Acute Suppurative Thyroiditis

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A 25-year-old woman presented to the emergency department with a 2-week history of progressively increasing neck swelling associated with pain, dysphagia, and orthopnea. On examination, her vitals were normal. A fluctuant, tender 3.4 cm mass was palpated in the right thyroid gland. Contrast-enhanced computed tomography of the neck showed marked enlargement of the thyroid lobe and the lateral aspect of the thyroid isthmus with diffusely decreased attenuation, multiple enhancing septations, and inflammatory changes in the surrounding soft tissues (**image A**, red arrow). The trachea was mildly displaced to the left (**image B**, blue arrow). The patient was treated with IV ampicillin-sulbactam and incision and drainage due to multiple septations, making adequate drainage with fine-needle aspiration difficult. Fluid cultures grew *Streptococcus anginosus*. The patient was stable upon posthospital follow-up with no further neck swelling.

Acute suppurative thyroiditis (AST) is rare and commonly caused by *Staphylococcus aureus*, *Streptococcus pyogenes*, *Staphylococcus epidermidis*, and *Streptococcus pneumoniae*.¹ *Streptococcus anginosus* is part of human oral flora and a known cause of head and neck abscesses, which may cause AST through local

extension.^{1,2} Patients present with anterior neck swelling and fevers and may develop transient thyrotoxicosis with subsequent hypothyroidism if left untreated.^{1,3} AST may be associated with anatomic abnormalities such as pyriform sinus fistula, necessitating repeat anatomic imaging after recovery of the acute infection.^{3,4} In cases without airway compromise, management includes fine-needle aspiration for drainage and culture-directed antibiotic therapy. If the airway is compromised, patients may require immediate operative management.² Prompt identification and management of the condition is paramount, as cases may be fatal.⁴ (doi:10.7556/jaoa.2020.132)

References

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