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TECHNICAL NOTE

Upper GI Endoscopy in a Patient with Submucous Fibrosis

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Abstract

Upper gastrointestinal (GI) endoscopy in a patient with submucous fibrosis is challenging and risky, as there is hardly any mouth opening for a mouth guard to be inserted. We devised a new innovative technique with the use of Guedel airway insertion for performing upper GI endoscopy in patients with small mouth opening(trismus) or restricted mouth opening

Keywords: Upper GI endoscopy, Trismus, Submucous Fibrosis

A 28-year-old male patient with a history of melena and loss of weight for the last few months came for an upper GI endoscopy. The patient had a history of having betel quid and chewing tobacco for almost a decade, with restricted mouth opening due to submucous fibrosis. It was impossible to insert the traditional mouth

guard to be inserted prior to insertion of the endoscope due to the interincisor distance being less than two fingers. The patient was not willing to undergo any type of maxillofacial or dental surgical intervention to increase the mouth opening before endoscopy.

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Figure 1. Upper GI endoscopy being done with Guedel airway as a mouth guard

We devised our innovative technique of inserting Guedel airway, large adult 10 cm into the oral cavity for mouth opening and performed upper GI endoscopy from the side of the Guedel airway. The upper GI endoscopy was performed comfortably under light sedation without any discomfort or resistance from the patient (Figure 1).

Performing upper GI endoscopy in a patient with submucous fibrosis is often challenging and risky, as any resistance

from the patient can lead to potential life-threatening complications during the procedure [1]. There are few case reports of using a Doyen mouth retractor or custom-made plastic syringe [2], the Guedel airway was never used. Since there is no previous literature or any published report available about this technique, this is probably the first such case, and we recommend this technique in all patients having extremely narrow mouth openings for upper GI endoscopy in the future.

Statements and Declarations

Conflicts of interest

The authors declare that they do not have conflict of interest.

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