

# Barrett's Esophagus

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**Barrett's Esophagus** is a disease which occurs in the lining of the esophagus to intestinal metaplasia due to reflux esophagitis. The normal mucosa of the esophagus consists of squamous cell epithelium, which is not resistant to the acidic juices of the stomach. Inflammation occurs here, and with long-term irritation, often due to insufficient function of the lower esophageal sphincter, it is transformed into a cylindrical epithelium with goblet cells (similar to that of the intestine). This epithelium is more resistant to an aggressive environment, but this intestinal metaplasia belongs to **precancerous condition** and therefore increases the risk of developing esophageal adenocarcinoma. In people with Barrett's esophagus, the risk of malignancy in adenocarcinoma increases 30-40 times.<sup>[1]</sup> It is usually in the lower part of the esophagus at the transition to the stomach.



*Barrett's esophagus during endoscopy*

## Risk factors

Factors are common to the occurrence of gastroesophageal reflux and a reduction in the pressure to the lower esophageal sphincter.

Risk factors include:

- Long-term and repeated reflux of acidic gastric contents.
- Smoking
- Excessive alcohol consumption.
- Motility disorder
- Dysfunction of the lower esophageal sphincter.
- Hiatal Hernia.

## Diagnosis

The diagnosis of Barrett's Esophagus is based on endoscopy with histological examination of the biopsied material. The endoscopic finding itself is typical of Barrett's esophagus- it is visible as a **marked red section of the mucosa**- but it is always supplemented by histological examination. Barrett's esophagus may not show any symptoms other than those associated with reflux disease, such as **heartburn**. Patients with this disease should be monitored regularly.

## Therapy

Full **anti-reflux therapy**, which leads to the suppression of the gastric juice production, using proton pump inhibitors (omeprazole, lansoprazole, pantoprazole, esomeprazole). This therapy is indicated **even in the absence of reflux symptoms** - chest pain, heartburn, pyrosis, odynophagia, dysphagia and others. An indication for endoscopic intervention in the Esophagus is the finding of severe dysplastic changes and removal of already proven adenocarcinoma.

## Complications

Complications for Barrett's esophagus include neoplasia, strictures, and ulcers (Barrett's ulcers). Bleeding from lesions and inflammatory stenosis may occur.

**All patients diagnosed with Barrett's Esophagus should be treated endoscopically at intervals according to previous histological findings and associated risk factors. The goal is early detection of possible dysplasias.**



*Intestinal metaplasia*

## References

### Related articles

- Esophageal reflux disease
- Metaplasia
- Precancerous lesions

- Swallowing

## Reference

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