

## Endoscopic submucosal dissection of a laterally spreading tumor in the right colon with a gastroscope after shortening the colon using a new double-balloon platform

Endoscopic submucosal dissection (ESD) allows en bloc resection of large superficial lesions in the gastrointestinal tract. Although ESD is frequently used in the rectum, esophagus, and stomach, it is only performed in the colon by high-volume experts, owing to the difficulty resecting lesions in this location [1]. This location is technically challenging due to bowel movements, poor scope maneuverability due to loops, and thinness of the submucosal space and the muscular layer. Poor scope maneuverability is one



► **Fig. 1** Easy retroflexion and good maneuverability thanks to the double-balloon platform.

of the most important risk factors for failure of colonic ESD and colon perforation. A new platform to facilitate exposure of difficult-to-access lesions has been designed (DiLumen Endolumenal Interventional Platform; Lumendi Ltd., High Wycombe, UK). It consists of a double-balloon platform and a sheath [2,3] (► **Video 1**). Once the lesion has been reached by a colonoscope within the sheath, shortening of the colon can be achieved and maintained by inflating the balloons to reduce the sigmoid loop. The scope can then be easily maneuvered around the lesion without forming a new loop.

Here we report the case of a patient with a 40 mm granular laterally spreading tumor (LST) of the right colon that was resected by ESD. Positioning with a regular colonoscope was difficult because of a large alpha loop and the position was difficult to maintain despite regular shortening. Once the lesion had been reached using the DiLumen platform, the balloons were inflated after shortening the

colon. The maneuverability of the scope was perfect, and the lesion was located 50 cm above the anal margin.

We used a gastroscope to perform ESD of the lesion. After removing the colonoscope, the gastroscope was inserted into the sheath of the device and the lesion was reached, without difficulty. Retroflexion was excellent within the stabilized colon (► **Fig. 1**). ESD using our previously reported strategy of counter-traction (double clip plus a rubber band) was performed safely and quickly. A 49 mm granular LST with intramucosal carcinoma was R0 resected in 30 minutes without perforating the colon.

The DiLumen double-balloon colonic platform facilitates endoscopic resection of lesions that are difficult to access due to poor scope maneuverability and the presence of loops.

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### Competing interests

None

### The authors

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► **Video 1** Endoscopic submucosal dissection of a laterally spreading tumor in the right colon with a gastroscope after shortening the colon using a new double-balloon platform.



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