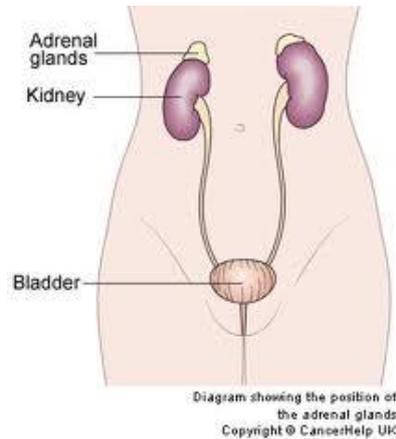


ADRENAL INCIDENTALOMA

The term “adrenal incidentaloma” refers to a lesion, usually over 1cm in size, located within the adrenal gland, discovered incidentally on routine CT scan/MRI/ ultrasound done for another purpose. The incidence of these tumours is probably around 4%, and increases with age. The adrenal glands are located on top of the kidneys.



The adrenal glands produce three types of hormones:

- 1) Glucocorticoid (steroid) hormones. Cortisol is the main of these hormones. Cortisol is a vital “stress hormone” which helps with the stress response of the body (maintaining Blood Pressure and circulation in times of physical stress), storing fat, fighting infection and regulating blood glucose levels
- 2) Mineralcorticoid hormones. The main of these is Aldosterone, which helps regulate sodium levels, potassium levels, body fluid balance and blood pressure
- 3) Androgens – testosterone, DHEA and DHEAS. In women, androgens are produced in the adrenal glands and the ovaries. In women, adrenal androgens promote the development of sex characteristics such as underarm and pubic hair. In men, most androgens (eg, testosterone) are produced in the testes. Androgens made by the adrenal glands are not as important for normal sexual function.

The 2 main reasons for investigating adrenal incidentalomas are to:

- Exclude overproduction of any of the above hormones by the adrenal incidentaloma (“functioning” tumour)
- Exclude cancer within the adrenal incidentaloma

Symptoms & Signs

An adrenal incidentaloma will not produce any symptoms or signs at all unless it is “functioning” ie. Overproducing hormones. Some of the symptoms or signs that may suggest this include:

- High blood pressure
- Diabetes
- Fractures (broken bones)

- Episodes of headache, sweating, palpitations, tremor, flushing/ being pale, anxiety
- Low potassium levels in the blood

Investigation

Generally, adrenal incidentalomas will require further investigation to exclude functionality (hormone overproduction) or cancer. These investigations may include a combination of blood tests, 24 hour urine collections, and other imaging investigations such as CT scans.

Follow-up

Depending on the individual case, a repeat CT scan may be required 3-6 months after detection of the adrenal incidentaloma to ensure it hasn't enlarged. Following this, whether further surveillance with CT scanning is required and the intervals at which this is done, will be decided by your doctor according to your individual case.