Reviewer's report

Title: Trajectories of maternal sleep problems before and after childbirth: a longitudinal population-based study

Version: 2 Date: 15 February 2015

Reviewer: Louise O'Brien

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Major compulsory revisions:

This is a nice, well conducted, longitudinal study of insomnia from late pregnancy to 2 years post partum. There is excellent retention across 2 years but high drop out from 17 weeks (consent, Q1) to 32 weeks (Q2). Why was the drop out so high between Q1 and Q2 but remained quite high from Q2 for the rest of the study?

Why were the questions only started at week 32 when women were enrolled at 17 weeks? This could have been a great opportunity to get longitudinal data across pregnancy

Why <7 hours for short sleep? Short sleep is often categorized as <6 hours.

SOL, WASO and sleep efficiency are not good measures if calculated from subjective variables. It is unclear what these add to the study since they were not obtained via actigraphy.

EPDS scores were collected but there is no report on how insomnia impacted EPDS. This is important

Figure 3 is not helpful since this sleep duration is incredibly subjective and the bounds between <7 and 7-8 hours for example mean that there is a high likelihood of misclassification.

What is the overlap between the current study and refs 18, 19, and 20? Are these the same women?

Minor essential revisions:

Table 1 should be of the women in the study rather than the 4662 who originally consented. An additional table showing the differences between those who consented and those who remained in the study would be appropriate.

Line 315 what does “polysomnographic sleep registration” mean?

Discretionary revisions:

Depression was accounted for at 2 years postpartum but what about depression
during pregnancy and prediction of insomnia?

It appears that obstetric complications were known about….why are these not included in the models? e.g. hypertension and diabetes

**Level of interest:** An article of importance in its field

**Quality of written English:** Acceptable

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**

I declare that I have no competing interests