IMAGE OF THE ISSUE

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Endoscopic through-the-scope Suturing after Endoscopic Submucosal Dissection of a Neuroendocrine Tumor in the Middle Rectum

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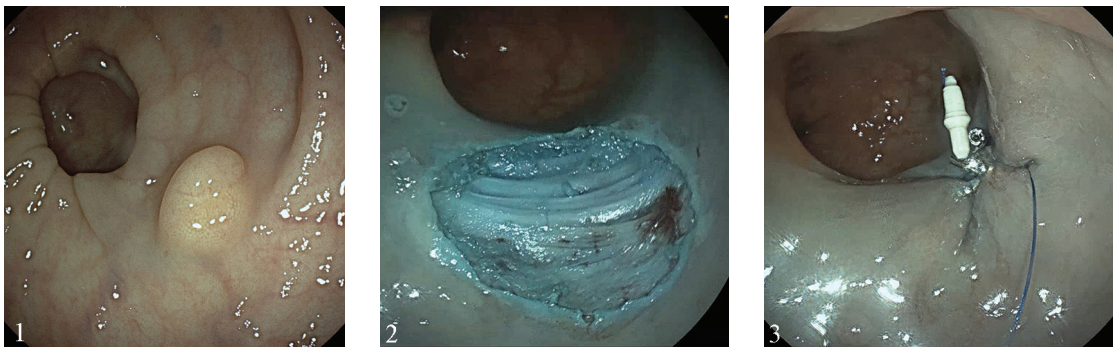

A 77-year-old man underwent colonoscopy due to progressive iron deficiency anemia, which revealed an 8 mm submucosal lesion in the middle rectum (Fig.1), with endoscopic features suggestive of a neuroendocrine tumor (NET). We performed endoscopic submucosal dissection (ESD) with „double-clip traction" technique. After completing circumferential incision and trimming, we attached a clip with an elastic band to the edge of the mucosal flap. A second clip was then used to hook the elastic band and attach it to the opposite wall of the rectum. Submucosal dissection was then terminated with complete excision of the lesion (Fig.2).

Finally, we performed mucosal defect closure (Fig.3) with a novel through-the-scope device, X-Tack system (Apollo Endosurgery, Austin, Tex, USA). Four tacks tethered with a single polypropylene suture were placed independently around the defect, using suture tension to bring the margins closer together. The suture cinch then locked the suture, maintaining tension and cutting off the excess suture.

After ESD, the patient was discharged home. No intra- or post-procedural complications occurred.

For rectal NETs measuring 10 mm or less, endoscopic resection is recommended and recurrence rates are low [1]. Studies have shown that ESD, modified EMR (with rubber band ligation, double channel, cap-assisted, circumferential pre-cut) and endoscopic full-thickness resection (eFTR) have a higher complete resection rate than conventional EMR [2-4]. Therefore, these are the most commonly used techniques for endoscopic resections of rectal NETs, with the choice also depending on the experience of the endoscopist. Perforation is a possible complication of ESD, even in small lesions, and can lead to further serious consequences whose management requires hospitalization, even for long periods [5]. Suturing the cutting base allowed us to prevent or resolve this eventuality. The use of a through-the-scope device also allowed for a rapid endoscopic suturing, without requiring endoscope removal for device application.

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Conflicts of interest: None to declare.

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