Case Report

Indian Journal of Trauma and Emergency Pediatrics
Volume 10 Number 3, July - September 2018
DOI: http://dx.doi.org/10.21088/ijtep.2348.9987.10318.3

Transient Jejuno Jejunal Intussusception in a Thalessemic Child

Geetha. M.[1], B. Kiran[2], V. Rangaiah[3], T. Hima Bindu[4], Nikhila. R. Reddy[5]

Abstract

Small bowel intussusception (SBI) are rare in children compared to adults. Small bowel intussusception can be transient, can be incidentally seen on ultrasound (US), often reduce spontaneously, no surgical intervention required. We report a case of Transient Jejuno Jejunal Intussusception in a seven year old child known case of beta thalessemia major, recovered with conservative management without any complications.

Keywords: Intussusception; Thalessemia.

Introduction

Intussusception which involves segmental invagination of intestinal segment into an adjoining intestinal lumen is a common gastrointestinal emergency, specially in children. It is the most common cause of small bowel obstruction in children, most frequent cause of all intestinal obstruction between 3 m to 6 y, more common in boys with overall incidence of 0.2% [1].

Intussucception largely remains an idiopathic entity, more so in children with majority involving large bowel resolving spontaneously with supportive care and observation, rarely complicating to perforation and sequalae.

Transient small bowel intussusceptions are less common with signs and symptoms not well described. Catalano described transient small bowel intussusceptions as momentary dysrhythmic contractions resulting in a functional abnormality of peristalsis, stasis of a segment resulting in inward bowel rotation, creating the intussusceptum [2].

Intussusceptions, very rare has been reported previously in a thalessemic child presenting with abdominal pain, ileocolic type, needing surgical intervention and proven due to yersinia enterocolitis [3]. We report a case of Transient Jejuno-Jejunal Intussusception in a child with beta thalessemia that resolved with conservative management.

Author Affiliation: [1]Assistant Professor, [2]Professor and Head [3]Senior Consultant [4,5]Resident, Department of Pediatrics, East Point College of Medical Sciences, Bengaluru, Karnataka 560049, India.

Corresponding Author: Geetha. M., Assistant Professor, Department of Pediatrics, East Point College of Medical Sciences, Bengaluru, Karnataka 560049, India.

E-mail: gee_festoon@yahoo.co.in

Received on 22.08.2018, **Accepted on** 17.09.2018

Case Report

A seven year old boy, a known case of beta thalessemia major diagnosed at one year of age, on iron chelator therapy and regular blood transfusion last two days earlier was admitted with peri umbilical abdominal pain, which is sudden in onset, sharp, non radiating since previous night. He had persistent vomiting since morning not tolerating even oral liquids. He gave history of watery stools four days prior.

On examination he had mild dehydration, pulse rate was 112/min, blood pressure 100/70 mm Hg, saturation 96% in room air. The oral cavity and oropharynx was normal. The abdomen was soft, non distended, with peri umbilical tenderness, no rebound tenderness or guarding, bowel sounds present. Rectal examination was normal.

The lab investigations revealed hemoglobin, total white cell count, serum creatinine and electrolytes, random blood sugar within normal limits with ketonuria. Ultrasonogram of the abdomen and pelvis revealed the diagnostic small bowel tubular mass in longitudinal view and doughnut with target sign in transverse view.

Child was managed conservatively with intravenous fluids, intravenous antibiotics, antispasmodics, antiemetics and constant observation and monitoring with plan of emergency surgical intervention in case of deterioration.

Patient seemed to symptomatically and clinically improve in hours with reduction in pain, vomiting, and reduction in tachycardia, dehydration and tenderness. Subsequent day child had completely recovered without any complications and confirmed with ultrasound.

Discussion

Intussusception is intestinal obstruction caused due to telescopic invagination of one bowel segment into another. Clinical presentation of intussusception is varied and includes abdominal pain, nausea, vomiting, lethargy, red currant jelly stools, these presentations may be missing in transient small bowel intussusceptions. Most pediatric intussusceptions are ileo colic, isolated small bowel involvement rare, yet more than 50% TBSI are jejunal [4,5].

In general, transient small bowel intussusception (TSBI) occurs in older children with a mean age of 4 years. Clinical history and physical findings are many times sufficient for diagnosis that is confirmed by imaging studies, in modern time's ultrasonography being sensitive and adequate for screening and conclusive diagnosis [5,6].

Pathological entities which can lead to SBI are infections, polyps, lymphomas, malabsorption syndrome, meckels diverticulum, duplication cyst, cystic fibrosis, intraluminal hematoma and adhesions [5,8].

An unreduced intussusception and resulting mesenteric vascular compromise can lead to bowel ischemia or necrosis. Hence early diagnosis and treatment is vital, conservative management with watchful expectancy for resolution and urgent surgical intervention to limit further complications in case of timely non resolution or even slightest suspicion of deterioration.

Conclusion

Transient small bowel intussuception, though rare and most unlikely cause, should be suspected in a thalessemic child with abdominal pain and suspected intestinal obstruction. It can be managed conservatively successfully, without any increased morbidity and mortality.

References

1. Puryso AS, Remer EM, Filho HM, Bittencourt LK, Lima RV, Racy DJ. Beyond appendicitis: common and uncommon gastrointestinal causes of right lower quadrant abdominal pain at multidetector CT. Radio Graphics. 2011;6:927–47.
2. Catalano O. Transient small bowel intussusceptions: CT findings in adults. Br J Radiol. 1997;6:805–08.
3. Ko SF, Lee TY, Ng SH, Wan YL, Chen MC, Tiao MM, Small bowel intussusceptions in symptomatic pediatric patients: Experiences with 19 surgically proven cases. World J Surg 2002;26:438-43.
4. del-Pozo G, Albillos JC, Tejedor D, Calero R, Rasero M, de-la-Calle U. Intussusception in children: Current concepts in diagnosis and enema reduction. Radiographics 1999;19:299-319.
5. Strouse PJ, DiPietro MA, Saez F. Transient small-bowel intussusceptions in children on CT. Pediatric Radial. 2003;33:316–20.
6. Tiao MM, Wan YL, Ng SH, Ko SF, Lee TY, Chen MC. Sonographic features of small-bowel intussusceptions in pediatric patients. Acad Emerg Med 2001;8:368.
7. Kim JH. US features of transient small bowel intussusceptions in pediatric patients. Korean J Radiol. 2004;6(3):178–84.
8. Koh EP1, Chua JH, Chui CH, Jacobsen AS. A report of 6 children with small bowel intussusceptions that required surgical intervention. J Pediatr Surg. 2006 Apr;41(4):817-20.
9. Linke F, Eble F, Berger S. postoperative intussusceptions in childhood. Pediatric surgery int 1998; 14:175-177.