Acute intussusception ileo-ileal in adult: A case report

 $By \times y$

<u>Case study</u> Acute intussusception ileo-ileal in adult

**A case report

Abstract

We relate here the case of a 47 years patient with no particular history, admitted in emergency for an occlusive syndrome which developed gradually. The onset of symptoms was marked by a moderate abdominal pain with bilious vomiting. The symptomatic treatment had no effect; the pain became intense and diffuses to the entire abdomen accompanied by uncontrollable vomiting and the gas and stool passage were stopped. Ultrasonography of abdomen showed target signs in cross section and sandwich sign in longitudinal section which are characteristic of intussusceptions. The abdominal computed tomography (CT) is the reference imaging technique; it allows conducting indisputably diagnostic certainty and discovering the possible etiology. It shows the presence of an intestinal occlusion, the topography of the condition and the morphological characteristics of any castal lesion. The laparotomy revealed an ileo-ileal intussusception caused by an ileal tumor. We performed a segmental small bowel resection with anastomosis. Histological study confirmed the benign nature of the tumor evoking an aspect in favor of an inflammatory pseudotumor of the small intestine.

key words: Acute intussusception, ileo-ileal, adult

Introduction

nti oddetion

Intussusception or invagination of the bowel is defined as the telescoping of one portion of the bowel into an immediately adjacent potential on of the bowel. Intussusception is more common in the pediatric population than in adults. The intussusception in adults is rare accounting for 5% of all cases of intussusceptions and almost 1%-5% of bowel obstruction. [2,8,9] and has some features that make the whole point of this condition. It is an epiphenomenon revealing in 80% of cases a particular tumor organic lesion [1]. The diagnosis and management in the pediatric population are different in the pediatric and adult populations

The observation

The patient of 47 years had no particular history. He was admitted in emergency for an intestinal obstruction which had developed gradually. The patient presented abdominal colic without severe pain, but presented with bilious vomiting. The onset of these symptoms was marked by intestinal obstruction. The pain became intense in spite of taking symptomatic treatment and diffused to the entire abdomen accompanied by uncontrollable vomiting. The gas and stool passage were stopped. On physical examination, the abdomen is slightly distended with tenderness in the left flank. Laboratory tests are normal. The abdominal X-ray shows the image of many bright arches with air-fluid levels projecting the left flank (Fig 1).



Fig 1. The abdominal X-ray: bright arches with air-fluid levels

Ultrasonography of abdomen showed target signs in cross section and sandwich sign in longitudinal section which are characteristic of intussusception



Figure 2. Ultrasonographic image in transverse section "target" signs

The diagnosis is confirmed by the abdominal computed tomography (CT) scan showing ileo-ileal intussusception (fig 3).



Fig. 3 Abdominal computed tomography in adult intussusception.

The laparotomy also revealed an ileo-ileal intussusception (Fig-4) with a dilated proximal small intestine.

The intussusception was due to an ileal homogeneous well circumscribed solid mass with exophytic growth into intestinal lumen (fig. 5,6). The mas was measuring $5 \times 5 \times 4.5$ cm in the location mentionned obove. It was reduced and a segmental small bowel resection was performed.

Histological study confirmed the benign nature of the tumor and revealed proliferation of spindle-shaped cells with infiltration of plasma cells and lymphocytes evoking an aspect in favor of an inflammatory pseudotumor of the small intestine. Immunohistochemy was not undergone



Figure 4: Intraoperative findings: a solid, well-defined mass as lead point of intussusceptum.

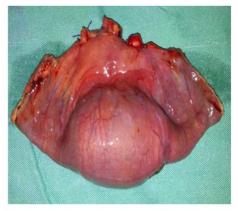


Figure 5: The surgical specimen after the en bloc resection of the small bowel



Fig-6: Specimen showed a firm, circumscribed endoluminal tumor.

Discussion

The Acute intussusception is a rare cause of abdominal pain and represents 1-5% of intestinal obstruction in adults. It is most often small bowel (48% -70%). Unlike the child where in often idéopathique in adults, it is often secondary to an organic lesion in 85% of all cases [5]. In 90% of adult cases, predisposing lesions can be found, but in the paediatric population, organic lesions are found in only 10% of the cases [1], whereas in 58% of cases of large bowel intussusceptions, a malignant aetiology has to be expected [2,10,13]. Some studies showed that approximately 30% of all small bowel intussusceptions are caused by malignancy, whereas the remainder is caused by benign lesions (60%) or are idiopathic (10%) [9,11,16].

The classic pediatric presentation of acute intussusception (a triad of cramping abdominal pain, bloody diarrhea and a palpable tender mass) is rare in adults [2]. The diagnosis is often difficult as the symptomatology evolves spontaneously resolve by pushing at least at the beginning and is usually manifested as chronic abdominal pain [10,16]. Nausea, vomiting,

abdominal fullness sensation, diarrhea, constipation or bowel obstruction outset can also be observed. As for the small bowel tumor diagnosis, it is difficult outside the complications of intussusception or bowel obstruction. More rarely, gastrointestinal bleeding form or Melena can dominate in case of tumor ulceration.

Plain abdominal films are typically the first diagnostic tool, since in most cases the obstructive symptoms dominate the clinical picture demonstrate signs of intestinal obstruction and may provide information regarding the site of obstruction.

Ultrasonography is a useful tool for intussusception diagnosis, bot in children and in adults though variable appreciation depending on the operator [5,26,27]. The classic appearance of an intussuscepted bowel in a transverse plane is called the 'target sign' and in the longitudinal appearance it is usually viewed as multiple parallel lines, which is termed as the 'sandwich appearance [9,12,16,17].

Computed tomography (CT) for adult Abdominal is the reference imaging technique, it allows conducting indisputably diagnostic certainty and discovering the possible etiology. It shows the presence of an intestinal occlusion, the topography and the morphological characteristics of any causal lesion [14,15]. The CT sensitivity varies between 58 and 100%. This test is currently considered as the most sensitive radiologic method to confirm intussusception and distinguishes the presence or absence of a lead point [4,6,9,14,15]. Adult tussusception secondary to inflammatory tumor can be demonstrated by MRI [15]. But the laparoscopy has also been used successfully in selected cases [7]. In the adult 70 to 90% of cases of intussusception require definite treatment, of which surgical resection is, most often, the treatment of choice [2].

The term "inflammatory pseudotumor" has been used for any macroscopic or microscopic tumor [1]. Different terms have been used: Inflammatory myofibroblastic tumor (IMFT), inflammatory fibroid polyps (IFPs), plasma cell pseudotumour, inflammatory myofibrohistiocytic proliferation, and omental mesenteric myxoidhamartoma. [3,12,13].

Conclusion

The acute intestinal obstruction by intussusception secondary to a small tumor is rarely seen in adults. Its symptoms are not specific. His diagnosis is facilitated by the CT scan. Surgical excision is the treatment of choice.

Acute intussusception ileo-ileal in adult: A case report

ORIGINALITY REPORT

26%

SIMILARITY INDEX

PRIMARY SOURCES

- www.wjgnet.com 139 words 11%
- Satoshi Ida, Hosei Matsuzaki, Shinichi Kawashima, Masayuki Watanabe, Yasuhiro Akiyama, Hideo Baba. 87 words 7% "Adult Intestinal Intussusception Caused by an Inflammatory Myofibroblastic Tumor", Case Reports in Gastroenterology, 2013
- www.jcdr.net 53 words 4%
- saspjournals.com 25 words 2%
- Yuan, X.-P., C.-X. Li, Y. Cao, S. Singh, and R. Zhong.
 "Inflammatory myofibroblastic tumour of the maxillary sinus: CT and MRI findings", Clinical Radiology, 2012.
- Oyen, T.L., A.M. Wolthuis, T. Tollens, C. Aelvoet, and J.P. Vanrijkel. "lleo-ileal Intussusception Secondary to a Lipoma: a Literature Review", Acta Chirurgica Belgica, 2007.
- Sami Akbulut. "Giant inflammatory fibroid polyp of ileum causing intussusception: a case report", Cases Journal, 2009

Crossref

EXCLUDE QUOTES OFF EXCLUDE BIBLIOGRAPHY OFF EXCLUDE MATCHES OFF