

# Upper endoscopy

### **Overview**

An upper endoscopy is a procedure used to visually examine your upper digestive system with a tiny camera on the end of a long, flexible tube. A specialist in diseases of the digestive system (gastroenterologist) uses an endoscopy to diagnose and, sometimes, treat conditions that affect the esophagus, stomach and beginning of the small intestine (duodenum).

The medical term for an upper endoscopy is esophagogastroduodenoscopy. You may have an upper endoscopy done in your doctor's office, an outpatient surgery center or a hospital.

## Why it's done

An upper endoscopy is used to diagnose and, sometimes, treat conditions that affect the upper part of your digestive system, including the esophagus, stomach and beginning of the small intestine (duodenum).

Your doctor may recommend an endoscopy procedure to:

- Investigate signs and symptoms. An endoscopy may help your doctor determine what's
  causing digestive signs and symptoms, such as nausea, vomiting, abdominal pain, difficulty
  swallowing and gastrointestinal bleeding.
- Diagnose. Your doctor may use an endoscopy to collect tissue samples (biopsy) to test for diseases and conditions, such as anemia, bleeding, inflammation, diarrhea or cancers of the digestive system.
- Treat. Your doctor can pass special tools through the endoscope to treat problems in your digestive system, such as widening a narrow esophagus, clipping off a polyp or removing a foreign object.

An endoscopy is sometimes combined with other procedures, such as an ultrasound. An ultrasound probe may be attached to the endoscope to create specialized images of the wall of your esophagus or stomach. An endoscopic ultrasound may also help your doctor create images of hard-to-reach organs, such as your pancreas. Newer endoscopes use high-definition video to provide clearer images.

Many endoscopes have technology called narrow band imaging, which uses special light to help doctors better detect precancerous conditions, such as Barrett's esophagus.

### **Risks**

An endoscopy is a very safe procedure. Rare complications include:

- **Bleeding.** Your risk of bleeding complications after an endoscopy is increased if the procedure involves removing a piece of tissue for testing (biopsy) or treating a digestive system problem. In rare cases, such bleeding may require a blood transfusion.
- Infection. Most endoscopies consist of an examination and biopsy, and risk of infection is low. The risk of infection increases when additional procedures are performed as part of your endoscopy. Most infections are minor and can be treated with antibiotics. Your doctor may give you preventive antibiotics before your procedure if you are at higher risk of infection.
- Tearing of the gastrointestinal tract. A tear in your esophagus or another part of your upper digestive tract may require hospitalization, and sometimes surgery to repair it. The risk of this complication is very low, but it increases if additional procedures, such as dilation to widen your esophagus, are performed.
- **Reaction to sedation.** Prior to your upper endoscopy, you'll likely be given sedation so that you'll be better able to tolerate the procedure. The type of sedation varies, and adverse reactions are possible, but rare. You will be monitored closely during the procedure to reduce the risk of serious reaction.

You can reduce your risk of complications by carefully following your doctor's instructions for preparing for an endoscopy, such as fasting and stopping certain medications.

### Signs and symptoms that could indicate a complication

Signs and symptoms to watch for after your endoscopy include:

- Fever
- Chest pain
- · Shortness of breath
- Bloody, black or very dark colored stool
- Difficulty swallowing
- Severe or persistent abdominal pain
- Vomiting, especially if your vomit is bloody or looks like coffee grounds

Call your doctor immediately or go to an emergency room if you experience any of these signs or symptoms.

## How you prepare

Your doctor will give you specific instructions to prepare for your endoscopy.

#### Food and medications

You will need to stop drinking and eating up to eight hours before your endoscopy to ensure your stomach is empty for the procedure.

Tell your doctor about all the medications and supplements you're taking before your endoscopy. If you take certain blood-thinning medications, your doctor may recommend that you stop taking them in the days before your endoscopy. Blood thinners may increase your risk of bleeding if certain procedures are performed during the endoscopy.

If you have chronic conditions, such as diabetes, heart disease or high blood pressure, your doctor will give you specific instructions regarding your medications.

### Other precautions

Most people undergoing an upper endoscopy will receive a sedative to relax them and make them more comfortable during the procedure. You may feel mentally alert, but your memory, reaction times and judgment may be impaired. Plan on allowing 24 hours for the sedative to wear off. Afterward, you may resume your normal activities. Arrange for someone to drive you home after the procedure. You may also need to take the day off from work.

## What you can expect

### Before the procedure

Before your upper endoscopy procedure, you'll be asked to lie down on a table on your back or on your side. Monitors may be attached to your body to allow your health care team to keep tabs on your breathing, blood pressure and heart rate.

At this time, you may receive a sedative medication. This medication, given through a vein in your forearm, helps you relax during the endoscopy.

Your doctor may also spray an anesthetic in your mouth, which will numb your throat in preparation for insertion of the long, flexible tube (endoscope). You may be asked to wear a plastic mouth guard to hold your mouth open.

### **During the procedure**

Your doctor will then insert the endoscope in your mouth. He or she may ask you to swallow as the scope passes down your throat. You may feel some pressure in your throat, but you generally shouldn't feel pain.

You can't talk after the endoscope passes down your throat, though you can make noises. The endoscope doesn't interfere with your breathing.

As your doctor passes the endoscope down your esophagus:

A tiny camera at the tip transmits images to a video monitor in the exam room. Your
doctor watches this monitor to look for abnormalities in your upper digestive tract. If
abnormalities are found in your digestive tract, your doctor may record images for later
examination.

- Gentle air pressure may be fed into your esophagus to inflate your digestive tract. This allows the endoscope to move freely. And it allows your doctor to more easily examine the folds of your digestive tract. You may feel pressure or fullness from the added air.
- Your doctor will pass special surgical tools through the endoscope to collect a tissue sample or remove a polyp. Your doctor watches the video monitor to guide the tools.

When your doctor has finished the exam, the endoscope is slowly retracted through your mouth. An endoscopy typically takes 15 to 30 minutes, depending on your situation.

### After the procedure

You'll be taken to a recovery area to sit or lie quietly after your endoscopy. You may stay for an hour or so. This allows your health care team to monitor you as the sedative begins to wear off.

Once you're at home, you may experience some mildly uncomfortable signs and symptoms after endoscopy, such as:

- Bloating and gas
- Cramping
- Sore throat

These signs and symptoms will improve with time. If you're concerned or quite uncomfortable, call your doctor.

Take it easy for the rest of the day after your endoscopy. After receiving a sedative, you may feel alert, but your reaction times are affected and judgment is impaired.

### Results

When you receive the results of your endoscopy will depend on your situation. If, for instance, your doctor performed the endoscopy to look for an ulcer, you may learn the findings right after your procedure. If he or she collected a tissue sample (biopsy), you may need to wait a few days to get results from the testing laboratory. Ask your doctor when you can expect the results of your endoscopy.

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