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## A rare case detected incidentally: Thyroid metastasis of lung adenocarcinoma

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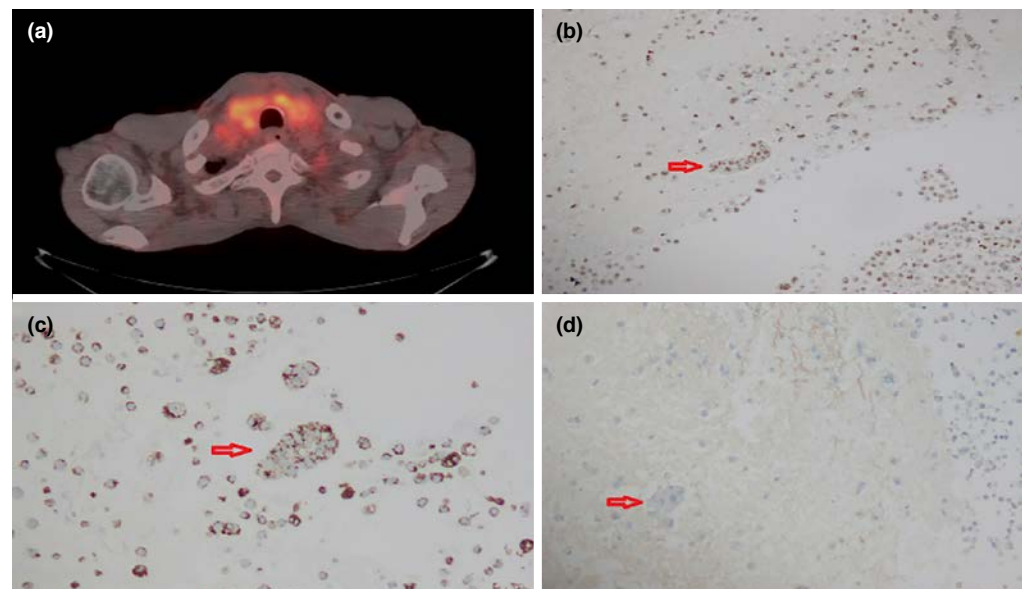
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A 61-year-old male presented to our clinic with complaints of dyspnea and neck pain. Pulmonary embolism was diagnosed through a computed tomography pulmonary angiogram. A nodular lesion, approximately 2 cm in short diameter, was identified in the laterobasal segment of the lower lobe of the right lung. Additionally,

a heterogeneous appearance of the thyroid tissue was observed in the mediastinal window [Fig. 1a]. Positron emission tomography/computed tomography imaging revealed enlargement of both thyroid lobes and the isthmus, with moderate to intense fluorodeoxyglucose (FDG) uptake in both lobes (maximum standardized up-



**Figure 1:** (a) Positron emission tomography/computed tomography (PET/CT) imaging showing increased fluorodeoxyglucose (FDG) uptake in both thyroid lobes, with a heterogeneous character and maximum standardized uptake value ( $SUV_{max}$ ) of 6.87. (b) Tumor cells stained positive for thyroid transcription factor-1 (TTF-1) (x20) forming an adenoid structure. (c) Tumor cells stained positive for Napsin-A (x20) forming an adenoid structure. (d) Tumor cells stained negative for thyroglobulin (x20) forming an adenoid structure

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take value,  $SUV_{max}$  6.87). A nodular lesion with an  $SUV_{max}$  of 5.79 was also noted in the peripheral subpleural area of the right lung's lower lobe laterobasal segment, raising suspicion of malignancy.

Thyroid biopsy results indicated "metastasis of lung adenocarcinoma to thyroid tissue" with tumor cells staining positive for thyroid transcription factor-1 (TTF-1) and Napsin-A, and negative for thyroglobulin [Fig. 1b-d]. While lung adenocarcinoma commonly metastasizes to the liver, adrenal glands, bones, and brain, metastasis to the thyroid gland from primary lung cancer is exceptionally rare.<sup>[1,2]</sup>

### Informed Consent

Written informed consent was obtained from the patient for the publication of the case report and the accompanying images.

### Authorship Contributions

Concept – C.S.; Design – C.S.; Supervision – C.S.; Funding – G.D.; Materials – G.D.; Data collection &/or processing

– G.D.; Analysis and/or interpretation – E.Ö.B. Literature search – E.Ö.B.; Writing – E.Ö.B.; Critical review – C.S.

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There are no conflicts of interest.

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### Peer-review

Externally peer-reviewed.

## References

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