

The development of cluster programs in Europe is supported by state, regional and local authorities. The EU Member States have prepared the European Cluster Memorandum (2007) to coordinate their efforts for innovative development on the basis of cluster initiatives, which has been dubbed the "Cluster Policy of Economic Development" with appropriate institutional support.

The freezing of agricultural enterprises in the cluster offers prospects for increasing production for

sale of agricultural products in wholesale markets; introduction of a single price policy to some extent to smooth the price imbalance of agricultural and industrial products in the markets; implementation of joint marketing policy by participating enterprises on the introduction of innovations in production, which will increase the level of competitiveness of cluster participants in relation to single manufacturers.

In Germany, the Netherlands, Japan, and Italy, clustering was initiated by the state and provided important legislative, informational, financial support, targeted programs tailored to the characteristics of the regions. Therefore, clustering in the agro-industrial complex of Uzbekistan should include the following measures:

to ensure the development and implementation of national strategies and programs to increase the competitiveness of the economy.

Methods. The research process used comparative comparison, logical and abstract thinking methods.

Results. Analyzing the international experience, the options for our country's participation in clustering can be summarized as follows:

- 1) functional cluster policy of the state, which facilitates the interaction of stakeholders and provides certain financial support for its implementation;
- 2) supportive cluster policy, where the role of the state is to direct and support infrastructure investments;
- 3) directive cluster policy, supplemented by the implementation of special programs aimed at changing the structure of production of local products through the development of clusters, the supporting function of the state;
- 4) interventional cluster policy, when the state, in conjunction with its directive function, assumes responsibility for the further development of the cluster by providing transfers, subsidies and other means of active regulation and shaping its specialization in the surrounding area;
- 5) public-private partnership - is a system of relations between a public authority and a private enterprise, in which a private enterprise is given full independence in the planning, financing and implementation of certain services to the population. This is more than applying traditional collaboration procedures and less than a privatization mechanism. Organizational and legal framework and basic principles of public-private partnership on the basis of the agreement are reflected in the Decree of the President of the Republic of Uzbekistan PF-5853 "On approval of the Strategy of agricultural development of the Republic of Uzbekistan for 2020-2030".

M. Porter² was the first scientist to begin a comprehensive study of clusters. He concludes that in the context of globalization, the network (industry) approach to the organization and management of production is losing its position, and cluster organization systems of interaction between firms and organizations come first.

M. Porter believed that the more developed the clusters in a particular country, the higher the living standards of the population and the higher the competitiveness of companies in that country. In his research on cluster problems, Porter identified the main groups of clustering characteristics:

The agro-industrial cluster organization offers concentration and specialization of agro-industrial production by forming closed cycles of production, storage, processing and sale of agricultural products based on integration using corporation and cooperative mechanisms to obtain competitive products and increase profitability. The idea of cluster technologies is to create and maintain a competitive environment. Combining competition, cooperation and integration in a

geographically limited specialized area is a key feature of the cluster. Cooperation and integration are crucial to achieving regional regional synergies. Therefore, one of the important directions in increasing the competitiveness of agriculture at both the regional and national levels is its clustering, and clusters should be considered as a promising form of cooperation in the agricultural sector of the country's economy.

According to M.A.Khvesik and A.S.Lesitsky³, it is expedient to form two different clusters in the agricultural sector - innovation and production.

1. An innovation cluster is a group of scientific, research and development institutes, educational institutions, consulting companies, engineering firms, business structures using corporate hierarchy and market mechanism to support innovative providers and other organizations through centralized coordination of their actions. is the most advanced form of achieving competitive advantages.

2. Production cluster - unites agricultural producers, processing and storage of products, a network of logistics and marketing companies, enterprises in the service sector. Its main advantages are the creation of existing conditions for the application of economies of scale of production through closer and "cheaper" inter-farm relations, joint use of productive forces, compared with the network system of organization of agricultural production. It also involves achieving significant competitive advantages, storing and processing products by creating a closed production cycle.

World practice shows that clusters are one of the forms of adaptation of the economic mechanism of agricultural enterprises in a competitive environment. formation of space, efficient use of capital and resources.

The innovative structure of the cluster helps to reduce the overall cost of research and development of innovations by increasing the efficiency of the production structure, allowing cluster members to carry out continuous innovation activities for a long time. Thus, the cluster performs several basic functions simultaneously:

- scientific, technical, organizational and economic innovations are spread from one enterprise to another, ensuring a steady increase in productivity in the cluster as a whole;
- Costs will be reduced, and due to the proximity of related enterprises will expand opportunities for research and development of innovations;
- all cluster members will have a synergistic effect due to the stability of interactions, cost reduction and rational use of material, natural and labor resources;
- all cluster members will have additional competitive advantages under the cumulative effect of scale effects and synergies.

When forming a cluster, it is advisable to bring together everyone who works to create the final product. Agricultural producers, suppliers of agricultural raw materials, agricultural machinery enterprises (suppliers of equipment), food processing enterprises, consumers of agricultural raw materials, agro-industrial complex (agricultural firms and corporations, consulting organizations, technology parks, trade)), organizations, transport organizations for advertising, financial institutions, scientific institutes, educational institutions, competent authorities (Figure 1).

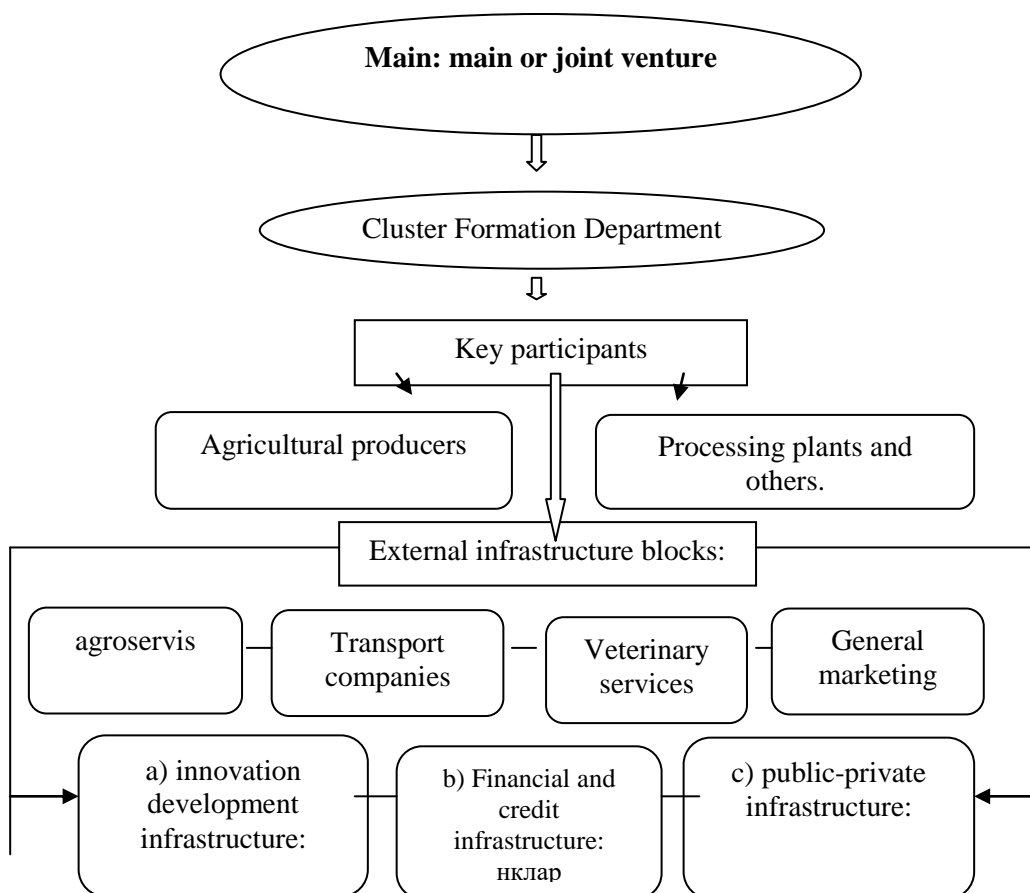


Figure 1. Agro-industrial cluster model⁴

In our opinion, the regional-sectoral cluster of agro-industrial complex should be understood as the concentration and specialization of agro-industrial production with the implementation of a sequence of actions in a particular area: production - storage - processing - sales of agricultural products, global integration, agricultural competitiveness increase, meet the needs of consumers with quality products and increase revenue for cluster members.

Since the cluster is a “growth point” in the socio-economic development of the regions, clustering of agricultural products is one of the key factors in ensuring the sustainable development of the agricultural sector and increasing the competitiveness of agriculture. The agro-industrial cluster has a number of features to increase the competitiveness of agriculture:

1. A regional agro-industrial cluster is a voluntary association of enterprises, institutions or other organizations engaged in agro-industrial production, engaged in one or more (geographically adjacent to agriculture) industries (geographical localization of agricultural products) that are geographically close enough.
2. Competitive advantage is created not only by business entities, but also by their territorial multi-level and multi-sectoral associations.
3. The conquest of consumers is carried out not by a separate agricultural, but by a complex of regional enterprises - a cluster.
4. Concentration of resources will be carried out within the cluster, their use will be aimed at achieving the common goal set and accepted by all participants, creating a single economic and information space, opportunities for managing labor, pooling intellectual capital and mutual

support with financial resources. will be.

5. Cluster entities may jointly represent the interests of cluster members in public authorities.

6. Cluster formation can create new jobs and thus provide permanent employment in the face of reforms and macrostructural destabilization processes.

7. Cluster formations have a high level of competitiveness because they allow:

- Large-scale production;
- Creation of stable competitive advantages over independent enterprises;
- Effective marketing policy;
- Training of highly qualified personnel;
- Introduction of innovative technologies;
- Use of progressive quality standards for the production of environmentally friendly and quality products;
- Reducing the level of production costs under the influence of synergy and improving the quality of products, including the integration of approaches to quality management, logistics, engineering, information technology;
- Expansion of markets for agricultural products due to access to world markets;
- Creating an effective system for receiving and exchanging information on market demand and supply, as well as the achievements of competitors.

Cluster development can become a feature of the modern innovative economy as a factor in increasing the competitiveness of agriculture and the agro-industrial complex in general.

Based on the experience gained in the operation of clusters, we have developed the concept of clustering during our research.

TABLE 1 PARADIGM OF THE CONCEPT "5I" FOR THE DEVELOPMENT OF AGRO-INDUSTRIAL CLUSTER IN KASHKADARYA REGION⁵

An element of the "5I" concept	The essence
Initiative	only entrepreneurs, agricultural, civil servants, public organizations, enterprising people from among educational institutions who are able to prove the integration, motivation and usefulness of clusters with their powers, minds, organizational skills and knowledge.
Innovation	only new technologies in the organization of production, sales, management, financing, which can open up new opportunities in competition
Information	availability, openness, data exchange, creation of databases and web pages, allows you to take advantage of access to markets
Integration	provides for the use of new technologies of cooperation between farms at the sectoral and regional levels with the support of science and public authorities
Interest	In case, the conditions for the life of the entrepreneur or social structure are not provided and implemented. This condition presupposes the interest of cluster association's participants in economic benefits.

In addition, the conditions for the creation and operation of clusters can be conditions for simultaneously investing in promising new technological projects.

Indeed, it is impossible to implement even the simplest project or attract any investment without initiative: only new, original, non-standard innovative ideas can interest an investor; only the combination of efforts of the government, business and institutions (scientific, educational, public organizations) may be necessary to successfully attract investment to this area (city, district, region); without exchanging information on the region's potential, its priorities, investment attractiveness and development prospects, it is impossible to obtain any investment proposal from potential interests; and finally, only the economic benefit derived from the invested capital can be a guarantee of successful implementation of any real investment project.

So, the advantages of clustering for agriculture in our country can be as follows:

- Ability to share capital and accelerate innovation;
- Sharing resources, saving on the purchase and storage of logistics;
- Determining the effective specialization of the economy in accordance with the territory of each individual enterprise of the agro-industrial complex, the scope of activities and the specifics of its activities;
- Distribution of markets in accordance with the capabilities of specialization and activity, prevention of inefficient competition;
- Saving volumes from cooperation and eliminating the shortcomings of so-called small businesses, reducing some costs;
- Reduction and distribution of risks achieved as a result of cooperation and synergy;
- Increasing the level of competitiveness of the agricultural sector;
- Increasing the sustainability of individual enterprises and the industry;
- Establish long-term relationships, including between producer and consumer.

The development of the institute of clustering will create an effective institutional environment for the use of resources in increasing the competitiveness of agricultural enterprises.

Creating an innovation cluster through direct cooperation with government partners will allow:

- 1) to regulate issues related to the transfer of individual communal infrastructure facilities belonging to communal property to a private partner in order to fulfill the terms of the concept agreement concluded within the framework of public-private partnership and wider use of irrigation systems built but not used in the future;
- 2) maintenance of engineering infrastructure facilities by carrying out restoration, repair and restoration works;
- 3) Continuous improvement of ecological and agro-ameliorative conditions of soils, avoiding moderate salinization, salinization and leaching processes;
- 4) Increasing the area under crops and increasing production through the use of new, high-quality products adapted to environmental factors;
- 5) Improving the information and analytical support of the industry;
- 6) Contribute to the protection of the legitimate rights and interests of public and private partners.

In the implementation of public-private partnerships (with the coordination of public and

agricultural interests based on synergies) it is possible to increase the use of administrative resources of public authorities and administration, taking into account the interests of the region and the territorial community, technical and economic indicators of sector efficiency .

Discussion

An important issue in the formation and development of clusters is to ensure their efficient operation by rationally combining internal resources and adapting to external environmental conditions. Economic clusters as a whole have certain characteristics in the system of indicators and methods for determining efficiency. The starting point for cluster efficiency analysis is to define its essence as an inter-farm association of different types of farms.

The essence of the cluster itself is the formation of a specific economic system, which combines economic and production ties to produce goods or provide services based on the joint efforts of participants. In this case, it is achieved through the joint use of resources, networks, integration and implementation of individual processes. Consequently, this allows for cost optimization and in some cases avoids them.

Intersectoral integration of agriculture is the organization of joint activities using the mechanisms of corporatization, cooperation or clustering. Today, large farms ensure their development through the mechanisms of corporatization, medium and small farms - the mechanisms of cooperation and clustering. Cluster entities play an important role in increasing the competitiveness of agriculture.

The use of a clustering mechanism allows all technologically dependent farms located in a given area to organize their joint activities due to their deep production specialization without losing their legal independence. The clustering mechanism is characterized by the following features:

- Territorial localization, geographical proximity of the main part of the business entities participating in the cluster;
- High level of development of cooperation, specialization and concentration;
- Stability of economic relations of the participants of the cluster system, the predominance of these relations for most of its participants;
- The presence of a large leading organization that determines the long-term economic, investment, innovation and other strategies of all cluster members;
- Long-term coordination of interaction between cluster members in the framework of production programs of innovative processes, basic management systems, quality control;
- Common products (goods, services, goods, brand) for all participants, for example, grain, vegetables, milk, meat, poultry eggs, etc.
- Voluntary and open membership in independent enterprises, cooperatives and trust clusters on the basis of equality between the participants of the product chain;
- Close interaction of the cluster association with the authorities;
- Existence of an arbitration court;
- The mechanism of formation and operation of clusters has a regional synergistic effect, which combines or shares resources (material, labor, financial, information, innovation), reduces transaction costs, enters the market, solves and balances the interests of participants, effective self-organization by forming a system.

To sum up, the economic essence of cluster activities is to not only strengthen business entities, restore lost production links, improve the social and environmental performance of all participants due to the synergistic effect of integration, but also to increase competitive advantages and

strengthen market positions of enterprises.

LIST OF USED LITERATURE

1. Decree of the President of the Republic of Uzbekistan No. PD-5853 "On approval of the Strategy of agricultural development of the Republic of Uzbekistan for 2020-2030". 23.10.2019 y.
2. Porter M. Konkurentnaya strategiya: metodika analiza otrasley i konkurentov / M. Porter; per. s angl. I.Minervin. - M.: Alpina Biznes Buks, 2005. - 454 p.
3. Selskoxozyaystvennyy kompleks Ukrainy: sotsialno-ekonomicheskie priority razvitiya: monografiya / pod red. M.A. Xvesik, A.S. Lisetskiy. - M.: SOPS Ukrainy NAN Ukrainy, 2009. - 216 p.
4. S.Z Safoevna, MN Juraevna. Analysis of economic efficiency of the use of irrigated land in agriculture and factors on them. Journal of Contemporary Issues in Business and Government. 2021. Том27, Номер2, Страницы4055-4061.
5. Z.S Shoxo'jayeva. Problems and solutions in the water sector of the region. - NAUKA I TEXNIKA. MIROVIE ISSLEDOVANIYA, 2020. P-21-24.
6. Sagdullaevna TF Shoxo'jaeva Zebo Safoevna. Food provision of the population of the Republic of Uzbekistan in pandemy conditions: problems and solutions. ACADEMICIA: An International Multidisciplinary Research Journal. 2021. №2.
7. Z.S Shoxo'jayeva. Efficient use of water resources in the agricultural sector. Monograph. T.: - 2012
8. ZS Shoxo'jayeva, M Norqobilov Problems of rational use of water resources in agriculture of the Republic of Uzbekistan. - NAUKA I TEXNIKA. MIROVIE ISSLEDOVANIYA, 2020.
9. Z.S Shoxujaeva Zarubejniy opit v sel'skom xozyaystve po ispol'zovaniyu vodnix resursov. - Economics, 2020.
10. Sagdullaevna TF, Shoxo'jaeva Zebo Safoevna. Food provision of the population of the Republic of Uzbekistan in pandemy conditions: problems and solutions. ACADEMICIA: An International Multidisciplinary Research Journal – 2021/2.
11. Utkirovna M.N, Shoxo'jaeva Zebo Safoevna Organizational and economic basis for the development of cotton and textile clusters. ACADEMICIA: An International Multidisciplinary Research Journal – 2021/2.
12. Z.S Shoxujaeva. Economic efficiency of water resources use in the agricultural sector. Monograph. T.: "Economy and Finance" Publishing House, 2012
13. S.Z Safoevna, T.F Sagdullaevna. Food provision of the population of the republic of uzbekistan in pandemy conditions: problems and solutions. ACADEMICIA: AN INTERNATIONAL ..., 2021
14. Eshev.A. Development of agriculture and its competitiveness is one the major priority areas of the economy of Uzbekistan.// Agroiqtisodiyot zhurnali, 2020. №3 (16) 115-117 б.
15. Eshev.A.S.Qishloq xo'jaligi mahsulotlari raqobatbardoshligini oshirishda davlatning agrar siyosati.// «Innovatsion iqtisodiyot: muammo, tahlil va rivojlanish istiqbollari» Proceedings of the International Scientific Conference. 20-21 May 2021 y. P-252-260.
16. Eshev A.S., Nazarova F.X. The Development of Agriculture and its competitiveness one of the important priority areas in the economy of the Uzbekistan.// Collection of scientific papers VII

international scientific and practical conference on economics, dedicated to the memory of the famous scientist and major organizer of economic science in Central Asia and southern Russia, Doctor of Economics, Professor A.F. Sidorov, Kuban-Samarkand-Karshi, 2020.406-410 p.

17. EshevA.S., Durmanov.A., Bayjanov.S., Khodjimukhaedova.Sh., Nurimbetov..., Shanasirova.N. Issues of Accounting for Organizational and Economic Mechanisms in Greenhouse Activities.// Journal of Advanced Research in Dynamical and Control Systems presents peer-reviewed survey and original research articles. 2020. November. 9-бет.