Indigenous peoples of the North at the turn of the third decade of the 21st century

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Abstract. Industrial development of the Arctic zone of the Russian Federation, climate change, modification of the regulatory and legal framework, large-scale economic transformations taking place both in Russia and around the world have led to serious changes in the traditional economy and traditional way of life of the indigenous peoples of the North. A whole complex of interconnected problems and contradictions has arisen. They require serious study, analysis and development of measures to resolve them. In this work, an attempt is made to identify from the arrays of scientific literature, further generalize and formalize the key problems (challenges) of the indigenous peoples of the North, localized on the land territory of the Russian Arctic. The key challenges of indigenous peoples living in the Yamal-Nenets Autonomous District are formulated. The identity of the problems of indigenous peoples was revealed throughout the territory of the Russian Arctic, which indicates their extra-regional nature. Explanations on the mechanisms of the interdetermination of key problems and the formation of cause-effect relationships in the environment of indigenous peoples are given. Based on the results obtained, nodes and development trends of indigenous peoples that allow predicting the further development of events are formulated.

1. Introduction
The complexity and multidimensionality of key problems leads to the search for a balance between maintaining the traditional way of life of indigenous peoples of the North, their traditional industries and the new economic, climatic and environmental conditions in which these peoples live. Finding such a balance is a non-trivial task and requires a serious approach to studying existing problems as a complex in which each problem in itself is a consequence of a number of existing bottlenecks, as well as the cause of new obstacles or opportunities.

2. Purpose and methods
The purpose of the work is to identify a set of key problems (challenges) of the development of the aboriginal peoples in modern climatic, socio-economic and scientific-technological conditions. Identification of key challenges will help to formulate and propose specific solutions to improve the level and quality of life of the indigenous peoples of the North.

The study is based on the results of theoretical and empirical studies in economics, sociology, psychology and culture, studies of the ethno-social characteristics of indigenous peoples, as well as a statistical and historical analysis of their development, sociological data, a comparative analysis of socio-economic factors that determine economic behavior and subjective well-being. Identification of key challenges and assessment of the development prospects of the native peoples consists of three
stages: analysis of Russian and foreign sources, the results of scientific expeditions; systematization of statistical data, including information on the dynamics of the development of the indigenous peoples of the North; systematic assessment of the impact of legal, economic and social factors on the preservation and development of aboriginal peoples.

In order to identify and formalize the key challenges of the above mentioned peoples, the array of scientific literature obtained from the scientific electronic library eLIBRARY.RU using the phrase “the problems of the indigenous peoples of the North” was studied. The search engine of the informational and analytical portal found 530 publications.

3. Main part
The bulk of the problem articles are devoted to the preservation of ethnic groups and identity. Scientific works describe the current state of ethnic groups in the Russian Arctic, trace the transformation of the traditional way of life under the influence of various factors, analyze the causes of the crisis state of demographic and cultural characteristics that currently impede sustainable development, suggest some ways to solve them. Legal issues, socio-economic problems, education and health are less studied. Attempts to comprehensively present the key problems of the indigenous peoples of the North are made in only 20 articles.

In particular, S.M. Baisheva [1], on the basis of studies conducted by the Institute for Humanities Research and Indigenous Studies of the North of the SB RAS, writes that in places of compact residence of the aboriginal peoples of Yakutia there are both general and specific problems of a socio-economic nature. The introduction of market relations is accompanied by high unemployment, low wages and social payments (pensions, benefits); heavy drinking among the aboriginals (alcoholism); lack of enterprise, inability to earn money; the deterioration of reindeer pastures and hunting grounds, the inability to influence the policies of local and regional authorities. As a result of the deterioration of quality indicators affecting the socio-economic development of the territories, the indigenous population of Yakutia weakened centuries-old traditions: respect for nature, respect for ancestors, love of hunting, desire to work in traditional industries of the North, etc. Studies have shown that in the context of socio-cultural modernization, the system of values and priorities is changing among representatives of various social groups and layers of the native peoples of the Republic of Sakha (Yakutia). Adaptation to new conditions in the educational, professional, labor and cultural spheres is difficult, it goes through breaking of traditional stereotypes about society, nature, family, etc. The author writes about the lack of adequate social support from the authorities and the need to modernize the political concept of the development of the above mentioned peoples.

Y.V. Popkov in his article [2] also critically evaluates the current policy of Russia in relation to the indigenous peoples. He points out the defects of the national policy in relation to the native peoples, both at the ideological level and in practical implementation. In his opinion, this is a consequence of the general crisis in the application of the object-oriented approach and determines the implementation of subject-oriented mechanisms in relation to the peoples of the North. A comprehensive analysis of a wide range of legal, economic and social problems [3] of ensuring the indigenous peoples' traditional life in the Arctic, conducted in collective work, shows the need to improve legislative, financial and managerial actions to preserve the traditional lifestyle and culture of the indigenous minorities as a unique phenogenotype, the activity of which is closely associated with the state of the natural environment of the macroregion and actually completely depends on it. The exceptional role and place of the aboriginal peoples in preserving the natural complexes of the Arctic for future generations in the 21st century is emphasized.

N.A. Silantyeva in her article [4] considers a set of problems (political, social, economic, cultural) that the indigenous peoples of the Ob North face. One of the central problems, in her opinion, is the intensive industrial development of the northern territories by oil and gas companies, in particular the alienation of lands without taking into account the interests of the native peoples. At the social level, persistent unemployment, alcoholism, deterioration of the health status of the indigenous peoples are noted, while the quality of medical services is declining. The effectiveness of the education system of
the aboriginal peoples is low due to the lack of adaptation to their specific features. The majority of the indigenous population lack housing, in the national villages it is dilapidated or poorly maintained. Shifts are noted in the culture, traditions, customs, and spiritual values of the native peoples. It is characteristic that over time, improvements in the position of the indigenous peoples of the North do not occur. Similar problems were described by V.M. Kurikov [5] in the 90s of the last century. The similar causes of the crisis were noted: the onset of industry; unemployment; health problems; lack of permanent housing; low efficiency of the education system.

The work [6], based on sociological research in the North-East of Russia, cites factors showing the strengthening of the social problems of the indigenous peoples against the background of economic and political transformations. The authors note the contradictions between the industrial development of territories and vital activity. The population is losing an identity based on language and endemic national culture. Since the 1990s, the incidence of neuropsychiatric diseases has increased, drug addiction and drunkenness have become more common, the birth rate has fallen, and the mortality rate has risen. Traditional economic activity remains the main occupation of the aboriginal peoples, but it is unable to ensure a normal level and quality of life. For many families, the basic resource of income is social payments. In families living on social benefits, more often than in other cases, the national culture and language are lost. Non-ecological, pseudo-rational thinking and wasteful attitude to natural resources become characteristic of northern peoples.

Researchers of the Barents Center of the Humanities of the Kola Science Center of the Russian Academy of Sciences [7] showed that a consequence of economic reforms was a decrease in the standard of living of the indigenous peoples of the North; in particular, there was a decrease in salaries in reindeer husbandry. The low competitiveness of the indigenous population in the labor market has raised unemployment to alarming proportions. The social infrastructure of the Sami settlements degraded without receiving budgetary investments. As in other regions of Russia, problems are noted in the education of children, medical services, and transport infrastructure. The indigenous population remains unadapted to modern socio-economic conditions. Community development is hampered by underdeveloped legislation, low availability of public services, and financial difficulties. Researchers believe that the reasons for this situation are the lack (imperfection) of institutions that provide opportunities for realizing the interests of indigenous communities.

In the work of A.P. Gudyma and V.I. Bulatov [8] an attempt is made to comprehend the complex of problems of the indigenous peoples of the North from the philosophical and theoretical positions of the relationship of environmental, economic and social problems in the idea of sustainable development. A number of fundamental postulates were put forward: 1) the problems of vital activity of the aboriginal peoples of the North are not local, but biospheric, since traditional forms of life are aimed at maintaining the ecological balance. Preservation of indigenous peoples is a condition for preventing global environmental hazards; 2) the level of awareness of the majority of the population and decision makers of the problems of the native peoples of the North is low, actions are inconsistent; 3) the formation of a holistic concept of the problems of the northern territories and the indigenous peoples of the North is possible within the framework of social philosophy, using an interdisciplinary approach.

In order to identify and formalize key challenges of indigenous peoples of the North in the Yamal-Nenets Autonomous District, the works of Russian researchers from the Federal Center of Theoretical and Applied Sociology of the Russian Academy of Sciences, Tyumen Industrial University and the Arctic Research Center (Salekhard) were also used [9], [10], [11], [12], [13], [14], [15], [16], [17], [18]. The works are based on large-scale sociological surveys of the population of the region on representative samples starting in 2005 and subsequent diagnosis of the results in the context of various social groups of respondents. They examined the problems of socio-spatial transformation of the northern territories associated with the development of the Yamal-Nenets Autonomous District, as one of the most important promising oil and gas Arctic regions of Russia. The works analyze the problems associated with ethno-social processes developing during the neo-industrial development of the arctic and subarctic territories of the north of the Tyumen region. The authors separately highlight the problems that have a serious impact on the vital activity of the native peoples in the district, leading a nomadic lifestyle and
engaging in traditional types of economic activity and crafts. The problems of reindeer husbandry as the main ethno-preserving type of traditional nature management of the indigenous peoples of the YNAD are considered.

The problems and trends in socio-economic development presented in the research works made it possible to formulate a list of key challenges of the aboriginal population of the Yamal-Nenets Autonomous District:

1. The growth of environmental problems, provoked by climate warming, the development of the oil and gas complex and irrational use of natural resources in traditional sectors of the economy;
2. Low income of the indigenous peoples of the North employed in traditional sectors of the economy, increase in the number of poor families, inadequate social assistance;
3. High level of prices and tariffs for goods and services in rural areas, outstripping the growth of expenditures of the population;
4. High unemployment (self-employment) rate, especially among young people, the threat of losing a job among the employed population;
5. Limited employment opportunities in rural settlements, including traditional sectors of the economy;
6. The system for attracting personnel is not oriented towards the autochthonous population, oil and gas enterprises employ a very limited number of indigenous peoples of the North, mainly offering them shift work;
7. Low level of education of the population, including graduates of boarding schools, which do not allow finding jobs in other sectors of the economy and outside rural settlements;
8. Indigenous peoples of the North have a lack of life strategies that meet the challenges of the time, a lack of social elevators and mechanisms to adapt to these conditions, a lack of readiness to become equal members of society, a lack of motivation for development;
9. Dysfunctional sociocultural environment in rural settlements (alcoholism, drug addiction, crime, marginalization);
10. Social disorder – low quality of medical care, low opportunities to improve housing conditions, low quality of products, insufficient opportunities for cultural, spiritual and physical development;
11. Legislative restrictions on the conduct of traditional activities;
12. Poor quality of managerial decisions at the regional and local levels, the plurality of subjects of development management of the indigenous peoples of the North, the adoption of uncoordinated decisions.

The challenges identified as a result of the study almost completely coincide with the problems in other Arctic regions of Russia [1-8], which allows us to conclude that there are common conditions for their occurrence, extra-regional features of emerging negative trends that impede the maintenance and development of traditional life. Thus, first of all, Russian legislation and the socio-economic system, manifested both in the mechanisms of education, social security and in the market institutions of entrepreneurship, employment, price formation, form a negative background that does not contribute to the development of the native peoples of the North and their adaptation in a modern rapidly developing society. On the basis of federal legislation, regions create more or less successful practices, depending on the focus and competence of the regional community and authorities, as well as their financial support.

The above challenges of the indigenous peoples of the YNAD, despite their magnitude, are not separate and independent, with individual causes and consequences. The challenges in the complex are closely interconnected with each other, therefore, in the process of their deployment, the interdetermination of some challenges by others and the intensification of the negative effect occur. Causal relationships determining the challenges are distributed on the causal, economic, social and political levels.

At a causal level are: environmental problems caused by climate change and natural resource development of the Russian Arctic; world technological development, which determines economic
development and increases the requirements for the level of competencies; the quality of education in accessible educational institutions in the region; authorities creating institutional conditions for the preservation and development of the indigenous peoples of the North. These peoples cannot have a productive impact on the nodes and trends that are forming at this level, despite the presence of institutions of interaction with government and business. Authorities directly affect most of the areas of life of the native peoples, but nevertheless, this impact is not enough to solve their problems at either the economic or social levels, or it is negative. The traditional economy is stagnating, new industries remain inaccessible to them. Anthropogenic impact on ecosystems reduces the ability to conduct traditional economic activities. The level of education and sociocultural features of ethnic groups limit the possibilities of their socialization outside the traditional environment. Poverty and unemployment will increase. State investments and subsidies in traditional sectors do not lead to an increase in the income of the people employed in them. Poverty and unemployment (mostly hidden) worsen the sociocultural condition of national villages, housing problems are not resolved (dilapidated and hazardous housing), the quality of medical care (according to respondents) does not improve, while the natural growth of the indigenous peoples of the North remains. Inertial approaches in the development management of the aboriginal population do not allow creating relatively comfortable conditions for solving socio-economic issues. Thus, a chain of interdependent challenges leads to a decrease in the level and quality of life of the native peoples, which at the political level can be interpreted as discrimination against them, deprivation of their rights, native lands and natural resources, the threat of the disappearance of beliefs, culture, language and way of life.

The political level is important because it is the subject of close monitoring of various international and non-governmental organizations. Indigenous peoples’ political rights and freedoms are internationally recognized in the United Nations Declaration on the Rights of Indigenous Peoples and the Indigenous and Tribal Peoples Convention, 1989 (ILO-convention C169). UN representatives believe that the inability to develop acceptable, culturally appropriate laws, strategies and programs can lead to imbalances and inequalities in society. Various manifestations of inequality also give rise to social and armed conflicts; internal armed conflicts and social unrest associated with development projects and mining initiatives are becoming common [19].

A systematic assessment of the impact of legal, economic and social factors on the preservation and development of the indigenous peoples of the North allows us to identify three main nodes of their development and to predict trends. Nodes are represented by challenges that are formed at a causal level, including ecology, authority and indigenous peoples of the North. The ecological node is formed by objective reasons, the impact on it from the regional authorities and the native peoples is significantly limited, therefore it is practically uncontrollable. The influence of society and government on the determinants of the “indigenous peoples of the North” node is also limited. Among the determinants are the ideas and worldview of the ethnus, including a set of values, norms, rules, behavior samples, cultural standards, religious views, rites, traditions, social habits, that form ethno-social features, strata and social groups that differ in their role in the socio-economic life of society. However, at the same time, there are mechanisms in society that contribute to overcoming traditional views, such as education, culture, technology, inclusion in economic life, which must be effectively used. The “Authority” node is the most flexible and susceptible to changes; it has undertaken obligations to support and develop the indigenous peoples of the North, but in reality, studies show that it is not always ready for a positive transformation of indigenous peoples. Probably, there are some internal restrictions and contradictions within the government itself, leading to ineffective behavior, which will be investigated separately.

Issues of the formation of transformation models of the indigenous peoples of the North in a consumer society, taking into account the specifics of their life, the formation of a global information space were considered in the works of Russian researchers using the scenario approach. For example, the following set of scenarios for the development of the aboriginal peoples of the Russian North [8]. At present, it is obvious that none of these scenarios has received significant development, although some elements are present in Russian practice, taking into account the regional specifics of various subjects of the Russian Federation. A complex scenario for the development of the native peoples of the
YNAD up to 2050, using literary and artistic techniques and a set of basic archetypes of Nenets culture, seems more likely [20].

The complex scenario of the development of the indigenous peoples of the North in general terms corresponds to the emerging nodes presented in this paper. In fact, the second decade of the 21st century showed that the second stage of active industrial development of the Yamal-Nenets Autonomous District resources, climate change and increase in the number of reindeer led to degradation of reindeer pastures, fodder shortage and, consequently, to massive loss of reindeer. The growing discontent of the aboriginal peoples with ongoing social policies, rising unemployment, poverty, deprivation, and the disproportionate distribution of natural rents is recorded by sociologists, and cases of aggressive behavior – by the media. Possible unrest cannot be ruled out. Presumably at the turn of the 20-30s of the 21st century, the scenario of interaction between the government and the aboriginal peoples will be finally determined; whether it will be negative (going through a series of complex problems and transformations associated with the change of generations and techno-economic paradigms) or positive (developing mutually acceptable values, co-evolution of indigenous peoples and the state), depends on all the development nodes of the native peoples. The main conditions for the onset of a positive scenario will be: the ability of authorities to proactively respond to growing threats, a high coordination of regional policy; moderation of environmental, socio-economic and technological risks; high quality education that can prepare the majority of indigenous young people to meet the requirements of economic agents.

The desired image of the future of the indigenous peoples of the North for the period 2030 - 2035 was formulated during the study as follows: traditional economic activity is carried out within the framework of environmental standards, the proportion of the population dependent on the traditional economy is steadily decreasing. Indigenous young people successfully complete educational institutions, undergo socialization and integrate into the modern world. The level of per capita income and social benefits allows ensuring the established rights and guarantees of the indigenous population. The quality of life in rural areas is growing.

To achieve the desired future, the following tasks have to be solved: 1) to reduce the number of people engaged in traditional economic activity to the level of environmental standards; 2) to raise the quality and level of education, to make graduates of schools and boarding schools competitive in labor markets; 3) arrange the economic model of the region in such a way as to increase revenues in traditional sectors of the economy; 4) to improve the quality of life in national villages, to make them a step that prepares for life in cities.

4. Conclusions
1. The key problems (challenges) of the indigenous peoples of the North, localized in the territory of the Russian Arctic, which have developed over the past thirty years, are identified, generalized and formalized; the conclusion is made that there are common conditions for their occurrence, extra-regional features of emerging negative trends that do not contribute to the preservation and development of traditional life activities. The regions of the Russian Arctic create more or less successful practices, depending on the focus and competence of the regional community and authorities, as well as on their financial support.

2. Causal relationships between key challenges and their interdependent influence, which contributes to the strengthening of the negative effect, are established. Problems at the causal level activate the economic and social levels, which in turn affect the standard of living and quality of life of the indigenous minorities. The latter, being monitored by international and non-governmental organizations, are able to launch determinant processes to protect the rights of the native peoples.

3. A systematic assessment of the influence of legal, economic and social factors on the preservation and development of the aboriginal peoples is given, which allows identifying three main nodes of their development. The nodes are represented by challenges that are formed at a causal level, including “Ecology”, “Indigenous peoples of the North” and “Authority”. A controlled improvement of the
situation of the native peoples is possible through the “Authority” node, but in reality it is not always ready for a positive transformation of indigenous peoples.

4. The emerging trends (consequences) of the development of events generated by the nodes reflect real events taking place in the sphere of the indigenous peoples of the North at present, allow forecasting economic, social and political events and coincide with individual scenarios for the development of indigenous population proposed earlier by Russian researchers.

5. The new political cycle coincides with the beginning of a new decade, within the framework of which the formats of relations between the authorities and the indigenous peoples of the North will be determined. It is assumed that the actions undertaken by the region will be sufficient for these peoples to achieve a new quality of life, and will help to overcome poverty, increase human potential and create favorable conditions for its capitalization.

Acknowledgements
«The reported study was funded by RFBR according to the research project № 19-013-00394» «The reported study was funded by RFBR according to the research project № 19-013-00394».

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