

Background:

Lingual tonsillitis is a rare inflammatory disease which might be life-threatening if left untreated. It usually occurs in patients who already had their palatine tonsils removed. The disease is difficult to diagnose since the visualization of the lingual tonsil requires indirect mirror or fiberoptic exam.

Case report:

We present a case of 55-year-old woman complaining of high fever, sore throat, dysphagia and swelling of the neck. Her past medical history included palatine tonsillectomy in childhood. On admission the patient looked pale with a blood pressure of 140/80 mmHg. Her skin was hot to the touch and she had a temperature of 38,6 degrees Celsius. Auscultation of the lungs was normal. The physical examination revealed a swollen neck, tender on palpation, the movements of the neck were restricted due to the pain. Posterior pharyngeal wall was not inflamed. Laboratory test revealed leukopenia of 0,4x10⁹/l, neutropenia of 0,16x10⁹/l, thrombocytopenia of 13x10⁹/l, CRP of 266,1 mg/l, procalcitonin of 24 mcg/l. Urine test was inconclusive. The chest radiograph was normal. Ultrasound of the neck showed multiple enlarged lymph nodes up to 10 mm. It was decided to perform an indirect laryngoscopy, which revealed an enlarged and ulcerated lingual tonsil with small necrotic lesions. Microbiological cultures of blood and coating of the lingual tonsils were negative. Clinical diagnosis of sepsis, purulent lingual tonsillitis, agranulocytosis and pseudothrombocytopenia was made.

	04-25	04-26	04-28	04-29	04-30	05-02	05-05
Leucocytes	0,4		0,45	0,3	0,5	6,589	18,7
Neutrophils	0,16		0	0,19	0,09	3,494	8,94
CRP	266,1	321,2	272,19	134,73		53,84	12,7
				Sol. Filgrastini			
Sol. Cefuroximi 1,5 g x3				Sol. Ceftazidini 2 g x3 + sol. Amikacini 1g x1			

Table 1. Changes in leucocytes, neutrophils and CRP during treatment.

Initially, the patient received Cefuroxime (1,5 g 3 times a day) which was changed to combination of Ceftazidime (2 g 3 times a day) and Amikacin (1 g a day). Consequently, CRP levels began to fall rapidly. Granulocyte-colony stimulating factor therapy was added in order to treat neutropenia. The patient's response to treatment was good with the prediction of full recovery and she was advised to consult a haematologist.

Discussion:

Lingual tonsils, like palatine tonsils, are susceptible to bacterial infection, most commonly group A streptococci and Staphylococcus aureus as well as viral infection. When presented with a patient who has fever and dysphagia or pharyngitis worsened by moving the tongue, lingual tonsillitis should be suspected. Medical history often includes palatine tonsillectomy. Physical examination usually reveals normal or mildly hyperaemic pharynx. Therefore, indirect laryngoscopy should be performed to confirm the diagnosis.

Commonly, it shows redness and swelling of the base of the tongue covered with purulent masses. Differential diagnosis includes lingual abscess, lingual hypertrophy and other causes of lingual masses such as cysts and tumours. Initially, treatment begins with adequate antibiotic coverage following surgical removal of tonsils if required. Lingual tonsillitis might lead to airway compromise or sepsis both of them being extremely dangerous conditions.

Conclusion:

Performing an incomplete oropharyngeal examination could lead to missing the location of an infection. Indirect laryngoscopy should be considered in cases of unexplained dysphagia, odynophagia or swelling of the neck. Early suspicion of the disease will lead to prompt diagnosis in order to provide proper treatment with antibiotics.