

Acute uvulitis: a rare cause of stridor in adults

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Abstract: A 34-year-old man presented to the emergency department with a chief complaint of shortness of breath and sore throat. On examination, the patient exhibited stridor and noisy breathing with the rest of the physical examination being within normal range, ultimately leading to a diagnosis of acute uvulitis. We present a case of acute uvulitis in this report.

Keywords: Acute Uvulitis; Corticosteroids; Emergency

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1. Introduction

Uvulitis is an uncommon inflammatory condition with different infectious and non-infectious etiologies. Although generally benign, it may result in life-threatening airway obstruction. Here, we present a case of acute uvulitis, highlighting the diagnostic challenges and emphasizing the importance of early recognition and evaluation.

2. Case presentation

A 34-year-old man presented to the emergency department with a chief complaint of shortness of breath and sore throat. The patient had upper respiratory tract infection for the past two days and has been taking analgesics. However, he had worsening of shortness of breath and sore throat approximately two hours prior to arrival. Upon arrival, the patient exhibited stridor and noisy breathing. The patient was afebrile and the vital signs revealed a blood pressure of 130/80 mmHg, a heart rate of 110 beats per minute, a respiratory rate of 24 breaths per minute, and an oxygen saturation of 96% while breathing ambient air. The physical examination of the head and neck revealed severe swelling of the uvula (Figure 1). The rest of the physical examination, including lung examination, was within normal limits.

3. Discussion

A diagnosis of acute uvulitis was made. Uvulitis is an uncommon condition with different infectious and non-infectious etiologies. Non-infectious etiologies of uvulitis in adults encompass a wide range of factors like gastroesophageal reflux disease, obesity, allergy, hereditary angioedema, pharmacological agents, obstructive sleep apnea, trauma (e.g.; intubation and endoscopy), alcohol, and smoking (1-3). Conversely, infectious causes predominate in children and adolescents,



Figure 1 Patient's uvulitis in the examination

often linked to upper respiratory infections by *Streptococcus pyogenes*, *Haemophilus influenzae*, or *Streptococcus pneumoniae* (1-3). The diagnosis is clinical and other conditions should be ruled out as they can be present simultaneously (4).

Although no standardized guidelines exist for the management of uvulitis, immediate care should prioritize airway assessment and identification of the underlying cause (3, 5). A thorough history, physical examination, and appropriate laboratory and radiologic investigations are essential (1, 4). In rare cases, uvulitis may cause life-threatening airway obstruction, particularly when associated with epiglottitis or peritonsillar abscess (2-4). In addition, certain symptoms may guide the physicians in identifying accompanying conditions. For instance, fever suggests an infectious etiology and possible association with life-threatening conditions such as epiglottitis (5). For isolated severe cases, management includes corticosteroids to reduce inflamma-

tion and pain, nebulized adrenaline to decrease edema and airway obstruction risk, and empiric antibiotic therapy targeting common pathogens (1, 3, 4). Penicillin remains an effective treatment for the infection causes (4).

The patient received intravenous steroids as treatment and symptoms improved rapidly. He had an uneventful follow-up.

4. Conclusion

Acute uvulitis is a rare but clinically significant cause of upper airway symptoms. Emergency physicians should consider uvulitis in the differential diagnosis, as early recognition is essential in proper monitoring and timely management.

5. Declarations

5.1. Acknowledgement

None.

5.2. Authors' contribution

HM designed the study. AS carried out the literature review and worked on writing the manuscript. HM and AA supervised and revised the manuscript. All the co-authors reviewed the manuscript and approved the final version.

5.3. Conflict of interest

The authors declare that they have no conflict of interest.

5.4. Funding

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References

1. Goldberg R, Lawton R, Newton E, Line WS, Jr. Evaluation and management of acute uvular edema. *Ann Emerg Med.* 1993;22(2):251-5.
2. Hawke M, Kwok P. Acute inflammatory edema of the uvula (uvulitis) as a cause of respiratory distress: a case report. *J Otolaryngol.* 1987;16(3):188-90.
3. McNamara RM. Clinical characteristics of acute uvulitis. *Am J Emerg Med.* 1994;12(1):51-2.
4. Metri D, Tirant D, Brennan T. Concurrent infectious uvulitis and peritonsillar abscess in an adult patient. *Ir Med J.* 2025;118(3):44.
5. Jerrard DA, Olshaker J. Simultaneous uvulitis and epiglottitis without fever or leukocytosis. *Am J Emerg Med.* 1996;14(6):551-2.