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Lutskaya I., Hlybouskaya T. Institute for Advanced Training and Retraining of Healthcare Personnel of the Belarusian State Medical University, Minsk, Belarus

# Clinical Analysis of Cases of Precancer of the Oral Mucosa and the Red Border of the Lip

Conflict of interest: nothing to declare.

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#### Abstract

Early detection of diseases prone to malignancy is one of the most important problems in medicine. Elements of lesions on the mucous membrane of the oral cavity and the red border of the lips, characterized by a risk of degeneration, are available for visual inspection and can be detected during a general examination of the patient by a doctor of any specialty. A qualified description of clinical cases helps to familiarize specialists working in healthcare institutions with the clinical manifestations of pathology. **Keywords:** oral mucosa, red border of lips, precancer, lip neoplasm

Луцкая И.К., Глыбовская Т.А. 🖂

Институт повышения квалификации и переподготовки кадров здравоохранения Белорусского государственного медицинского университета, Минск, Беларусь

# Клинический анализ случаев предрака слизистой полости рта и красной каймы губ

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Подана: 25.02.2025 Принята: 10.03.2025 Контакты: t\_z777@mail.ru

#### Резюме

Раннее выявление заболеваний, склонных к малигнизации, является одной из важнейших проблем в медицине. Элементы поражения слизистой оболочки полости рта и красной каймы губ, характеризующиеся риском перерождения, доступны визуальному осмотру и могут быть обнаружены при общем осмотре пациента врачом любой специальности. Квалифицированное описание клинических случаев способствует ознакомлению специалистов, работающих в учреждениях здравоохранения, с клиническими проявлениями патологии.

Ключевые слова: слизистая оболочка полости рта, красная кайма губ, предрак, новообразование губы

# INTRODUCTION

Diseases with a high tendency to malignancy (obligate precancers of the oral mucosa and red border of the lips) require special consideration in medical practice. They are characterized by the absence of objective signs of a cancerous tumor, but the presence of an unfavorable background leads to malignancy of the lesion [1].

One of the aspects of cancer screening is the preparation of doctors to competently carry out the stages of screening the population. In the practice of postgraduate education, we use master classes, which are based on an algorithm for conducting events. The most important step is the clinical examination of the patient, presented with a specific example [2, 3].

Diagnosis and treatment of diseases localized on the mucous membrane and perioral area are somewhat difficult due to the variety of their manifestations in some cases and the striking similarity of the rashes in others. Similar complaints and unclear development of the process often do not allow one to obtain a sufficient impression to determine a possible disease. In such cases, the diagnostic search begins with an objective assessment of the clinical picture, namely, the appearance of the lesion elements [4, 5].

The main signs of malignant degeneration can be the following symptoms: a sharp change in the clinical picture, namely, acceleration of the development of a tumor or ulcer, exophytic growth or ulceration of the tumor, bleeding of the lesion, the presence of hyperkeratosis, infiltration and compaction at the base. Malignancy is confirmed by the results of morphological studies.

### PURPOSE

To increase the effectiveness of early diagnosis for manifest manifestations of precancerous diseases that have a high risk of malignancy.

## MATERIALS AND METHODS

An analysis of the results of a consultation with 125 patients and clinical observation of cases of facultative and obligate precancer on the basis of the 8th State Clinical Hospital was carried out. The examination was carried out in accordance with the recommendations of WHO experts and Clinical Protocols. Almost all patients were consulted by related specialists. Cytological and histological examinations of tissues, as well as general biochemical and clinical blood tests were carried out in specialized laboratories. In many cases, a council gathered to choose tactics for managing a complex patient.

### RESULTS AND DISCUSSION

The results of the study are presented in the form of specific clinical examples.

Bowen's disease has a high risk of malignancy, since its histological picture is cancer in situ (intraepithelial cancer without invasive growth). The favorite localization of the elements is the posterior sections of the mucous membrane: the palatine arches, the root of the tongue. Clinical manifestations of the disease on the cheeks, lateral surface of the tongue, and soft palate are described (fig. 1).

The patient's complaints may boil down to discomfort, roughness, and some itching. In some cases, the lesion will be detected during a routine examination of the oral cavity.

The initial stages of the disease are characterized by the formation of a limited area of hyperemia. The surface is characterized by a peculiar velvety quality as a result of small papillary growths. Areas of hyperkeratosis and a tendency to develop erosions appear. The lesion rises above the level of surrounding tissues in the case of the formation of nodules and plaques. Atrophy of the mucous membrane is possible.

The diagnosis of Bowen's disease is made on the basis of a histological picture: giant cells with an accumulation of nuclei in the form of lumps, the so-called "monstrous" cells, are found in the spinous layer.

The prognosis of the disease is unfavorable: the development of lesions within 2–4 months leads to invasive growth without a tendency to regression.

Treatment for Bowen's disease involves complete excision of the lesion, which may include surrounding healthy tissue. In some cases, close-focus X-ray therapy is used.

Warty precancer is characterized by a pronounced tendency to malignancy: already 1–2 months after the onset of the disease.

The patient's complaints boil down to the presence of a cosmetic defect and discomfort. The favorite localization of the lesion (usually single) is the red border of the lower lip. The main element of the lesion is a nodule with a diameter of up to 10 mm, protruding above the level of the mucosa and having the usual color of the red border of the lips or a persistent red color. The surface of the nodule may be covered with thin, tightly attached scales that cannot be removed when scraped. On palpation, the compacted consistency of the nodule is determined, there is no pain.

Treatment of warty precancer is only surgical with complete excision of the lesion and histological examination of the tissue. Confirmation of warty precancer is the proliferation of the epithelium due to the spinous layer both towards the surface and deep into the mucosa.

Limited precancerous hyperkeratosis has a less pronounced degree of malignancy: the lesion can remain in a stable phase for months, even years. Increased keratinization processes, the appearance of erosion and compaction can be detected only a short time after the onset of malignancy. Therefore, the basis is histological examination.

The patient makes no complaints or indicates a cosmetic defect. The grayish lesion may sink or rise above the surrounding unchanged red border without spreading to the skin or Klein zone. The elevation of the lesion above the level of the lip is associated with the layering of scales, which cannot be removed when scraped. Since histological examination is critical for the diagnosis of malignancy, biopsy should be performed as early as possible.

Treatment of limited hyperkeratosis involves surgical removal of the lesion within healthy tissue.

Abrasive precancrosis cheilitis Manganotti differs from other diseases in this group by its long course and tendency to regression (remissions). Degeneration may occur after several months or many years.



#### Fig. 1. Bowen's disease

A single lesion (rarely there are two) is localized on the red border of the lips in the form of an oval or irregularly shaped erosion. The erosion surface, having a bright red color, looks as if polished, and does not show a tendency to bleed. Drops of blood may be detected when scabs or crusts are separated.

Palpation does not detect changes in tissue consistency or pain. Once it appears, erosion can spontaneously epithelialize, and then reappear in the same or another place, limited in size from 5 to 15 mm.

Histologically, the diagnosis is confirmed by detecting epithelium infiltrated with histiocytes, lymphocytes, mast cells, as well as changes in the spinous layer and connective tissue.

Treatment of Manganotti cheilitis includes general and local treatments. Vitamins are prescribed internally. Drugs with epithelial action are used locally: oil solutions of





Fig. 2. Decubital ulcer

Fig. 3. Erosion of the lower lip of the oral cavity



Fig. 4. Exfoliative cheilitis

Fig. 5. Necrosis after anesthesia

vitamins A, E; methyluracil, solcoseryl. Frequent recurrence and increasing clinical signs are indications for surgical removal of the lesion within healthy tissue with histological examination of the material.

Elimination of bad habits, irritating factors, sanitation, and rational oral hygiene are mandatory.

There are also other clinical manifestations that are prone to malignancy (fig. 2–5).

# CONCLUSIONS

During the examination of the patient, the doctor complies with the following rules.

- 1. Each patient is admitted using personal protective equipment and sterile instruments.
- 2. The initial examination of the oral mucosa must be carried out using instruments (mirror, probe, spatula, tweezers).
- 3. In all doubtful cases, the patient must be examined for syphilis and HIV infection.
- 4. The initial detection of an ulcer with hardened edges or the lack of effect of treatment during an ulcerative process (7-10 days) requires consultation with an oncologist, accompanied by a cytological or histological (biopsy) examination of the affected tissue.
- 5. A diagnosis confirmed by laboratory tests and excluding oncological or contagious diseases serves as the basis for prescribing conservative treatment, taking into account the etiology and associated factors.

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