

## Difference Between Small and Large Bowel Obstruction

www.differencebetween.com

## **Key Difference - Small vs Large Bowel Obstruction**

Intestinal obstruction is one of the most serious surgical emergencies. Patient's life is at risk if prompt medical attention is not given in case of an intestinal obstruction. Depending on the site of occlusion, clinical manifestations vary. Out of the clinical signs and symptoms associated with bowel obstruction, constipation can be considered as the main feature that helps the clinicians to localise the site of obstruction. **There is absolute constipation in small bowel obstruction but not in large bowel obstruction.** This is the **key difference** between the obstructions at these two sites.

### What is Small Bowel Obstruction?

Small bowel consists of three major regions as <u>duodenum</u>, <u>jejunum</u>, and <u>ileum</u>. It is responsible for the absorption of vital nutrients from the food that has been appropriately conditioned by the gastric juices. An obstruction of the <u>small intestinal</u> lumen can give rise to various clinical manifestations that are predominantly due to the hindrance to the passage of <u>ingested</u> food through the gastrointestinal tract.

#### Causes

- Strangulated hernias
- Adhesions
- Malignancies
- Crohns disease
- Volvulus

#### **Clinical Features**

- A high bowel obstruction gives rise to nausea, vomiting and frequent colics
- There is a slight, central abdominal distension
- Constipation is extremely rare

#### **Risk Factors**

- Previous pelvic or abdominal surgeries
- TB
- Inflammatory bowel disease

## Investigations

The clinical suspicion of intestinal obstruction can be confirmed through the following investigations.

- CT
- USS
- Endoscopy

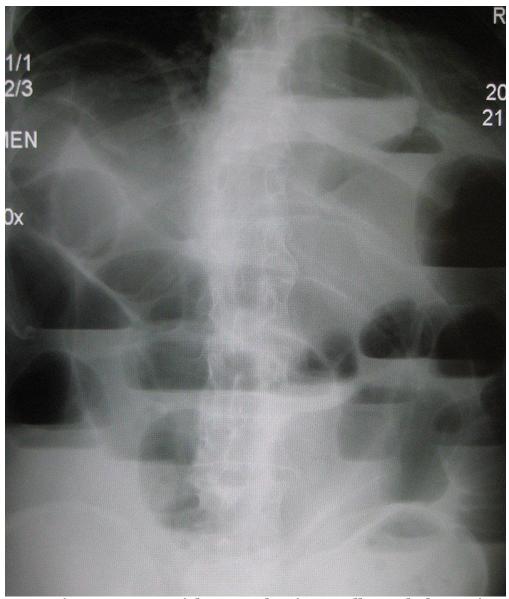


Figure 01: An upright X-ray showing Small Bowel Obstruction

## Management

Management of intestinal obstruction varies according to the underlying cause of the condition. When the obstruction is due to inflammatory bowel disease, anti-inflammatory drugs are given to control the inflammatory changes in the bowel thus alleviating the obstruction. A malignant or benign tumor that occludes the lumen can be surgically resected. A strangulated obstruction of the small bowel is a surgical emergency because of the possibility of ischemic necrosis of the intestinal segment that is distal to the point of strangulation.

## What is Large Bowel Obstruction?

Food that has passed through the small intestine then enters into the large bowel inside which the resorption of water happens. An obstruction of the large bowel can give rise to a clinical picture which is entirely different from that due to the obstruction of the small bowel.

#### **Causes**

- Carcinomas
- Diverticulitis
- Volvulus
- Pseudo-obstruction of the large bowel secondary to some retroperitoneal pathologies

#### **Clinical Features**

- A low large bowel obstruction can cause a prominent peripheral abdominal distension
- Colicky type abdominal pain can also be present
- There is absolute constipation in case of a large bowel obstruction
- Vomiting does not usually occur in a large bowel obstruction

### **Investigations**

The following investigations support the process of arriving at a definitive diagnosis

- CT
- Sigmoidoscopy
- Contrast radiography with enema
- Full blood count
- Hematocrit

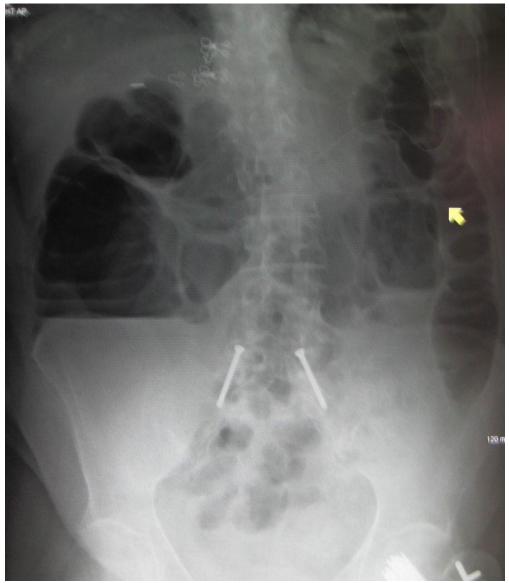


Figure 02: Large Bowel Obstruction

## Management

Surgical interventions are almost inevitable. Volume resuscitation of the patient and the administration of prophylactic broad-spectrum antibiotics are extremely important during the preoperative preparation. In the most severe cases, insertion of a nasogastric tube may be necessary.

# What is the Similarity Between Small and Large Bowel Obstruction?

• The obstruction of the passage of food through the lumen of the gastrointestinal tract is the cause of clinical symptoms in both conditions.

# What is the Difference Between Small and Large Bowel Obstruction?

Small Bowel Obstruction vs Large Bowel Obstruction	
An obstruction of the small intestinal lumen with the can be identified as the small bowel obstruction.	An obstruction in the large intestinal lumen can be identified as the large bowel obstruction.
Causes	
Causes of small bowel obstruction are,	Large bowel obstruction is caused by,
· Strangulated hernias	· Carcinomas
· Adhesions	· Diverticulitis
· Malignancies	· Volvulus
· Crohns disease	<ul> <li>Pseudo-obstruction of the large bowel secondary to some retroperitoneal</li> </ul>
· Volvulus	pathologies
Clinical Features	
	The following clinical features can be seen in large bowel obstruction,
Symptoms and signs of small bowel obstruction include,	A low large bowel obstruction can cause a prominent peripheral abdominal distension
<ul> <li>A high bowel obstruction gives rise to nausea, vomiting and frequent colics</li> </ul>	distension
There is a slight, central abdominal	<ul> <li>Colicky type abdominal pain can also be present</li> </ul>
distension  Constipation is extremely rare	<ul> <li>There is absolute constipation in case of a large bowel obstruction</li> </ul>
Consupation is extremely fare	<ul> <li>Vomiting does not usually occur in a large bowel obstruction</li> </ul>
Investigation	
A clinical suspicion of small intestinal obstruction can be confirmed through the following investigations.	The following investigations support the process of arriving at a definitive diagnosis
· CT	· CT

- USS
- Endoscopy

- · Sigmoidoscopy
- · Contrast radiography with enema
- Full blood count
- · Hematocrit

#### **Management and Treatment**

Management of intestinal obstruction varies according to the underlying cause of the condition. When the obstruction is due to inflammatory bowel disease, anti-inflammatory drugs are given to control the inflammatory changes in the bowel thus alleviating the obstruction. A malignant or benign tumor that occludes the lumen can be surgically resected. A strangulated obstruction of the small bowel is a surgical emergency because of the possibility of ischemic necrosis of the intestinal segment that is distal to the point of strangulation.

Surgical interventions are almost inevitable. Volume resuscitation of the patient and the administration of prophylactic broad-spectrum antibiotics are extremely important during the preoperative preparation. In the most severe cases, insertion of a nasogastric tube may be necessary.

## **Summary - Small vs Large Bowel Obstruction**

Depending on the site of obstruction, clinical features that appear vary. In small bowel obstruction, the chance of having absolute constipation is extremely distant. But absolute constipation is a typical feature of large bowel obstruction. This is the difference between Small and Large Bowel Obstruction.

#### Reference:

1. Burnand, Kevin G., John Black, Steve Corbett, W. E. G. Thomas, and Norman L. Browse. Browses introduction to the symptoms & signs of surgical disease. 5th ed. Boca Raton, FL: CRC Press, 2014. Print.

#### **Image Courtesy:**

- 1.Upright X-ray demonstrating small bowel obstruction'By James Heilman, MD Own work, (CC BY-SA 3.0) via Commons Wikimedia
- 2.'LargeBowelObsUp2008'By James Heilman, MD Own work, (CC BY-SA 3.0) via Commons Wikimedia

#### **How to Cite this Article?**

APA: Difference Between Small and Large Bowel Obstruction.(2018 January 02). Retrieved (date), from http://differencebetween.com/difference-between-small-and-vs-large-bowel-obstruction/

MLA: "Difference Between Small and Large Bowel ObstructionT" Difference Between.Com. 02 January 2018. Web.

Chicago: "Difference Between Small and Large Bowel Obstruction." Difference Between.Com. http://differencebetween.com/difference-between-small-and-vs-large-bowel-obstruction/ accessed (accessed [date]).



Copyright © 2010-2017 Difference Between. All rights reserved