PARALYTIC ILEUS
CAUSES AND SOLUTIONS

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Physiology

- Small intestine function returns to normal often within several hours of surgery.
- Gastric motility returns to normal within 24-48 hrs of after surgery.
- The colon is the final portion of the GI tract to regain normal motility, which usually occurs 48-72 hrs after surgery.

Etiology

Intra-abdominal causes	Extra- abdominal causes
Peritonitis : acute pancreatitis, acute cholecystitis, peptic ulcer perforation, appendicitis	Metabolic disturbances: electrolyte imbalance- hypokalemia, hypocalcemia
Retroperitoneal irritation: ureteric stone, pyelonephritis, retroperitoneal hemorrhage	Uremia (acute or chronic renal failure)
Disturbance in the O2 supply: mesenteric artery insufficiency, mesenteric vein insufficiency	Hormonal imbalance: DM, hypoparathyroid, myxedema
	Drugs: TCA, Phenothiazines
	Sepsis

Obstetric causes of Paralytic Ileus

- Prolonged labour and obstructed labour
- Intra Uterine Infections
- Septic Abortion, ruptured ectopic.
- Uterine Perforation and Rupture.
- Operative injuries.

Gynecological causes of Paralytic Ileus

- Abdominal surgeries.
- Vaginal surgeries.
- Post operative infections.
- Pelvic inflammatory diseases.

Classic presentation

- Gassiness (distension)
- Diminished bowel sounds
- Tympany on percussion of entire abdomen (meteorysmus)

- Obstructive Ileus- deposit of air & fluid proximal to the obstruction causing distension while distal to the obstruction no air is found.

Paralytic ileus compared to obstructive ileus

Clinical symptoms	Paralytic ileus	Proxymal duodenum	Distal duodenum	Jejunoileal junction	Colon
Abdominal pain	Absent/ discomfort-	Colic (in intervals)	Colic, often	Colic, moderately	Colic, rare
Gassiness	moderate-severe	Mild	Mild	Moderate	Severe
Vomiting frequency	Little, rare	Voluminous	Voluminous	Little, rare	Very, rare
Characteristic	Acidic, bilious	Clear, acidic, Cl , KCL	Greenish, bitter NaCl, NaHCO3,	Foul smelling, feculent	Foul smelling, feculent
Acid- base balance	Varies	Metabolic alkalosis	Metabolic acidosis	Dehydration	Varies

Preventive measures

- Preoperative carbohydrate loading
- Early ambulation, measures to increase the GI motility by chewing gum
- Administration of milk of magnesia
- Early postoperative introduction of fluids and food.
- Avoiding heavy doses of NSAID's and opiates
- Prevent to reduce the K levels
- Use of warm blankets to reduce hypothermia

Conclusion

- Paralytic ileus is never a primary disorder but instead is a clinical syndrome due to acute and temporary loss of smooth muscle motor activity in the small intestine.
- Most commonly caused by peritonitis.
- Other causes of paralytic ileus are electrolyte imbalance and drug usage.
- Clinical findings – nausea, vomiting, distension of abdomen and diminished bowel sounds.

Conclusion

- Identification of the underlying disease is the key to success in the management of paralytic ileus.
- Laboratory evaluation, 3 position radiological examination and abdominal ultrasound will help in the diagnosis.
- CT and ECG may be needed in complicated cases.
- The basic treatment is aimed at underlying disease of paralytic ileus and does not require surgical treatment.
- With supportive therapy and management of the underlying/accompanying disease, paralytic ileus will spontaneously remit.