Coincidental visualization of an atypical bronchial carcinoid on Tc-99m-sestamibi scan in Kallmann's syndrome

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We report a case of an atypical bronchial carcinoid showing sestamibi uptake. A 27-year-old man with Kallmann's syndrome and hyperparathyroidism had parathyroid scintigraphy with ^{99m}Tc-sestamibi. A focal uptake was observed on the right perihilar region, and this right perihilar mass was demonstrated on computed tomography and proved histologically to be an atypical bronchial carcinoid tumor. Factors which may explain the tumoral avidity for sestamibi are increased blood flow, transmembrane potentials of plasma and mitochondrial membranes and the relative number of mitochondria present in the cells of this carcinoid tumor. The importance of this case is the coincidence of an atypical carcinoid in a patient with significant failure of secondary sexual characteristics, right renal agenesis and bilateral anosmia associated with Kallmann's syndrome.

Key words: ^{99m}Tc-sestamibi, carcinoid, Kallmann's syndrome