



## COMPLICATIONS AND TREATMENT METHODS OF DISEASES OF THE ENDOCRINE SYSTEM.

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**Abstract:** The endocrine system plays a very important role in the regulation of almost all vital processes in the human body. Endocrine glands produce hormones, disruption of this process leads to serious diseases. There are various etiological factors causing endocrine system dysfunction. Often, the endocrine system appears as a result of a primary disorder of the nervous system. Damage to the higher nervous system as a result of nerve damage can lead to thyroid disease, Bazedov's disease or damage to the pancreas and diabetes. Endocrine gland dysfunction is caused by inflammatory processes of the cerebral cortex and nearby subcortical centers, traumas, hemorrhages, or the development of thrombosis of cerebral vessels.

**Key words:** Endocrine system, Shichen's syndrome, pituitary gland, adenomas, cachexia.

Endocrine glands or endocrine glands are glandular organs that do not have excretory ducts, so the hormones they produce pass directly into the blood. These include the pineal gland, pituitary gland, thyroid gland, parathyroid glands (parathyroid glands), adrenal glands, gonads, as well as special tissues of more complex organs that perform other functions. For example, the islets of Langerhans of the pancreas, the egg cells of the ovaries, and the Leydig cells of the testicles also produce hormones. There is also an APUD-system, which produces hormones of polypeptide or protein nature of some glands and tissues and unites endocrine cells arising from the neuroectoderm. Glucagon-producing alpha-cells of the islets of Langerhans, insulin-producing beta-cells, calcitonin-producing parafollicular cells of the thyroid gland are among them. A number of cells that produce tissue hormones: alpha-cells of the stomach (enteroglucagon), delta cells of the stomach (gastrin), S-cells of the duodenum (secretin) also belong to this system. Endocrine glands, as mentioned above, synthesize hormones, these hormones are chemical compounds that enter the blood and have a specific effect. At the same time, some of the hormones go with the blood and affect distant organs (systemic hormones), while others have an effect at the place where they appear (local, local hormones). Hormones have three main characteristics: 1) their effect is aimed at a certain goal: hormones affect a certain number of tissues; 2) the effect is unique, i.e. specific: "one

hormone - one target tissue - same effect"; 3) the effect is excellent, that is, only a very small amount of hormone is needed for a typical response reaction to occur. In any case, under the influence of various pathogenic factors, hyperfunction (increased gland function), hypofunction (decreased function) or loss of function - dysfunction may occur in the endocrine glands. Such changes in the functional state of the endocrine glands lead to the appearance of a certain disease in the body.

With the advent of electron microscopy and immunocytochemical methods of examination, it became possible to clearly define the secretory cells and their functional activity. ) thyrotrope cells that produce hormones that stimulate the thyroid gland, 3) gonadotropic cells that produce follicle-stimulating hormones, luteinizing hormone, 4) lactotrope (prolactin) cells, 5) somatotropic (produce growth cells) cells. In addition, hypophysis contains chromophores, which also contain secretory granules. The active secretory process continues with the reduction of the granules in the cells just mentioned. Currently, it has been established that the production of pituitary hormones is controlled by the hypothalamus with the help of its releasing factors. Pathological processes occurring in the pituitary gland are diverse. They can consist of non-specific and specific inflammatory processes, embolisms, ischemia-induced necrosis, as well as various tumors, which later lead to the formation of fibrous tissue. Depending on the nature of the pathological process, pituitary function may increase (beginning of hyperfunction) or decrease (hypofunction). Pituitary hyperfunction is often due to the occurrence of benign tumors (adenomas), hypofunction may be due to sclerotic atrophy, tuberculosis, the beginning of the wound process, the occurrence of infarction and scarring of the organ, etc. The most common cause of pituitary hyperfunction, as mentioned above, is pituitary adenomas, which have the property of increasing the production of pituitary hormones. Three types of adenomas are distinguished: the first type, from prolactin-producing lactotropic cells; from somatotropic cells producing the second type of growth hormone; The third type consists of corticotropic cells that produce adrenocorticotrophic hormone. Adenomas consisting of other types of pituitary cells, i.e. pituitary cells that produce folliculin-stimulating, luteinizing and thyrotropin hormones, are rare. All adenomas are monoclonal and produce only one hormone. Adenomas that are composed of two different cells, or even if they are identical, are composed of cells that produce two different hormones, are very rare.

Shichen's syndrome - pituitary necrosis that begins after childbirth - also causes pituitary insufficiency. During pregnancy, the pituitary gland doubles in size, which causes the blood supply to this gland to fail due to compression of its vessels. Posthemorrhagic anemia or hemorrhagic shock may occur if bleeding occurs during labor or delivery, further impairing the blood supply to the anterior pituitary. In such conditions, necrosis may begin in the adenohypophysis. The first symptoms of pituitary insufficiency observed after childbirth are the involution of the mammary glands and the absence of milk, and the absence of lactation. Later, the menstrual cycle is disrupted. Pituitary insufficiency is known in several cases after several years, when the deficiency of tropical hormones becomes obvious. As the process worsens, the function of the gonads deteriorates, along with atrophy of internal organs, cachexia (Simmonds cachexia). Pituitary infarction is less common in sickle cell anemia, vasculitis, syndrome of multiple coagulation of blood in vessels. Large-scale necrosis and hemorrhages in the pituitary gland can cause a person to have convulsions.

**References:**

1. Strukov A. I., Serov V. V. Pathological anatomy. — M: Medicine, 1993.
2. Abdullakhodjaeva M. S., Giyasov 3., Kuznetsova T. A. Social aspects of sudden infant death syndrome. - Second regional Congress of pediatrics of Central Asia and Turkey with international participation, Tashkent, 1994, p. 133.
3. Ismailov S.I. Selected Lectures on Endocrinology. -Tashkent, 2005.-B. 105-183.

