

A giant bronchogenic cyst compressing the left atrium: A case report

A 73-year-old man presented with intermittent chest pain for the past 1 month. The patient's cardiac biomarkers and electrocardiogram were unremarkable. His transthoracic echocardiography revealed a giant echolucent cavity with a smooth surface located behind the left atrium (Fig. 1, Video 1). Color Doppler examination revealed no communication between the echolucent cavity and the left atrium. Chest computed tomography, however, revealed a giant mass of size 15 × 10 cm, which was not contrast-enhanced and located in the middle mediastinum (Fig. 2). The mass lay close by and compressed the left atrium, the left main coronary artery, the pulmonary vein and artery, the superior vena cava, and the esophagus. The upper end of the mass extended to the aortic arch, while its lower end extended to the diaphragm. A right posterolateral thoracic incision was performed to remove the cyst, but the cyst was found to be adhered firmly to the surrounding tissues. During the dissection of the cyst from the left atrium, the latter tore, causing severe bleeding. Although hemostasis was performed immediately, the patient's blood pressure fell rapidly, resulting in ventricular fibrillation and, subsequently, death. Histological examination of the excised tissues indicated that the mass was a bronchogenic cyst (Fig. 3).

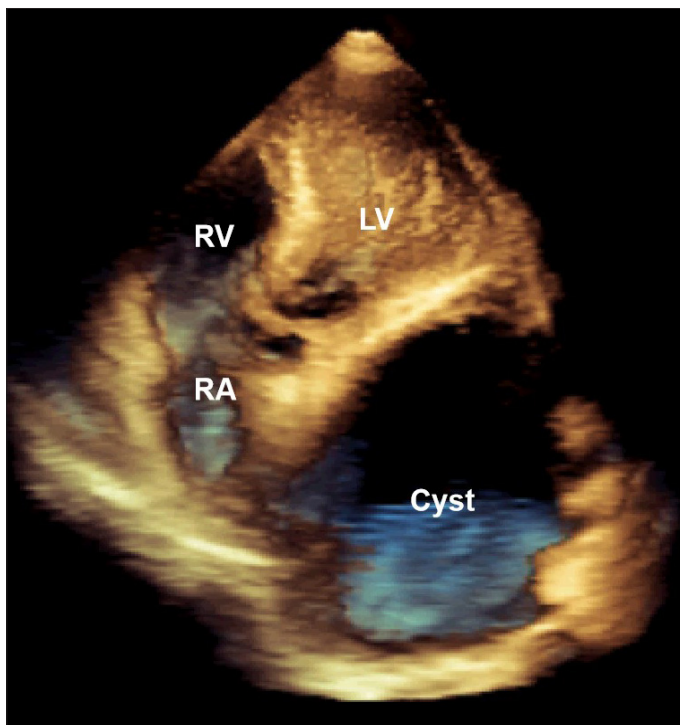


Figure 1. Three-dimensional transthoracic echocardiography showing a giant hypoechogenic mass located close to the heart.

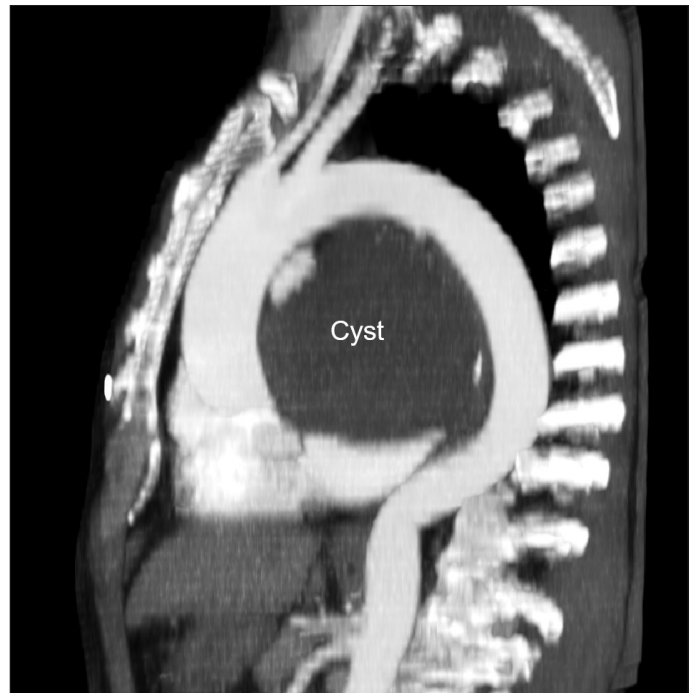


Figure 2. Contrast-enhanced computed tomography showing a well-defined mediastinal cystic lesion with homogeneous content.

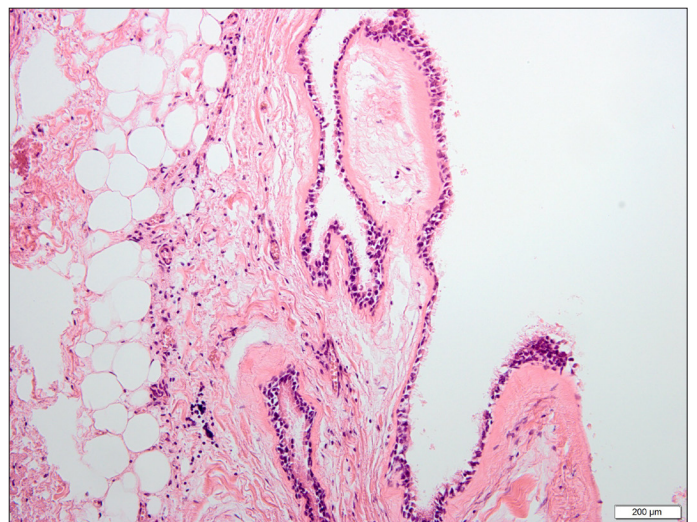


Figure 3. A photomicrograph (hematoxylin and eosin staining, original magnification 200×) of the cyst wall, showing that the cavity is lined with pseudostratified ciliated columnar epithelial cells.

Informed consent: Written informed consent was obtained from the patient's relatives.

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Video 1. Two-dimensional transthoracic echocardiography showing a giant hypoechogenic mass located close to the left atrium

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