

A Rare Presentation of Dysphagia: Managing a Patient with Killian-Jamieson Diverticulum

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Introduction

Killian-Jamieson Diverticulum (KJD) is a rare type of esophageal diverticulum that arises anterolaterally below the cricopharyngeus muscle. Symptoms typically include dysphagia, regurgitation, and chronic cough, though other presentations like neck mass and hoarseness may occur. This condition is less common than Zenker's diverticulum and often remains undiagnosed until advanced imaging is performed. This case report highlights the challenges in diagnosing and managing a patient with KJD.



Lateral radiograph from a barium swallow study showing Killian-Jamieson diverticulum: This image illustrates an esophageal diverticulum located anterolaterally to the left of the cervicothoracic junction. The use of barium contrast allows for clear visualization of the esophageal lumen and the diverticulum's unusual position.

Case Report

A 55-year-old female with no prior history of significant medical conditions presented with progressively worsening dysphagia, a chronic cough, and a sensation of food becoming lodged in her throat. The patient's symptoms had been present for several months, leading her to seek evaluation for further investigation. Diagnostic imaging confirmed the presence of a Killian-Jamieson Diverticulum (KJD), a rare esophageal anomaly.

Rapid sequence intubation (RSI) was performed with special attention to the location of the diverticulum and her positioning, given the risk of airway compromise. The surgical team proceeded with an open resection of the diverticulum, focusing on complete removal and reconstruction of the esophageal wall. Intraoperatively, the patient experienced significant hypertension, with systolic pressures reaching 200 mmHg, which heightened the risk of postoperative complications. Despite these challenges, the surgery was successfully completed.

On the first postoperative day, the patient developed a rapidly expanding neck hematoma, leading to airway compression and the sensation of strangulation. This necessitated an emergency washout procedure to control the hematoma and relieve airway pressure. Postoperative monitoring was critical, with a focus on blood pressure control using antihypertensive medications to prevent further complications.

A follow-up esophagram confirmed the absence of leaks at the surgical site, and the patient was placed on a liquid diet for two weeks. After stabilization, she was discharged with outpatient follow-up, including referrals for evaluation of obstructive sleep apnea (OSA) and management of anxiety related to her surgical experience.

Discussion

Killian-Jamieson Diverticulum (KJD) is a rare esophageal condition, accounting for fewer cases compared to Zenker's diverticulum. KJD arises anterolaterally, with symptoms such as dysphagia, regurgitation, and chronic cough. Less common signs include neck mass or hoarseness. Imaging modalities like barium esophagrams and CT scans are critical for diagnosis, as KJD can be missed on routine exams. In this case, a barium swallow confirmed the diverticulum's location and size, guiding surgery.

Surgical resection is the treatment of choice for symptomatic KJD but carries risks, particularly in patients with comorbidities like hypertension. Intraoperative hypertension increases the risk of complications, such as hematoma formation. Proper perioperative management, especially blood pressure control, is key. Postoperative complications such as the neck hematoma observed here require prompt intervention, underscoring the importance of a multidisciplinary approach involving anesthesiologists, surgeons, and critical care specialists.

The patient's recovery, including evaluations for obstructive sleep apnea (OSA) and anxiety, underscores the importance of comprehensive follow-up care. Addressing both physical and psychological aspects of recovery is essential for optimizing long-term outcomes. Future cases may benefit from further research into improving perioperative management and early detection through imaging.

References

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