# DYNAMICS OF THE IMMUNE STATUS OF WOMEN IN THE TREATMENT OF HUMAN PAPILLOMA VIRUS (HPV) OF THE CERVIX

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#### **ABSTRACT:**

HPV in the process of infection affects the basal layers of immature skin cells and mucous membranes, which are then a constant source of infection of epithelial cells. An infected cell may contain from 10 to 200 episis in the cytoplasm of the cells of the basal layer for some time. Infection is facilitated by microtrauma (bacterial microdamage, mechanical trauma, etc.) of the skin and mucous membranes. The most vulnerable area is the mucous membrane in the cervical transformation zone - the transition site of the stratified squamous into the cylindrical epithelium. For infection, a single viral particle is enough to trigger an infectious process. The time elapsing from the time of initial infection to clinical manifestations can vary and is determined by the titer of the infectious particles. A low titer leads to the formation of a latent infection (carriage). It is known that the activation of latent infection is possible only against the background of a decrease in immunity. KEYWORDS: HPV, LSILL, HSILL, cervix, clinical and morphological immunity,

analyzes, immunocytochemistry, colposcopy, and histological examination.

#### **INTRODUCTION:**

In recent years, in many countries of the world there has been a tendency towards an

increase in the incidence of human papillomavirus infection (PVI) caused by human papillomavirus (HPV). Despite the existing methods of treatment, the problem of resistance of PVI to the therapy is relevant. Squamous intraepithelial lesions (SIL) of the cervix occupy a leading position in the structure of gynecological pathology among women of reproductive age (1) The main role in the development of SIL of the cervix is played by the human papilloma virus (HPV). According to the literature, the peak of HPV infection is between 15 and 30 years old and makes up 18.6%, after 30 years, human papillomavirus infection decreases (9.9%), while the incidence of SIL and cervical cancer increases (2) Annually, in the Republic of Uzbekistan, an average of 2844 new cases of oncogynecological pathology are diagnosed, which is 13.5% of the total number of cases. Among oncogynecological pathologies in 2016, the largest number of patients was registered with cervical cancer (cervical cancer) - 1465, incidence rate GP - 4.6, SP - 9.2. At the same time, the GP of mortality in the republic in 2016 for all the localization of ZN amounted to 43.8 per 100 tons, from RSM GP - 2.5, SP - 5.1. The highest rates were in Andijan - 10.2, Khorezm - 6.9, Namangan regions - 6.7, Tashkent - 6.8 and Karakalpakstan - 5.9, incidence / mortality 1.8. Their dynamic change is characterized by a stable increase in the incidence and accumulation of the patient population. The smallest indicators were noted

in Syrdarya - 2.5, Surkhandarya - 2.9, Kashkadarya regions - 3.0. The age peak falls on 45–59 years, the percentage of patients in stages III and IV remains high, which requires a study of the oncoepidemiological situation depending on the territory of detection (3).

However, the epidemiological data on the prevalence of cervical cancer (cervical cancer), which stubbornly remains in the "top three" of cancer, directly related to are human papillomavirus infection (4) [Bebneva T.N., Muizhnek E.L., Rogovskaya S.I. Kiselev V.I., Ashrafyan L.A. Pathogenetic treatment of neoplastic processes of the cervix uteri: new approaches // Doctor.Ru. 2016.]. By 2016, the total percentage of cervical cancer cases in the Russian Federation was 22-24%, and the incidence of cervical cancer I - II stages increased over the years of the study from 57% to 67%. About 14,000 new cases of cervical cancer are registered in Russia annually, which makes up more than 30% of all malignant neoplasms of the female genital organs. Incidence continues to increase. More than 160,000 women are registered with this pathology in oncological institutions of the country. With PVI, the most important for determining treatment tactics and evaluating its effectiveness are methods for determining the immune status of patients as an objective reflection of the activity of antiviral immunity.

There is evidence that both with persistent and transient forms of PVI, the number of immunocompetent cells (T and B lymphocytes) is higher compared to the control, which indicates the activation of the immune system (5) [Arany I., Tyrinq S. Systemir immunosuppression by HIV infusion influence HPV transcription and fhus local immune responses in condylota ocuminafum // Int.J. STD AIDS. - 1998. - No. 5. - S. 268-271]. To the above, it should be added that the immune defense of a macroorganism in viral infections

has features due to two factors of the existence of the virus: extracellular and intracellular.

However, specific antiviral antibodies can interact only with the extracellular virus, intracellular structures are not accessible to them in vivo. Along with this, T-killers, natural killers, interferon and serum inhibitors of viral particles are an important factor providing antiviral immunity. The above applies to papillomaviruses, because their main feature is that they either transform cells without reproduction, or cause a productive infection, resulting in cell death and the formation of fullfledged viral offspring.

In addition, it should be noted that the Papovaviridae family undergoes a slow reproduction cycle in the cell nucleus and causes latent and chronic forms of infection with a recurrent course. Cellular immunity is the most important part of the immune system, constitutionally designed to eliminate cells bearing signs of genetic foreignness, which include and virus - infection. It should be noted that the structure of the virus allows for a longterm persistence in the body, exacerbating the existing secondary immunodeficiency.

The literature data confirm that recurrent condylomas are a classic marker of immunodeficiency, and according to many scientists, there is no doubt that the risk of PVI is associated with the failure of cell-mediated immunity (6). Considering that the main problem of PVI is relapse of clinical manifestations.

## **REFERENCES:**

- Radzinsky, V. Ye. Guide for outpatient care in obstetrics and gynecology / Ed. V.E. Radzinsky. - M.: GEOTAR - Media. 2016. -1136 S.
- Screening for cervical cancer: what's new in world practice / G. R. Bayramova, L. Z. Fayzullin, A. I. Korolkova [et al.]

- 3) Almukhamedova B.G., Aliyev D.A. Republican Specialized Scientific and Practical Medical Center of Oncology and Radiology of the Ministry of Health of the Republic of Uzbekistan 100179, Uzbekistan, Tashkent, st. Farobi, d.383 Email: alievada@yandex.ru. 108 Materials of the First International Forum of Oncology and Radiology, Moscow, September 23-28, 2018
- Bebneva T. N., Muizhnek E. L., Rogovskaya S. I., Kiselev V. I., Ashrafyan L. A. Pathogenetic treatment of neoplastic processes of the cervix: new approaches // Doctor.Ru. 2016.
- 5) Arany I., Tyrinq S. Systemir immunosuppression by HIV infusion influence HPV transcription and fhus local immune responses in condylota ocuminafum // Int.J. STD AIDS. - 1998. - No. 5. - S. 268-271
- 6) Khalilov E.N., Sadikhova F.E., Kahramanova H.T. "Azeomed" zeolite sorbent of the viral and bacterial flora // Natural zeolite in medicine, SWB, Bourges. 2010. S. 36-45.