CASE REPORT

A candidal oesophageal stricture responsive to fluconazole therapy

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ABSTRACT

We report a case of candidal oesophageal stricture in an 81 year-old man with a 2 year history of gradual onset dysphagia and odynophagia to solids. Although rare, most cases have reported treatment success with oesophageal balloon dilation. We report the first case of candidal oesophageal stricture resolution with a prolonged course of anti-fungal therapy.

BACKGROUND

This case highlights the need to consider candidiasis as a cause for oesophageal strictures in high-risk groups. The case also highlights the importance of considering medical therapies prior to any therapeutic endoscopy in some patients who may not have absolute dysphagia.

CASE PRESENTATION

An 81-year-old man with a history of ischaemic heart disease and type 2 diabetes presented to the gastroenterology clinic with a 2-year history of gradually worsening intermittent dysphagia and odynophagia to solids. His medications included metformin (Sanofi Aventis Quebec Canada), ramipril (Sanofi Aventis, Australia), simvastatin (Merck and Co. USA) and clopidogrel. There was no history of smoking or alcohol consumption. His initial gastroscopy had revealed oesophagitis with no stricture, and an oesophageal biopsy specimen excluded eosinophilic oesophagitis. His dysphagia worsened despite proton pump inhibitor therapy, and 5 months later, a repeat gastroscopy revealed a non-negotiable oesophageal stricture at 25 cm. Figure 1 reveals an endoscopic image of the non-negotiable oesophageal stricture with multiple candidal plaques at 25 cm. Although endoscopic ultrasound (EUS) was limited to the top end of the stricture despite using a blind

probe (Olympus scope MH 908), there was evidence of circumferential and uniform mucosal thickening suggestive of a benign stricture (figure 2). CT of thorax showed no evidence of extrinsic compression of the oesophagus. Diagnosis of oesophageal candidiasis was confirmed on oesophageal biopsy of the strictured area. The patient did not complain of absolute dysphagia, and as he had consented for diagnostic gastroscopy and EUS only, oesophageal dilation was not performed. He was treated with a prolonged 2-week course of fluconazole therapy and made a spontaneous recovery with endoscopic evidence of plaque and stricture resolution (figure 3).

DISCUSSION

First described in 1839,¹ candida albicans, a diploid fungus, can cause mucosal inflammation and plaque-like lesions in the oesophagus. There are several risk factors predisposing to oesophageal

Figure 1 Endoscopic image of the oesophageal stricture with candidal plaques.

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Figure 2 Endoscopic ultrasound image of the oesophageal stricture.

candidiasis, a few being the use of antibiotics, corticosteroids, malignancy, immunodeficiency and poorly controlled diabetes mellitus.² The frequency of oesophageal candidiasis encountered at upper GI endoscopy ranges from 1% to 8%.³ With the introduction of newer oral anti-fungal agents in the 1990s that are better tolerated and can be absorbed at any gastric PH,⁴ management of candidal infections has been greatly enhanced.

Mucosal inflammation in some patients can become chronic, initially involving the lamina propria and progressing onto transmural inflammation, fibrosis, scarring and luminal narrowing.^{5 6} There have been

Figure 3 Endoscopic image of the oesophagus post treatment.

three cases of candidal stricture reported in the literature.⁷⁻⁹ Although these cases describe complications of candidal oesophagitis, none of these cases showed stricture resolution post anti-fungal treatment.

Oesophageal candidiasis can be misdiagnosed as eosinophilic oesophagitis;¹⁰ however, in our case, initial biopsy specimens were normal. Candida of the oesophagus is often seen as occasional and scattered white/yellow plaques, but in some cases can appear as a florid membranous oesophagitis. Although rare, candida can cause oesophageal stricture that can be treated successfully with prolonged anti-fungal therapy preventing long term sequelae and the potential need for balloon dilatation. We therefore describe the first case of candidal stricture in the oesophagus that resolved with anti-fungal therapy.

Learning points

- ▶ Consider candidiasis as a cause for benign oesophageal stricture
- ▶ There are several risk factors predisposing to oesophageal candidiasis, a few being the use of antibiotics, corticosteroids, malignancy, immunodeficiency and poorly controlled diabetes mellitus
- ▶ Candidal oesophageal stricture can be treated successfully with prolonged anti-fungal therapy in patients who do not present with absolute dysphagia

Contributors RK wrote the initial draft of the manuscript, and subsequently, both authors have been involved with the amendments and final report.

Competing interests None.

Patient consent Obtained.

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