

Editorial

Food-related parenting: issues and challenges

The family has long been considered to be central to the socialisation of children and critical in shaping child behaviour. Families impact children's behaviour both directly and indirectly by influencing child cognition, role-modelling behaviours and shaping the physical and emotional environment within the home. Research examining the role of families on child nutrition and obesity has investigated overt parenting practices, parenting styles or dimensions, and feeding styles, with supporting evidence found for the role of each, as well as covert methods of changing availability of foods in the home. However, progress in the field has been hampered by unclear operationalisation of parenting concepts, with terms often used interchangeably^(1,2); lack of valid and reliable tools for measurement^(2,3); few population-based and longitudinal studies^(1,2); reliance on self- and parent report^(2,3); lack of exploration of how parenting concepts relate to each other⁽⁴⁾ or how parents view nutrition education, the provision of food to children and their children's behaviour or weight; and the development and appropriate evaluation of effective intervention programmes. Resolution to such issues is paramount for research findings to be translated into public health recommendations and practice.

This issue of *Public Health Nutrition* includes eight papers focusing on the family food environment that extend the current literature by addressing the interplay between parenting practices and styles with longitudinal study designs^(5,6), measurement of parenting practices⁽⁷⁾, the specific practices of family meals⁽⁸⁾, meal preparation/cooking skills⁽⁹⁾, important concepts to address with parents^(10,11), as well as the development of a new skill-building programme⁽¹²⁾.

Parent practices and styles

In the literature to date, several significant limitations have resulted from unclear operationalisation and interchangeable use of terms and concepts regarding food-related parenting, including overlap in measurement instruments and scales, confusion about how different aspects of the family environment operate to influence children's diet, difficulty comparing study findings to previous research and a lack of clear theoretical guidance for the development of interventions. Recent commentaries have called for consistency⁽²⁾. Parenting practices refer to specific behaviours, strategies and techniques parents

use to influence specific behaviours in their children⁽²⁾, with the most commonly examined practices related to child feeding defined as restriction, monitoring and pressure to eat⁽¹³⁾. Originating from developmental psychology, parenting styles are considered a general approach to child rearing reflected in parent–child interaction across a range of domains and situations, providing the emotional context in which children are socialised^(1,14,15); with three to four commonly accepted typologies described as authoritative, authoritarian, permissive and neglectful based on the dimensions of demandingness/control and responsiveness/warmth⁽⁴⁾. This distal concept has been long thought to moderate relationships between parenting practices and child food-related behaviours⁽⁴⁾, with the same parenting practice enacted in different ways depending on the general approach to parenting (parenting style) – and with a differential effect on behaviour. However, interactions between parenting practices and styles have not been widely studied in relation to children's diet⁽¹⁶⁾ or incorporated into family-based interventions targeting children's diet⁽¹⁷⁾.

In this issue of *Public Health Nutrition*, in one of the few longitudinal studies, Tung and Yeh⁽⁶⁾ found associations between monitoring of child's food intake and weight status after one year that were moderated by parenting style, with use of monitoring associated with higher odds of being overweight among more authoritarian parents and lower odds of overweight among more authoritative parents. Similarly, in their longitudinal study, Rodenburg *et al.*⁽⁵⁾ examined associations between feeding styles and snacking behaviours and weight, and found that both behavioural and psychological control dimensions of parenting style moderated associations between specific feeding styles and snacking behaviours longitudinally. Together, the findings of these two studies demonstrate the complexity of parenting and provide support for the notion that the way in which a feeding style or practice is enacted within the home environment can have differential outcomes. Further work is needed to build theory and models that describe processes by which the family environment operates to impact child diet specifically, particularly in diverse cultural groups where the impact of parenting styles may differ⁽⁴⁾. In terms of intervention, these results also suggest that promoting particular parenting practices to improve child nutrition may not be enough if the way in which these techniques are enacted by parents is not also addressed.

Family meals at home

The article on the prevalence and patterns of cooking dinner at home in the USA by Virudachalam *et al.*⁽⁹⁾, who used a large, population-level data set, estimated that, on average, Americans cook dinner five nights per week. This finding is similar to previously published estimates of dinners among families of youth (e.g. reference 18) as well as that of Poulos *et al.*⁽⁸⁾ in this issue (~4 family meals per week). Their findings of differences by socio-economic status, race, foreign-born meal preparers and those with dependants living in the household demonstrate the need for appropriately tailored interventions to improve cooking skills and meal preparation with the goal of improving healthful eating among diverse populations. Namely, the value of time and money needs to be addressed in developing interventions. Findings from large data sets such as this provide a solid, population-level perspective; future qualitative work is needed to understand how household decisions are being made regarding food purchasing and food preparation.

Much of the family meal literature to date makes the assumption that the significant positive associations between family meal frequency and healthful dietary intake among youth are due to the provision of healthful foods at the meal (e.g. reference 19). Poulos *et al.* showed that parental encouragement to eat healthfully may also be a contributing factor in this association. Parents who promote healthful eating may do so in a variety of ways including encouragement of healthful eating, role modelling (e.g. reference 20), providing healthful foods and beverages⁽²⁰⁾ and setting expectations for having family meals⁽²¹⁾. The findings by Poulos *et al.*⁽⁸⁾ suggest other important ways to support parents in their efforts to provide healthful food environments for their children, such as increasing discussions about healthy eating.

Education and skills

The pre-school study by Petrunoff *et al.*⁽¹¹⁾ demonstrated that even the best intentions from parents to provide healthful foods can be thwarted by their views that children deserve extra treats, particularly when they have met the parent's goal of a healthful diet, regardless of the fact that the energy associated with these extra treats adds kilojoules to the diet that may contribute to obesity. However, parents also reported that they did not always have control over their children's intake of extra treats as they were given to their children by staff in child-care settings and by other family members. Media exposure to unhealthy foods also made it difficult for parents to say no to their children. These findings indicate that education in regard to energy balance is necessary at all levels including school environments, parents and extended family.

One of the current areas of promotion of healthful eating has focused on educating and skill building among youth. Programmes that teach children how to grow their own food through community gardens and how to cook these foods have proliferated⁽²²⁾. However, parents also need skill building because many adults do not have essential meal preparation skills. The evaluation of a cooking skills programme for parents of young children by Garcia *et al.*⁽¹²⁾ in this issue showed that such programmes may increase parents' self-confidence in relation to using basic ingredients, following simple recipes, tasting new foods and preparing and cooking new foods. In addition, they may have long-term effects on healthful eating. Parent-focused programmes are complementary to the programmes for youth and together may significantly influence healthful eating in families. More programmes for parents and children are needed, however; and evaluation is critical. Often programmes are implemented without evaluation or high quality measures. The Behavior and Attitudes Questionnaire for Healthy Habits, described in this issue by Henry *et al.*⁽⁷⁾, may be a useful tool for evaluation of future programmes to promote healthful eating among families. As described by Henry *et al.*, this psychometrically sound tool assesses important components of change: knowledge, attitudes and behaviours.

Some programmes promoting healthful eating also attempt to prevent childhood obesity. Many studies have shown that parents often don't recognise overweight or obesity in their children^(23,24). The study by Gillison *et al.*⁽¹⁰⁾ showed that parents can be very sensitive to their child's weight. How to approach and communicate with parents to prevent obesity takes a delicate touch and the study's authors provide some key areas to improve communication with parents. Some of these findings corroborate the findings from literature regarding the intersection of obesity, eating disorders and self-acceptance in which parents must learn the balance of promoting their children's healthful eating habits and healthy weight without harming their children's self-esteem⁽²⁵⁾. In this regard, environmental efforts to promote healthful lifestyles, such as healthful home food environments for the entire household (covert behaviours) as well as promotion of physical activity through the physical environment (e.g. urban planning), offer non-judgemental health promotion for all children and adults.

The way forward

Although the public health nutrition areas of food-related parenting, skill building and family meals related to nutrition are burgeoning, identified shortcomings of the current evidence base are clear. The eight papers highlighted in this issue address many of these shortcomings and advance the field. Yet, future directions for research include: further exploration of how parenting styles or

dimensions interact with a range of parenting practices (e.g. family meals), particularly among different population or cultural groups; comparisons of the quality of family meals between those made at home and those purchased outside the home but eaten inside the home; evaluation of associations between meal preparation skills and obesity; and how food insecurity affects home food availability. Further, a greater understanding is needed regarding how covert parenting behaviours (e.g. changing the home food environment) interact with overt parenting behaviours (e.g. food-related parenting practices) to influence children's eating behaviours and weight status. In addition, a particular challenge for the field is the development of family-based interventions that promote optimal parenting practices while addressing general parenting approaches that may influence the way in which these practices are received by children. Clear operationalisation and consistent use of terminology and construct labels going forward will help to generate the evidence base needed to build models or theories related to food-related parenting on which to base intervention strategies.

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