

Basic Information about Inflammatory Bowel Disease (IBD)

What is inflammatory bowel disease?

Inflammatory bowel disease is a chronic inflammatory condition of the intestines. The cause of IBD is not well understood, but may be related to the response of the body's immune system against bacteria in the intestines. Inflammation causes the lining of the intestinal tract to become inflamed (red and swollen). IBD is thought of as an autoimmune disease. An autoimmune disease is a disease in which the immune system attacks itself rather than bacteria.

There are three different types of inflammatory bowel disease.

1. Ulcerative colitis affects only the colon.
2. Crohn's disease often affects the small intestine, but it can also affect the stomach, esophagus, and colon.
3. Indeterminate colitis affects the colon only, but cannot be distinguished from ulcerative colitis or Crohn's disease.

What is ulcerative colitis?

Ulcerative colitis starts in the rectum and can affect the entire colon or only part of it. It may be called proctitis if only the rectum is affected and left-sided colitis if only the lower half of the colon is affected. If most of the colon is affected, it may be called extensive colitis or pancolitis.

The inflammation is continuous, which means that it does not stop and then start again in a different part of the colon. The disease is chronic, which means that it is always present, although the inflammation may come and go. Symptoms "flare" when the colon is inflamed. Ulcerative colitis is different from irritable bowel syndrome, infectious colitis, and ischemic colitis.

What is Crohn's disease?

Crohn's disease can affect any part of the digestive tract: mouth, esophagus, stomach, duodenum, jejunum, ileum, colon, and anus. The most common area affected is the part of the small bowel called the ileum.

The inflammation usually occurs in segments, with healthy segments of bowel in between inflamed segments. It is called Crohn's ileitis when only the ileum is affected, Crohn's colitis when only the colon is affected, and Crohn's ileocolitis when both the ileum and the colon are affected.

It can cause inflammation all the way through the intestine and cause tiny tracts called fistulas that can go to other parts of the body including other intestines or skin. It can also cause scarring or narrowing of the intestine called strictures.

What is indeterminate colitis?

Indeterminate colitis also only affects the colon, but it is not the same as ulcerative colitis or Crohn's colitis. IBD may be called indeterminate colitis when the biopsy cells under the microscope look more like cells from a person with ulcerative colitis, but with the naked eye the inflammation in the colon looks more like that of Crohn's disease.

Inflammation in Crohn's disease is more likely to affect segments of the colon, rather than continuous stretches of the colon, as happens in ulcerative colitis. Also, in Crohn's disease the ulcerations can look deep and long.

Who is most at risk of getting IBD?

IBD affects men and women equally. It can occur at any age, but often starts between the ages of 15 to 25. Crohn's disease is more common among people who have a family history of the disease. IBD affects about 1.4 million people in the United States.

Diet can affect the symptoms of IBD, but diet does not cause IBD. IBD results from the way the body's immune system reacts to the bacteria in the digestive tract. An overactive immune system may be genetic in families that have multiple members with IBD.

What are the symptoms of IBD?

The symptoms of IBD partly depend on where the inflammation occurs.

Inflammation in the colon often causes diarrhea and bloody stools.

Inflammation in the rectum often causes urgency (the need to have a bowel movement quickly) and tenesmus (frequent urges to have a bowel movement, but passing very little stool). If the colitis is severe, the inflammation may extend deep into the wall of the intestine and cause abdominal pain and cramping.

Inflammation in the small bowel often causes diarrhea. It can also result in abdominal pain, tenderness, and cramping. These symptoms occur as the muscles in the intestine push food through narrowed areas. Stomach cramps and bowel blockage may lead to nausea and vomiting.

In addition to bowel symptoms, you may have other symptoms such as severe fatigue, weight loss, loss of appetite, fever, sore or red eyes, skin rashes, and pain in the joints. People with IBD tend to have flares with active symptoms and periods of remission with no symptoms.

What are the complications of IBD?

Scar tissue may result as the inflamed tissue heals. This scarring can narrow or even block the intestine. The narrowed area is called a stricture. If food can't move through your intestine, this is called an obstruction. As a result, you may have nausea and vomiting.

Long-term obstruction raises the pressure in the part of the intestine before the narrowed or blocked area. This pressure can cause the inflamed intestinal wall to burst. This is called a perforation. An

untreated perforation lets intestinal contents out into the abdominal cavity. This is quite painful and requires immediate surgery.

More commonly, the perforation forms a small hole with a tunnel to another organ. This is called a fistula and is a way to release the pressure that builds up from the blockage. A fistula most commonly connects to another part of the intestine, to the skin, to the bladder, or to the vagina.

If a fistula does not connect to an exit site, it can form a cavity filled with infected intestinal contents and pus. This is called an abscess. Fistulas and abscesses can also develop in the tissues around the anus. These complications are called perianal fistula and perianal abscess. Long-term inflammation of the colon can lead to colon dysplasia (abnormal or pre-cancerous cells) and colon cancer.

Long-term inflammation of the small intestine rarely leads to cancer. However, inflammation of the small intestine can decrease the body's ability to absorb iron, vitamin D, and vitamin B12.

A lack of iron or B12 can cause anemia. Blood loss into the stool over time can also cause anemia. Decreased vitamin D absorption can lead to bone loss. Steroid use can make bone loss worse.

In addition to intestinal inflammation, you may have inflamed joints (arthritis), skin problems (sore red bumps or ulcers on the skin) and inflammation of the eyes or mouth. If your eyes suddenly become very red and sensitive to light, you need to have an eye exam right away.

Crohn's disease in the small intestine increases the risk for kidney stones and gallstones. The risk is higher if part of the small intestine has been removed.

How is IBD diagnosed?

You will have a complete history and physical exam. You may need some tests, such as blood tests, stool tests, CT or MRI scans, and colonoscopy with biopsy. The colonoscopy will look for ulcers or inflammation in the intestine.

Because most of the treatments for IBD have risks, you need to be completely sure that you have IBD before it is treated. Your intestinal tissue will be looked at very closely under a microscope to be sure you have IBD and not an infection or another illness. You also may need an other tests.

How are Crohn's disease and ulcerative colitis treated?

There is no cure for IBD at this time. Treatment helps to eliminate or reduce symptoms, prevent flares, and decrease complications of the disease.

What you can do:

- If you stop smoking, the inflammation in your intestines will decrease and your symptoms may go away.
- Avoid using Nonsteroidal Anti-Inflammatory Drugs such as Motrin, Ibuprofen, Naproxen, Aleve, Goody's or BC powders. Patients who use NSAIDs, even infrequently, are more likely to have a

flare of the IBD than those who do not use them. Also, their flare is more likely to be resistant to IBD medicines. Be sure to discuss the use of NSAIDs with your IBD physician.

- Medicines for inflammation. Most drugs used to treat IBD reduce inflammation.
- Medicines for symptoms. Until the medicines start working by reducing the inflammation, you may take medicines that will help ease your symptoms such as cramping, urgency, or diarrhea. These medicines are only used when you need them. (More detailed discussion of medicines can be found in the Medications for IBD section.)
- Surgery to remove the part of the intestine that is inflamed is an important part of IBD therapy. It should always be considered as a reasonable alternative to medical therapy.
- Changing your diet, especially during flares, may ease your symptoms. It will not reduce inflammation, nor will it lower your risk for complications.

Herbal, alternative, or complementary therapies have not been shown to work on inflammation in clinical studies, nor have they been fully tested. Although some help ease symptoms, they usually work only in very mild cases or as a supplement to existing therapy. Ask your health care team about the safety and effects of these products. Always let your healthcare team know if you are using them.

What should I know about my IBD to be an informed partner in my care?

- Do you know if you have Crohn's disease, ulcerative colitis, or indeterminate colitis?
- Do you know what part of your intestines is involved?
- Do you know what year you first starting having symptoms (how long you have had IBD)?
- Do you know if you have had any strictures, fistulas, or abscesses in the past?
- Do you know what medicines you have taken in the past? Why did you stop taking each one? Did the medicine improve your symptoms?
- Do you know if you have had surgery for your Crohn's disease, ulcerative colitis, or indeterminate colitis? When did surgery occur? What parts of the intestines were removed?

