19TH AOCR MALAYSIA

WHERE IS THE MISSING CHICKEN BONE ? A CASE OF FOREIGN BODY BRONCHIECTASIS.

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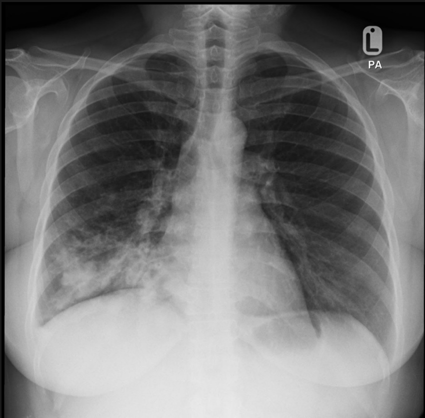
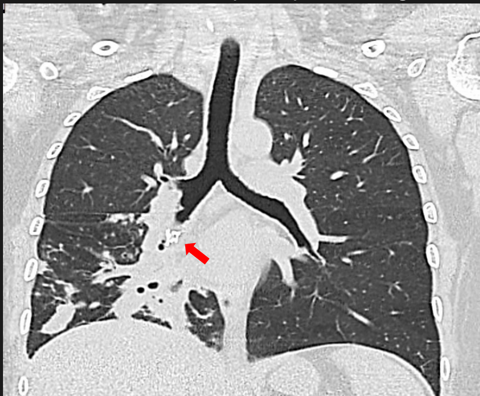
CASE REPORT

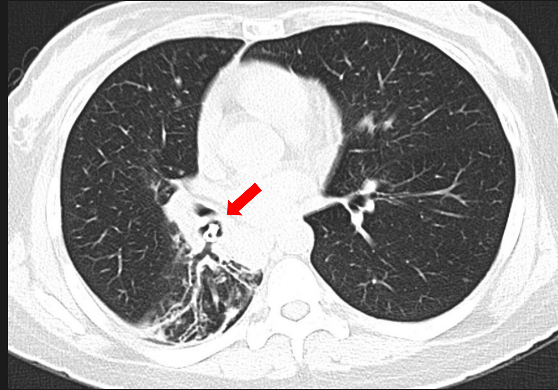
41 years old with recurrent hospital admission for bronchiolitis. Complain of worsening respiratory symptoms for 1 month. Chest radiograph shows right middle lobe collapse and right lower zone bronchiectasis.

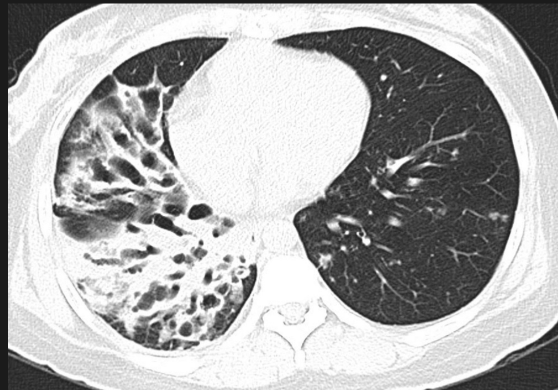


Initial HRCT done at different centre demonstrate a large calcified lesion in the right lower lobe bronchus. Localized cystic bronchiectasis at the middle and lower lobes as well as superimposed lung infection.



The diagnoses was missed, and patient was again admitted for similar symptoms at our centre. HRCT was repeated and shows worsening bronchiectasis.





Upon further questioning patient admitted history of foreign body aspiration (chicken bone)10 years ago. The patient was subsequently subjected for removal of foreign body using rigid bronchoscopy and a large piece of chicken bone removed.

BACKGROUND

- Foreign body aspiration is an uncommon cause of bronchiectasis in adults.
- Prolonged endobronchial retention of foreign body will eventually lead to recurrent infection and subsequent bronchiectasis.

CLINICAL RESENTATION

- Aspiration of foreign body in adults it is frequently seen in elderly, patients with altered mental status, intoxication and trauma.
- The acute presentation of foreign body aspiration includes choking and persistent cough, however left neglected the presentation can mimic presentation of chronic disease such as COPD, asthma, and obstructive pneumonia.
- Without clinical history of aspiration, patients with chronically retained foreign body can be misdiagnosed with other diseases.

IMAGING

- The foreign body is commonly lodged in the right main bronchus since it is anatomically wider and more vertical.
- The radiological appearance depends on x-ray attenuation of the foreign body, surrounding structure and overlying structure that may veil the object.
- The diagnostic challenge in CT is detection of organic material and plastic which may be difficult to detect due to its density.
- The presence of reactive tissue growth around the foreign may also hinder detection.
- The causal relationship between cases of foreign body aspiration and bronchiectasis has not yet been established.
- Postulated pathophysiology includes recurrent infection with impairment of drainage. The ensuing host response causes chronic inflammation of the airway with ulceration, airway dilatation which will eventually lead to bronchiectasis.
- Early bronchoscopic removal of foreign body leads to significant recovery, however in patients who have developed bronchiectasis they sometimes require lobectomy due to recurrent infection.

CONCLUSION

Diagnosis of foreign body retention is difficult without a clinical history of aspiration. Left untreated may present with non-specific symptoms. However high clinical suspicion is suggested if the patient presents with localized bronchiectasis.

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