Reviewer’s report

Title: Low Income, Community Poverty and Risk of End Stage Renal Disease

Version: 2 Date: 10 September 2014

Reviewer: Eric W Young

Reviewer’s report:

The paper makes a useful contribution in showing that the relationship between ESRD and income is dominated by personal rather than community SES. The paper would benefit from several clarifications.

Minor Essential Revisions

1. The abstract and body of the paper are somewhat vague and unclear in describing the key finding that a significant relationship was found between ESRD risk and county poverty (in an adjusted but “reduced” model) but the relationship was extinguished in a more complex model that also included personal income. In other words, the association with community poverty was largely accounted for by the personal income measure. I believe these points could and should be expressed more clearly at each part of the manuscript where they are described.

2. At a number of places, the association between ESRD risk and SES is expressed with verbs that connote causality such as “declined” and “increased”. For example, rather than stating that ESRD rates declined from x in a high-poverty area to y in a low-poverty area, I suggest stating the ESRD risk was higher in high vs. low poverty counties.

3. The paper discusses the concept of concentration of community poverty (p. 4, line 90) and suggests that this dimension might explain more variation in ESRD risk than county poverty alone. I believe the community poverty measure used in the study incorporates concentration. However, there was no apparent effort to test the assertion that ESRD risk is more strongly associated with the concentration of community poverty than with simple county poverty.

4. Explain why such a large part of the sample (21%) could not be geocoded given the central study focus on geography and home visits.

5. As described (p. 8, lines 163-170), the neighborhood poverty score seems to assign a higher value to individuals with higher rather than lower education. Please clarify.

Level of interest: An article of importance in its field

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.