

A Case of Pheochromocytoma presenting as incidentoma



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Case report

83 year old gentleman admitted with nausea and feeling generally unwell. Past medical history of hypertension, duodenal ulcer, previous gastric surgery, polymyalgia rheumatica and type 2 diabetes mellitus. Chest XR showed right basal pneumonia which was treated with antibiotics. Patient admitted to significant weight loss therefore he had thoracic-abdominal CT scan performed which showed 4cm by 4cm solid cystic lesion in the left adrenal gland possibly malignant. Subsequently magnetic resonance imaging scan revealed left adrenal heterogeneous lesion which could be either primary or metastatic. 24 hr urinary metadrenaline 7.2 umol/24hrs, normetadrenaline 4.1umol/24hrs. These findings were consistent with diagnosis of pheochromocytoma. He had experienced hypotensive episodes associated with dizziness these were treated with intravenous fluids to expand his intravascular volume. He did not tolerate phenoxybenzamine because of dizziness and low blood pressure. He was assessed for surgical treatment to his pheochromocytoma but in view of his multiple co-morbidity he declined surgery therefore he was managed conservatively. For nearly 2 years he remains under outpatient follow-up and his repeated imaging showed slight enlargement of his original lesion but no new lesion

Learning Points

-The classical triad of paroxysmal headache, palpitation and sweating may not be present in elderly patients.

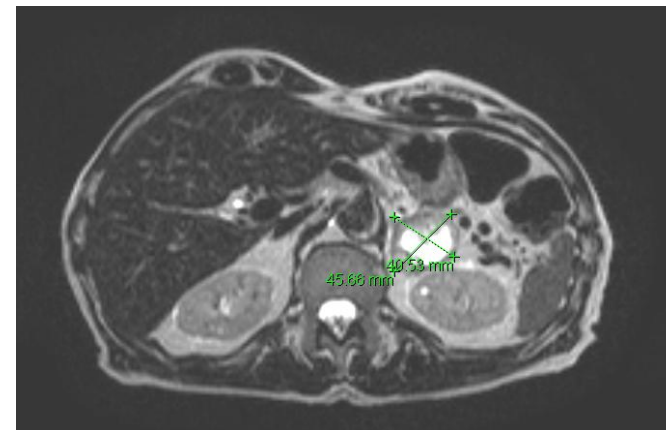
-Pheochromocytoma can be discovered incidentally on imaging done for unrelated symptoms.

-24 hour urinary metanephrines has high sensitivity and is now increasingly the preferred test. The tumour can be localised with MRI scan or iodine-131 MIBG test (metaiodobenzylguanidine).

-Management of Pheochromocytoma in the elderly with complex co-morbidity can be challenging.

Discussion

- Combination of headache, sweating and palpitation has a specificity of more than 90% for diagnosis of pheochromocytoma
- Hypertension in some form is present in 80-90%, palpitations in 60%.
- Sustained hypertension is present in 50-60% of cases.
- 4-5% of adrenal incidentalomas tend to be pheochromocytomas.
- Up to 8% of patients may be asymptomatic and are discovered incidentally on imaging done for unrelated symptoms as in our case
- Great majority of pheochromocytoma is found in adrenal glands (90%) and 10% bilaterally often with familial syndromes like multiple endocrine neoplasia (MEN-type2A).
- 10% of pheochromocytomas occur outside the adrenals, mostly in the abdomen
- Approximately 10% tend to be malignant and can metastasise to liver and bone
- 24 hour urinary metanephrines has sensitivity of 97% in diagnosing pheochromocytoma
- Treatment is surgical after medical stabilisation with α -blockade and if necessary β -blocker therapy.
- Patients not fit to undergo surgery are managed conservatively.



References

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