**AVAirch Research Review**

**Review Title:** Illuminating findings on the impact of adequate social support on IPV and pregnancy outcomes.

**Reviewer(s):** Pauline Gulliver, PhD, Research Fellow, New Zealand Family Violence Clearinghouse, University of Auckland.

**Article(s):** The effects of intimate partner violence before during and after pregnancy in nurse visited first time mothers.

**Article Summary:**

**Brief Overview:**

The authors conducted a longitudinal investigation of the prevalence and correlates of intimate partner violence (IPV) before, during and after pregnancy for a large cohort of women enrolled in the Nurse Family Partnership (NFP) program.

The NFP enrolls first time, low income mothers. A total of 10,855 NFP participants were included in the investigation. All data were collected through self-report at each of three regularly scheduled NFP home visits (enrolment, 36 weeks gestation, and the infant’s 12 month assessment). As well as measuring IPV experiences (physical violence only), data were collected on maternal affect (through the Rand Mental Health Screen), maternal beliefs, coping patterns and behaviours (through Perlin’s Sense of Mastery Scale), demographic variables, relationship status, smoking drug and alcohol use, perinatal and post-natal outcomes, 24 month contraception use, and subsequent pregnancy.

The authors hypothesised that the pregnancy period would be protective against IPV (based on previous reports of IPV exposure) and that those who experienced IPV would have increased risk of adverse
maternal and perinatal outcomes.

**Relevant Findings:**

The authors highlighted three key results from their investigation: (1) the rate of IPV during pregnancy was lower relative to other time periods; (2) IPV was not related to negative perinatal outcomes; and (3) that IPV at 12 months post-delivery was associated with lower rates of contraceptive use and higher rates of short-interval repeat pregnancy at 12, 18 and 24 months.

Findings 1 and 2 were not in line with what has previously been reported in the literature. In response to results indicating that there was not a higher risk of IPV during pregnancy, the authors noted that the rate was still “alarmingly high and deserves clinical attention.” In response to the lack of negative perinatal birth outcomes, the authors suggested that this may be a result of protective effects of participation in the NFP or due to the differences in demographics between the enrolled cohort and that included in other, comprehensive reviews.

**Authors' Conclusions:**

The authors concluded that further work was required in this area, specifically expanding the focus to include non-physical forms of IPV, a deeper exploration of the relationship between IPV and perinatal outcomes, and designing interventions to help women experiencing IPV to obtain their desired form of birth control to prevent reproductive coercion.

**Potential Limitations:**

The authors highlight the following limitations with the investigation: (1) only physical IPV was measured; (2) the extremely large sample may highlight statistically significant, yet clinically irrelevant findings; and (3) there was a substantial amount of missing data.

Of the limitations listed, it is the existence of missing data that is of most concern. Although there were 10,855 enrolled, it appears that data was complete for 9,477 at time 1, 9,137 at time 2 and 5,824 at time 3. Missing data was adjusted for using multiple imputation, where the multiple imputation models included both engagement with the NFP program and all the analysed variables to estimate the distribution of the missing variables. While the authors have acknowledged and attempted to adjust for missing values, it is unclear how missing data could have impacted on the correlates measured. Additional information concerning the prevalence of IPV by engagement with NFP, and proportion of missing values by engagement with NFP would have been of interest.

The use of self-report for all covariates might also be considered problematic. However, it would be expected that all of the covariates measured would be reported with a high degree of reliability by study members.

It is of interest that the authors chose not to measure (or report on) fetal death. Previous investigations of the effect of IPV in pregnancy have shown increased risks of fetal death. However, some of these investigations were restricted to cases of hospitalized physical violence, which may be more severe than physical violence as reported in this investigation.

**Reviewers' Comment:**

Within the findings of this research project are gems that highlight the positive impact of effective social support on perinatal outcomes for women at risk of IPV during pregnancy. It is relatively easy to write off the findings of lack of impact of IPV on perinatal outcomes as a result of differing demographic factors.
in the study population. It is more challenging to suggest that effective social support during pregnancy may reduce the risks of subsequent adverse outcomes and increase maternal safety. Understanding the reasons for the reduction in physical IPV during pregnancy, that would provide the most useful insight into designing effective interventions to modify risks of IPV during pregnancy.

Reviewer’s summary:

Although the authors sought to describe the prevalence of IPV during before, during and after pregnancy using consistent methods to provide reliable estimates of whether there is increased risk of IPV during pregnancy, throughout the process of this investigation, both the authors and the reader becomes more interested in the background story about what is driving the results that are presented.

The study leaves a number of unanswered questions, but alludes to the potential positive impact of adequate social support for producing a safer environment for both mother and child.

The authors have correctly suggested that further work is required in this area. Of the work recommended, it may be that understanding the reasons why this study demonstrated no impact of IPV on perinatal outcomes, as well as