ASSESSING THE EXISTING EVIDENCE BASE ON SCHOOL FOOD AND NUTRITION POLICIES:
A SCOPING REVIEW

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Executive summary

The prevalence of overweight and obesity among children and adolescents is rising globally, with more than two thirds of overweight children now living in low-and middle-income countries (LMICs). School food and nutrition policies that address key areas such as the school community, curriculum, food and nutrition environment and/or nutrition and health services have the potential to address the rise in prevalence of overweight, obesity and diabetes, as well as to prevent and reduce undernutrition.

This report presents the results of a scoping review conducted in 2019 to identify and map existing evidence on the effects of school food and nutrition policies on health-related outcomes in children of school age. For the purposes of this exercise, and in order to align with WHO's Nutrition-friendly Schools Initiative (NFSI) framework, school-based food and nutrition interventions were assessed in terms of the impacts in all four key policy areas, namely – the school community, the school curriculum, the school food and nutrition environment, and school nutrition and health services.

Three electronic databases were searched for systematic reviews meeting the eligibility criteria: the Cochrane Library, Epistemonikos and PubMed. All systematic reviews published since 2012 in English on school food and nutrition policies that promote healthy diets among learners in primary and secondary school through interventions that address either the school community, the curriculum, the food environment or nutrition and health services were considered. Inclusion criteria relating to outcomes were kept deliberately wide and included both health outcomes (e.g. BMI) and non-health outcomes (e.g. consumption and purchasing behaviour). All titles and abstracts of records identified through the database searches were screened by one reviewer against the eligibility criteria. One reviewer was also responsible for screening all the potentially eligible full texts and for charting the data for the included studies using a pre-specified and piloted form. Results were tabulated and described narratively.

After excluding duplicates and obviously irrelevant titles, the titles and abstracts of 2,569 records, and then 258 full texts, were screened. A total of 173 records were excluded at the full-text screening stage, leaving 69 reviews to form the basis of the scoping review – including 64 completed systematic reviews and two systematic review protocols which assessed the effectiveness of policies or interventions, and three completed systematic reviews that focused on strategies for implementing policies or interventions. Most of the effectiveness reviews reported on children aged between 5 and 18 years (n = 20/66) or children under 5 up to the age of 18 years (n = 17/66), that is, pre-schoolers as well as primary- and secondary-school-aged children. Approximately half of the effectiveness reviews assessed nutrition interventions only (n = 28/66), and a roughly equal proportion assessed the impact of a broader set of interventions, for example, interventions which addressed physical activity as well as nutrition (n = 31/66). The effectiveness of interventions which addressed the school curriculum was assessed in 48 reviews, while interventions that focused on modifying the school food and nutrition environment were the subject of 39 reviews. The most reported outcomes were anthropometric (in 47 of 66 reviews) and diet-related (in 40 of 66 reviews).

This scoping review identified and mapped the evidence provided by existing reviews on the topic of school food and nutrition policies. This work has helped to outline the scope of new WHO guidelines on school food and nutrition policies, which are currently under development. By identifying the types of interventions that the new guidelines will need to address, the scoping review has fulfilled one of its main aims. It has also identified key gaps in the existing evidence base on school food and nutrition policies, in terms of both primary and synthesized research. The main primary research needs have been identified as: more studies in lower income countries; greater inclusion of theoretical models to support the implementation of interventions; more studies which make comparisons between interventions with and without parental participation, as well as across socioeconomic divides; extension of outcomes of interest beyond physical outcomes to include cognitive and academic outcomes, as well as environmental determinants; and more studies which assess the cost-effectiveness and sustainability of interventions. Longer term follow-up studies were also identified as a research need going forward. Finally, this scoping review identified a set of research questions relating to school food and nutrition policies which remain to be addressed by future systematic reviews.