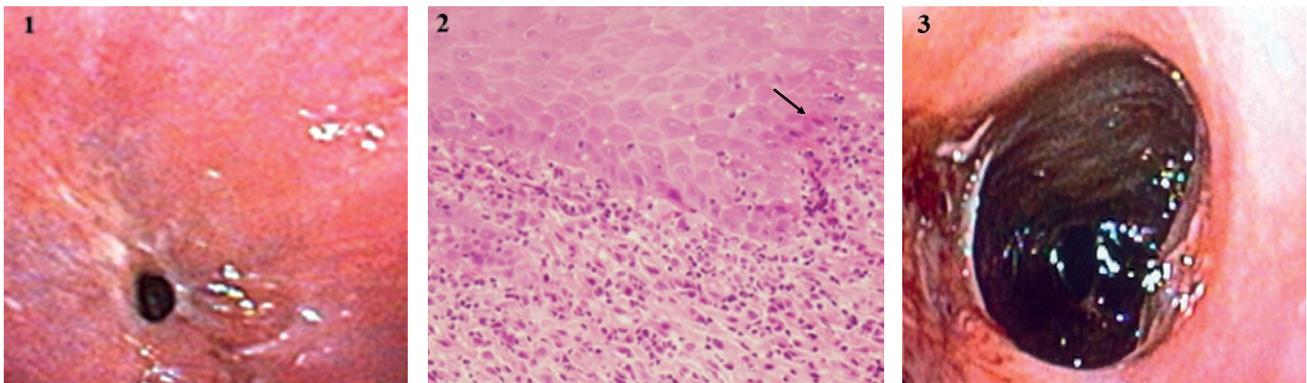


## One-shot Balloon Dilation of Esophageal Stricture due to Unusual Lichen Planus Localization

Mariano Sica<sup>1</sup>, Claudio Zulli<sup>1</sup>, Raffaele Manta<sup>1</sup>, Vincenzo Villanacci<sup>2</sup>, Rita Conigliaro<sup>1</sup>, Gabrio Bassotti<sup>3</sup>

1) Gastroenterology and Endoscopy Unit, Nuovo Ospedale Civile Sant' Agostino-Estense, Modena; 2) Institute of Pathology Spedali Civili, Brescia; 3) Gastroenterology & Hepatology Section, Department of Medicine, University of Perugia School of Medicine, Perugia, Italy



A 77-year-old female was admitted to our hospital for worsening of dysphagia and weight loss. Past clinical history was remarkable for type 1 diabetes mellitus and hypothyroidism secondary to previous Hashimoto's thyroiditis. Physical examination showed no systemic signs of Lichen Planus (LP).

Upper endoscopic examination revealed the presence of a tight proximal esophageal stricture (Fig. 1) with mucosal alterations (i.e. erythema and web-like areas) not crossable even with the use of a small caliber (pediatric) endoscope. Esophageal biopsies were obtained for histology. They revealed a lymphohistiocytic inflammatory infiltrate involving the superficial lamina propria and basal epithelium with basal keratinocyte degeneration, and the presence of Civatte's bodies (Fig. 2, H&E x20). Therefore, under deep sedation the patient underwent endoscopic balloon dilation of the proximal esophageal stricture with CRE (Boston Scientific Inc.). The balloon was inflated to 10mm for 30 s and then to 12mm for further 30 s. The stricture was immediately resolved without complications (Fig. 3).

After three months, the patient underwent an upper endoscopic control that revealed complete resolution of the stenosis, and only slightly fibrotic tissue was seen at the site of dilation.

Lichen planus incidence ranges from 0.5% to 2% in the general population [1]. Esophageal involvement is a rare and under-recognized manifestation of LP and only a few cases have been reported to date [1-3]. The diagnosis is usually made by a combination of history, endoscopic, and histological features. Esophageal LP manifestations usually do not show

the characteristic histological features, making the differential diagnosis difficult with other causes of esophageal stricture.

Although in most cases multiple endoscopic dilations are required for symptomatic relief of recurring esophageal strictures [4], esophageal LP may be successfully managed by a single session endoscopic dilation. This has clinical and economic consequences, avoiding multiple unnecessary admissions, especially in elderly patients.

**Corresponding author:** Mariano Sica, [sica.mariano@gmail.com](mailto:sica.mariano@gmail.com)

**Conflicts of interest:** None to declare.

### REFERENCES

1. Fox LP, Lightdale CJ, Grossman ME. Lichen planus of the esophagus: what dermatologists need to know. *J Am Acad Dermatol* 2011; 65: 175-183. doi: [10.1016/j.jaad.2010.03.029](https://doi.org/10.1016/j.jaad.2010.03.029)
2. Katzka DA, Smyrk TC, Bruce AJ, Romero Y, Alexander JA, Murray JA. Variations in presentations of esophageal involvement in lichen planus. *Clin Gastroenterol Hepatol* 2010; 8: 777-782. doi: [10.1016/j.cgh.2010.04.024](https://doi.org/10.1016/j.cgh.2010.04.024)
3. Quispel R, van Boxel OS, Schipper ME, et al. High prevalence of esophageal involvement in lichen planus: a study using magnification chromoendoscopy. *Endoscopy* 2009; 41: 187-193. doi: [10.1055/s-0028-1119590](https://doi.org/10.1055/s-0028-1119590)
4. Chandan VS, Murray JA, Abraham SC. Esophageal lichen planus. *Arch Pathol Lab Med* 2008; 132: 1026-1029. doi: [10.1043/1543-2165\(2008\)132\[1026:ELP\]2.0.CO;2](https://doi.org/10.1043/1543-2165(2008)132[1026:ELP]2.0.CO;2)