

# Incidence and risk factors for mental health-related hospitalisation within the first postnatal year among Aboriginal and non-Aboriginal women in the Northern Territory

## Abstract

Aims to estimate the incidence of mental health-related hospitalisation (MHRH) within the first postnatal year, and associated risk factors, among Aboriginal and non-Aboriginal women in the Northern Territory (NT). A retrospective cohort study was conducted for all births to NT resident women from 2002 to 2017. An incident event was defined as a woman having an admission with a primary or secondary diagnosis of a mental health-related condition recorded in the inpatient activity. Modified Poisson regression was used to estimate the association of risk factors with the incidence of MHRH. The rate of any MHRH was 2.00% for births to Aboriginal women and 0.85% for births to non-Aboriginal women. For births to Aboriginal women, factors included prior MHRH (adjusted Incidence Rate Ratio (aIRR): 3.03), MHRH during pregnancy (aIRR: 5.63), alcohol consumption at 1st antenatal care visit (aIRR: 1.78), obstetric complications (aIRR: 1.63), low Apgar scores (aIRR: 1.73), and mothers aged 20-24 years (aIRR: 0.72). For births to non-Aboriginal mothers, factors included prior MHRH (aIRR: 4.26), MHRH during pregnancy (aIRR: 8.00), violence-related admission during pregnancy (aIRR: 3.50), smoking during pregnancy (aIRR: 1.92), labour complications (aIRR: 1.40), and obstetric complications (aIRR: 1.74). The incidence of MHRH within the first postnatal year was higher for births to Aboriginal women compared to births to non-Aboriginal women. For both Aboriginal and non-Aboriginal women, many risk factors associated with MHRH are either preventable or responsive to early intervention. Therefore, a holistic, comprehensive, and integrated healthcare model is needed to offer culturally sensitive services that can effectively identify and address complex risk factors.