Reviewer's report

Title: Pituitary apoplexy following shoulder arthroplasty - a case report

Version: 1 Date: 25 May 2010

Reviewer: Mônica Gadelha

Which of the following best describes what type of case report this is?: An unexpected event in the course of observing or treating a patient

Has the case been reported coherently?: Yes

Is the case report authentic?: Yes

Is the case report ethical?: Yes

Is there any missing information that you think must be added before publication?: Yes

Is this case worth reporting?: Yes

Is the case report persuasive?: Yes

Does the case report have explanatory value?: Yes

Does the case report have diagnostic value?: Yes

Will the case report make a difference to clinical practice?: Yes

Is the anonymity of the patient protected?: Yes

Comments to authors:

The authors report an interesting case of pituitary apoplexy following shoulder replacement in a 62 year old healthy male patient who had post-operative heparin thromboprophylaxis. The manuscript is well written, but some points need to be clarified accordingly (see below).

Introduction
Please, provide references.

Case report
- Was the aspirin discontinued before surgery? How long before surgery?
- Please, provide all sodium values.
- What was the hemoglobin value before surgery?
- It would be very attractive if the authors could show the CT scan which revealed a 15 mm low attenuation signal in the pituitary fossa as well as the MRI showing the macroadenoma.

- Please, depict the cortisol levels before and after synacthen stimulation as well as free T4 levels. Why was synacthen test performed instead of insulin tolerance test? Here, it is important to stress out that whether the central adrenal insufficiency is recent (secondary to apoplexy), there will be an adequate serum cortisol response to ACTH. The rest of pituitary function evaluation is not clear. Please, provide PRL, IGF-I, LH and testosterone levels as well.

References

The references should be standardized

**Quality of written English:** Acceptable

**Declaration of competing interests:**

I declare that I have no competing interests