

Imaging Sciences Interesting Cases

Case 459

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CLINICAL PRESENTATION: The patient is a 41-year-old male status post-motor vehicle collision.

IMAGING FINDINGS: AP view of the chest demonstrated a curvilinear shadow arising from the apex of the right lung and terminating in a “tear drop” shadow formed by the azygos vein.

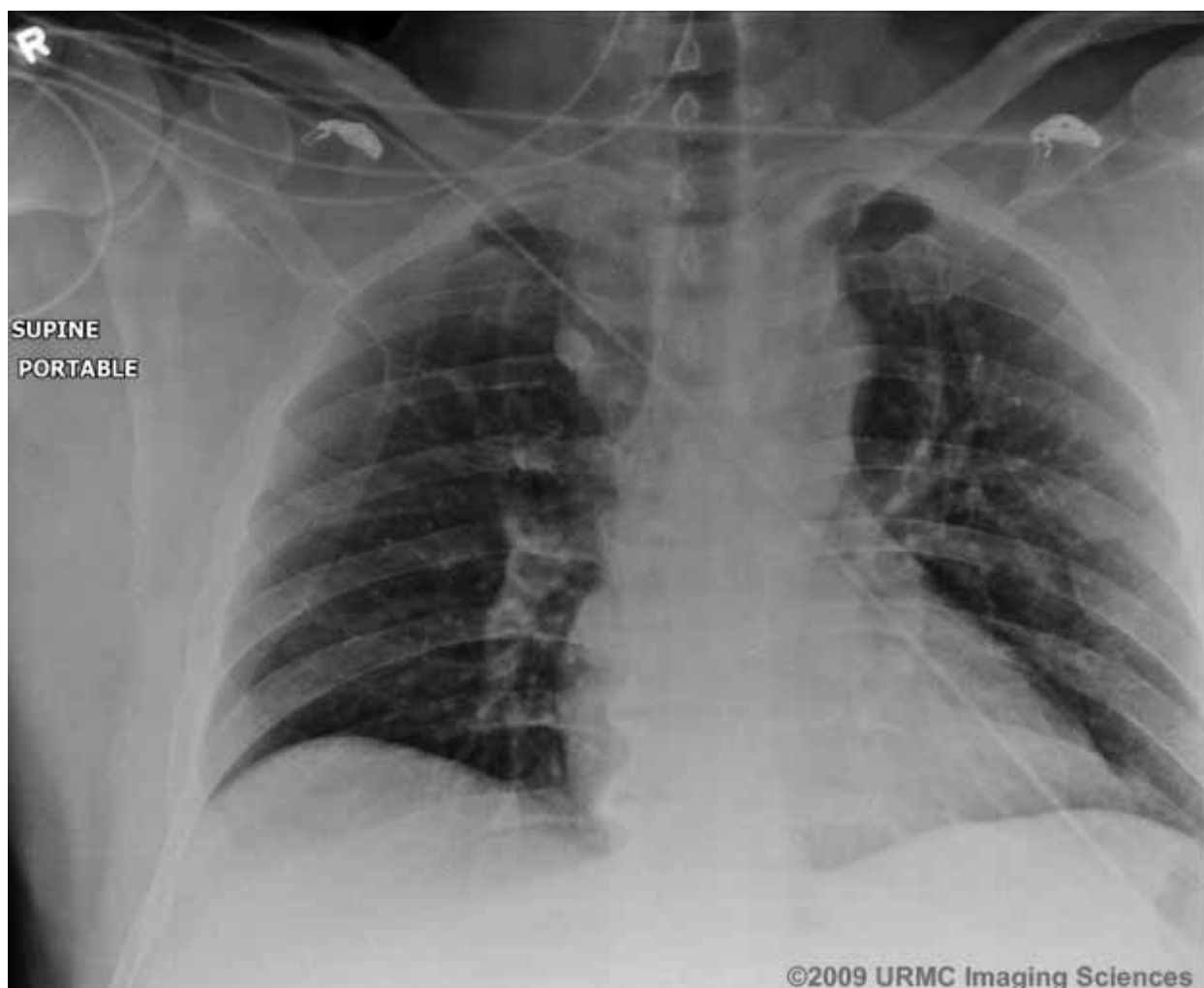


Figure 1: AP view of the chest shows a curvilinear line terminating in the characteristic “tear drop” shadow.



Figure 2: Axial CT image shows the azygos fissure.



Figure 3: Coronal reconstruction shows the azygos vein within the azygos fissure, in the proximity of the tracheobronchial angle.

DIAGNOSIS: Azygos lobe

DISCUSSION: The azygos lobe is a normal variant, which occurs in approximately 0.4% of the population. It forms when the azygos vein fails to migrate over the apex of the right lung and instead courses through the right upper lobe dragging along with it the parietal and visceral pleura, forming the azygos fissure. The azygos fissure is a curvilinear line, which extends from the right tracheobronchial angle to the apex of the right lung. The azygos vein lies within the fissure and appears on plain film as a characteristic "tear drop" at the inferior margin of the azygos fissure.

REFERENCES:

1. Mata J, Cáceres J, Alegret X, Coscojuela P, De Marcos JA. Imaging of the azygos lobe: normal anatomy and variations. *AJR Am J Roentgenol.* 1991 May;156(5):931-7. PMID: 2017954