

# Management of Regional Infrastructure Development: Network and Non-network Opportunities to Ensure the Sustainable Development of the Territory's Economy



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**Abstract** The scientific article presents the results of the author's scientific search in terms of assessing the potential for sustainable development of the economies of modern regions based on infrastructure network and non-network scenarios aimed at maximum complete release and cost-effective use of the resource potential of territories. The methodological basis of the research was the work of researchers in the development and modernization of the methodology for the study of regional markets and regional market infrastructure (A. S. Novoselov, A. N. Simonov, S. M. Khalilova), research on specific regional markets (O. I. Arlanova, A. V. Zverev, E. Yevtushenko and I. Rabinovich, A. D. Erok, S. R. Natkho, D. V. Rozhkova, A. A. Solkina), directly focused infrastructure studies aimed at analysing and assessing the characteristics and national economic significance of certain types of regional market infrastructure Zvereva (2015), Kokoshko (2010), Novoselov and Volyanskaya (2015), Fetisova and Chigareva (2015). The development of regional market infrastructure is currently an area of impulse and fragmentary research, emphasizing the need to implement infrastructure scenarios for the development of regional economies, but, as a rule, limited to trying to identify problems of the economy and management associated with overcoming infrastructure deficits. The more comprehensive realization of the possibilities of network and non-network economic development of subjects of regional socio-economic systems based on modernization of regional market infrastructure is a promising direction of the strategy of sustainable development of territories, providing a systematic approach to solving key spatial socio-economic problems taking into account the importance of sustainable development as a paradigm of the modern regional economy. Novelty of implemented research consists in synthesis of existing approaches to understanding essence, peculiarities and prospects of network and non-network development of regional market infrastructure.

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## 1 Introduction

The regional market infrastructure is currently characterized by a systematic modernization of infrastructure capacities and a qualitative change in the structure of trade in the direction of modern formats for organizing market activities. At the same time, in the context of crisis economic phenomena, the infrastructure capabilities of traditional markets remain significant infrastructure reserves to support the sustainability of local and regional socio-economic processes.

## 2 Methods and Materials

The problems of the formation, functioning and development of regional market infrastructure in modern Russian research activities can be structured into three main areas:

- development and modernization of methodology for research of regional markets and regional market infrastructure (Novoselov 2008; Simonov 2015.; Khalilova 2011);
- studies of specific regional markets (Arlanova 2008; Yevtushenko and Rabinovich 2014; Erok 2019; Zverev 2011; Natkho 2018; Rozhkova 2015; Solkina 2018);
- directly infrastructure research aimed at analysing and assessing the peculiarities and national economic significance of certain types of regional market infrastructure (Zvereva 2015; Kokoshko 2010; Novoselov and Volyanskaya 2015; Fetisova and Chigareva 2015).

## 3 Results

The main problems of the formation and development of market infrastructure in the Russian regions, according to A.S. Novoselov, include:

- simultaneous and spontaneous transformation of the regional market infrastructure in the absence of plans and strategies for its formation and effectiveness assessment;
- significant regional differentiation in the pace, composition and functionality of established regional infrastructure market systems (Novoselov 2008).

Among the promising areas for the development of regional infrastructure of a particular market A.S. Novoselov included:

- increasing the capital base and technical equipment of trade, transport and logistics organizations—subjects of the regional economy;
- increasing the effectiveness of interaction with the prospect of partnership and integration with entities of the financial and credit sphere of the regional economy (Novoselov 2008).

Emphasizing the fundamental nature of the author's approach, we note that it does not define the regional market infrastructure itself, does not give its classification and main functions, does not pay attention to specific economic effects, including national economic ones, from the creation, functioning and development of market infrastructure hubs.

A. N. Simonov, generally agreeing with the conceptual approach of A. S. Novoselova, noted that the main factor in the formation of regional markets for specific economic benefits is the specificity of the regional reproductive process, which affects the entire sphere of regional trade and covers all regional economic entities represented within a specific territory without exception (Simonov 2015.).

S. M. Khalilova attempted to review the methodology for the study of regional markets and regional market infrastructure from the perspective of conceptual approaches to centralized regulation of regional market processes, highlighting and noting the following significant patterns:

- Keynesian theory and Keynesian-Neoclassical synthesis are oriented towards the application of budgetary tools to stimulate demand, the development of local competition processes and pricing management;
- Monetarism, as the main priorities for stimulating regional market activity, is focused on freedom of enterprise, regulation of the volume of money supply and the availability of financial resources for market entities, and saving social unproductive costs (Khalilova 2011).

Having agreed with the promising directions of the research methodology for the market infrastructure of regional economic systems, we emphasize the need to detail and refine it in order to distinguish infrastructure and structural scenarios of the evolution of regional market-reproduction processes, the reliable definition and classification of the subjects of these processes and their national economic significance in relation to the results of the functioning of the economy of the content territory.

Note that in fact, the issue of regional market infrastructure has not been disclosed by the author, although the author's classification of transactions within the local/regional market can be positively evaluated in terms of reliable allocation of specific types of transactions that form independent flows of goods and material assets that should be mediated by specific subjects of regional market infrastructure (the role of which the author is largely not disclosed and underestimated).

A similar drawback is the approach of S.R. Natkho, who defined the development of regional market infrastructure as the priority of regional regulatory policy, but

identified in the dissertation work the regional market infrastructure with "the system of state administration measures of target markets" (Natkho 2018).

In our opinion, such identification of qualitatively heterogeneous categories of regional economy requires additional and very detailed justification, apparently, the author was not able to distinguish between the terms "regional market infrastructure" and "institutions of regional markets."

Studies focused on the analysis and assessment of the peculiarities and national economic significance of certain types of regional market infrastructure are presented by I. V. Zvereva, L. V. Konoshko, A. S. Novoselov and T. V. Volyanskaya, O. V. Fetisova and T. V. Chigareva.

I. V. Zvereva, in an attempt to define a regional market infrastructure, tried to characterize it by identifying a set of entities—organizations specializing in various types of services and focused on ensuring the functionality of specific regional markets (consumer, products and services for industrial and technical purposes, labor, financial resources and capital, information). The author axiomatically suggests the need for advanced infrastructure development, which, in her opinion, determines "the stability and flexibility of the regional economy as a whole, as well as the success of its development" (Zvereva 2015).

The author's conclusions and assessments are not supported by the results of empirical studies, they are largely debatable, especially in terms of the thesis about infrastructure as an independent regional "point" of growth. The experience of the implementation of the latest local/regional infrastructure projects (for example, the construction of new metro lines in New Moscow) indicates the delayed multiplier effect of the formation of a full-fledged infrastructure support, which can ensure the development of the location as a whole, but significantly reduce the effectiveness of infrastructure enterprises and organizations in the absence of direct users of the relevant services and their demand.

In the definition of L. V. Kokoshko, the main function of market infrastructure is to promote the mobility of all types of economic resources as the basis of the modern global economic process, focused on the formation and use of the most efficient production functions (Kokoshko 2010), p. 30. The author considers the key functions performed by market infrastructure entities to be:

- integration of economic actors (including regional ones) and intermediation of relations between them;
- the possibility of regulating the proportion and pace of economic development by stimulating/restricting/banning the development of targeted infrastructure (Kokoshko 2010), p. 32.

According to the author's classification of types of market infrastructure L.V. Kokoshko, it is possible to use the following characteristics of its differentiation:

- a functional feature determined by the content, quality and orientation of the economic processes being mediated;
- a sign of the form of ownership;
- a sign of innovation (Kokoshko 2010), p. 35–37.

It should be emphasized that as a specific identification feature that allows to identify and characterize the segment of regional market infrastructure, the author notes the sign of the provision of infrastructure services of all types to corporate consumers (Kokoshko 2010), p. 38, proposing on this basis to distinguish between social and market infrastructure (it turns out that the population of the territory can only act as subjects—recipients of social markets, not being full-fledged subjects of market relations, which is extremely debatable and very, in our opinion, not justified).

Criticism of the author's approach is as follows:

- the author identifies the existence of a market infrastructure with the existence of regional markets, although market relations are possible in an infrastructure-free form, based on direct economic and economic ties;
- the delegation of infrastructure functions to provide regional economic processes to specialized suppliers can significantly change the quality of the regional competitive environment and the intensity of competitive processes, ranging from natural/predatory competition to monopoly, with the full range of both favourable and negative economic and social effects.

Having agreed with almost all points of the approach, we note that a number of infrastructure subsystems of market functionality, for example, the financial and credit subsystem currently does not have regional subordination, but is effectively directed and administered from the national level of national economic management.

At the same time, the approach considered is a full conceptual basis for the development of a highly necessary and current strategic planning document, the Regional Infrastructure Development Strategy, development and sequential implementation of which can synchronize the development vectors of various levels of regional economic systems, To involve in their composition new prospective participants with economic potential and interested in its commercialization within specific regions, Ensure transparent and consistent dynamics in the implementation of the priorities of the long-term strategic development of the targeted territories.

O. V. Fetisova and T. V. Chigareva, when studying the problems of formation and regularities of functioning of regional consumer markets, point to the possibility of forming both direct relationships between market entities (sellers and end consumers) and the possibility of complicating these relationships and including infrastructure service providers in market processes (Fetisova and Chigareva 2015).

## 4 Conclusion

Therefore, to sum things up, we will once again emphasize the relevance of further studies of regional market infrastructure as a "point," or rather a space of economic

development that can qualitatively increase the effectiveness of regional socio-economic systems. Approaches to the study of network and non-network infrastructure market entities capable of ensuring the systematic and sustainable implementation of infrastructure functions in spatially localized economic systems of modern Russian regions require further development.

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