Reviewer's report

Title: Evaluation of Medical student's response to Voluntary Counseling and Testing services in Kilimanjaro region, Tanzania.

Version: 1 Date: 17 August 2008

Reviewer: Adamson Muula

Reviewer's report:

Dear Editor,

Re: Evaluation of medical students response to voluntary counseling and testing services in Kilimanjaro region, Tanzania

Authors: Kweka et al.

Thank you for giving me the opportunity to review this manuscript. I have given it considerable thought and my remarks are as below:

Major Compulsory Revisions
Title: I feel that the title misrepresents the professional groups that were studied. The title suggests perhaps that only medical students were enrolled in the study; in fact other professional groups were enrolled. I would therefore suggest that medical students be replaced by health professions students or another such term that encompasses all the other professional groups.

It does not come out clearly when i.e. years, the survey was conducted.

In the Abstract, the authors refer to a “questioner”, I would suggest they replace with “questionnaire”;

In the Results section of the Abstract, the authors report that there were 63.8% females and 36.2% males. However, in the results of the main text, the authors report of a 1:9 gender or sex ratio. The authors need to reconcile this difference.

In the results of the Abstract, the authors report about the differences between this sample and studies in Zambia and Uganda. Unless this objective was part of the methods of the study, this comparison may have to be shifted to the discussion section.

In the conclusion of the abstract, the authors suggest that health education is needed in health colleges; one would wish they were specific in the recommendation as it can be assumed that the health professions trainees have a lot of health education but, according to the authors, a different kind is required.

In the Background section, the authors quote references that are a bit older than may be necessary. For instance they refer to UNAIDS reports 2003, when the 2007 and now the 2008 are out. Unless of course one wants to say something about the situation 5 years ago, but to refer to these as if there were no current data may be misleading.
SAMPLING FRAME

A total 780 students listed down their names, BUT only 420 are reported to be eligible. Was age the only inclusion/exclusion criterion? Also note that the sentence that reports on the age criterion is grammatically problematic. The authors wrote: “Purposive sampling was used, an inclusion/exclusion criterion was the age below or above 18-25 years from each class and college inclusively. I would suggest, “We only aimed to recruit students within the ages 18 to 25 years.” Or “Only 18-25 year olds were eligible for the study.” Now the authors also report that they used purposive sampling. What was the criterion for such purposive sampling? What would it achieve? How do you deal with the bias such an approach may raise?

Within the same section, the authors wrote: “Eleven regions, namely……Tabora had reported to have a prevalence rate of 5.1 – 10% youths who attended VCT services in the year 2003.” It is not clear what this prevalence is for. Is this the prevalence of HIV among the people who reported for VCT? Is this the prevalence of testing? Which ever is the case, one would not use that prevalence to estimate the sample size for a study with the objective as outlined in this study. Moreover, the need to calculation of sample size breaks down when the sampling is PURPOSE.

The selection of research assistants has been reported in detail, but may not be important for reader, unless the authors justify why we need to know.

Data management and analysis

In this section, it would be important for the authors to report what was the outcome of interest, and the other variables that were analyzed. The section is too brief it does not do justice to all the results that have been presented.

Ethical issues

The questionnaire was administered in class. How did you manage those students who had not been selected to participate in the study?

Results (Main text)

I have raised the issue of sex ratio already. In this section, the ratio that is being reported is 1:9; yet in the abstract, different percentages are being reported. I appreciate the fact that the authors report again that the age range was 18 to 25 years. However, it would be much better if the authors were to remind the reader that this was the age group that was eligible for study instead of erroneously thinking that students in health colleges are necessarily 18 to 25 years.

Risk assessment

The authors reported in first sentence: .experience compared to females (96.4%) as described in Table 2. In fact Table 2 does not really describe, but it reports or shows, or indicates; i.e. there is no discussion in Table 2

The second paragraph needs a different sentence construction.

The sentence: Both gender had 17 years maximum age of sexual debut. This
sentence can be made a little clearer. Also note that this idea only makes sense if all of the sample reported that they had ever had sex. If there is an individual who is yet to have sex, then the maximum age of sexual debut is undefined (possibly infinity)

The authors also report: Twenty one point seven percent of the students perceived low risk of HIV despite the history of being taking narcotic drugs compared to 176 (77.9%) students who never took narcotic drugs. My reservation is on the substantive matter of this sentence. Taking narcotic drugs, e.g. by mouth or sniffing them should not be raise the risk of HIV if no sex or injecting drugs are not use. There is of course an association between drugs and HIV but the mechanisms are different.

Attitude toward VCT

How was this attitude determined? i.e. which questions were asked; what were the responses/options and how did the researchers decide that this is negative attitude and this is positive attitude?

Perceived risk of HIV

We may need to be reminded why perception matters.

Benefits of VCT

The authors have suggested that VCT is great. It may also be good to report that other studies exist where VCT does not seem to be beneficial. Furthermore, unless HIV testing is only via VCT, people may have testing from other avenues and not necessarily VCT.

Minor Essential Revisions

References

The references need to be updated.

No uniform formatting of references has been followed.

There are also too many tables and figures. Table 1 is unclear; what are the authors showing? What do figures 2 and 3 show? The figures have no titles. What was the definition of causal sex? Can sex with a relative be casual? If not/yes, why have they categorized differently.

Adamson muula

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

Quality of written English: Needs some language corrections before being published

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

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