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Review Article

INNOVATIVE APPROACH TO CLUSTERING IN TOURISM (IN EXAMPLE EU COUNTRIES)

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Abstract

This article explores the role of clusters in enhancing European tourism potential. The importance of cluster communications between enterprises and organizations in providing tourism services is highlighted.

The aim of the study is the purpose of public government programs such as Europa InterCluster, The European Petrochemical Association, EPCA and PANAC: Exploring the essence of the European cluster system through extensive study of the Pannon Automotive Cluster operating principles.

As a result of the research, the following results were achieved:

Regional strategies focus on a new generation of smart strategies. They are determined by the following characteristics:

- a) smart growth based on knowledge and innovation,
- b) sustainable growth based on resource conservation, ecology and a competitive economy,
- c) innovative growth that promotes high employment and economic, social and territorial alignment.
- In general, state support for innovation at the regional level is carried out in three areas:
- 1) innovation policy aimed at stimulating innovation (in the field of competition, trade policy);
- 2) policies aimed at adapting to changes (human capital development and innovation policy as a whole);
- 3) support policy (social and regional policy with the objectives of redistribution).

Keywords: Europe, Hungary, tourism cluster, innovation, Europa InterCluster, public-private partnership, start-up, corporate partnership.

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INTRODUCTION

In the economies of developed countries, tourism services are one of the most important tools for GDP growth.

A cluster in tourism is an economic complex of enterprises and organizations concentrated on the territory of a tourist destination, the participants of which are connected in a single chain of creating the value of an integrated tourism product; have a management structure and a mechanism for coordination and regulation of economic activity; cooperate in the common interests of attracting tourists and increasing the international competitiveness of destinations.

Possibilities of applying the cluster approach in regional innovation systems in tourism In world tourism development practice, the cluster approach is widely used in strategic management of the transition of regions to an innovative development path and can be used: - as an analytical tool to better understand the state, problems and competitive opportunities (advantages) the region's economy, choose promising specialization in the global and domestic tourism market, develop development goals and objectives; - as an organizational tool to attract potential cluster members to the development of a strategy, project; organize a communications network, a forum for discussing problems and exchanging relevant information; identify leaders, active participants and include them in initiative groups for the development and implementation of strategies and projects;

- as a tool for offering state, educational, scientific services to organizations and enterprises of large, medium and small businesses;

- as an instrument for resolving potential conflicts of interest, since the ownership of the resources used to create the tourism product is distributed between a large number of participants both in the tourist region and beyond.

The cluster approach can be used to form mutually beneficial strategic proposals for resource owners.

A feature of the cluster approach to the strategic management of innovative development is the concentration on the international competitiveness of the region of recreational and tourist specialization. This is what distinguishes the cluster model of organization from the sanatorium complexes that were created in the Russian regions under socialism.

In order to prepare the existing complexes for successful competition in the global tourism market, it is necessary not only to create a scientifically based development strategy for each research works, but also to organize constant interaction of the main participants in the cluster - government, business, science and education, in the development and implementation of strategies.

In the conditions of a command economy, the unity of work of sanatorium complexes was ensured by planning and control "from above", and this was an easier managerial task than the task of organizing cluster activities in a market economy and economic independence of various owners. Organizational networking, cooperation, knowledge sharing, the creation of common electronic control systems, databases and research libraries, free access to them for all cluster members, coordinated marketing, pricing policies, joint projects with a complete innovation cycle, from research and development to staff training and bringing innovations to the market - these and

other activities within the framework of the cluster approach are able to activate the innovative development of the tourism sector in the region.

Innovative clusters of the countries of the world Clusters are a geographical concentration of firms, universities and research institutions, as well as other public and private organizations that provide cooperation in the implementation of economic activities.

Studies have shown the importance of proximity and agglomeration effects to provide a breakthrough in knowledge and innovation. The main reason for state support for the development of clusters is the desire to increase the speed and efficiency of knowledge dissemination among economic entities in order to make them more innovative and competitive. (1, Alexandrova)

Some of the leading clusters specialize in high-tech industries (such as Silicon Valley and Bangalore), while others are located in traditional sectors such as automotive or biotechnology. Clusters are more likely to be affected by global competition, and public authorities seek to provide assistance to firms within the cluster in order to increase their competitive advantage and move up the value chain through the generation of innovations and increased specialization. Government policy is aimed at assisting clusters through infrastructure development and investments, strengthening networking and training, disseminating knowledge among actors represented in clusters and, thus, creating a collective knowledge pool that leads to increased productivity and increased competitiveness of firms. Smart specialization is a policy based on a system of indicators, technology foresight and other priority setting tools. It is focused on supporting entrepreneurs and firms in the development of existing scientific, technological and industrial designs, simultaneously identifying and contributing to the emergence of new areas of economic and technological activity. By promoting a smart specialization strategy, national and regional governments are trying to increase competitiveness of firms and clusters. (2, Drozdova)

RESEARCH METHODOLOGY

The study used the deduction method to study the empirical basis of the cluster.

In the European Union, Hungary and France, the methods of analysis and synthesis have been used effectively to study the specifics of the tourism cluster.

The degree to which the subject has been studied

The classic definition of a cluster (M. Porter): "Geographical concentrations of interconnected companies, specialized suppliers, service manufacturers, firms in related industries, and associated institutions (eg universities, standardization agencies, trade associations) in specific areas that compete, but also cooperate "(3, Porter) in the field of tourism was supplemented by Montfort, who defined the cluster as a complex of interrelated companies providing services to tourists and the characteristics of the destination; Beni, who highlighted the connection, consent, cooperation between the participants; Rodriguez, who took into account the vertical and horizontal relationships between the participants. The concept of "cluster" in the tourism economy does not yet have an established definition that would distinguish it from many synonymous concepts and would allow us to indicate precisely that this agglomeration is a cluster. Most often, the term "cluster" is synonymous with the concepts of "destination", "complex" (tourist-recreational K., sanatorium-resort K.).

The article authors Martine J. Burger Bas Carreman Fred van Eenennaam examines the influence of cluster organizations on the international competitive advantages of clusters in the European life sciences industry. Data on coordinated cluster organizations is used to assess whether cluster development policies increase cluster attractiveness for multinational enterprises (MNCs). We evaluate mixed logit models using a sample of 481 investment projects from the point of view of the natural sciences of TNCs in Western European regions during the period 2010–2013. Contrary to the beliefs of politicians, our

results show that both the presence of cluster organizations and the activities of cluster organizations of a higher order have only a negligible effect on attracting investment from scratch. In addition, cluster organizations help attract business with less defined location requirements, such as manufacturing plants and sales and marketing offices. This conclusion provides valuable information for politicians, since it has not been found that investing public funds in cluster organizations attracts high value-added businesses, such as those that occur at headquarters and at R&D facilities, which are often the target of such investments. (4, Martijn J. Burger, Bas Karreman, Fred van Eenennaam)

Based on the analysis of scientific literature, the author identifies the essential characteristics of a cluster in tourism:

- A cluster is a grouping of economic entities (4, Martijn J. Burger, Bas Karreman, Fred van Eenennaam).
- The composition of the cluster members all enterprises and organizations creating a comprehensive tourist destination product, including: - business firms; government bodies; - scientific and educational organizations (5, Tsikhan).
- 3. Features of economic activity in the cluster:
- a. the cluster members are connected in a single value chain of the integrated tourism product of the destination;
 b) cluster members have a single mechanism for managing economic activity;
- b. joint projects based on public-private partnerships;
- the innovation process as the basis of cluster competitiveness (6, Kirschner).
- The cluster has a positive synergistic effect of functioning: - due to the geographical proximity and concentration of cluster members; - due to systemic interactions and interaction of participants.
- Cooperation of economic entities included in the cluster on the basis of participation in value accumulation systems (creating tourism product value) (7, Ramos , Santos).

ANALYSIS AND RESULTS

Globalization and competition have contributed to the internationalization and specialization of clusters. This is important for government support policies. For example, France and Germany encourage competition between clusters and orient the state support system towards achieving best practices, including at the international level. (8, Kutsenko) Many countries and regions combine cluster strategies and specialization strategies. For example, the German federal states of Berlin and Brandenburg have developed a joint innovation strategy to focus on government support for five clusters: healthcare; energy technology; transport; mobility and logistics; optics; information and communication technology (ICT). This interregional strategy is aimed at identifying entrepreneurial initiatives, at exploring market opportunities through intra-cluster cooperation, as well as at developing innovative technologies.

As part of the strategy, an inter-regional venture capital structure was created to support entrepreneurs and strengthen innovative enterprises5. European cluster organizations and initiatives can be subdivided according to regional and sectoral principles. In addition, there are enough organizations claiming pan-European coverage without any industry specificity6. The special significance of the latter organizations is that they initiate a wide discussion on contemporary pan-European problems of the development of industrial and innovative clusters. One example of such organizations is Europa InterCluster. It was created in 2007 and initially was an initiative of several cluster organizations, that is, it embodied the principle of bottom-up development. Today, this organization is a developed non-profit European agency for inter-cluster interaction. (10, Pilipenko)

Europa InterCluster enables the formation of strategic cluster alliances. Specific proposals for the development of clusters are recorded in the White Paper, which is a report that includes a description of the three challenges for clusters, seven proposals

for changing cluster policies and nine fundamental principles of cluster development. (8. Kutsenko)

The three calls answered by cluster members can be described as follows.

- Globalization stimulates the EU countries to increase competitiveness by creating conditions for the development of modern innovative production (not only through the development of modern industries, but also through the modernization of "traditional", which includes, in particular, the chemical industry). (10, Pilipenko) In addition, the ongoing globalization process requires clusters to develop a holistic strategic vision when forming their own value-added chains. To achieve this, it is necessary to take a position in growing markets with high added value. This is possible, especially for intersectoral clusters and clusters with a significant component in the service sector, operating in industries such as new materials, green technologies, creative industries.
- 2. The need for internal consolidation: simultaneously with the search for their own niche in the global economy, clusters need to strengthen their own "internal core". This requires sufficient internal dynamics, which, in turn, requires a full-fledged innovation cycle (from idea to patent, from prototype to design, from production to market entry). The quality of internal dynamics is the main criterion for the global competitiveness of the cluster.
- Using the benefits of European integration potential. Clusters in Europe are currently experiencing the need for a global strategy and internal consolidation. Faced with serious competition from developing countries, they must consolidate, creating associations. This is done in order to move from exchange (for example, experience) to cooperation (creation of temporary consortia for the duration of the cluster program). (12, Schmidt, Gibelev, Bannikov) These challenges defined in the White Paper seem to be important and accurate characteristics of modern processes in the global economy, requiring their participants (in this case, territorial innovation clusters) to combine openness and preserve key competitive advantages, flexibility and a certain stationarity developing strategies for functioning in the global space and creating local associations. (13, Paradigm Shift) Seven proposals developed based on an analysis of current trends in world economic development mainly affect changes in the structure and hierarchy of innovation and cluster policies of EU member states. The proposals were systematized and published in the form of a "European

Pact on Clusters", proposed for consideration by the European Parliament and the European Commission. (14, Benner)

The important role of clusters for the development of industry

in the regions was considered in a number of studies. For example, the report "Cluster Studies in the Chemical Industry", prepared by The European Petrochemical Association (EPCA), talks about the fundamental role of clusters in the functioning of value chains in the chemical industry and that most of the chemical clusters in Europe have formed base of old production centers (in the so-called old industrial areas). This is also stated in the report of the Higher Group for the Study of the Competitiveness of the Chemical Industry of Europe, where it is noted that clustering helped to compensate for the lack of raw materials and the high cost of energy carriers.

Of interest is the organization of management and the overall functioning of the largest clusters in Hungary. In Hungary, the idea of a cluster-based strategy for regional economic development first appeared in the spring of 2001, when several competitive sectors of the economy were identified in the Pannonia region with a large number of employees and a significant proportion of small and medium enterprises grouped around several large companies. (15, Enright)

The history of clusters begins in the early 2000s. Hungary was the first country in the region of Central and Eastern Europe where the national government supported the development of corporate cooperation and clusters. The first cluster in the Central and Eastern Europe region was probably created in Hungary (in December 2000 - PANAC: Pannon Automotive Cluster) as a result of tenders for proposals to support the creation and development of regional clusters, starting in 2001. typical for clusters at these times.

Accession to the EU in 2004 opened up new resources for supporting clusters and opportunities for spreading the cluster phenomenon. The breakthrough was the programming period 2007–13, when clusters were supported as part of complex and long-term programs.

The programs of economic development and regional activities during the program period 2007–13 provided broad support for the development of cluster organizations. A three-level cluster development policy is supported (Figure 1):

- starting cooperation, creating clusters;
- developing clusters (at least 1 year work experience);
- accredited clusters.

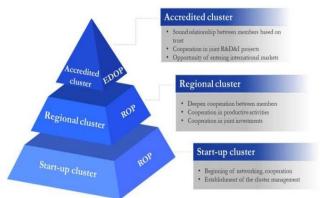


Figure 1: Three-Level Cluster Development Model 2007-13

Regional operational programs provided resources for the launch and development of clusters. The main objectives of the approved projects were to support newly formed clusters and developing clusters (those that had been working for at least 1 year).

The Operational Economic Development Program has provided grants to support accredited clusters using nationwide criteria. The appeals were aimed at supporting joint R&I projects and investments of cluster members, design companies and consortia.

The three-tier cluster development policy has contributed to the continuous evolution of clusters, and the peak of this progress has been the achievement of the Accredited Cluster label. The purpose of accreditation was to recognize the achievements of successfully operating clusters, as well as the selection and improvement of those clusters that meet the following requirements:

- significant impact on employment
- outstanding depth of collaboration between members
- \bullet national or cross-border impact of collaboration between members
- \bullet potential for entering the international market; \bullet significant innovative potential.

Accredited clusters, on the one hand, received an accreditation certificate that provided the label Accredited Cluster for 2 years, and on the other hand, using the label on which they had the right to use certain advantages in available request for proposals (for example, highlighted calls of proposals of higher intensity grants, advantage in the project selection process).

In 2013, 34 clusters were labeled "Accredited Cluster". In total, they had 1261 members, of which 1140 were commercial organizations. About 117,000 people were employed in 34 clusters, and their total income amounted to more than 9,500 billion forints, a quarter of which came from export activities.

The three-level cluster development model and available queries for clusters and their participants led to an explosion in the number of Hungarian clusters in the period 2007–13 (Figure 2).

2014-20 Focus, concentration among clusters

The results and experience of the national cluster development policy were summarized in a study commissioned by the Hungarian Ministry of National Economy in 2015. The aim of the study was to define goals for a new seven-year period.

The main lesson of the study was that only one third of the 176 start-up and developing clusters can successfully use the received grants. Other clusters did not perform any real activity after the project implementation period. On the one hand, the abundance of challenges associated with clusters has led to the fact that novice and developing clusters located in the same industry are almost geographically adjacent to each other. On the other hand, collaboration between members did not have the right background.

In contrast to the member companies of accredited clusters, many successful projects have been implemented that invest in economic development, especially in R&D projects.

Given this experience, the development policy of the national cluster has changed significantly. Unlike previous practice, the cluster development policy is more focused during the programming period 2014-20. The emphasis is on clusters with a good reputation and on improving clusters that are able to develop instead of numerous initial cooperations. Accordingly, the conditions for obtaining the label "Accredited Cluster" have been changed, therefore, active cooperation between members, professional management of the cluster and international presence is more significant than before.

In addition to changing the terms of the Accredited Cluster sign, the goals of the national cluster development policy for 2020 were defined as follows:

- 1. Concentration of clusters, internationally visible clusters Concentration and growth of accredited clusters will lead to the emergence of 10-15 best clusters in three years. Operational issues should be addressed by a cluster management organization that provides professional services (e.g., incubation, mentoring, rating of suppliers, etc.). Such a top cluster should focus the most significant players in its industry and sectors related to it and should have more than 100 members (currently an average of about 40 members) and cover the entire spectrum of the value chain.
- 2. Implementation of successful and market-oriented projects For three years, concentrated cluster membership represents at least 3 successful joint projects in each top cluster, and the product resulting from such projects is put on the market and / or sold. Projects should pay particular attention to Industry 4.0 solutions.
- 3. Enhanced international presence

For three years, as a result of concentrated cluster membership, each cluster participates in at least two international projects (for example, Horizon2020, COSME, INTERREG EUROPE, etc.).

4. Strengthening regional clusters

In addition to accredited clusters, successful regional clusters that focus on regional needs and specialization of local industry also play an important role. The goal of supporting regional clusters is to help them in their further development and prepare them to enter the international market. The expected result is 15-20 clusters focused on professional regional needs, which will give a new generation of Hungarian clusters.

To achieve the above goals, the Ministry of National Economy has introduced a new approach to support Hungarian cluster initiatives (Figure 2).



Figure 2. - The cluster development model 2014-2020 $\,$

Taking into account the vast positive experience in organizing clusters, networks and establishing cooperation between production and science, the Hungarian government authorities are oriented, inter alia, at building interaction networks. The possibility of obtaining funding from EU funds is another

argument in favor of the development of clusters in light industry, agriculture and food industry, tourism, construction, etc.

Clusters in France are institutions, to some extent similar to chambers of commerce and industry unions, uniting business entities on a sectoral and territorial basis. Their role is reduced to mediation in the allocation of funding from specialized funds and information and consulting support for supported projects. Moreover, horizontal interaction between cluster members is assumed to be extremely minimal.

Cluster management is carried out by coordination committees, including representatives of cluster members, local authorities and government. (18, Improving the Cluster Infrastructure Through Policy Actions)

The intermediate results of the activity of competitiveness clusters revealed the following problems:

- the mechanism for managing them is quite complex, highly bureaucratic, constantly confronting the diverging strategic goals of various stakeholders;
- the procedure for providing financial support is very complicated, including, according to some participants, two unnecessary and very long phases; the attraction of financial resources for small enterprises is complicated by the multiple nature of sources that do not have unified procedures and rules; staff training for the needs of clusters and within clusters is carried out formally or not at all;
- the degree of interaction with venture investors and other participants in the capital market from the side of the clusters is minimal, that is, they rely entirely on state sources of financing and banks cooperating with the state; - the geographic concentration of developers of various topics is not achieved, since in most cases companies find partners far enough away from their location; - large companies carry out their research nationwide and, thus, become involved in several clusters working on one or related topics. At the same time, the French authorities and independent researchers state that the policy of competitive clusters plays a positive and significant role. In particular, it provides a link between the regions and the national level of government. When applying a systematic approach to innovative research, the interaction between universities and other research organizations on the one hand and firms on the other hand is one of the key factors of innovation.

CONCLUSION

In general, regional innovation policy should stimulate the processes of knowledge exchange between participants in innovation. The openness of institutional boundaries in innovative projects allows knowledge and information to flow freely between institutions and scientists. The development of innovative infrastructure involves reducing barriers to information exchange.

The state is increasing funding for fundamental and applied research, R&D, and various forms of generating new knowledge. The regions in which new knowledge is created receive significant advantages in the process of generating ideas for determining innovative regional policies (for example, the development of conceptual models of regional innovation policies with serious limitations, risk analysis, etc.).

Regional strategies focus on a new generation of smart strategies. They are determined by the following characteristics:

- a) smart growth based on knowledge and innovation,
- b) sustainable growth based on resource conservation, ecology and a competitive economy,
- c) innovative growth that promotes high employment and economic, social and territorial alignment.
- In general, state support for innovation at the regional level is carried out in three areas:
- 1) innovation policy aimed at stimulating innovation (in the field of competition, trade policy);
- 2) policies aimed at adapting to changes (human capital development and innovation policy as a whole);
- 3) support policy (social and regional policy with the objectives of redistribution). The embodiment of scientific discoveries into an innovative product requires the creation of an interactive market environment. A free corridor of interactions should be built between all the links in the chain of creation and

commercialization of an innovative product. Variability (and from it the estimated productivity) and breadth of communication are provided by the network organization of interaction of participants in regional innovation projects. All communication participants are equal partners. The state, business and development institutions participate in the creation of innovative equal partnership. The driving factor of development in the face of accelerated technological progress and increasing global competition is the integration of knowledge into the interaction process of all key players in the market, where a special role is played by innovative systems that are developing in certain areas and are most fully included in the global innovation process, which makes it possible to maximize economic efficiency of the innovation process itself. The innovative development and implementation of innovative goods and services in the economies of countries and regions is determined not only by the presence of innovations themselves, but also by the willingness of territories to introduce these goods and services. It becomes important not only the possibility of birth and primary testing of basic innovations, but also the ability of territories to actively innovate.

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