Abstract

The Prevalence of Vegetarians, Vegans and Other Dietary Patterns That Exclude Some Animal-Sourced Foods in a Representative Sample of New Zealand Adults†

James Greenwell 1,*, Megan Grant 1, Leanne Young 2, Sally Mackay 3 and Kathryn E. Bradbury 2

1 Public Health Agency, Manatū Hauora (Ministry of Health), Wellington 6140, New Zealand
2 National Institute for Health Innovation, School of Population Health, University of Auckland, Auckland 1023, New Zealand
3 Department of Epidemiology and Biostatistics, School of Population Health, University of Auckland, Auckland 1023, New Zealand
* Correspondence: james.greenwell@health.govt.nz
† Presented at the Annual Scientific Meeting of the Nutrition Society of New Zealand 2022, Wellington, New Zealand, 1–2 December 2022.

Abstract: Previous estimates of the prevalence of vegetarians in New Zealand are unreliable. This study aimed to estimate the prevalence of vegetarians, vegans and other dietary patterns that exclude some animal-sourced foods in a large representative sample of New Zealand adults. We also examined sociodemographic and lifestyle correlates of these dietary patterns. The New Zealand Health Survey is a rolling representative survey of New Zealanders aged 15 years and older. Data from the 2018/19 and 2019/20 waves (in total, n = 23,292) were used for this analysis. Participants were asked if they completely excluded red meat, poultry, fish/shellfish, eggs or dairy from their diets. The rates of prevalence of red meat excluders (2.89%, 95% CI: 2.56–3.22), pescatarians (1.40%, 95% CI: 1.16–1.64), vegetarians (2.04%, 95% CI: 1.77–2.32) and vegans (0.74%, 95% CI: 0.57–0.91) were low. After adjustment for sociodemographic and lifestyle factors, women (Odds Ratio (OR) = 1.54, 95% CI: 1.22–1.95), Asian people (OR = 2.56, 95% CI: 1.96–4.45), people with tertiary education (OR = 1.71, 95% CI: 1.18–2.48) and physically active people (OR = 1.36, 95% CI: 1.04–1.76) were found to be more likely to be vegetarian/vegan. Those aged ≥ 75 years (OR = 0.28, 95% CI: 0.14–0.53), those with a higher BMI (OR for every 1 unit increase in BMI = 0.96, 95% CI: 0.94–0.98) and current smokers (OR = 0.42, 95% CI: 0.23–0.76) were less likely to be vegetarian/vegan. Similar associations were observed between sociodemographic and lifestyle factors and the odds of being a red meat excluder/pescatarian. Approximately 93% of New Zealand adults eat red meat, and a very small number exclude all animal-sourced foods from their diets. The New Zealand Eating and Activity Guidelines recommend a largely plant-based diet, with moderate amounts of animal-sourced foods. A comprehensive national nutrition survey would provide detailed information on the amount of red meat and other animal-sourced foods currently consumed by the New Zealand population.

Keywords: dietary patterns; prevalence; New Zealand; vegetarian; vegan; pescatarian; red meat

Author Contributions: Conceptualization, J.G. and M.G.; methodology, J.G.; formal analysis, J.G.; writing—original draft preparation, J.G. and K.E.B.; writing—review and editing, J.G., M.G., L.Y., S.M. and K.E.B. All authors have read and agreed to the published version of the manuscript.

Funding: L.Y. was funded by a New Zealand Heart Foundation post-doctoral fellowship (grant number 1830). K.E.B. was funded by a Sir Charles Hercus Health Research Fellowship from the Health Research Council of New Zealand (grant number: 19/110).

Institutional Review Board Statement: The New Zealand Health Survey was conducted in accordance with the Declaration of Helsinki and approved by the New Zealand Health and Disability Multi-Region Ethics Committee (MEC) (MEC reference: MEC/10/10/103).
Informed Consent Statement: Informed consent was obtained from all participants involved in the study.

Data Availability Statement: Restrictions apply to the availability of these data. Data are available from https://www.stats.govt.nz/integrated-data/apply-to-use-microdata-for-research/confidentialised-unit-record-files-curfs/#Available-CURFS-list (accessed on 9 March 2023) with the permission of StatsNZ.

Conflicts of Interest: The authors declare no conflict of interest.

Disclaimer/Publisher’s Note: The statements, opinions and data contained in all publications are solely those of the individual author(s) and contributor(s) and not of MDPI and/or the editor(s). MDPI and/or the editor(s) disclaim responsibility for any injury to people or property resulting from any ideas, methods, instructions or products referred to in the content.