



Indigenous trends in population-based indicators of perinatal health in Queensland

Trisha Johnston¹, Rachael Wills¹, Michael Coory¹
¹Health Statistics Centre, Queensland Health

Throughout Australia, perinatal mortality in babies born to Indigenous mothers is twice that in babies born to non-Indigenous mothers. Factors related to increased risk of perinatal mortality are:

- Antenatal – risk factors and health issues resulting in low birthweight (weight at birth <2500g, gestational age at birth <37 weeks)
- Quality of care during delivery

This study used data from the Queensland Perinatal Data Collection to examine trends in death rates and precursors in babies born to Indigenous and non-Indigenous mothers.

While the perinatal mortality rate for babies of Indigenous mothers remains much higher than babies of non-Indigenous mothers (RR=1.85; 95% CI 1.62-2.10; 2002-06), the gap is beginning to narrow (figure 1). The perinatal mortality rate is decreasing by 2.5% per year for babies of Indigenous mothers and by 0.7% per year for babies of non-Indigenous mothers.

This reduction in perinatal mortality for babies of Indigenous mothers has been achieved without a decrease in low birthweight (0.1% increase per year) or preterm birth (0.1% decrease per year). This suggests that Indigenous mothers and their babies are increasingly accessing high-quality care at the time of birth.

Further reduction of the mortality gap may require improvements in antenatal behaviours. When mortality rate ratios are calculated stratified by birthweight and gestational age (figure 2), the mortality differential is greatly reduced (M-H Adjusted RR=1.06; 95% CI 0.93-1.20).

This result suggests that the quality of care is adequate for babies born to Indigenous mothers within each strata and that the reason for the higher perinatal mortality rate is the larger proportion born too small (RR=1.78; 95% CI 1.69-1.88; 2003-06) or too early (RR=1.55; 95% CI 1.48-1.63; 2003-06). If babies born to Indigenous mothers had the same birthweight and gestational age distribution as the non-Indigenous population, the relative disparity could be further reduced by 85% (=29 fewer deaths/year).

Figure 1. Trends in perinatal mortality rate among babies born to Indigenous and non-Indigenous mothers, Queensland, 1988-2006

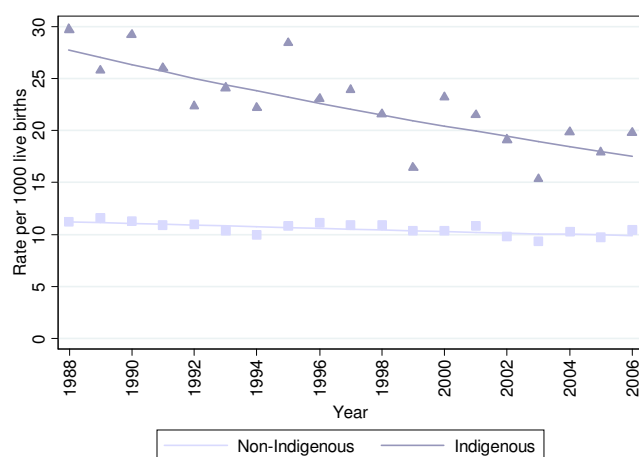
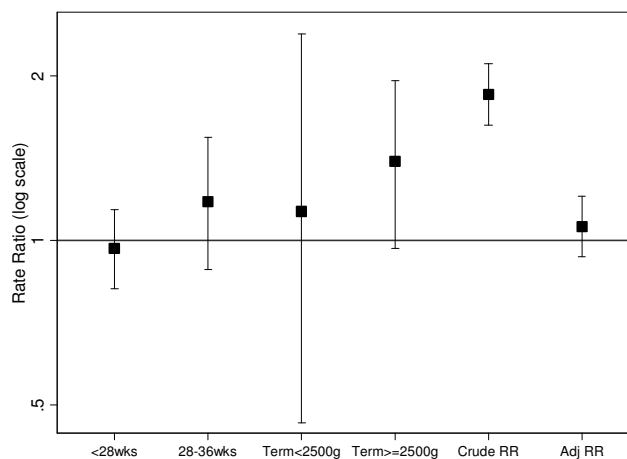


Figure 2. Rate ratios^a comparing Indigenous to non-Indigenous perinatal mortality stratified by preterm and birthweight status, Queensland, 2002-2006



a. Rate ratios greater than 1.0 indicate higher mortality among babies born to Indigenous (Aboriginal and TSI) mothers. Differences between stratum-specific rate ratios are not statistically significant ($\chi^2(3)=4.41$, $p=0.2208$)