Reviewer's report

Title: Antiretroviral treatment reverses HIV-associated anemia in rural Tanzania

Version: 1 Date: 22 February 2011

Reviewer: Agnes Kiragga

Reviewer's report:

In general, the article is well written and will build the body of literature on the use of Zidovudine in resource limited settings. The following constitute my comments

Major compulsory revision:
None

Minor essential revisions:
1. In the 3rd paragraph in the background section, it is important to list some of the most commonly seen co-morbidities e.g Tuberculosis (TB) which are very prevalent in patients starting ART in Africa. As has been shown in literature, patients with TB and HIV are faced with various clinical challenges some of which may include anemia.

2. In the second paragraph of the statistical analysis, please mention the method of model construction i.e backward, forward selection of variables for inclusion in the final multivariable model.

3. In the results section and first paragraph of the results section and/or table 1, could you include the initial regimen for patients across the 4 levels of anemia. Also, make sure that row percentages add up in table 1.

4. What were the mean changes of hemoglobin in each category of anemia. It would be good to see whether the higher changes were noted among patients with very low hemoglobin. For example, were greater changes observed in patients with severe anemia?

Discretionary revisions
Please clarify what the superscript "c" in table 2 represents.

I do no think that the pie chart (figure 2) is necessary. The percentages can be explained in the text. However, if presented, then indicate the respective percentages in the figure.

On figure 3, indicate the number of patients at the different time points.

4.
Level of interest: An article whose findings are important to those with closely related research interests

Quality of written English: Acceptable

Statistical review: Yes, and I have assessed the statistics in my report.

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