



Round : ..General surgery.....

Group no : B3.....

Done By : ..Fatima abu assal.....

Abdominal obstruction:

✨ On percussion it's resonant anterior aspect but dull toward the flanks

✨ Small intestine is more common

✨ Dynamic : (Intraluminal)/(extramural (adhesions, band hernia, neoplasm))
(intramural (stricture , malignancy , intussusception, volvulus)

✨ **Intussusception:**

Children: mostly ileocolic

Adult : mostly colocolic

severe paroxysmal colicky abdominal pain with currant red jelly stool (mixture of mucus and blood), sausage shaped mass palpable in abdomen.

Investigation : Barium: Claw's sign of iliac intussusception

US: target sign.

✨ **Adynamic** (acute mesenteric vascular occlusion it's a-propulsive form/Hirschsprung's ds/ pseudo obstruction/ paralytic ileus)

✨ **Hirschsprung's ds:** congenital megacolon characterized by absence of myenteric and submucosal ganglion cells in the distal elementary tract

✨ Pseudo-obstruction e.g.: (ogilvie's syndrome (acute **colonic** Obstruction) treatment is conservative)

✨ Paralytic Ileus: caused by postoperative, peritonitis, pelvic/spinal fractures, **hypokalemia**, pseudo-obstruction and drugs (TCA, lithium, opiate, anti-cholinergics)

🌸 colorectal cancer is the most common cause of large intestinal obstruction

🌸 Adhesives is the commonest cause of small intestine obstruction

🌸 Obstructed and Strangulated hernia is the Commonest cause of a small intestine obstruction in children and the second cause in adult

🌸 Ileo-caecal intussusception (infantile type): The commonest type of intussusception , terminal ileum is invaginated into the caecum with ilio caecal valve forming the apex of intussusceptions

✨ In neonates (mc is congenital)

✨ Retrograde: as jejuno gastric intussusception after gastrojejunostomy.

✨ Ileo-colic: ileo-ileal intussusception advancing till its apex enters the colon.

✨ Sigmoid volvulus: occurs usually in **elderly** above 50 years and it is four times more common in men than in women. (caused by chronic constipation and , lengthening of mesentery) also can be associated with high fiber diet and excessive use of laxatives!!!!// on x-ray show coffee bean sign

✨ Cecal volvulus: occurs and **younger** patients dilatation in cecum gives stack of coin appearance

midgut volvulus in peds: Malrotation of the midgut

life-threatening history of 6 week old child Vomits (bile-

	Small intestine	Large intestine
1) pain	periumbilical	more suprapubic
2) Vomiting <i>projectile</i>	early	late
3) distension	Minimal to moderate (central)	Marked (peripheral)
4) Absolute constipation	late	early

	simple occlusion	Strangulation	Paralytic ileus
1) Pain <i>(earliest sign)</i>	Colicky, intermittent	Sever, persistent	No Pain
2) Palpation	-ve	Tenderness, rebound tenderness & rigidity	-ve
3) Auscultation	High exaggerated intestinal sounds	First exaggerated sound then disappears	Dead silent abdomen
4) suction	Relieves pain	No effect on pain	Relieve distension

stained blood)

diagnosis: CT: whirlpool sign // Barium swallow (gold standard): corkscrew sign

✨ Laboratory findings in bowel obstruction: Hyponatremia, hypokalemia, leukocytosis, metabolic acidosis, alkalosis, elevated serum lactate.

✨ CT scan with contrast is the modality of choice (Bird beak sign seen in volvulus // apple core sign in colonic malignancy)

🌸 369 rule (الحد الطبيعي الأقصى لكل واحد):

Small bowel <3 cm // Large bowel: <6 cm // Cecum: <9 cm

High SB0	Low SB0	LBO
x-ray finding	x-ray finding	x-ray finding
1. no air-fluid level	1. multiple air-fluid level	1. fewer air-fluid level
2. centrally position	2. centrally position	2. peripherally position
3. Vulvulae coniventae	3. Vulvulae coniventae	3. Haustrations

🌸 Plz note the difference between vomiting in intestinal obstruction and vomiting caused by gastric outlet obstruction, that vomiting in gastric outlet obstruction is **undigested** food associated with weight loss and visible peristalsis on examination

🌸 Note: Features of strangulation

tachycardia, pyrexia, toxic appearance, leukocytosis

Pain becomes constant rather than colicky.

Signs of peritonitis

	★ Viable intestine	★ Non-viable intestine
1. Peritoneal luster	• Present	• Absent
3. Colour	• Pink or dark red .	• Green, brown or black
4. Peristalsis & Tone	• Present, contract if pinched	• Absent & no response to pinching.
5. Consistency	• Firm	• Flabby & thin
6. Mesenteric pulse (duplex)	• Present (most important)	• Absent

🌸 Management: **conservative treatment** in adhesions, chronic obstruction, Distinction From Postoperative Paralytic Ileus Is Uncertain.

🌸 SURGERY (Laparotomy):

(Absolute indication) Peritonitis/Visceral perforation Irreducible hernia/intestinal strangulation.

(Relative indication) Palpable mass lesion/'Virgin' abdomen/Failure to improve.

🌸 **Initial management:** NPO, NGT, IV fluid,

Antibiotics if Strangulation found or suspected, and for **all** patients undergoing surgery.