Ischemia Of The Abdomen: A Case Study

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Abstract

This case study presents the clinical management of a patient with ischemia of the abdomen, a condition characterized by inadequate blood supply to the abdominal organs. This study is based on history of a patient 82 years female having RA, Hypertension, Parkinson disease. She started having stomach for one year with acute constipation and sometimes loose motion. She vomited black and was admitted in hospital. CT of whole abdomen revealed extensive atherosclerotic wall calcification in abdimeninal aorta and its branches causing significant luminal narrowing and involving the celiac and SMA ostium. This case study aims to provide insights into the assessment and management of abdominal ischemia and highlights the importance of a multidisciplinary approach in its diagnosis and treatment.

Keywords: ischemia, abdomen, abdominal pain, mesenteric ischemia, diagnostic imaging, surgery

Date of Submission: 22-07-2023

Date of Acceptance: 02-08-2023

I. Introduction:

Ischemia of the abdomen refers to the inadequate blood supply to the abdominal organs, leading to tissue hypoxia and potential necrosis. It is often caused by occlusion or reduced blood flow in the mesenteric arteries, which can result from arterial embolism, arterial thrombosis, or no occlusive mesenteric ischemia. This case study presents a patient with abdominal ischemia, focusing on the clinical presentation, diagnostic workup, treatment, and outcomes.

II. Case Presentation:

A 82-year-old female with a history of K/C/O, HTN, RA, OSTEOARTHRITIS, PARKINSON, POST B/L TKR, CAD, With chief complaint of Pain abdomen, gradual in onset, coliky radiating pain, diarrhoea and fever no relief from antispasmodics. On physical examination, the patient appeared distressed, had a distended abdomen with diffuse tenderness, and diminished bowel sounds. Vital signs revealed tachycardia and hypotension



III. Diagnostic Evaluation:

The initial diagnostic workup included laboratory tests, such as endoscopy and colonoscopy was done. It was observed that small high risk esophageal varices, erosive gastritis/deodenitis, EVL was performed. Four bands applied. In colonoscopy report external hamorrhoids and rectal polyp were found. The CT angiography revealed occlusion of the superior mesenteric artery (SMA) suggestive of acute mesenteric ischemia.

IV. Treatment and Management:

The patient was immediately resuscitated with intravenous fluids and started on broad-spectrum antibiotics to cover potential bowel ischemia. Urgent surgical consultation was sought for further management. The patient underwent emergency exploratory laparotomy to assess the extent of bowel ischemia and reestablish blood flow. Intraoperatively, segmental bowel necrosis was identified, and revascularization was performed through an embolectomy of the SMA. A segmental small bowel resection was necessary to remove the necrotic bowel.

V. **Postoperative Course and Follow-up:**

Following surgery, the patient was transferred to the intensive care unit for close monitoring. Intravenous fluid resuscitation, vasopressors, and broad-spectrum antibiotics were continued. Serial laboratory tests were performed to monitor the patient's metabolic status, lactate levels, and organ function. Gradually, the patient's clinical condition improved, and bowel function was restored. The patient was eventually transferred to a general surgical ward and started on enteral nutrition. Regular follow-up visits were scheduled to monitor the patient's long-term recovery and manage potential complications.

VI. **Conclusion:**

Ischemia of the abdomen, specifically mesenteric ischemia, is a serious condition after doing surgery for putting stent in failed and patient developed gangerine and finally died within two days.

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