EDITOR-IN-CHIEF'S PREFACE

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This issue presents a wide range of articles that can attract the reader both by the novelty of approaches and data, and by their practical orientation. For the first time in recent years, articles on infectious pathology do not come out on top.

The first leading article of the issue is undoubtedly a study led by an outstanding scientist, member of RAS V.A. Tutelyan (S.A. Apryatin et al.; Moscow, St. Petersburg), who conducted a comparative analysis of changes in the liver transcriptome of two lines of rats and three lines of mice treated with excessive calorie content and lipogenic effect diets. In each animal species and sex studied, genetic variants with a diet-induced obesity tendency were identified. This justifies new approaches to personalized diet therapy for alimentary-dependent diseases.

The second editorial article is a review of the master of free radical processes research V.Z. Lankin et al. (Moscow), which provides evidence of the predominant role of low-density lipoproteins (modified with low molecular weight dicarbonyl compounds formed during free radical oxidation of lipids and carbohydrates) in the development of endothelial dysfunction and atherosclerotic vascular damage. It is assumed that pharmacological correction of free radical oxidation can slow down not only atherogenesis, but also diabetogenesis.

The section of **therapeutic orientation** is represented by a few works. A.N. Sumin et al. (Kemerovo, Novokuznetsk) devoted their article to the problem of diagnosing acute coronary syndrome in women. The author of the second work L.A. Ivanova (Irkutsk) identified risk factors for the development of vascular dementia, but concluded that they are potentially reversible, which can reduce the development of cognitive disorders. There are unexpected findings in the other publication. We are used to the fact that the troponin test has become a routine in the diagnosis of myocardial infarction. But it turned out, according to the article by M.S. Smirnova et al. (St. Petersburg) that troponin I increases 2–4 times (without myocardial damage) in cross-country skiers in response to training and may be an indicator of its intensity.

The only article on **epidemiology** came from Kazakhstan (Almaty, Uralsk), which presents an analysis of long-term data on the epizootic and epidemic activity of natural foci of tularemia and the created electronic map of settlements endemic for tularemia to determine the volume of preventive measures.

Surgical articles are represented by a large section of reviews, original studies, and descriptions of unique cases, including ones in the field of **oncology**. The review by E.A. Kravtsova et al. (Tomsk) might be of interest to the physicians in terms of education. The article showed that in countries implementing the National Program of Vaccination against Human Papilloma Virus of High Carcinogenic Risk, a decrease in the incidence of both cervical pathologies of varying severity and other cancers associated with the carriage of this virus was registered. The second review by K.V. Protasov and O.A. Barakhtenko (Irkutsk) systematized data on stratification of the risk of cardiovascular complications of surgical treatment of cancer patients by using different biomarkers. It seems that specialists will also be interested in the experience of V.A. Pelts et al. (Kemerovo) on successful liver resections in the treatment of hepatocellular carcinoma, as well as a description of a unique clinical case of diagnosis and treatment of Castleman tumor of rare retroperitoneal localization, given by M.B. Polyanskiy et al. (Kursk).

Two articles are devoted **to coloproctology.** The article by Yu.A. Churina et al. (Moscow) showed the possibility of expanding the indications for the treatment of high anorectal fistulas involving up to 2/3 of the sphincter complex. The authors of the second article, A.A. Zakharchenko et al. (Krasnoyarsk), described the case of successful treatment of recurrence of hemorrhoidal disease by endovascular occlusion of hemorrhoidal arteries.

Dentists may be interested in the article by A.A. Fefelov et al. (Chita, Irkutsk) who have shown the effectiveness of plasmolifting for the treatment of chronic periodontal disease, including restoration of endothelial function evidenced by its markers. **Ophthalmologists** will learn about a rare case of sclerochoroidal calcification, which can be mistaken for a malignant tumor, from the article by A.D. Chuprov et al. (Orenburg).

In this issue, a large number of articles are related to **the study of obesity** as a global epidemic and lipid metabolism disorders.

In the treatment of obesity, one of the problems is sarcopenia, and in this regard, I would advise you to read the review of D.P. Kurmaev et al. (Samara), who evaluated the need for branched-chain amino acids in the treatment and prevention of sarcopenia in geriatric patients and concluded that the addition of BCAAs may be justified in cases where it is not possible to consume sufficient amounts of high-quality protein from food.

The original and insufficiently studied topic of the influence of olfactory and taste perception on metabolic homeostasis in obese patients was revealed in the review by Yu.G. Samoilova et al. (Tomsk).

Ju.G. Birulina et al. (Tomsk) revealed a change in the reactivity of the respiratory tract and the formation of bronchospastic conditions and the induction of an inflammatory response in the respiratory system in the obesity modelling in rats. On another model, T.V. Brus et al. (St. Petersburg) showed that in non-alcoholic fatty disease in the experiment, the increased formation of cytokines IL-1, IL-6 inhibits the absorption of iron in the duodenum and blocks the release of iron processed from aging erythrocytes into the plasma, which may be the pathogenesis link of anemia.

More and more attention of researchers is attracted by **the problem of rehabilitation of patients** after diseases and vascular accidents. There are two such articles in the issue. In the first one, the authors from Rostov, S.S. Memetova et al., revealed that the availability of measures for medical rehabilitation of a patient with a stroke in the early recovery period in a specialized rehabilitation center is limited and about half of the respondents expected a referral of up to 6 months, which indicates the need to expand the network of such institutions. The second article by V.A. Beloglazov et al. from the Republic of Crimea regarding the rehabilitation of post-COVID syndrome is also far from optimistic – it is stated that the presented plan of sanatorium-resort treatment is ineffective and the need for deeper scientific research in the direction of studying the mechanisms of formation of low-intensity inflammation and methods of combating it.

I found the review by E.M. Kuklina and N.S. Glebezdina from Perm interesting. It is devoted to insufficiently studied markers of Th1-polarized Th17 cells, which can cross the histohematic barriers and play a key role in the pathogenesis of many inflammatory and autoimmune diseases.

Where are three articles devoted to investigations *in silico*. The one by N.Yu. Nosov et al. from Moscow showed that chocolate agar with growth additives produced by the Russian manufacturer "Gem LLC" can be successfully used for the cultivation of pure culture of *N. gonorrhoeae*, instead of imported one, which reduces the domestic microbiology dependence on imports. V.I. Shlyapkina et al. (Saransk) developed emulsion forms of Sosnovsky hogweed furanocoumarins as promising photosensitizers for various diseases phototherapy.

The issue concludes with the article by T.A. Fominykh et al. (Simferopol) dedicated to the 17th century anatomist Jean Pecquet, who made a significant contribution to the development of this science.

We are waiting for new interesting articles and comments, and of course are welcoming new authors!

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