Reviewer's report

Title: Histotype-specific copy-number alterations in ovarian cancer

Version: 2 Date: 31 August 2012

Reviewer: Charles Warden

Reviewer's report:

Minor Essential Revisions:

1) “We performed ANOVA test on ~200 of these genes and observed no significance (FDR<0.05), thus supporting the PCA plot that batch effects was minimal.” I think this is a reasonable justification, and I noticed that this comment was added in the methods section. However, I think it would be nice to present this information in a supplemental table (for all of the probes, not just the housekeeping genes). That way, other users who analyze the data presented in this study can confirm that their gene(s) of interest don’t show any bias in the combed dataset. It would also be nice to provide these values for ERBB2 in the text, since that gene is emphasized so much in this paper.

2) “We have also included comparison with TCGA in revised manuscript.” I think the TCGA comparison provides the strongest data for the overlap analysis. However, the methods need to include a description of what defines an overlapping region. For example, do the regions show at least 50% overlap in genomic coordinates? A list of overlapping regions would also be helpful. If possible, it would be nice to add a column to Table 1. If that is not feasible for reasons of space, a supplemental table would also be acceptable.

3) “Similarly, deletion in 9p21 of mucinous tumors was also reported (Campbell, Gareth Beynon et al. 1995;Devlin, PA Elder et al. 1996)” These papers aren’t cited anywhere in the main text and should be added to the discussion.

4) The table presenting the t-test statistics for the 3 groups (response to my previous major revision #2) needs to be included in the paper. A supplemental table is OK, but it needs to be clear that the qualitative trend is the same for all 3 studies but the difference is only significant with p-value < 0.05 in one study.

5) Review again for grammatical errors

a. This was similarly observed in other study [25]. Tense is not consistent (“study” needs to be “studies” or a modifier is need, e.g. “in another study”). Plus, there are actually 3 studies that can be cited to justify this claim.

Level of interest: An article of importance in its field

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