

# Gastroscopy



'Gastroscopy' is an endoscopic

examination of the gastrointestinal tract in which the stomach and esophagus can be examined. It is a common examination that carries only small risks, while it has great benefits in the diagnosis and treatment of many diseases.

## Principle

A thin flexible endoscope tube is inserted into the patient's mouth and carefully inserted into the esophagus. Then it slides deeper until it reaches the stomach. At the end of the hose is a small video camera. A thin flexible endoscope tube is inserted into the patient's mouth and carefully inserted into the esophagus. Then it slides deeper until it reaches the stomach. At the end of the hose is a small **'video camera'** that projects an image of the lining of the esophagus and stomach onto a screen where the doctor sees it. Using the control device, the end of the endoscope can be rotated in various ways to view the entire stomach cavity.

In addition, the endoscope allows the use of "small ticks" that can painlessly cleave a small sample of mucosa (biopsy) that is sent for histological examination.

## Meaning

The endoscopic device is of great importance even in the **'stopping of bleeding from the mucous membrane of the esophagus and stomach'** - for example, the endoscope can be used to close bleeding with clamps or to "weld" a bleeding catheter with a weak electric current.

## Preparation

The patient should **not eat or drink for about 6 hours before the procedure**, because the stomach cavity should be empty during the examination (better clarity). **Just before the examination, a special anesthetic is sprayed into the oral cavity**, which ideally blocks the gag reflex. This, on the other hand, means that the patient should not eat or drink anything again for some time after gastroscopy - with anesthetized mucosa in the oral cavity and in the pharynx you also have a disturbed swallowing reflex and could easily inhale food and drinks (danger of suffocation, aspiration pneumonia).

If someone is too anxious, they can ask for analgesia. However, this has the disadvantage that after its application, a person is prohibited from driving motor vehicles for 24 hours due to reduced attention.

## Meaning

Examination of the esophageal and gastric walls along with sampling is important for the *diagnosis of esophageal cancer, gastric cancer, esophageal achalasia, gastric ulcers* and many other diseases of these organs. Bleeding into the esophagus and stomach, whatever its cause, can be treated endoscopically. Likewise, a variety of swallowed objects can be removed with the endoscope, which is common in children and psychiatric patients.

## Complications

Gastroscopy is a very *safe and painless examination*, which, of course, carries with it certain problems and risks. Many people are less tolerant of endoscope insertion into the esophagus and have a gag reflex. An anesthetic solution injected into the oral cavity is not always a 100% solution to this problem. After gastroscopy, mucosal bleeding may occur after irritation with the endoscope tube or after sampling. The most serious, but very rare, complication is the *'rupture of the esophageal wall'* by an endoscope. This usually happens in the esophagus disrupted by some pathological process. It is a life-threatening condition that surgeons usually have to deal with.

## Benefits

The great advantage of the examination is that the doctor sees the condition of the mucosa "with his own eyes" and that he can take samples. The patient is not exposed to any harmful radiation during this examination and the relative painlessness of this examination is also an advantage.

## Links

## Source

- ŠTEFÁNEK, Jiří. *Medicine, diseases, study at the 1st Faculty of Medicine, Charles University* [online]. [feeling. 24.03.2010]. < <https://www.stefajir.cz/> >.

