Volvulus of the caecum

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Abstract

Volvulus of the Caecum is a rare cause of mechanical intestinal obstruction. A 30-year-old young man with acute mechanical intestinal obstruction from cecal volvulus is presented. Cecal volvulus is a rare cause of mechanical intestinal obstruction and preoperative diagnosis might be difficult.

Key words: Volvulus, Cecum, Intestinal, Obstruction

INTRODUCTION

Volvulus of the cecum is a rare condition first described by von Rokitansky^[1] in 1849. In addition to its rarity, preoperative diagnosis of is usually very difficult because of it presents with highly variable symptoms ranging from intermittent self-limiting abdominal pain to features of strangulating intestinal obstruction with perforation and sepsis. We present the first case of cecal volvulus seen in Abia State University Teaching Hospital (ABSUTH), Aba, Abia State, Nigeria.

CASE REPORT

Mr. OP, a 30-year old unemployed Nigerian presented to the A and E Department of ABSUTH with sudden onset of severe colicky abdominal pain. The pain started in the right lower abdominal quadrant and spread to the mid abdominal region. This was associated with nausea, anorexia bilious vomiting and constipation. He has had similar attacks in the past, which were relieved by laxatives, opening bowel, and antispasmodics. He has had no previous abdominal surgeries.

Examination showed a young man in painful distress. The vital signs were within the normal limits. The abdomen was uniformly distended with marked tenderness in the right

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iliac fossa. The bowel sounds were hyperactive. Digital rectal examination revealed scanty formed stool in the rectum. The other systems use essentially normal.

Plain abdominal X-ray showed multiple air-fluid and distended loops of small bowel.

He was worked up for emergency exploratory laparotomy. Findings at surgery were massively dilated loops of small bowel overlying a massively dilated cecum twisted about 270° in a clockwise direction. On detorsion the cecum was found to be viable and had a mesentry. Appendicectomy was done and the caecum decompressed through the base of the appendix. Cecopexy was done by anchoring the caecum with silk 2/0 on the parietal peritoneum through the tenia coli. Mass wound closure was done.

Postoperatively, patient was placed on nil by mouth, intravenous fluid, analgesics and antibiotics. The postoperative period was uneventful. Bowel activity was established on the second postoperative day and patient commenced on graded oral feeds. He was discharged on the eighth postoperative day in stable condition.

He has remained in good condition 1-year postoperative.

DISCUSSION

Volvulus of the gastro intestinal tract account for about 1-3% of all cases of intestinal obstruction globally. [2] It occurs most commonly in the sigmoid colon, less common in the small intestine and caecum and least of all in the transverse colon. Generally, colonic volvulus occurs against the background of a dilated redundant bowel segment with a narrow mesenteric

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base. The points of attachment of the mesentery act as a fulcrum over which the twist occurs. A variant of cecal volvulus called bascule is associated with an upward and anterior folding of the caecum on the ascending colon.^[3]

These predisposing factors may be inherited as in cecal volvulus or acquired as in sigmoid volvulus. When the mesentery of the caecum and right colon fails to disappear, it acts as a predisposing factor to volvulus as in our index case. Other predisposing factors are high fiber diet, previous abdominal surgery, intensive outpatient programs rneuropsychotropic drugs and colonic distension form distal obstruction and late pregnancy.^[4,5]

Cecal volvulus present with severe colicky abdominal pain, nausea, vomiting, constipation and abdominal distension.^[3] The volvulus may untwist spontaneously resulting in repeated episodes of abdominal symptoms. Self-administration of laxatives and knee-chest position may also lead to untwisting of the volvulus.

If untreated or untwisting does not occur, volvulus progresses rapidly from obstruction to strangulation, gangrene and perforation.

Plain abdominal rotengeogram shows marked distension of the caecum and small bowels. At times, diagnosis is only made at surgery.

Nonoperative treatment of cecal volvulus is not successful.

Surgical treatment may involve detorsion and fixation, detorsion alone and right hemicolectomy, which has a very low incidence of recurrence.^[3]

CONCLUSION

High index of suspicion is important in making the diagnosis of cecal volvulus. Optimal patient management consists of metabolic support, early diagnosis, and operative therapy.

REFERENCES

- von Rokitansky V. A Manual of Pathological Anatomy. London: Sydenhan Society; 1849.
- Ballantyne GH, Brandner MD, Beart RW Jr, Ilstrup DM. Volvulus of the colon. Incidence and mortality. Ann Surg 1985;202:83-92.
- Consorti ET, Liu TH. Diagnosis and treatment of caecal volvulus. Postgrad Med J 2005;81:772-6.
- Montes H, Wolf J. Cecal volvulus in pregnancy. Am J Gastroenterol 1999;94:2554-6.
- Alinovi V, Herzberg FP, Yannopoulos D, Vetere PF. Cecal volvulus following cesarean section. Obstet Gynecol 1980;55:131-4.

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