The object of the research is the information about the number of child morbidity cases of the city of Mozyr for the period from 2012 to 2016, which was acquired at Healthcare Facility "Mozyr City Children's Hospital." In the study the following methods are used: the calculation of the average annual indicator trends (A1), the calculation of the average annual morbidity indicators (A0), identification of reliable differences in two sets, time series analysis by the method of number alignment by a parabola of the first order, the calculation of the ratio coefficient between the indicators of general and primary morbidity.

In the structure of child morbidity of the city of Mozyr the first rank place over the study period hold the following classes of diseases: respiratory diseases, the eye and its adnexa diseases, infectious and parasitic diseases, injuries and poisoning. The conducted comparative analysis of general morbidity indicators at the end of the study period, as compared to the start, shows a significant increase in the following classes: respiratory diseases (t = 1,2), some infectious and parasitic diseases (t = 3,5), the eye and its adnexa diseases (t = 4,4), in the class of "injuries, poisoning and some other consequences of external causes" no reliable differences are found (t = 1,8, p> 0,05). Reliable differences in the direction of increase in the primary morbidity indicators are found in the following classes of diseases: respiratory diseases (t = 9,6), the eye and its adnexa diseases (t = 2,6). In the direction of decrease reliable differences are found in "some infectious and parasitic diseases" (t = 2,6). In the class of disease "injuries, poisoning and some other consequences of external causes" no statistically significant reduction is found (t = 1,79, p> 0,05). The ratio coefficient between the general and primary morbidity within the study period for all the diseases under the study was close to 1, except for the eye and its adnexa diseases (2.5-3.4). The growth of this ratio coefficient over the years may indicate an increase in chronization of this pathology among the children population of the city of Mozyr.

## ATMOSPHERIC POLLUTION AS A CAUSE OF CHRONIC BRONCHITIS

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The article deals with air pollution as a cause of chronic bronchitis, its types, symptoms, diagnosis and treatment.

Keywords: atmosphere, morbidity, bronchitis, smog, industry, pollution.

The disease occurs when under the influence of reason in specific conditions violated the "trim" of the human body with the environment, i.e., when the adaptability of the organism to changing environmental factors becomes insufficient.

The reasons for the appearance of chronic bronchitis are extremely many. The main ones are the following: air pollution, tobacco Smoking, infectious respiratory diseases of adults (especially influenza) and children (measles, whooping cough), diseases caused by colds, diseases of the paranasal sinuses and oral organs [1].

Many have undoubtedly heard and read about the ominous smogs that often hang over London, Los Angeles, Hamburg, New York, Tehran, Mexico city, Tokyo, Chicago, Paris and the Japanese "smog capital" Nagoya, as well as many other industrial centers of Western Europe, Asia and America, turning them into "choking cities." Residents of these cities have to breathe not air in the usual sense of the word, but a concentrate of carbon monoxide, nitrogen oxides, chemical compounds of sulfur, lead, mercury, vapors of complex organic solvents, rubber dust, soot, ash, fog droplets, gasoline vapors and many other chemicals that are extremely "generously" emit into the atmosphere dozens of plants, factories and thousands of cars.

A number of studies have shown the impact of emissions from some industries on human health. It is shown that the etiology of respiratory diseases is associated with increased air pollution. Studying the changes in the health status of the population of the Republic of Belarus under the influence of environmental factors, the following immunomodulatory effects were observed and described: transient inhibition and stimulation of the immune response, shift of the peak of antibodies, decrease in the avidity of antibodies, change in the expression of surface cell receptors, proliferative activity or differentiation of immunocompetent cells. Based on the above, an attempt is made to assess the impact of environmental factors in the territory of the Republic of Belarus on the health of the population.

In our cities in some cases released into the atmosphere a large amount of dust, gases that are harmful to the respiratory system, especially people who have suffered acute respiratory or any pulmonary disease. Therefore, in cities and industrial areas, the incidence of chronic bronchitis is much higher than among villagers and villages.

Unfortunately, many production processes are still imperfect, and in some enterprises the concentration of dust, smoke, vapors and gases is not yet possible to significantly reduce.

Can we assume that every person who coughs for a long time, allocates sputum and notes shortness of breath, is sick with chronic bronchitis? No, no. Cough may occur not only as a result of irritation of the bronchi smoke, steam, gases, various microbes, but also as a result of the development of other diseases. Bronchi, which were in the focus of inflammation or malignant neoplasm, also involved in the process. The so-called chronic segmental bronchitis develops. So, any specific, characteristic only for chronic bronchitis signs do not exist. Despite this, the disease is diagnosed relatively easily. But sometimes, to say with full confidence that the patient has chronic bronchitis, the doctor has to conduct several diagnostic tests [2].

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# CHARACTERISTICS OF CORRECTION METHODS OF THE FUNCTION OF THE THYROID SYSTEM IN THE PATHOLOGY OF THE THYROID GLAND

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An analysis was made of the results of treatment of thyrotoxicosis, hypothyroidism and autoimmune thyroiditis by various methods. The most effective treatment regimens for these pathologies have been identified.

*Keywords*: incidence, hypothyroidism, hyperthyroidism, autoimmune thyroiditis, causes of onset, symptomatology.

Currently, thyroid disorders are one of the most common in the world. The incidence continues to grow, due to various factors, among which the most important are iodine deficiency, high radiation background and environmental pollution, therefore the pathologies of the thyroid system require special attention not only from medicine but also from ecology.

To solve the problem of evaluating the effectiveness of treatment of thyroid pathologies were used data on the determination by the immune-enzyme methods of blood free thyroxine (T4cv.), Thyroid-stimulating hormone and antibodies to thyreperoxidase.

In the treatment of thyrotoxicosis the following medicamental methods were used: after detection of pathology, patients were prescribed the drug "Mercazolil", which blocked the production of thyroid hormones in the thyroid gland, then surgical intervention was carried out, after that the patients were transferred to lifelong replacement therapy with "Eutirox" with synthetic analogue T4 thyroid hormone glands. With an increase in the dosage of the drug "Merkazolil" from 30 mcg to 100 mcg, the formation and secretion of thyroid-stimulating hormone into the blood and the decrease in the blood content (T4cv) were observed.

Based on the data obtained, it can be concluded that the treatment of diffuse toxic goiter through surgical intervention and lifelong replacement therapy with thyroid hormones demonstrates positive dynamics, has a high therapeutic effect and positively affects the health status of the patients under study.

The drug approach to the treatment of hypothyroidism is the replacement of the thyroid hormone deficiency to normal with synthetic medicinal analogues of T4 with preparations of "Eutirox" or "L-thyroxine". Analyzing the obtained data it should be noted that the treatment of hypothyroidism differs from the temporary hypothyroidism of the thyroid gland developing after resection to achieve a positive therapeutic effect. There were significant differences in the blood levels of thyroid hormones in patients after changing the dosage of the drug. With an increase in the dose of "L-thyroxine" from 100 mcg to 150 mcg, there was a pronounced increase in the thyroid-stimulating hormone content in blood and an increase in the blood T4cv content.

At the beginning of the development of chronic autoimmune thyroiditis, at the stage of manifestation of hyperthyroidism, drug therapy is not indicated because of its destructive nature and short duration of 1 to 6 months. At the stage of hypothyroidism, hormone replacement therapy with Eutirox and L-thyroxine is used, which, as a rule, is life-long.