



Knut R.P., Sydorchuk R.I., Volyanyuk P.M.

**THE INFLUENCE OF MORPHOLOGICAL CHANGES OF HERNIA SAC
AND HERNIA-SURROUNDING TISSUES ON CHOICE OF METHOD OF HERNIOPLASTY IN ELDERLY
PATIENTS SUFFERING INGUINAL HERNIAS**

*Department of General Surgery
Higher state educational establishment of Ukraine
«Bukovinian State Medical University»*

During last year the incidence of inguinal hernias in elderly grew significantly. The complications development in these patients after inguinal hernioplasty reached 6-18%. It can be explained with the fact that during surgery and postoperative period surgeons don't take all the aspects of complications pathogenesis in these patients into consideration. The aim of the study was to evaluate the morphological changes of hernia sac and hernia-surrounding tissues in elderly patients with inguinal hernias.

For the research purpose we used biopsies of hernia tissues of 24 patients (aged 60-83, mean 67.47 ± 2.54 yrs), obtained during the inguinal hernioplasty. We paid special attention to evaluation of the muscular tissue atrophy and development of cicatrized and inflammatory changes. For investigation we assessed following tissues: hernia sac, subcutaneous cellular tissue, muscular tissue and, in some cases, preperitoneal cellular fat. Fragments of tissues were fixed and processed in accordance to histological standards.

We determined principal signs of chronic inflammation of the hernia sac in all 24 patients. In 8 (33.3%) patients we established isolated inflammation of hernia sac tissues, and in 10 (41.6%) patients it combined with chronic inflammatory changes of hernia-surrounding tissues. In 6 (25.0%) patients with the recurrent inguinal hernias the inflammatory changes of hernia sac and hernia-surrounding tissues were very pronounced and combined with their cicatrized changes. In all patients we also established expressed atrophic changes of muscular tissue. The last can witness about the fact that the suture methods of hernioplasty can cause the further development of ischemia, atrophy and cicatrized changes in muscles of the anterior abdominal wall, leading to hernioplasty insufficiency. Use of 'suture-free' techniques in elderly patients may greatly reduce inflammatory changes impact on healing, though not providing full protection.

Among the reasons for complications development in post-hernioplasty period in elderly patients are the chronic inflammatory changes of hernia sac and hernia-surrounding tissues. The employment of antibacterial and anti-inflammatory remedies can be important component for postoperative complications prophylaxis in these subjects. Inflammatory and cicatrized changes after the suture methods of hernioplasty cause ischemia, atrophic and cicatrized changes in muscles during postoperative period, making these methods of surgery in elderly patients not sufficiently effective.

Kozariychuk N.Ya.

ENDOCRINE OPHTHALMOPATHY. MANAGEMENT AND TREATMENT

*B.L. Radzikhovskiy Department of Ophthalmology
Higher State Educational Establishment of Ukraine
"Bukovinian State Medical University"*

Endocrine ophthalmopathy is a complex orbital disease of unknown cause characterized by round-cell infiltration, edema, and proliferation of connective tissue. These changes affect predominantly the extraocular muscles and to a lesser degree affect the lacrimal glands and retrobulbar fat. Endocrine ophthalmopathy may occur alone, in connection with diffuse thyrotoxic or pretibial myxedema or with both conditions. The condition is more common in women. Endocrine ophthalmopathy, or endocrine exophthalmos, the latter term was coined by Brain in 1959, is a useful but somewhat misleading appellation because the orbital changes may occur without endocrine abnormalities.

Materials and methods - 12 patients of both sexes (22 orbits) with endocrine ophthalmopathy in the active phase were included in the study. The average age of these patients varied from 43.6 ± 10.5 years. The duration of the disease ranged from 3 to 12 months. The activity of the disease was evaluated according to a scale of clinical activity of endocrine ophthalmopathy and thickening of the extraocular muscles based on MSCT of the orbits.

One month after the start of pulse therapy there was a significant reduction of endocrine ophthalmopathy activity, and the severity of the disease in all patients was confirmed by an increase in vision, a decrease in the level of intraocular pressure, reduction in the amount exophthalmus at 0.8 ± 0.02 mm ($P < 0.05$) and the frequency of diplopia.

Immunosuppressive treatment was effective at an early stage of compressive optic neuropathy and 3 months after the start of glucocorticoid therapy in 68% of cases a transition to the inactive phase of the disease was determined. Recurrence of the disease was diagnosed in 3 patients after 12 months of treatment.

Also, patients with endocrine ophthalmopathy should be examined by both an endocrinologist and an ophthalmologist with relevant work experience. Immunosuppressive therapy of endocrine ophthalmopathy should start in preclinical phase of process and it should be initiated by the ophthalmologist. Intravenous pulse therapy with high doses of methylprednisolone followed by oral administration in the long-term regime is effective and safe; this contributes to the rapid achievement of the clinical effect and stable remission of the disease. A thickening of the extraocular muscles is the criterion for the initiation of glucocorticoid therapy. Smoking is associated with an increased risk of progression of endocrine ophthalmopathy and the patient should be persuaded to give up smoking. Artificial tears should be prescribed.