Report Summary

Perinatal Health Indicators 2013: a Surveillance Report by the Public Health Agency of Canada's Perinatal Surveillance System

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Glossary of Definitions:

- The maternal mortality rate is the number of maternal deaths (occurring during pregnancy, childbirth, or within 42 days of delivery or termination of pregnancy) divided by the number of deliveries.
- The fetal mortality rate is the number of late fetal deaths per 1000 total births (live births and stillbirths).
- The infant mortality rate is the number of deaths of live-born babies in the first year after birth per 1000 live births.
- Neonatal death is the death of a newborn aged 0–27 days.
- Post-neonatal death is the death of an infant aged 28–364 days.
- The preterm birth rate is the number of live births with a gestational age at birth of less than 37 completed weeks as a proportion of all live births.
- The postterm birth rate is the number of live births with a gestational age at birth of 42 or more completed weeks of pregnancy as a proportion of all live births.
- The small-for-gestational-age birth rate is the number of singleton live births whose birth weight is below the 10th percentile of the sex-specific birth weight for gestational age reference as a proportion of all singleton live births.
- The large-for-gestational-age birth rate is the number of singleton live births whose birth weight is above the 90th percentile of the sex-specific birth weight for gestational age reference as a proportion of all singleton live births.

Introduction

The Canadian Perinatal Surveillance System (CPSS) is a national health surveillance program of the Public Health Agency of Canada. The CPSS mandate is to monitor and report on key indicators of maternal, fetal and infant health. These indicators include both determinants and outcomes of perinatal health.

Perinatal Health Indicators 2013 reports on 13 priority indicators using the most recent data from vital statistics, hospitalizations, the Canadian Community Health Survey and the National Longitudinal Survey of Children and Youth.

The report includes the following main findings:

Behaviours and practices

Between 1993–1996 and 2005–2008, overall maternal smoking during pregnancy decreased from 21.9% to 12.3%. Smoking prevalence decreased with age; the smoking rate was seven times higher in mothers aged less than 20 years (38.8%) than in those aged 35 to 39 years (5.6%).

The rate of maternal alcohol consumption also decreased over the same time, from 15.5% to 10.7%.

Between 2005 and 2009–2010, the rate of breastfeeding initiation remained stable at approximately 88%, while the rate of

exclusive breastfeeding for six months increased from 20.3% to 25.9%.

Between 2001 and 2010, the rate of live births to teenage mothers (15-19 years old) decreased while the rate of live births to older mothers (35-49 years old) increased. Among mothers aged 15 to 17 and 18 to 19 years, the rate decreased from 9.1 to 7.7 and 31.1 to 25.8 per 1000 females respectively. Among mothers aged 35 to 39, 40 to 44 and 45 to 49 years, the rate increased from 32.0 to 49.3, 5.2 to 9.2 and 0.2 to 0.4 per 1000 females, respectively. As a result of these trends, the proportion of all live births to teenage mothers declined from 5.6% to 4.2%. while the proportion to older mothers increased from 14.7% to 17.0%.

Maternal outcomes

Between 2003–2004 and 2010–2011, the rate of severe maternal morbidity fluctuated between 13.2 and 15.4 per 1000 deliveries. The most common severe maternal morbidities were blood transfusion, postpartum hemorrhage with blood transfusion and hysterectomy. Between 2001–2002 and 2010–2011, the rate of Caesarean delivery increased from 23.4% to 28.0%.

Between 2003–2004 and 2010–2011, the rate of maternal mortality fluctuated between 8.2 and 6.1 per 100 000 hospital deliveries. The most common diagnoses associated with maternal deaths were diseases of the circulatory system, post-

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partum hemorrhage and hypertension complicating pregnancy, childbirth and the puerperium.

Infant outcomes

Between 2001 and 2010, the fetal mortality rate increased from 5.9 to 6.7 per 1000 total births. In 2010, the mortality rates for fetuses weighing 500 g and over and 1000 g and over were 5.1 and 3.7 per 1000 total births, respectively. Between 2000 and 2009, the infant mortality rate varied between 4.9 and 5.4 per 1000 live births.

Neonatal death constituted 74% of infant deaths in 2009. Immaturity and congenital anomalies were the leading causes of neonatal death. Congenital anomalies and Sudden Infant Death Syndrome were the leading causes of post-neonatal death. After decreasing between 2001 and 2007 from 460 to 377 per 10 000 total births, the overall prevalence of congenital anomalies increased to 397 per 10 000 total births in 2010.

Between 2001 and 2010, the rate of preterm birth fluctuated between 7.5% and 8.2% of live births and was 7.7% in 2010. During this 10-year period, the rate of post-term birth declined from 1.1% to 0.6%. The rate of small-for-gestational-age birth among singleton infants fluctuated between 7.8% and 8.3% while the rate of large-for-gestational age birth among singleton infants decreased from 11.8% to 10.4%. The rate of multiple births increased from 2.8% to 3.2% of total births.

Conclusion

The picture of national perinatal health provided by *Perinatal Health Indicators 2013* is meant to enhance current knowledge in the field and to provide evidence that using public health/health system programs, policies and practices improves the health of mothers and babies in Canada.

To obtain an electronic copy of the report, please contact the Canadian Perinatal Surveillance System at CPSS-SCSP@phacaspc.gc.ca.