

An Unusual Course of Necrotizing Pneumonia Leading To Pneumonectomy in a Child

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1. Clinical Image

A 13-year-old boy with a history of complicated pneumonia at the age of 20 months (Figure 1-A) managed with antibiotics and chest drainage presented with hemoptysis. Chest radiography showed multiple small, thin-walled cavities (Figure1-B). Chest scan showed massive necrosis of the left lung (C and D). Lung perfusion scan showed differential perfusion of left: right lungs to be 8:92 % (E and F). The patient underwent left pneumonectomy. Postoperative course was uneventful and the patient did not develop respiratory tract symptoms during a 1-year follow-up period. Necrotizing pneumonia is characterized by the development of necrosis, liquefaction, and cavitation of the pulmonary parenchyma due to pulmonary tissue lysis of infectious origin [1]. This condition is uncommon in children [2]. The major pathogens are *Staphylococcus aureus* and *Streptococcus pneumoniae* [1]. The standard treatment for necrotizing pneumonia includes empiric intravenous antimicrobial therapy with possible transition to oral antibiotics for a median duration of 28 days [3]. Lung necrosectomy should be considered at an early stage in the management of these patients, which avoids a more aggressive resection [4].

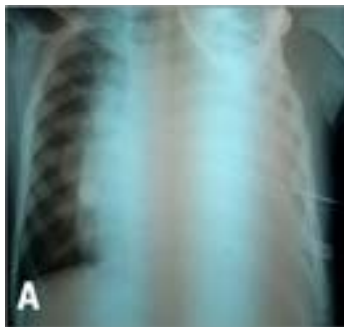


Figure 1A: Chest radiograph showing whiteout of the left lung.



Figure 1B: Chest radiograph showing multiple small, thin-walled cavities.

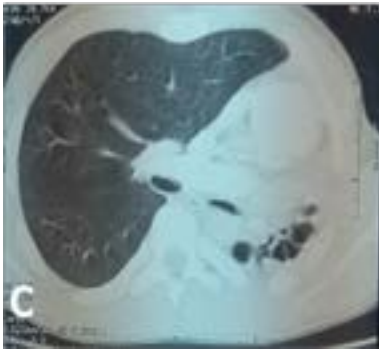


Figure 1 C: Axial (C) and frontal (D) CT scan cuts showing the development of multiple air filled cavities within the lung parenchyma

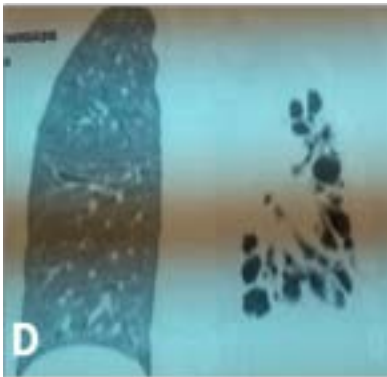


Figure 1 D: Axial (C) and frontal (D) CT scan cuts showing the development of multiple air filled cavities within the lung parenchyma.

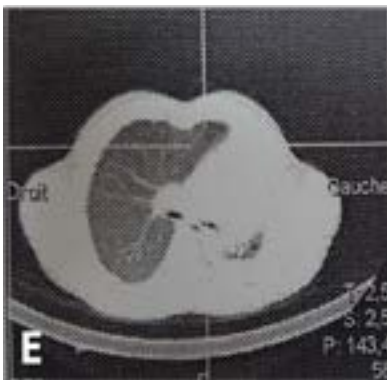


Figure 1 E: Lung perfusion scan showing a reduced perfusion of the left lung.

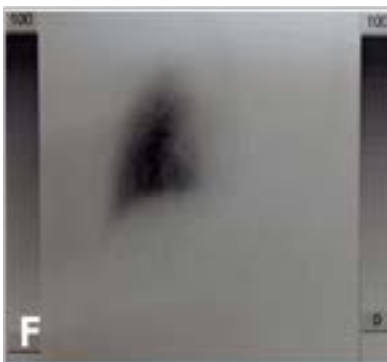


Figure 1 F: Lung perfusion scan showing a reduced perfusion of the left lung.

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