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Previous weight management experiences are important: Lifestyle specific health cognitions associated with excess gestational weight gain

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The perinatal period is a critical time for the development of obesity in mothers and children. Prevention of excess gestational weight gain is a key intervention strategy, however interventions to date have produced mixed results. Identification of the health cognitions associated with excess GWG and its two underpinning behaviours of dietary intake and physical activity may provide insights into lack of consistent positive effects of interventions. The aim of this study was to examine associations between lifestyle specific psychosocial factors and gestational weight gain in pregnant women from the New Beginnings Healthy Mothers and Babies Study. Pregnant women ($n=664$) aged $29+5$ (mean + SD) years completed a questionnaire at 16 weeks gestation assessing pre-pregnancy weight, lifestyle related health cognitions common to dominant health behavior theories including risk perception, self-efficacy, outcome expectations,



social support and barriers, and demographic data. Height was measured at recruitment and gestational weight gain assessed at 36 weeks gestation. Logistic regression was used to examine associations between health cognitions and excess GWG, controlling for relevant covariates. One third (34%) of participants had a BMI $> 25 \text{ kg/m}^2$ prior to pregnancy and 38% gained excess weight. A stronger belief in the ability to control body weight (weight locus of control) was protective against excess GWG ($\beta = -0.344$, $p=0.024$) whereas higher negative outcome expectations were associated with an increased likelihood of excess GWG ($\beta = 0.191$, $p=0.015$). Previous experiences associated with success or failure in weight control are likely to play a key role in a healthy gestational weight gain. Consideration of these experiences may be key to successful behaviour change interventions targeting healthy gestational weight gain.

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A cluster randomised controlled trial of an online intervention to improve healthy food purchases from school canteens: Study protocol



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Background: In Australia, poor diet is a leading cause of disease burden and improving child nutrition is a health priority. School canteens represent an ideal setting in which to deliver public health

nutrition strategies. Online canteens, where parents or students order and pay for their child's lunch online, represent a novel and attractive opportunity to deliver interventions to improve healthy food purchases at scale with high fidelity.

Aim: Given the increasing use of online canteens, the researchers sought to investigate the efficacy of using an online canteen system to deliver a consumer behaviour intervention to improve the healthiness of canteen lunch order purchases for primary school students. This presentation comprehensively describes the study protocol for a cluster randomised trial investigating this research question.

Methods: Ten NSW schools currently using an online canteen will be randomised in a 1:1 ratio to receive either the intervention or control (standard online ordering only). The intervention will include a suite of consumer behaviour strategies to encourage healthy food purchase including (i) availability (increasing availability of healthy items), menu labelling, placement and prompting. Intervention efficacy will be assessed through between group comparison of the nutritional value of lunch order purchases, as recorded by the online ordering system at baseline (6 month period pre-intervention) and follow up (6-month period post-intervention commencement). Specifically, the trial will assess the total kilojoule, saturated fat, sugar and sodium content of food and beverages purchased of online lunch orders and (ii) the proportion of foods purchased of high (green) and low (red) nutritional value as determined by state canteen policy.

Conclusion: The proposed trial represents the first randomised trial internationally to examine the efficacy of an online intervention on improving healthy food purchases from a primary school canteen

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Community junior sport sponsorship: Children's responses to unhealthy food vs. pro-health sponsorship options



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Background: Participation in community junior sport delivers many health benefits to children; however, exposure to unhealthy food sponsorship in these settings may promote unhealthy food choices to children, and ultimately contribute to poor health outcomes.

Aim: To explore children's responses to sponsorship of community junior sport by unhealthy food brands, and investigate the utility of alternative, pro-health sponsorship options.

Methods: Experimental design whereby 1000 students in grades 1 to 3 from Melbourne metropolitan primary schools will be randomly assigned to one of four sponsorship conditions: (i) unhealthy food branding; (ii) healthy food branding; (iii) non-food branding; (iv) obesity prevention campaign branding. All participants will initially be exposed to an image of a merchandise set for their favourite sport branded with the logo corresponding to their assigned condition—thus simulating the process of enrolling in a local sports club and receiving branded merchandise at the start of the season. Following exposure to the intervention, participants will complete a series of questions assessing their brand awareness, brand attitudes, and preference for food sponsor products.

Results: Data collection for this study is underway and will be completed in July. Results will be available for presentation at the conference. For the analysis, logistic regression will be used to examine the effects of sponsorship condition on the proportion of students with top-of-mind awareness and preference for the (a) unhealthy food sponsor product and (b) healthy food sponsor product respectively. Analysis of variance will be used to