

### Colonic Mucosal Sieve: An Unusual Endoscopic Finding

We report here a case of significant and symptomatic mucosal bridging, in the absence of an inflammatory bowel condition, at the site of a colostomy closure. The findings and treatment in this particular case reveal unusual colonoscopic pictures, and we describe a new division technique in which the use of an upper gastrointestinal papillotome through the working channel of a colonoscope led to successful relief of the symptoms.

A 70-year-old woman, who had undergone a radical left hemicolectomy 15 years previously, with a transverse loop colostomy for a Duke stage B annular adenocarcinoma at the splenic flexure, presented with an eight-week history of increasing constipation, intermittent painful abdominal distension, and increased flatulence. There was no history of blood or mucus in the stool. At previous follow-up colonoscopies, mild diverticular disease of the sigmoid, a mucosal bridge at the site of her previous colostomy, and a tubulovillous adenoma in the rectum had been described. The latter had been removed three years previously.

Colonoscopy on this occasion revealed an unusual mucosal sieve (Figure 1). The technique used for the division of the mucosal webs is shown in Figure 2. Good haemostasis was achieved, and the patient was allowed home next morning. After the procedure, the obstructive symptoms resolved, and the patient's bowel habits returned to normal. She remained free of symptoms during four years of follow-up.

Colonic mucosal bridges are described throughout the literature as a harmless feature of inflammatory bowel disease (1–4). They are intraluminally traversing strands of mucosa connected at both ends to the bowel wall. Endoscopically and radiographically, mucosal bridges present in the colon as thin bands, 0.4–0.6 cm in diameter, with lengths of up to 6 cm being reported (3). Histologically, they show a distorted mucosal pattern, with irregular glands and inflamed stroma (1). The aetiology is believed to be related to the tunnelling of an ulceration beneath the area of inflamed mucosa, followed by epithelialization of the ulcer tunnel. It is conceivable that ulceration at the site of non-absorbable sutures following previous surgery might have contributed to creating the mucosal bridges observed in this case.

In addition to the new therapeutic division technique used here, this case is unusual in that the colonic mucosal bridging was not related to inflammatory bowel disease, as has generally been postulated. The extensive nature and thickness of the colonic bridges alone, causing clinically relevant symptoms and requiring endoscopic release, is rare.

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**Figure 1:** At colonoscopy, a substantial mucosal bridge of the mid-transverse colon was discovered. Its branches divided the colonic lumen into three separate lumina, two of which allowed passage of the colonoscope.



**Figure 2:** An endoscopic papillotome was passed through the working channel of the colonoscope and around the bridges, which were divided by electrocautery.

#### References

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