

Spontaneous Bilateral Adrenal Haemorrhage at 25 Weeks Gestation

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Introduction

Adrenal haemorrhage is a challenging yet important diagnosis to consider when faced with a patient presenting with nonspecific symptoms.

A 26-year-old primiparous female attended with sudden severe back pain radiating to the right hypochondrium, associated with shortness of breath and vomiting at 25+4 weeks gestation. She was diagnosed with bilateral adrenal haemorrhage.

Our aim is to increase awareness of this rare condition as it is associated with a 15% mortality rate on first presentation¹

Investigations

1. Physical examination and baseline bloods were unremarkable.
2. CT Pulmonary Angiogram showed bulky adrenal glands and hepatomegaly
3. Magnetic Resonance Cholangiopancreatography showed bilateral adrenal masses
4. A low 9am cortisol level prompted a short synacthen test which showed minimal response.

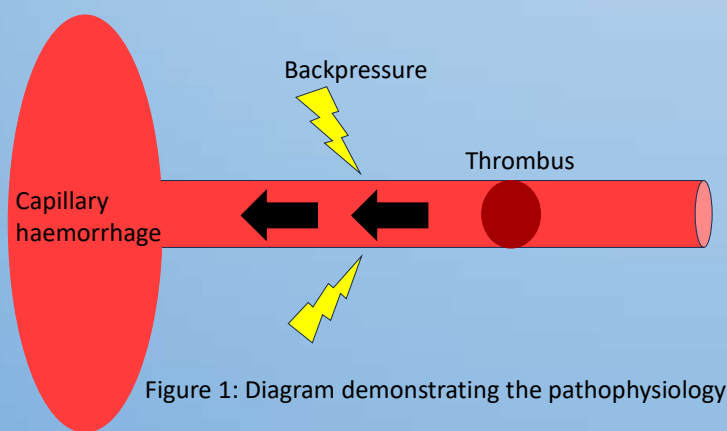
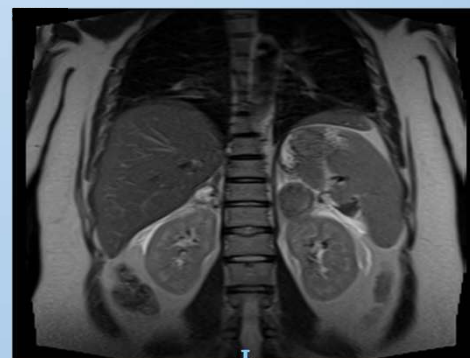


Figure 1: Diagram demonstrating the pathophysiology

Discussion

- Adrenal haemorrhage affects 0.14-1.1% of the non-pregnant population² and is associated with a 15% mortality rate¹.
- Diagnosis is primarily based on imaging such as ultrasound or magnetic resonance imaging.
- Adrenal cortical hyperplasia in pregnancy may cause venous congestion followed by thrombosis. It is the thought that this causes backpressure resulting in haemorrhage (Figure 1)
- Management is with steroid replacement; surgery is reserved for those who fail to respond to aggressive resuscitation.

Outcome

- ❖ Remained on oral hydrocortisone, but had an otherwise unremarkable antenatal period
- ❖ Booked for induction of labour at 38+5/40 due to concerns of ongoing risk of adrenal crisis
- ❖ Delivery of healthy baby via caesarean section following failed induction of labour
- ❖ The patient's adrenal function failed to recover postnatally and she remains on hydrocortisone with regular endocrine follow-up.

References

1. Aloini et al. Bilateral adrenal haemorrhage: learning notes from clinical practice. *Front Endocrinol* (Lausanne) Nov 2023; 3 (14). doi: 10.3389/fendo.2023.1233710
2. Kadhem et al. Spontaneous Unilateral Adrenal Haemorrhage in Pregnancy. *Cureus* Jan 2017, 9 (1). doi: 10.7759/cureus.977