My title*

My subtitle if needed

First author

Another author

07 March 2022

Abstract

First sentence. Second sentence. Third sentence. Fourth sentence.

1 Introduction

You can and should cross-reference sections and sub-sections. For instance, Section 2. R Markdown automatically makes the sections lower case and adds a dash to spaces to generate labels, for instance, Section 4.1.

2 Data

2.1 Data Source and Methodology

The data was obtained from Canada's 2017 General Social Survey (GSS) on the Family. The survey was conducted during the period of February 2nd to November 30th 2017 by computer assisted telephone interviews of participants. The target population was all non-institutionalized persons ages 15 years and older in Canada, excluding residents of the Yukon, Northwest Territories, and Nunavut. Participants were chosen using stratified sampling by geographic area within the 10 provinces, with one person representing each household to be interviewed. The response rate was 52.4% with a total of 20,602 respondents.

2.2 Key features

The raw data includes 461 variables which were derived from the questionnaire responses. Some key features included age, sex, place of birth, marriage, ethnic diversity and immigration, education, work, income, children, religion, family structure, geographic location, household size and living arrangements. We used R (R Core Team 2020) and R packages tidyverse (Wickham et al. 2019) and janitor (Firke 2021) to clean the variable names and values. A subset of the key features is shown in table 1.

2.3 Strengths and weaknesses

Some variables have several missing values.

^{*}Code and data are available at: LINK.

Table 1: Some key features

Age of respondent	Total number of children	Sex	Province	Marital Status	Family Income
52.7	1	Female	Quebec	Single, never married	\$25,000 to \$49,999
51.1	5	Male	Manitoba	Married	\$75,000 to \$99,999
63.6	5	Female	Ontario	Married	\$75,000 to \$99,999
80.0	1	Female	Alberta	Married	\$100,000 to \$ 124,999
28.0	0	Male	Quebec	Living common-law	\$50,000 to \$74,999
63.0	2	Female	Quebec	Married	\$50,000 to \$74,999
58.8	2	Female	Nova Scotia	Single, never married	Less than \$25,000
80.0	7	Female	Quebec	Divorced	Less than \$25,000
63.8	0	Female	British Columbia	Single, never married	Less than \$25,000
25.2	1	Male	Saskatchewan	Single, never married	Less than \$25,000

3 Results

4 Discussion

4.1 First discussion point

If my paper were 10 pages, then should be be at least 2.5 pages. The discussion is a chance to show off what you know and what you learnt from all this.

4.2 Second discussion point

4.3 Third discussion point

4.4 Weaknesses and next steps

Weaknesses and next steps should also be included.

Appendix

A Additional details

References

Firke, Sam. 2021. Janitor: Simple Tools for Examining and Cleaning Dirty Data.

R Core Team. 2020. R: A Language and Environment for Statistical Computing. Vienna, Austria: R Foundation for Statistical Computing. https://www.R-project.org/.

Wickham, Hadley, Mara Averick, Jennifer Bryan, Winston Chang, Lucy D'Agostino McGowan, Romain François, Garrett Grolemund, et al. 2019. "Welcome to the tidyverse." *Journal of Open Source Software* 4 (43): 1686. https://doi.org/10.21105/joss.01686.