Reviewer’s report

Title: Unilateral cause of primary hyperaldosteronism is usual and adrenal vein sampling is mandatory in the diagnosis. Results from screening to histopathology in a Swedish population

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Reviewer: Yoshitaka Iwanaga

Reviewer’s report:

In this manuscript, the authors presented a series of clinical data from screening to treatment of primary hyperaldosteronism (PA) in a Swedish population. They demonstrated the prevalence of PA, useful diagnostic methods including adrenal venous sampling (AVS), and histological findings after laparoscopic adrenalectomy. Although the manuscript overall is interesting and well written, there are several concerns which should be addressed. The manuscript should be more focused on the AVS and histological findings.

- Major Compulsory Revisions

1) The most unique finding in the present study is that unilateral PA was common and unilateral adrenal hyperplasia was a half of those cases. However, there is little discussion about the issue. Young WF reviewed the pathophysiology of PA in 2007 (Young WF. Clin Endocrinol. 2007;66:607). He referred to 6 subtype classifications of PA: describing APA (35%) and bilateral idiopathic hyperplasia (IHA: 60%) as the most common subtypes and UAH as only 2% of PA. There is a huge discrepancy and the authors should explain and discuss it.

2) The role of AVS in the differentiation of unilateral and bilateral disease has long been discussed. The authors should explain sufficiently why they concluded ‘AVS is mandatory in the diagnosis’ from the present results.

3) There is no reference in the method of histopathology (page 7).

- Minor Essential Revisions

In the last two sentences in Discussion (page 14), ‘high higher’ and ‘as common as PA’ may be errors in words.

- Discretionary Revisions

The authors had better omit the result and discussion about the clinical course of patients treated with laparoscopic adrenalectomy including Table 3.

Level of interest: An article of importance in its field

Quality of written English: Acceptable
**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**
I declare that I have no competing interests.