

A novel polypectomy technique: the “ropeway method” for resection of large pedunculated polyps

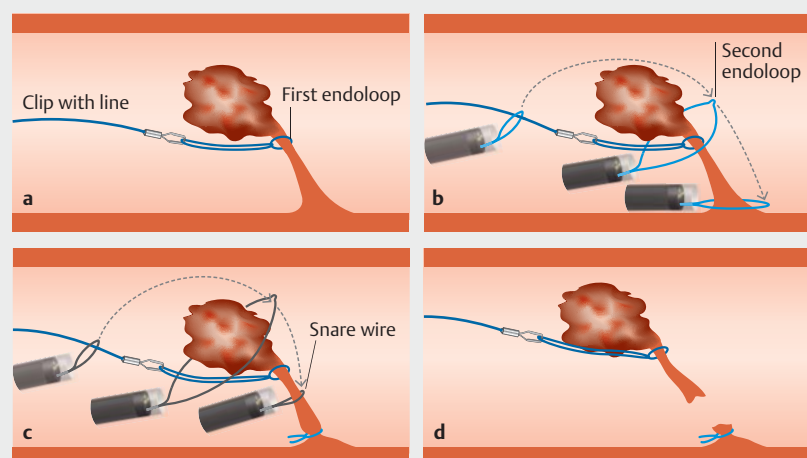
Pedunculated polyps at narrow or sharply bending areas in the colonic lumen can be challenging for endoscopic resection [1–5]. We report a newly invented technique, the “ropeway method,” to improve endoscopic resection of pedunculated polyps assisted by traction.

A 74-year-old woman was found to have a 3-cm pedunculated lesion in the sigmoid colon. We attempted to ligate the base of the stalk with an endoloop (MAJ-254; Olympus, Tokyo, Japan) before endoscopic resection. However, this proved impossible because the head of the polyp occupied the entire lumen and the base could not be identified. We performed this new method using two endoloops (►Video 1; ►Fig. 1). First, the stalk near the head was ligated by an endoloop (►Fig. 2a), and a clip with a line was attached to the endoloop to apply traction. After the colonoscope was completely withdrawn, a transparent hood was attached to the tip of the colonoscope to secure the view. An additional endoloop was inserted through the working channel and the tip of the endoloop protruded slightly to make a small loop. The line connected to the lesion was passed through this loop. Reinserting the colonoscope while pulling distally on the line led the endoloop to the exact location on the base with the line appropriately stretched (►Fig. 2b). In the same way, the snare wire was delivered between the two endoloops and the stalk was cut with electrocautery under direct vision (►Fig. 2c). We confirmed that the remaining stalk was securely ligated by the second endoloop (►Fig. 2d). The resected specimen was easily retrieved by pulling the line. Histological study showed a tubular adenoma with low-grade dysplasia.

The “ropeway method” enables safe and precise removal of the entire lesion and is a promising option for pedunculated lesions in difficult locations.



►Video 1 A novel polypectomy technique, the “ropeway method” for resecting a large pedunculated polyp in a difficult location.

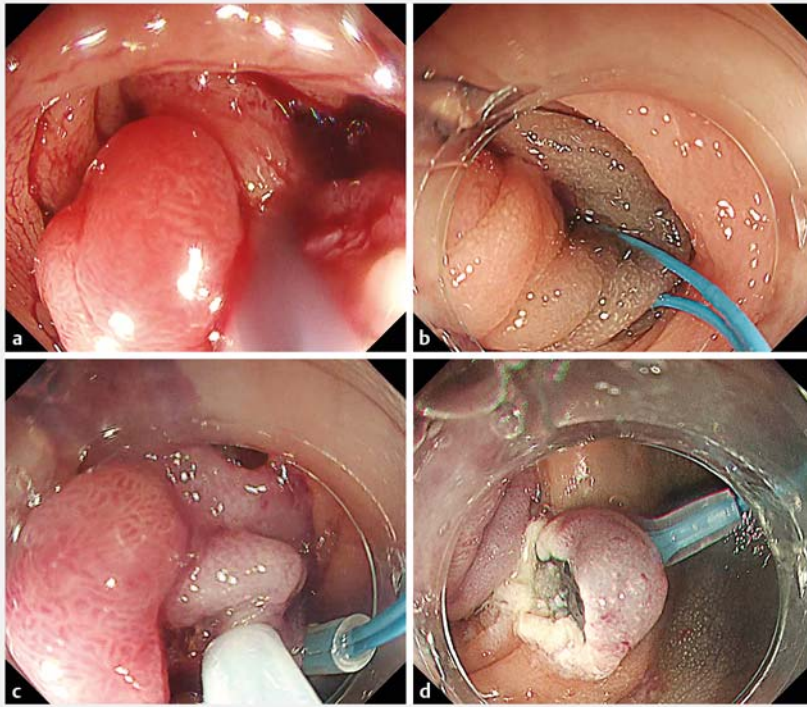


►Fig. 1 a–d Schema of the ropeway method using endoloops: a first, a clip with a line grasps the endoloop ligating the stalk near the head; b while the line is being pulled distally, a second endoloop is delivered to the base along the line and is tightly ligated; c finally, the snare wire is delivered between the two endoloops ligating the stalk, and the stalk is cut between the endoloops; d the resected specimen is easily retrieved by pulling the line.

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Competing interests

The authors declare that they have no conflict of interest.



► **Fig. 2 a–d** Endoscopic views showing: **a** the stalk near the head ligated by an endoloop; **b** an additional endoloop placed at the stalk base while traction was applied to the line; **c** the snare wire delivered between two endoloops; **d** the remaining stalk tightly ligated by the second endoloop.

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References

- [1] Brandimarte G, Tursi A. Endoscopic snare excision of large pedunculated colorectal polyps: a new, safe, and effective technique. *Endoscopy* 2001; 33: 854–857
- [2] Iishi H, Tatsuta M, Narahara H et al. Endoscopic resection of large pedunculated colorectal polyps using a detachable snare. *Gastrointest Endosc* 1996; 44: 594–597
- [3] Kouklakis G, Mpoumpouris A, Gatopoulou A et al. Endoscopic resection of large pedunculated colonic polyps and risk of post-polypectomy bleeding with adrenaline injection versus endoloop and hemoclip: a prospective, randomized study. *Surg Endosc* 2009; 23: 2732–2737
- [4] Takita M, Sakai E, Muramoto T et al. Traction-assisted colorectal endoscopic submucosal dissection using an endoloop for large semipedunculated lesions. *Endoscopy* 2020; 52: E279–E280

- [5] Hu X, Yang XD, Zhang YH et al. Prefixation with clip-anchored endoloop: a novel method facilitating endoscopic resection of a giant duodenal polyp with thick stalk. *Endoscopy* 2021; 53: E87–E89

Bibliography

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