

# DESCRIPTION OF SOME SYNTHETIC DRUGS USED IN THE TREATMENT OF GASTRIC ULCERS

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Abstract. This article describes some synthetic drugs used in the treatment of gastric and duodenal ulcers, their mechanisms of action and side effects.

Keywords: gastric ulcer, synthetic,

A stomach ulcer is one of the most common pathologies of the gastrointestinal tract. In some countries, stomach ulcers occur in 10% of the population. Gastric ulcer is diagnosed in both men and women. This disease manifests itself in the most active years of life, from 30 to 50 years.

The stomach contains acid which aids in digestion. But it can also digest the walls of the organ. To prevent this from happening, the inner mucosa of the stomach is covered with a layer of protective cells that it actively produces. If for some reason this layer is destroyed, there is less mucus, and the acid begins to corrode the walls of the stomach. Thus, a wound is formed.

Many medicines are used in medicine to treat this. Including: Cimetidine, Ranitidine, Omeprazole, etc.

These are 1st generation histamine H<sub>2</sub> receptor blockers. When taken, the production of hydrochloric acid decreases, the pH rises, which reduces the activity of pepsin.

Treatment with cimetidine helps to restore the protective mechanisms of the gastric mucosa and heal various injuries caused by exposure to hydrochloric acid. This happens due to an increase in the gastric mucosa, an increase in glycoproteins in it, additional stimulation of bicarbonate secretion of the gastric mucosa, etc.

In addition, there was a decrease in the concentration of reduced cytochrome P450 and a significant decrease in the activity of aniline hydroxylase of microsomal liver enzymes. In this case, the drug does not affect adrenoreceptors, does not show the effect of local anesthesia.

The development of a therapeutic effect is noted after an hour, with the use of 300 mg of the drug, it persists for at least 4-5 hours.

Complete absorption from the gastrointestinal tract occurs inside the body. Metabolism occurs predominantly in the liver, resulting in the formation of metabolites: sulfoxide and hydroxymethylcimetidine.

The main contraindication to the appointment of cimetidine is the presence of hypersensitivity to it and its components.

During treatment with cimetidine, adverse events may occur that affect various organs and systems, for example: digestive, nervous, endocrine, cardiovascular, urinary, musculoskeletal and hematopoietic.

The tablet contains 150/300 mg ranitidine hydrochloride. Excipients: silicon dioxide (colloidal), copovidone, magnesium stearate.

Solution for injection (1 ml) contains 0.025 g of ranitidine hydrochloride.

Ranitidine Akos is an ulcer drug, its active substance belongs to the group of histamine H<sub>2</sub> receptor antagonists. The principle of action is based on blocking the H<sub>2</sub> receptors of parietal cells located in the gastric mucosa, as well as inhibiting the production of hydrochloric acid. Under the influence of the active substance, the total volume of secretion decreases, the activity of pepsin in the gastric juice decreases.

Due to the antisecretory effect of ranitidine, it is possible to create favorable conditions for the treatment of peptic ulcers of the digestive organs (stomach, duodenum). The active substance is able to have a protective effect, enhancing reparative wound healing, enhancing the secretion of specific mucous substances and improving microcirculation.

Ranitidine tablets are widely used for gastroenterological diseases.

Ranitidine Akos - is prescribed for the treatment of various pathologies of the digestive system, and can also be used for preventive purposes.

Ranitidine Akos instructions for use symptomatic ulcerative lesions of the appendages of the gastrointestinal tract; peptic ulcer of the digestive system (stomach, duodenum); Zollinger-Ellison syndrome; Prevention of aspiration of gastric juice during surgical interventions with anesthesia; prevention of the development of "stress" ulcers; reflux esophagitis; Erosive esophagitis; prevention of the development of ulcerative lesions of the gastrointestinal tract after surgery; prevention of recurrence of bleeding from the upper gastrointestinal tract.

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