

as eczema, psoriasis, diabetic dry skin, various neurodermatosis. Urea is interesting in that it changes physiological properties depending on concentration. At the concentration of 3 to 10 % in medicine, urea will as an excellent natural moisturizer. Starting from a concentration of 10 %, a slight keratolytic effect can already be observed, which will increase with increasing the concentration. Medicines with a high concentration of urea of 15-20 % will be appropriate for the correction of severe keratoses of the feet. At a concentration of 20% to 35-40 % and higher, urea exhibits pronounced keratolytic properties.

Urea moisturizes the film on the skin, reduces water loss through the horny layer, softens the skin, accelerates the healing of minor skin lesions. It is known that the very small size of urea molecules easily penetrate into the deep layers of the skin along with water, nutrients and medicinal substances. Therefore, the use of vitamins and healing components in combination with urea is very promising in the development of extemporaneous dosage forms. It is well known that the most commonly used medicinal forms of preparations with keratolytic action for the treatment of corns are ointments, gels, creams, patches.

The purpose of our work was to develop an extemporal ointment with urea and vitamin A with keratolytic action for the treatment of corns.

Extemporal ointments are prepared according to general rules, depending on the physical and chemical properties of medicinal substances. The samples of ointment have been prepared on the different types of ointment bases. Urea was introduced into the hydrophobic ointment base as an emulsion type and as a solution into hydrophilic base.. Considering the peculiarities of the pharmacotherapy of corns, callosity and other skin coarseness, the use of a polyethylene oxide base was not considered due to the high osmotic activity. The obtained samples were examined for organoleptic and physical- chemical indicators.

Nasal ointments in the treatment of sinusitis

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Sinusitis is a common condition defined as inflammation of the paranasal sinuses. Sinus cavities produce the mucus that nasal passages need to work effectively. Causes of sinus inflammation include viruses, bacteria, fungi, allergies, and an autoimmune reaction. The symptoms of sinusitis include nasal discharge, a postnasal drip, facial pain or pressure, blocked or runny nose, sore throat,

cough, bad breath, fever, headaches, a reduced sense of smell and taste tenderness and swelling around the eyes, nose, cheeks, and forehead. There are three types of sinusitis: acute sinusitis (when symptoms are present for 4 weeks or less; it is caused by bacteria growing in the sinuses); chronic sinusitis (when the swelling of the sinuses is present for longer than 3 months; it may be caused by bacteria or a fungus); subacute sinusitis (when the swelling is present between one and three months).

The use of topical dosage forms for the treatment of sinusitis is more appropriate. Among the large assortment of nasal dosage forms are drops, sprays, gels, ointments, creams.

Ointment is a dosage form for external use, intended for application to the skin or mucous membranes by smearing or rubbing, applying dressings soaked in ointment. At the room temperature, they retain a viscous, immobile consistency, and when applied to the suction surface, they form a smooth, non-slip continuous film that turns into a viscous liquid. According to the state of aggregation, ointments occupy an intermediate position between drugs with solid and liquid dispersion media. Nasal ointments are prepared under aseptic conditions. Since they are applied to wet mucous membranes, surfactants are added to increase their absorption.

For nasal ointments, a prolonged action is characteristic, since the ointment base provides a longer effect of active substances on the nasal mucosa. Ointments have a softening effect on the nasal mucosa. Compared to the gel, the systemic effect is significantly less pronounced in ointments. Dosage form of the ointment makes it possible to jointly introduce active substances of both hydrophobic and hydrophilic nature into one medicine. The ointment has a beneficial effect on dryness of the nasal mucosa, the presence of crusts.

Among the extemporal prescriptions of ointments for the treatment of sinusitis, menthol, diphenhydramine, adrenaline solution, norzulfazole, novocaine, boric acid are most often prescribed. The aim of our study was to develop a combined ointment for the treatment of sinusitis.