

Morphological Features of Laryngeal Cancer Diagnosis

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ABSTRACT

Immunohistochemistry in laryngeal cancer taLCets predictive factors of PCNA, p53, Ki67 that correlate with histopathological degree of lesion and development. Our study highlights the need and importance of a multidisciplinary approach to laryngeal malignancies, focusing on the comparison of clinical and morphological information with histological and immunohistochemical analysis of tumor protein p53, nuclear proliferation antigens PCNA and Ki-67 and epidermal growth factor receptor and CD44 antigen is increased expression of EGFR, which is associated with late stage, poor survival and resistance to treatment (radiation therapy).

Laryngeal cancer occurs in 25-30% of the total incidence among head and neck malignancies that tend to rise globally [1], despite the fact that current therapies are currently being used, there is a decrease in 5-year survival. According to the World Cancer Research Agency GLOBOCAN in 2018, the number of patients with malignant neoplasms amounted to more than 18 million people, of which the number of deaths was 9.5 million, while patients with Lc amounted to 177,422 (1%), deaths - 94,771 (1%), the incidence is 7 times more common in men than in women. According to the Cancer Prevention Center of the Republican Specialized Scientific and Practical Medical Center for Oncology and Radiology (RSNPMCR), more than 250 patients with LC are detected every year in the Republic of Uzbekistan, with 65% of working age.

At the time of seeking medical care in patients with LC, the III-IV stages of the process are determined, as a result of which adequate treatment and rehabilitation of these patients are difficult and problematic [2] according to 769 US clinics (16,213 patients), did not note a trend towards increased early detection of this disease.

The importance of immunohistochemistry in laryngeal cancer taLCets PCNA prognostic factors, p53, Ki67, which correlate with histopathological degree of lesion and development.

Our study highlights the need and importance of a multidisciplinary approach to laryngeal malignancies, focusing on the comparison of clinical and morphological information with histological and immunohistochemical analysis of tumor protein p53, nuclear proliferation antigens PCNA and Ki-67 and epidermal growth factor receptor (EGFR) and CD44 antigen. In squamous cell carcinoma of the head and neck up to 90%, there is increased expression of EGFR, which is associated with late stage, poor survival and resistance to treatment (radiation therapy).

Mutations in p53 are one of the most common abnormalities in SCCHN and can be seen in severe dysplasia. TP53 mutations are found in 39-53% of SCCHN tumors and in 56.7% of

laryngeal carcinomas. P53 mutations have been shown to be associated with poor survival [3].

The CD44 adhesion molecule, which is present in both normal epithelium and dysplasia, may play an important role in predicting laryngeal cancer. The presence of EGFR (epidermal growth factor receptor) expression may correlate with the degree of tumor differentiation. EGFR was well represented in the epithelium of well-differentiated carcinomas, moderately and weakly - in low-differentiated ones. Overexpression of EGFR was associated with an increased risk of death from the disease. High EGFR levels were reported in patients with tumor recurrence and poor prognosis [4].

To detect proliferation, a more appropriate marker is Ki-67. High Ki-67 expression may be associated with cervical lymph node metastasis, making it a valuable predictor of prognosis of squamous cell carcinoma of the larynx [5].

Laryngeal cancer can be treated with transoral laser microsurgery of the larynx or with a cold instrument exposed by partial laryngectomy or radiation therapy (RT). All these methods give good oncological results. For many years, laryngectomy has been considered the main method of treating LC, which has certain consequences - gross defects in the neck, lack of speech, impaired touch and breathing through natural pathways, as well as dependence on tracheostoma [6].

During radical surgery in these patients during the first 3 years, a recurrence of the disease is observed, which accordingly leads to an unfavorable prognosis. In this regard, it is necessary to resolve issues early diagnosis of WG, which will contribute to expanding the possibilities of timely treatment with an improvement in the quality of life of this severe category of patients.

Currently, special attention is paid to organ-preserving and reconstructive operations. Only topical treatment of glottis carcinoma at the T1 stage (through endolaryngeal endoscopy or exclusively radiation therapy) complies with oncological prescriptions. Organ-preserving operations are divided into two groups: microsurgical or laser endolaryngeal resection and open methods [7].

However, the disadvantages of radiotherapy are extensive, including local temporary or persistent edema, glottis stenosis, xerostomia, and hypothyroidism. In the literature, both methods have shown good oncological and functional results; however, the choices made depend on the experience and preferences of the group responsible for the patient, as there are no clear advantages of one over the other.

The goal of treating early glottis cancer (T1-T2) is to achieve local control of the disease, preserve the organ and its functions (breathing, respiratory protection and phonation).

Speaking about modern methods of treating laryngeal cancer, one cannot but dwell on the use of a surgical laser. According to the authors, using a surgical laser for the treatment of laryngeal malignancies, this technique has approximately the same oncological and functional indicators as the radiation and surgical method [Weiss BG, 2017; At the same time, compared to traditional surgery, the operation is faster. Due to the fact that the intervention is carried out using direct support laryngoscopy, there is no need for external incisions of the skin and cartilage. During tumor removal, the physical characteristics of the laser provide vessel coagulation, reducing bleeding and increasing the degree of ablation. Compared to teletherapy (TGT), treatment is much faster, while there are practically no complications from healthy tissues, such as radiation epitheliitis, general decrease in immunity, etc.

Transoral laser microsurgery (TOLM) is an effective treatment for advanced laryngeal cancer and exhibits 2-year and 5-year overall survival rates of 75% and 55%, respectively. This compares with rates of 74% and 54% in competitive chemoradiation and 75% and 56% for radiotherapy alone.

itm treatment; Based on the data obtained, groups of patients will be determined by the aggressiveness of the course of the disease and the exact criteria for the introduction of patients in LC.

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