

One Bronchus too Many: A Rare Bronchoscopy Finding

*Um Brônquio a Mais:
Um Achado Raro na Broncoscopia*

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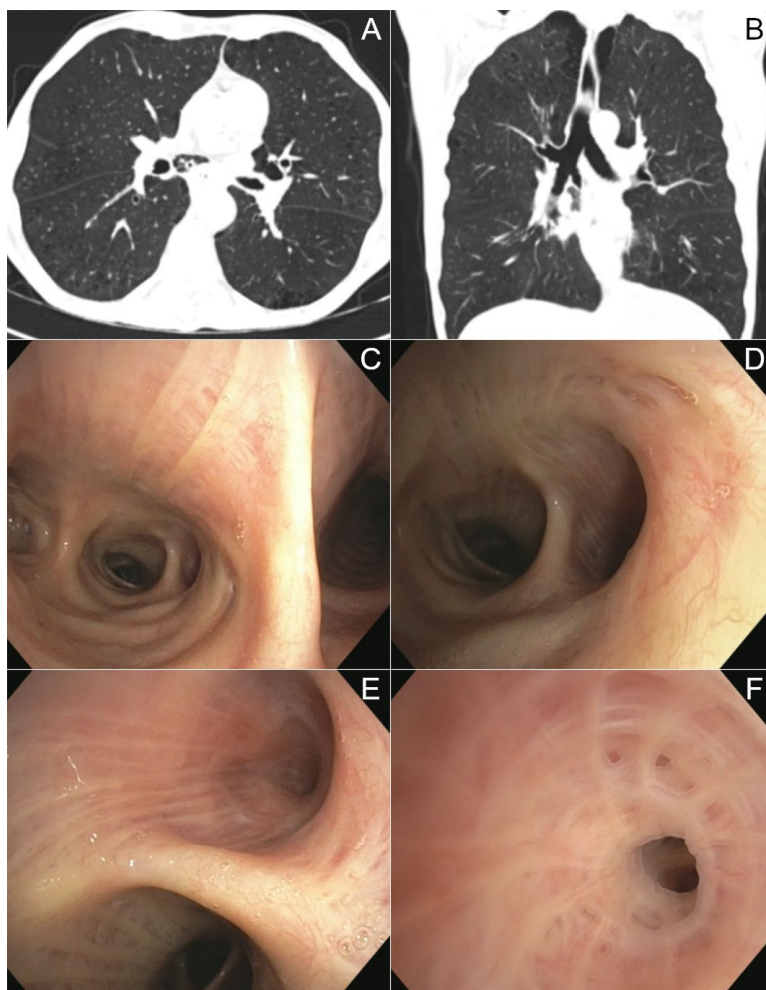
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Bronchial anatomical variations are frequently encountered during bronchoscopy, though accessory bronchi are rare and typically lack clinical relevance. Among these, the cardiac bronchus is an uncommon anomaly, present in 0.07%–0.5% of individuals, and only half communicate with aerated lung parenchyma.^{1,2} We report the incidental finding of a cardiac bronchus in a 53-year-old male with a history of heavy smoking and multiple comorbidities, including COPD. The patient presented with progressive dysphagia and underwent upper gastrointestinal endoscopy, which revealed a friable, infiltrative lesion in the distal oesophagus, 31 to 40 cm from the teeth (Siewert I/II). Biopsies confirmed oesophageal squamous cell carcinoma. Thoracic computed tomography (CT) showed minor adenopathy and an accessory inner lobe superior to the heart (Figs. 1A,B). During endobronchial staging, no tracheal or left main bronchus involvement was noted (Choi-Baisi stage I). However, an extra segmental bronchus was identified arising from the internal wall of the intermediate bronchus (Figs. 1C,D). After saline instillation, the bronchus was navigated, revealing bifurcation into two segmental bronchi leading to aerated lung tissue (Figs. 1E,F). This case highlights a rare bronchial variation observed during staging of oesophageal cancer. The presence of a cardiac bronchus with distal aeration is noteworthy and contributes to the anatomical understanding of bronchial anomalies.

**Figure 1**

Imaging findings of the clinical case. Thoracic computed tomography scan in the (A) axial and (B) coronal planes show an accessory inner lobe superior to the heart. Bronchoscopy images show (C) the right main bronchus, (D) the intermediate bronchus, and the (E,F) cardiac bronchus, (E) before and (F) after saline instillation.

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REFERENCES

1. Chassagnon G, Morel B, Carpentier E, Ducou Le Pointe H, Sirinelli D. Tracheobronchial branching abnormalities: Lobe-Based classification scheme. *Radiographics*. 2016;36:358-373. doi: 10.1148/rg.2016150115.
2. McGuinness G, Naidich D, Garay SM, Davis AL, Boyd AD, Mizrachi HH. Accessory cardiac bronchus: CT features and clinical significance. *Radiology*. 1993;189:563-6. doi: 10.1148/radiology.189.2.8210391.