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Journal of Pediatric Surgery

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Letter to the editor





Dear Editor,

An article was published in the Journal of Pediatric Surgery by Gasior et al., "Surgical management of the functional constipation: An intermediate report of a new approach using a laparoscopic sigmoid resection combined with a Malone appendicostomy" [1]. Analysis of this article and previous works showed the following: The authors do not use modern research methods widely used by pediatricians and adult surgeons (anorectal manometry and defecography). They "...believe that the diagnosis of idiopathic constipation is a clinical one" [2]. To increase the accuracy of megarectum and the megacolon determination, they performed a retrospective chart review of children aged 0-5 years who had undergone air contrast enemas for intussusception [3]. This choice is not correct. a) In the study of the rectum and colon, the water-soluble contrast is introduced into the colon under hydrostatic pressure ranging 30-50 mm Hg. During pneumatic reduction of intussusception, the pressure was more than 100 mm Hg. Excessive pressure in the colon leads to the expansion of its parts, the width of which cannot be accepted as a norm. b) In intussusception, the mesentery of the intestines is compressed. This causes a decrease in the tone of all colon. It is manifested by the expansion of the colon. c) The rectum is curved into 2 projections, which in a frontal projection are superimposed on each other. Therefore, the rectum can only be measured on a lateral radiograph.

Knowing that the true height of L-1 at this age is 1.4 cm, we measured the width of the rectum on the radiograph from this article [3] (Fig. 1). The width of the rectum is equal to 6.5 cm. It is greater than the upper limit of the norm determined for adults (6.3 cm) [4]. In another article, they claim that an upper limit to the norm for determining a megacolon and a megarectum in children is 6.5 cm, which is usually used in adults. In the human body, there is not a single organ that does not increase in size from 1 year to 15–70 years. This error in the measurement led to a false conclusion about the possibility of segmental dilatation of the large intestine [5]. It is known that the cause of FC in most patients is obstructed defecation syndrome or paradoxical puborectalis contraction. And it is always accompanied by a megarectum. Resection of the sigmoid colon does not eliminate the cause of the disease. The resumption of symptoms of FC is inevitable.

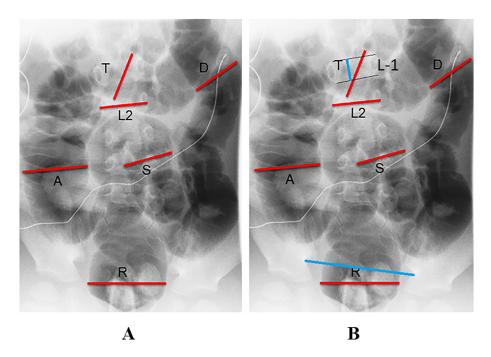


Fig. 1. Frontal radiograph from the article. (A) The image from an air contrast enema. Lines indicate characteristics (by authors) that were measured. A—ascending colon diameter, D—descending colon diameter, L-2 width vertebral body, R—rectum diameter, S—sigmoid colon diameter, T—transverse colon diameter. (B) The same radiograph with my additions. The blue line at L-1 is the height of the body L-1. The blue line in the pelvis is the maximal pelvis diameter.

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https://doi.org/10.1016/j.jpedsurg.2018.04.044

References

- [1] Gasior A, Reck C, Vilanova-Sanchez A, et al. Surgical management of functional constipation: an intermediate report of a new approach using a laparoscopic sigmoid resection combined with Malone appendicostomy, 2018;53(6):1160–2.
- [2] Bischoff A, Brisighelli G, Dickie B, Frischer J, Levitt MA, Peña A. Idiopathic constipation: a challenging but manageable problem. J Pediatr Surg 2017. https://doi. org/10.1016/j.jpedsurg.2017.09.022 pii: S0022-3468(17)30628-0. [Epub ahead of print].
- [3] Koppen IJ, Yacob D, Di Lorenzo C, et al. Assessing colonic anatomy normal values based on air contrast enemas in childrenyounger than 6 years. Pediatr Radiol 2017;47(3):306–12.
- [4] Gladman MA, Knowies CH. Novel concepts in the diagnosis, phathophysiology and management of idiopathic megabowel. Color Dis 2008;10(6):531–8 [PubMed].
- [5] Koppen IJN, Thompson BP, Ambeba EJ, et al. Segmental colonic dilation is associated with premature termination of high-amplitude propagating contractions in children with intractable functional constipation. Neurogastroenterol Motil 2017;29(10):1–9.