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Research report

Eating well with Canada's food guide? Authoritative knowledge about food and health among newcomer mothers☆

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ABSTRACT

Problem: Current versions of Canada's Food Guide (CFG) aim to inform a culturally diverse population, but it is not known how intended audiences from different cultural and linguistic groups within Canada's diverse population understand and apply its messages. *Methods:* We analyzed data from qualitative interviews conducted with 32 newcomer mothers of children aged 1–5 years to explore how conceptions of food and health change with migration to Canada among Spanish-speaking Latin American and Tamil Speaking Sri Lankan newcomers and may influence the appropriateness and applicability of Canada's Food Guide (CFG) as a nutrition education tool. We applied Jordan's model of authoritative knowledge to identify different forms of newcomer maternal nutrition knowledge, how they influence child feeding practices, and shifts causing some forms of knowledge to be devalued in favor of others. *Results:* Awareness of CFG differed between groups, with all Latin American and only half of Tamil participants familiar with it. Three distinct, overlapping ways of knowing about the relationship between food and health are identified within both groups of mothers: "natural" foods as healthy; influence of foods on illness susceptibility, and the nutritional components of food. CFG was found to be limited in its representations of recommended foods and its exclusive utilization of biomedical concepts of nutrition. *Conclusions:* Development of new, culturally competent versions of CFG that depict a variety of ethno-culturally meaningful diets and encompass both non-biomedical conceptualizations of food and health has the potential to enhance effective knowledge translation of CFG's key messages to an increasingly cosmopolitan Canadian population.

Introduction

The Canadian federal government has been disseminating nutrient requirement recommendations for Canadians through food guides since 1942, when *Canada's Official Food Rules* was published by the federal Health Department in 1942 (Bush, Martineau, Pronk, & Brule, 2007; Katamay et al., 2007). Since then, these recommendations have evolved from prescriptive diets to the current 2007 version, *Eating Well with Canada's Food Guide* (CFG), which has been translated into ten languages in addition to English and French. CFG aims to be a "description of a healthy pattern of eating intended to reduce the risk of chronic disease and obesity, and meet nutrient requirements for most Canadians [which] focuses on the amount *and* type of food to eat" (Bush et al., 2007). CFG is based on substantial epidemiological evidence and emphasizes preventing chronic disease through decreasing salt and saturated fat intake, increasing fruit and vegetable intake, and increasing physical activity (Bush & Kirkpatrick, 2003; Katamay et al., 2007).

The guide itself is a six-page booklet that outlines food intake patterns developed for nine groups stratified by sex and age, providing specific recommended serving numbers per day. The key message is to "enjoy a variety of foods from the four food groups" (Vegetables and Fruit; Grain Products; Milk and Alternatives; and Meat and Alternatives). Each of the food groups is presented as one stripe of a rainbow, with representative foods from each food group depicted pictorially. CFG also aims to "reflect Canada in 2007" (Bush et al., 2007), implying that it reflects the multicultural range of foods consumed by Canada's residents. As the primary health

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promotion tool for disseminating Health Canada's ideal food intake pattern, CFG's effectiveness likely depends on individual Canadians' exposure to and response to these guidelines, and how well the guidelines concord with culturally-informed understandings of food, health and their inter-connectedness.

Food-based dietary guidelines such as CFG and the USDA's MyPyramid in the United States are intended to improve public health by encouraging healthy individual eating decisions, which include decisions that parents make in feeding their children (Bush et al., 2007). However, these guidelines are not without controversy. There is ongoing academic and public debate as to the CFG's appropriateness, including its potential to in fact promote rather than prevent weight gain (Freedhoff & Hutchinson, 2014; Kondro, 2006). In addition to these critiques, while CFG aims to reflect Canada's cultural diversity, it is limited in meeting this aim in two respects. First, while the depiction of foods on the CFG website reflects a slightly greater diversity of foods by cultural preference, the guide itself features foods generally associated with a Western diet. Second, CFG's framework employs a Western biomedical perspective, which may not encompass other social and cultural frameworks for understanding health and nutrition (Airhihenbuwa, 1995). Research on health and nutrition knowledge has demonstrated that frameworks for understanding health and nutrition vary significantly between different cultural groups in Canada (Ristovski-Slijepcevic, Chapman, & Beagan, 2008). The aim of this study is to generate knowledge about how CFG is comprehended by newcomer mothers of young children in terms of the types of foods recommended, in order to inform public health strategies for future redevelopment and reconceptualization of CFG. The analyses explore the interplay between newcomers' previous dietary knowledge and practice and how their exposure to Canadian dietary guidelines via CFG, dietitians, community nutrition programs, physicians, and other sources influences dietary change on arrival to Canada.

Theoretical approach

To examine the changes in diet associated with migration to Canada, we use Brigitte Jordan's concept of authoritative knowledge, which examines how particular health-related practices and ways of knowing are legitimized in a "community of practice" in specific situations (Jordan, 1993). Jordan (1993) argues that in any particular domain of human understanding, there are several different ways of knowing, but very often one type of knowledge – "authoritative knowledge" – gains authority over the others. This authoritative knowledge is often associated with a stronger power base, and is validated and accepted through both practice (medical or otherwise) and social interaction (Irwin & Jordan, 1987; Sargent & Bascope, 1997). Jordan's work examines the interplay between parallel cultures that result from the introduction of Western medical knowledge and practice, in particular between traditional birthing practices and Western medical birthing practices. Other scholars have applied the concept of authoritative knowledge to a variety of settings to further explore parallel forms of knowledge in the areas of reproductive health and nutrition (Chadwick, 2010; Ellison, 2003; Fiedler, 1996; Kingfisher & Millard, 1998; Saravanan, Turell, Johnson, Fraser, & Patterson, 2012; Vaga, Moland, Evjen-Olsen, Leshabari, & Blystad, 2013). The framework is well-suited to the context of migration, which exposes individuals to new ways of knowing.

Using Jordan's model we aim not only to identify the different forms of knowledge and explore how these influence child feeding practices, but also to examine what causes some forms of knowledge to be devalued in favor of others. We apply this model to examine the overlapping and potentially competing forms of knowledge to which individuals are quickly exposed through the process of migration. This paper focuses first on identifying the ways that this diversity of knowledge might influence the appropriateness of Health Canada's dietary guidelines and CFG as a tool, and the applicability of these guidelines to our study participants. Second, we aim to identify the different types of knowledge about food and health in this sample. Overall, this research aims to inform the design of culturally competent programs aimed at improving young children's diets in newcomer families in Toronto, and will also assist providers and policymakers in understanding how child caregivers use and interpret nutrition recommendations.

Methods

Research partners and coordination

The research was conducted in partnership with a hospital-based initiative to improve access to healthcare among new immigrant families, along with the support of several community centers and programs in the study area. The Office of Research Ethics at the University of Toronto approved the study and the research team followed standard guidelines for best practice in research ethics regarding informed consent, confidentiality and anonymity.

Study setting

The research was conducted in the Jane and Finch neighborhood, an inner-suburban neighborhood in Toronto, Ontario, Canada. The study team chose this neighborhood due to its high proportion of low-income households, high proportion of recent immigrants to Canada, and for the density of services available to newcomers.

Rationale for methodology

The study design applied ethnographic approaches, employing a mix of formal and informal interviews with key informants and newcomer mothers. We developed the interview guides using an iterative process involving key informant interviews and consultations with dietitians, settlement counselors, social workers and early years professionals working in the Jane and Finch neighborhood, as well as pre-testing on two Spanish and Tamil speakers. We conducted interviews with study participants using in-depth, semi-structured interview guides. Individual interviews were necessary because of the depth of information required and the sensitive nature of several of the interview questions, which covered the precarious migration status of several of the participants (particularly those who were currently in the refugee claims process), migration experiences, and experiences with household food insecurity. To ensure privacy, interviewers gave participants the choice of being interviewed in their own homes, or in a private room at a community center.

Inclusion criteria

To qualify for study participation, participants were required to meet the following inclusion criteria: (i) mother of at least one (index) child aged 1–5 years (if more than one child met this criteria, the eldest child in this age range was chosen as the index child); (ii) of Tamil-speaking Sri Lankan or Spanish-speaking Latin American country origin; (iii) household income below the Federal Low Income Cut-Off (a widely used measure of poverty in Canada); (iv) arrival in Canada either as refugee claimants or through the family sponsorship program; (v) arrival in Canada within the last five years. We targeted Sri Lankan Tamils and Latin Americans because both groups have high rates of refugee claims and family sponsorship,