

1997 Manitoba Birth Cohort Study: Description and Preliminary Findings

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Introduction and Overview

Understanding the effects of various types of non-parental care on child development is crucial in creating comprehensive and effective child care policies. The study partners are Social Development Canada (formerly Applied Research Branch of Human Resources Development Canada), Healthy Child Manitoba Office (HCMO), South Eastman Health/Santé Sud-Est (SEH/SSE) and Division scolaire franco-manitobaine (DSFM).

A national first, the *Manitoba Birth Cohort Study* (also known as the *Tots Study* or *Parlons Petite Enfance*) follows preschool children to examine how different types of non-parental care and the quality of that care influence children's development. It builds on the national Understanding the Early Years (UEY) initiative which focuses on the readiness to learn of young children in specific communities across Canada. Children who do well in school begin their education with a familiarity with books and numbers and have the required social and problem solving skills.

There were compelling reasons for undertaking this study. Research has demonstrated that prenatal and early childhood experiences have significant, long-lasting impacts on health, learning, and well-being (Rutter, 1989; Kuh et al. 1997, Hertzman & Weins, 1996). The social environment is an important influence on early childhood development. An essential precondition for optimal child development is a secure attachment to a trusted caregiver (Bowlby, 1988). Positive parenting in the early years is a strong predictor of children's outcomes over time (Wolfe et al. 1992).

While an important body of research has been devoted to the impact of child care on the well-being of children, some ambiguity remains. Some authors argue that child care has little impact on child development (Blau, 2000). Others highlight the negative consequences of not providing high-quality and affordable child care to children (Silverstein, 1991). Determining which child care factors are important in healthy child development is not straightforward, because of the myriad of influences involved in human development.

The *Manitoba Birth Cohort Study* is a longitudinal study that follows a sample of 635 children from two distinct groups prior to school entry and beyond. The primarily rural sample was recruited from Manitoba's southeast region, defined by the boundaries of the local regional health authority. The francophone group of children live in Winnipeg and rural Manitoba. These preliminary findings are based on the first phase of the study and are considered cross-sectional.

Over time, this study will increase our knowledge of how early child care and other experiences influence the early development of children growing up in two unique populations for whom there is presently limited research. First, it examines children living in rural areas where providing access to a range of supports and programs to families is considered more challenging. Second, it considers early childhood development for francophone children living in a linguistic minority context. Because these children will be attending francophone schools but live in communities where there is a limited amount of French spoken, knowing more about early influences on their school readiness will have important implications for children living in a linguistic minority environment.

Research Questions

The research questions formulated at the onset of the study were:

- a) What are the types of non-parental care that Canadian children experience? Are there shifts in the distribution of care arrangements over time?
- b) How do the various types of non-parental child care affect children's outcomes over time?
- c) What factors (eg.: location, caregiver characteristics, program quality) are associated with each type of non-parental child care, and how do they affect children's outcomes over time?
- d) Do the effects vary with the child's age, socio-economic status or other family and community factors? What are the protective factors?
- e) What factors (income, parents' education, distance, age of child and cost) affect the child's placement in care and the type of care that is chosen?

Method

Data from the first phase of the *1997 Manitoba Birth Cohort Study* were used to explore some of these research questions. A total of 635 children, their parents (n=635) and their child care providers (n= 244) participated in the first phase of the study. The overall response rate was 60 per cent. Children (aged three to four years old) were assessed using the *Ages and Stages Questionnaire* which measures gross motor, fine motor, communication, problem solving and personal social skills and the *Who Am I? Development Assessment* which measures school readiness. Parents were asked about their child's prosocial and aggressive behaviour, child and family characteristics, activities provided by the parents, and child care arrangements. Ninety-five per cent of the parents interviewed were the birth or adoptive mother and five per cent were the birth or adoptive father. Non-parental child care in this study was defined as the care of a child by an adult other than a parent for half a day or more per week on a regular or scheduled basis.

Study Highlights

- No differences in child development and behaviour were found between children who were involved in a child care arrangement and those who were in their parent's care, when child and family characteristics are taken into account.
- Child care use does not appear to be greatly affected by fluctuations in child care costs or income. This suggests that parents consider child care to be a necessary service and use it regardless of increases in child care costs or decreases in their family income.

Preliminary Findings

The majority of children in this study were from households that earned over \$30,000 annually (81 per cent). A large proportion of mothers in this study had completed at least some post-secondary education (61 per cent) and were employed in either part-time (32 per cent) or full-time (29 per cent) work. Seven per cent of families were single parent families. In all the types of child care arrangements examined in this study, 84 per cent of child care providers were 30 years or older and 31 per cent had at least partially completed or completed the early childhood education certification program. Of the total sample, 275 children (46 per cent) were in a regular child care arrangement for at least a half day per week. Of these 275 children, 50 per cent were in care in someone else's home (one third of these with a relative), 22 per cent were in child care centres, 16 per cent were in nursery or preschool programs, and 12 per cent were cared for in the child's home (about half of these with a relative). A preliminary finding of this study is that the development and behaviour of children in all child care arrangements were not significantly different from those who were in their parent's care, when controlled for child and family characteristics.

Economic analyses were conducted to determine how much parents adjust their child care requirements as the price of child care or family income increases (referred to as price or income elasticity). The findings suggest that the cost of child care and family income influence how much child care is used. As the cost of child care increases, the number of hours of child care use decreases. Similarly, as the family income decreases, the number of hours of child care use decreases. However, these changes in child care use occur at a lower rate than would be expected. This suggests that families consider child care to be a necessary service and use it regardless of increases in child care costs or decreases in their family income. This raises the question about the financial strain families may experience because they need child care. These findings may not be applicable outside of the scope of this study. There is likely less fluctuation in costs in Manitoba because maximum centre-based child care costs are set by the provincial government. Also, low-income families in Manitoba receive child care subsidies.

Study Limitations

These preliminary findings should be interpreted with some caution. This study is unique but the sample is not representative of the Manitoban or Canadian population. This study includes a lower proportion of low-income families and higher proportion of educated mothers than those found in the general population. The most common child care arrangement was care in someone else's home. Many families were from rural areas or from small urban centres (population of 10,000 or less) which is not typical of most Canadian families. Francophone children living in a linguistic minority environment comprised about one third of the sample. In this analysis, we were not able to compare licensed and unlicensed child care as this information was not collected.

Looking Ahead

This initial analysis was based on the first phase of the study (data collected in 2001 when children were three to four years old) and will allow us to learn much about that single point in time. Data was next collected from these children and families in 2003 which will enable us to begin exploring the development of children over time (longitudinal). In the coming years, as we continue to follow their development, we will learn more about the influences of early learning and child care experiences on young children growing up in rural and Francophone communities.

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