

The Family, Whānau and Wellbeing Project: 2003-2008

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Introduction

Pathways to Positive Outcomes for Family and Whānau (the Family, Whānau and Wellbeing project, FWWP) was a five-year research programme supported by the Social Science funding pool of the Foundation for Research, Science and Technology; funding for which finished mid-2008. The principal goal of this programme was to develop ways to examine and monitor the social and economic determinants of family and whānau wellbeing and how these changed over the 1981–2006 period, through the use of New Zealand census data.

After dutifully completing their census forms every five years, New Zealanders may wonder what becomes of the mountains of personal data that are collected by Statistics New Zealand. FWWP made substantial use of these data and sought to extract further value from and add value to the data sets, over and above what Statistics New Zealand has time for. Under the watchful eye of Statistics New Zealand (Stats NZ) and the auspices of the Statistics Act 1975, which ensures preservation of individuals' privacy and confidentiality, FWWP examined the changing face of New Zealand society, looking to understand the changing social and economic shape of the country over the study period, in the form of family/whānau wellbeing indicators. All analyses were conducted within Stats NZ's secure "datalab" facilities and all output monitored to ensure the protection of confidentiality.

FWWP addressed the issues of analysing census data over time, ensuring comparability through the six censuses from 1981 to 2006, and better allowing trends to be identified. The main advantages of using census data are that they provide a consistent and long time series of social data and, because of their scale, allow the effect of change on small population groups to be examined. The programme also explored the feasibility of monitoring the impact of social policy events (such as policy changes) on the population and key groups within it. The principal units of the FWWP analysis were the family and the household. Whānau

are difficult to examine using census data – in our reports, the census definition of family is used: parents plus children living in the same dwelling, although we did extend the analyses to include people living alone in one-person households.

A set of indicators was originally developed from the available census data for 1981–2001 (Milligan, Fabian, Coope & Errington, 2006) to track changes in family/whānau wellbeing over this period. The wellbeing indicators measure aspects of wellbeing that can be identified from the census, such as total family income, attainment in education, etc. The usefulness of this analysis is restricted due to limitations in the range of indicators available from census data. These measures will likely be affected by the economic, social and political environments at the time of each census, the age structure of the family and the age cohort to which the family belongs. For example, as the cost of post-secondary education changes, the number of families with members attaining a post-secondary qualification may be affected. And as a family's children age from toddlers to teenagers, there is a greater chance that one may acquire a post-secondary qualification: these are period and age effects respectively. Equally, exposure to a certain event at a particular age may have lasting effects on a family's wellbeing that differ from those they would have had on older or younger families (cohort effects).

FWWP outputs

The programme's early output achievements included two published reports that referred to census data 1981–2001:

- Methodological reports on deriving indicator measures from census data, since extended to 2006 (Errington, Cotterell, von Randow and Milligan, 2008) and more recently related to the wider set of alternative indicator sets (Cotterell and Crothers, 2009).
- Description of significant policy events since 1981 (McTaggart, 2005), which has since been extended to other environment inputs such as over-time state social expenditure patterns (von Randow M, Cotterell G, McTaggart S, Sua'ali'i-Sauni T, Davis P, Patrick D (2009, in press and Crothers, 2006).

The first of more substantive output reports measured changes in Family and Whānau Wellbeing (Cotterell, Weldon and Milligan, 2008a, 2008b). This report examines changes in family wellbeing using the

indicators described earlier, modified for data availability and comparability. A number of different 'family/household types' as identifiable in census data are analysed. Given the absence of an overall index of wellbeing for each family type in the analysis, it is difficult to quantify the overall change in family wellbeing over the period. However, if income is taken as the best measure of levels of wellbeing, then for both sets of analyses almost all family/household types became better off over the 25 years in question. Furthermore, they all saw improved education and employment levels. On the other hand, almost all family/household types saw increases in parental hours worked, and experienced declining levels of both home ownership and rental affordability, and increasing levels of receipt of health-related benefits. The picture with regard to crowding was mixed, with levels declining for most Māori families and some family types in the all families analysis, but increasing for others.

A second report builds upon the above by looking at relationships with the educational attainments of parents (Cotterell, von Randow, and Wheldon, 2008), dividing the family types examined into education-based groups in a similar fashion to how the earlier work defined Māori families, based on the attributes of 'at least one adult'. The education-based groups were families where:

- No adult holds any educational qualification;
- At least one adult holds a secondary school qualification, but none holds a post-secondary qualification;
- At least one adult holds a post-secondary qualification.

The report confirms the findings of other studies, which show that attainment of secondary and post-secondary educational qualifications commands a 'premium' in the labour market. This study indicates how this 'educational premium' is distributed differently over different family types, and suggests that the premium increased over the period 1981–2006 for most measures of family wellbeing.

Details on the early work on cohort analysis by Mervyl McPherson, a demographer who had previously given advice on the methodology, is now another technical report, after details of the methodology were refined as a result of a review by Stats NZ (McPherson, Davis, Wheldon and von Randow, 2009). The cohort report looks at cohorts of families as

best possible using available census data; the families of New Zealand-born mothers born within five-year ranges from 1932 to 1981. Of course it is not possible to follow individual families, but analysing the wellbeing indicator data for these cohorts provides useful insights beyond those of the analyses in the earlier reports. Since the census is a repeated cross-sectional study, data from consecutive censuses are amenable to cohort analysis since they allow observation of age, period and cohort effects. Although the trajectories of individual families are not tracked through time, there are many families common to consecutive censuses. Therefore, we are able to follow age cohorts of families from census to census. That is, in each census we can identify groups of families sharing a common 'age', and re-examine the same group in the following census when it is five years older.

The data from FWWP has also been used to analyse changes in wellbeing for Pacific people over the period 1981–2006. This report will be published by the Families Commission (Cotterell, von Randow, and McTaggart, 2009, forthcoming; Sua'ali'i-Sauni, McTaggart and von Randow, 2009, in press and von Randow, Cotterell, McTaggart, Sua'ali'i-Sauni, Davis, and Patrick, 2009). The centre plans to produce a similar output report for sub-groups of the Maori population, later in 2009, in collaboration with Ngā Pae o te Māramatanga

Other work includes studies of:

- general trends in census background variables over time (Crothers, 2007)
- examination of differences in patterns between individual and household level indicators (Mandell and Crothers, 2008)
- the factor structure amongst indicators (Crothers and von Randow, 2008)
- a review of the Interrelations between Objective and Subjective Measures of Satisfaction in New Zealand (Crothers, 2009)

Also in progress is an unpublished, but key major achievement for the project – the development and implementation of the Cambridge Social Interaction Scale (CAMSIS) with New Zealand Census data. This will allow the examination of social stratification/homogamy in NZ over 20 years (1981–2001) and enable comparison internationally of NZ cohabitation patterns.

The dissemination aspect of the FWWP project continues. There has been a number of presentations of project outputs. In July 2007 Andrew Sporle presented a paper to the Australian Social Policy Conference, and at the SSRG colloquium in Wellington, August 2007, results from the first report and introductory workings on the planned 'cohort analysis' were presented. A further presentation, by Andrew Sporle and Gerry Cotterell, was given at the TASA/SAANZ conference in December 2007 at The University of Auckland, while Charles Crothers presented a review of conceptual issues involved in analysing census data (2007). Work on the factor structure amongst the indicators was presented at the November 2008 SAANZ conference. At the group's second colloquium at Stats NZ in August 2008, *Measuring Changes in Family and Whanau Wellbeing using Census Data, 1981–2006: A descriptive analysis* was launched, along with *A Guide to Using Data from the New Zealand Census: 1981–2006*.

Other programme achievements include:

- Contribution to and review of official statistics surveys – including review of content for the 2006 Census, review of ethnicity measures, development and implementation of the new Australasian standard occupational codes (ANZSCO), design and content of the General Social Survey and input into and review of an Official Statistics System (OSS) position paper on family statistics and classification.
- Running workshops, in Auckland and Wellington, on advanced research techniques using official statistics.
- Further establishing strong links to the OSS, including an advisory role in various initiatives and active involvement in OSS research (including a project to synthetically create data sets (preserving confidentiality) to lessen the infrastructural burden on Stats NZ and increase users' understanding of official statistics. In addition, Professor Alastair Scott, Associate Investigator, is a member of the Ministerial Advisory Committee on Official Statistics. The Committee reports directly to the Minister of Statistics, so we are providing reports on our experiences and issues to this Committee.
- Review and comment on the OSS, specifically regarding data access, documentation / metadata, infrastructure/resources.

Although the funding for the project is now finished, the team continues working on FWWP, mainly looking at tying up the ends and deriving any further conclusions which might be wrung from the available data. The Social Statistics Research Group has become an official Research Centre within The University of Auckland: the Centre of Methods and Policy Application in the Social Sciencesⁱ (COMPASS, <http://www.compass.auckland.ac.nz/>).

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