

PUBLISHING OF ATLASES IN RUSSIA IN 2002-2006

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Abstract. More than 100 titles of various geographical atlases were issued in Russia during the last five years. The article explains what is the reason of this extraordinary boom of atlas mapping in Russia. There are given some factors, themes, purposes and new phenomenon responsible for this development. Some kinds of complex geographical atlases, thematic (branch) atlases, public and governmental estimation of Russian atlases are described in the article.

Key words: Russian cartography, Russian atlases, cartographic market

The Russian cartographic market saw an unprecedented rise in offers of various geographical atlases: more than 100 titles were issued during the last five years. In the history of cartography in Russia and the former Soviet Union there were no other periods comparable in terms of number of new published atlases. What is the cause of this extraordinary boom of atlas mapping in Russia?

There are several **factors** responsible for this development.

Firstly, with the transition of Russia to the market economy the state monopoly was abolished in the sphere of cartographic activities. Many newly emerged cartographic firms pursue their publishing policy independently, while hundreds of private and governmental organizations and institutions, such as publishing houses, high school, universities, etc., got licenses for cartographic activities. Thus, all of them have right to compile and publish geographical atlases. Besides that, some publishing houses acquire rights to issue foreign atlases in Russian translation, widening in such a way the range of goods in the domestic market of popular-science and reference cartographical products.

Secondly, the abolition or mitigation of secrecy-related restrictions for the distribution of topographical maps, space images, socio-economical, demographical, environmental, and other data made it possible to represent precise information on various themes in maps and atlases accessible for all customers. Published atlases became more interesting and diversified in terms of contents, because they contain formerly restricted

topographical maps and space images, inform the reader on environmental situation in the country, etc. All these gave a boost to the demand for atlas publications.

Thirdly, changes in social and economical conditions of living, quickly growing motorization of Russia's population, rise of tourist travelling, all these pushed up the demand for road and tourist atlases, which are now abundantly represented in the domestic market.

Fourthly, in the course of the administrative reform and the political and economic transformations in Russia the regional leaders became aware that a geographical atlas, in a similar way as a flag or anthem, can serve as an emblem of their region, its principal investment reference book, a geographical encyclopaedia that demonstrates and clarifies through geographical maps the investment appeal of the region, its economic and social development, availability of natural and labour resources, tourist sites, etc. Regional and local governments increasingly often become the sponsors to such geographical atlases, especially on the eve of significant regional anniversaries.

Fifthly, federal ministries and other authorities also are interested in compilation of geographical atlases. They need them both for strategic planning and daily proceedings as well as for public relations and popularization of their activities.

Sixthly, the publishing of fundamental scientific and reference atlases by institutes of Russian Academy of Sciences and by geographical departments of universities became possible due to budgetary assignments as well as financial support from non-governmental and governmental foundations and private sponsors. Finding of funds for compilation and publishing of geographical atlases is one of the most acute problems; the diversity of atlases in the domestic market depends upon its solution. A number of interesting atlas projects worked out by institutes of Russian Academy of Sciences, universities, and research institutes still have no financial support. Thus, the realization of these projects is the matter of the near future.

Geographical atlases published during the last five years are very divers in terms of coverage and map scales, themes and contents, size and volume, design and purposes.

COVERAGE

It ranges from the atlases of the Solar system, the world, continents or large parts of the world, e.g. the "Atlas of the Antarctic Region", Russia and its regions, such as federal districts, different constituent parts of the Russian Federation (republics, *oblasts*, *krais*), administrative *rayons*, Russia's individual physiographical or economical regions, to cities, urban districts, and even individual geographical objects within cities (e.g. the Atlas of Moscow University). Besides that, several atlases of water areas are published: those of the oceans (Pacific ocean), of the seas (Sea of Okhotsk, Sea of Japan), of large lakes (Baikal, Ladoga), and even of rivers. Map scales depend naturally on the dimensions of depicted areas. It should be noted that a rather large scale of 1:100 000, restricted for general public in the recent past, is now used for compilation of general geographical atlases of the constituent parts of the Russian Federation. The first such atlas was that of the Nizhegorodskaya *oblast* (province), published by Upper Volga Aerogeodetic Enterprise in 2005.

The **themes** of published atlases are extremely divers. They include general geographical atlases, atlases of natural and socioeconomic features as well as complex atlases depicting both natural and socioeconomic conditions and resources.

COMPLEX GEOGRAPHICAL ATLASES

A real breakthrough in Russian cartography and an important scientific achievement is the "National Atlas of Russia" compiled by Unified Map-Making Enterprise "Kartografiya" in cooperation with leading scientists and experts of different institutes of Russian Academy of Sciences, of ministries and other state authorities, and of Moscow Lomonosov State University. The Atlas consists of four volumes, two of them are already published (Volume 1 "General profile of national territory" and Volume 2 "Nature and environment"). The issue of Volume 3 "Population and economy" and Volume 4 "History and culture" is expected in 2007.

Volume 1 "General profile of national territory" contains general and thematic maps, texts, and illustrations which characterize the history of formation, exploration, and mapping of Russia's national territory from the earliest times up to now, the actual federal organization of the Russian Federation, its geographical regions and the adjacent seas. The Atlas includes many space images, covering the most interesting areas of Russia, as well as reference data on Russia, its nature, resources, population, and economy, and the index of geographical names.

Volume 2 "Nature and environment" provides integrated information on the existing natural conditions and resources of Russia, on the evolution of natural environment from the Pleistocene up to date, on the environmental situation in the country. This volume is illustrated by numerous photos and space images, it also contains explanatory notes to maps and a glossary of principal terms.

The "National Atlas of Russia" is a fundamental comprehensive cartographic work summarizing acquired knowledge on Russia, its nature, population, history and culture. This atlas keeps up and develops the best traditions of Russian cartography and succeeds to the masterpieces of Russian and Soviet map-making.

Among regional complex atlases the most fundamental and interesting in terms of contents are the atlases of the Republic of Bashkortostan, of the Republic of Tatarstan, of the Yamalo-Nenets autonomous *okrug* (district), of the Khanty-Mansi autonomous *okrug* (district), and of the Kaliningrad *oblast'* (province). These cartographic works are voluminous and very rich in information. They contain newest data and all-round characteristics of natural features, population, and economy of the regions as well as their attractiveness for investments. In a certain sense these atlases are "emblems" of these Russia's economically strong regions possessing rich deposits of oil, gas, and amber or being a transportation hub, such as the Kaliningrad *oblast'* (province). Two atlases of the Republic of Tatarstan were published to the millennium anniversary of its capital Kazan', celebrated in 2005. The most impressive of them is the reference and encyclopaedic "Altas Tartarica: the history of the Tatars and the peoples of Eurasia. The Republic of Tatarstan yesterday and today". It distinguishes from other regional atlases not only by its significant volume (887 pages), but also by its original historical and cultural contents. Besides traditional sections devoted to the nature, population, and economy of the region it also includes individual maps of all administrative *rayons* (counties) of the Republic with their principal sights. The emphasis is laid upon the successive presentation of Tatarstan history from the ancient times to the present day and upon the ethnography of the Tatars. The atlas is extraordinary rich in photographs, pictures, and old maps and contains many explanatory and reference texts. The atlas was compiled by Publishing and Producing Centre "Design. Information. Cartography", Ltd.

THEMATIC (BRANCH) ATLASES

The development of new lines in atlas mapping is represented for the first time by a rather numerous series of environmental atlases of Russia, the Irkutsk and Belgorod *oblasts* (provinces) and by atlases of natural and technological hazards of the Russian Federation and of the Republic of Kabardino-Balkaria.

The "Environmental atlas of Russia" (2002), compiled by the geographical department of Moscow Lomonosov State University, contains over 70 maps characterizing the formation factors of the environmental situation in Russia, man-induced impacts on the environment, its changes and the present state as well as medical ecological situation and nature protection in the country. Thematically close is the Federal Atlas "Natural Resources and Environment of Russia" (2002), compiled by National Information Agency "Natural Resources". Its 148 maps with textual notes are devoted to the reserves of natural resources in Russia, their use as well as social and economic conditions of nature conservation and the environmental situation in the country.

On the regional level, the atlases "The Irkutsk *oblast'* (province): environmental conditions for development" and "Natural resources and environmental situation in Belgorod *oblast'* (province)" demonstrate varied interrelations between the public production and natural environment in their entire complexity and interaction of external and internal factors. Environmental atlases serve now as a necessary element in the system of information support of decision-making in the environmental sphere. They fulfil also regulative functions and provide ecological data for the development and implementation of federal and regional environmental policies.

Two atlases of a new type were published in 2005: the "Atlas of natural and technological hazards and risks of emergencies in the Russian Federation" and the "Atlas of natural and technological hazards of the Republic of Kabardino-Balkaria". The former was compiled by the Institute of Geography of the Russian Academy of Sciences on an order of the Ministry of Emergencies of the Russian Federation, the latter by Scientific and Production Corporation "Intellect-S" as a self-initiated project. These atlases give an integral idea of distribution, conditions, and "strength" of natural and technological hazards and risks, of their connection with natural and socio-economic situation in the country and the region. The atlases reflect practically all kinds of natural hazards, such as earthquakes and tsunamis, volcano eruptions, avalanches, landslides and mudflows, floods and ice jams in rivers, hazardous meteorological phenomena (ice-slick and rime, strong winds, heavy rains, hail-damage and thunderstorms, extremely low and extremely high air temperatures, etc.), there are data on distribution of the most dangerous diseases of people and domestic animals, and other information. Besides that, the former atlas presents the chronology of emergencies in the Russian Federation in the years 1991-2005 and deals with the organization of prevention and elimination of emergency effects.

Socially oriented is also the atlas "The Health of Russia" (2005). It was compiled by A.N. Bakulev Scientific Centre of Cardiovascular Surgery to the First Russian National Forum "The health of the nation is a basis of Russia's prosperity". The atlas consists of 82 maps characterizing the factors, which exert the greatest influence on demographical processes and the state of population health. The problem of cardiovascular deceases and methods of their treatment as well as public health financing and the social sphere are especially emphasized in the atlas.

Among geological atlases the greatest attention attracts the fundamental "International geological-geophysical atlas of the Pacific ocean" (2003), compiled by the V.I. Vernadsky Institute of Geochemistry and Analytical Chemistry of the Russian Academy of Sciences in cooperation with U.S., Japan, and German partners. It presents the newest data on gravitation anomalies, magnetic field, bottom topography, thickness of bottom sediments, seismic and volcanic activity in the Pacific ocean.

The "Atlas of the Sakhalin Coastal Zone" (2002) contains maps that characterize geological and geophysical processes, going on in the transitional zone "sea – dry land" of the Sakhalin Island, and mineral resources of this zone (oil, gas, etc.).

Rich fish, crustaceous, and cephalopods resources of the Far East seas is the theme of the atlases of quantitative distribution of nekton species in the Sea of Okhotsk (2003) and in the northwest part of the Sea of Japan (2004), compiled by Pacific Research Fisheries Centre. All maps are based on data of trawling fishing represented with the use of a unified 1° x 1° quadrangles grid. These are first cartographic summaries of this kind on the biota of the Far East seas. These data are important for the monitoring of biological resources.

The "Atlas of Russia's lands: Siberian federal district" was issued by Federal Land Cadastre Service in 2003. This is the first atlas that characterizes comprehensively the land resources of Siberian federal district and the lands of especially protected natural areas, including internationally important wetlands and the World Heritage Sites ("Lake Baikal" and "Golden Mountains of Altai").

The publishing of the sixth volume of the "Atlas of the Oceans" ("Antarctic region") in 2005 was a great event in the Russian cartography. It was compiled by Head Department of Navigation and Oceanography of the Ministry of Defence of the Russian Federation and the State Research Centre of the Russian Federation Arctic and Antarctic Research Institute. In the same way as all previous volumes of the "Atlas of the Oceans", this volume gives all-round characteristics of natural features and resources of the Antarctic polar region, including water areas of the Southern Ocean. It also deals with the exploration history of the Antarctic region and contains general geographical maps of Antarctica with adjacent islands and bathymetrical maps of surrounding seas.

As for atlases of other water areas, a special attention should be paid to the atlases of greatest Russia's lakes – Baikal and Ladoga. They represent integrated characteristics of natural features, resources, and environmental state of these unique lakes.

Deideologization, impartiality, and objectivity in the depiction of the country's history is characteristic of historical atlases, published recently in Russia.

The "Atlas of Russian military history. The 9th-20th centuries" (2003), compiled by Lieutenant General I.I. Maksimov, is a systematic collection of more than 500 maps representing actual information on military events in the history of Russia from the 9th to the 20th century. It should be noted that, as far as quality of design and printing is concerned, this atlas is equal to the best foreign cartographic works and even surpasses them in readability and details of military historical maps. All the atlas maps are supplemented by explanatory texts and over 1000 illustrations (photographs, fragments of pictures and engravings, sketches, and tables), making it possible for a reader to achieve better apprehension of the thematic contents of maps and, therefore, better understanding of events.

The atlas "Great Patriotic War 1941-1945" was compiled and published to the 60th anniversary of the Victory in World War II. With a help of its maps, texts, and illustra-

tions the splendor of people's deed, the role of military leaders, heroism and courage of Soviet soldiers are demonstrated. In terms of contents and design there is much affinity between this atlas and the above mentioned "Atlas of Russian military history. The 9th-20th centuries".

The "Big Atlas of Russia" represents in a cartographical form the entire history of the country since the 9th century up to date.

The "Atlas of Ethnopolitical History of the Caucasus (1774–2004)", compiled by Arthur Tsutsiev and published in 2006, deals with the two-centuries-long history of territorial administrative division in the Caucasus. 50 maps supplemented by detailed comments demonstrate non-coincidence of administrative and political borders with ethnical areas. Territorial or status issues are characterized as historically determined backgrounds of current contradictions and conflicts in the Caucasus.

The "Mongolian peoples. Atlas of history and ethnography", compiled by Victor B. Papuyev, represents the history of the Mongolian peoples (the Mongols, Buryats, and Kalmucks) from the ancient times up to the day and specifies different periods in the history of nomad communities of Central Asia.

The "Geographical Atlas of Russia", published by Unified Map-Making Enterprise "Kartografiya" in 2005, is a distinguishing work among general geographical atlases. It characterizes Russia's federal system, geographical regions and largest cities and is supplemented by geographical reference data. The atlas is rather rich in illustrations (space images and photographs).

The "Illustrated Atlas of Russia" was published by Reader's Digest Russian branch in 2005. It consists of three large sections: thematic (information on various issues characterizing the country as a whole), cartographic ("Russia in maps"), and regional (texts and reference information on all individual constituent parts of the Russian Federation). The two first sections were compiled by "Associated Cartographic Center". This original atlas is made in the same style as the "Illustrated Atlas of the World" published in Russian translation by Reader's Digest Russian branch in 2002.

As for **purposes**, most atlases mentioned above are classified as scientific reference or popular-science products. Besides them, a lot of educational geographical, historical, and regional atlases were published as training aids for schools. There are also special atlases for hunting and fishing amateurs as well as road atlases for drivers.

A **new phenomenon** in the cartographical market of post-Soviet Russia is the offer of popular foreign atlases in Russian translation. Some publishers, such as "Associated Cartographic Centre", "Astrel", Reader's Digest Russian branch, and others, are specialized in issuing of such atlases, or they constitute a significant part of their cartographical production.

PUBLIC AND GOVERNMENTAL ESTIMATION OF RUSSIAN ATLASES

Some recently published geographical atlases were highly prized in Russia and in the world. Thus, the first volume of the "National Atlas of Russia" was awarded by a diploma for excellence in cartography in the category Globes and Atlases at the 22nd International Cartographic Conference of ICA in A Coruña (Spain) in 2005. The "Environmental atlas of Russia" and the Federal Atlas "Natural Resources and Environment of Russia" were awarded by the State Prize of the Russian Federation in 2005. The "Big Atlas of Russia", compiled by Publishing and Producing Centre "Design. Information.

Cartography", Ltd., got the first prize ("Book of the Year") at Moscow International Book Fair in 2006.

Of course, it is impossible to mention in a short review all the atlases published during the last five years. We regarded only those which are the best in our opinion and represent principal trends of atlas mapping in Russia.

KARTOGRAFIA ATLASOWA W ROSJI W LATACH 2002-2006

Streszczenie. W ostatnich 5 latach w Rosji opublikowano ponad 100 różnych atlasów geograficznych. W artykule podano przyczyny tak wielkiego boomu wydawniczego – przytoczono fakty, tematy, zamierzenia i nowe trendy w kartografii atlasowej. Przedstawiono również kilkanaście przykładów atlasów ogólnogeograficznych, atlasów tematycznych i branżowych, podano ich ocenę jakościową i opisano uznanie zdobyte na forach krajowych i międzynarodowych.

Słowa kluczowe. Russian cartography, Russian atlases, cartographic market

Accepted for print – Zaakceptowano do druku: 30.09.2007