Reviewer's report

Title: Prevalence and determinants of a normotensive blood pressure in a German population based cohort of hypertensive study participants

Version: 2 Date: 15 August 2012

Reviewer: Fangjian Guo

Reviewer's report:

This is a well written descriptive study about the prevalence of hypertension in 1997-2001 in Western Pomerania in northeast Germany, and the control of blood pressure after 5 year follow-up. It provides important information on factors relating to achieving target blood pressure in hypertensive patients in Germany. The major contribution of this paper is that both the proportion of hypertensive participants receiving therapy and the number of participants reaching their target blood pressure values are very low in northeast Germany, and aging, having risk comorbidities, and obesity are obstacles for achieving target blood pressure.

Following is my comments to the authors.

- Major Compulsory Revisions

1. Though the authors used sample-design-weights to adjust for different selection probabilities when calculating hypertension prevalence in SHIP-0, they did not include sample weights for calculating the classification of blood pressure values of hypertensive patients in Table 2. Table 3-7 also did not include sample weights when calculating treatment rates and rates of achieving target blood pressure.

   My suggestion is to include sample weights in the weight statement in the SAS programs for all the Tables. Or, the authors should provide justifications for not using sample weights.

2. One of the major limitations of this study is the absence of data for medication adherence in hypertensive patients. However, the author arbitrarily concluded in paragraph 6 of the discussion part that non-adherence to antihypertensive medication is likely to be one major reason for not reaching the target blood pressure values. Then the author discussed adherence issue in the following several paragraphs. The discussion of adherence issue took up about half of the space in the discussion part, but provided little information related to the study.

   My suggestion is that the authors should not focus their attention on non-adherence issue. Comparing blood pressure control rates and the factors related to blood pressure control in hypertensive patients in different countries may provide more interesting information for the readers.

- Minor Essential Revisions "Minor issues not for publication"

1. In the method part, the authors may want to describe the statistical method
with more details. It would be preferable to put the statistical method in a single
paragraph.

2. There are numerous spelling mistakes, and grammatical errors.

**Level of interest:** An article of outstanding merit and interest 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