



## Statement to the Ministerial Meeting of the School Meals Coalition

*Prepared by the Research Consortium for School Health and Nutrition,  
an initiative of the School Meals Coalition*

18 October 2023

The Research Consortium for School Health and Nutrition was launched as a global initiative in 2021 to provide independent, evidence-based guidance to the 90 member states of the School Meals Coalition as they recover from the COVID-19 pandemic and rebuild the health, education and future of their schoolchildren and adolescents.

This Annual Research Statement reports new programmatic and policy insights in 2023 as well as accumulating and evolving understanding of the research in this area since the 2022 Ministerial Meeting.<sup>1</sup> The Statement concludes by suggesting the implications for policy decisions, with the aim of increasing the reach, quality, and comprehensiveness of national school meals programmes by 2030.

The Statement was prepared by the Research Consortium on behalf of the School Meals Coalition for the parliamentarians and policymakers of the member countries of the Coalition. The insights consolidated within this Statement draw from analyses led by the Research Consortium's global Communities of Practice, as indicated under each statement below, including by the early career researchers and young scientists.

Research Consortium for School Health and Nutrition; (2023) Statement to the Ministerial Meeting of the School Meals Coalition. Working Paper. London School of Hygiene & Tropical Medicine, London. DOI: <https://doi.org/10.17037/PUBS.04671285>

---

<sup>1</sup> The 2022 Statement to the Ministerial Meeting of the School Meals Coalition can be accessed here: <https://www.docdroid.net/frHRATI/statement-research-consortium-september-2022-1-pdf>

## **New Insights into the Design and Benefits of Programmes**

### **1. School closures during the COVID-19 pandemic continue to have a powerful influence on the momentum of school meal programmes.**

The school closures from the COVID-19 pandemic continue to cast a shadow worldwide on education outcomes and the prospects of that generation of school children. Some children, especially girls, have dropped out permanently, others have become persistently absent, up to 20% even in some high-income countries, while continuing inconsistency in marking examinations is affecting participation in tertiary education. The universality of this effect has spurred the growth of the SMC over the past twelve months, bringing the Coalition to (now) 90 member states and more than 100 partner organizations. At the Food Systems Stocktaking +2 event in Rome, the SMC was recognized as the most substantial Coalition to arise from the 2021 Food Systems Summit. This momentum is also confirmed by the rebound in coverage of programmes: today, 418 million children are receiving a daily meal in school, exceeding levels prior to the COVID-19 pandemic in high- and middle-income countries and even some low-resource countries, notably in Benin, Honduras and Rwanda. This success suggests the Coalition has largely achieved its first goal, but the global average of one-in-two school-going children receiving a meal masks the difference among high-income countries (with 60 percent coverage) and low-income countries (20 percent).

The Analytics & Metrics Community of Practice of the Research Consortium; additional sources: [1-2]

### **2. Universal school meals are fast becoming the most popular programming approach.**

Today, 186 million children receive school meals through universal programmes – more than 44% of all school meals delivered daily. Several countries are now developing new universal programmes while others are considering switching to this approach; within 2024 we expect more than half of all programmes will be universal. Universal school meals programmes ensure distributional equity, improve children's nutrition by steering them away from unregulated sources of food, whilst lowering the cost per meal due to economies of scale. In addition, the universal delivery of meals supports social cohesion through shared meals and eliminates the stigma that arises from eligibility criteria. The list of countries currently delivering universal programmes includes those that have delivered universal programmes continuously for over 70 years, which includes Finland, Sweden and Japan, and also the largest programmes in the world, in Brazil and India. Most recently, eight states in the USA have adopted universal school meals following their positive experience of delivering a universal programme in response to school closures during the COVID-19 pandemic, and the Community Eligibility Provision has had the effect of making universal school meals available in most cities across the nation. The key attractions of this approach are the long-term returns to human capital and social capital: Sweden found that students who had access to universal school meals had on average a 3% higher lifetime income than students who attended schools without this policy.

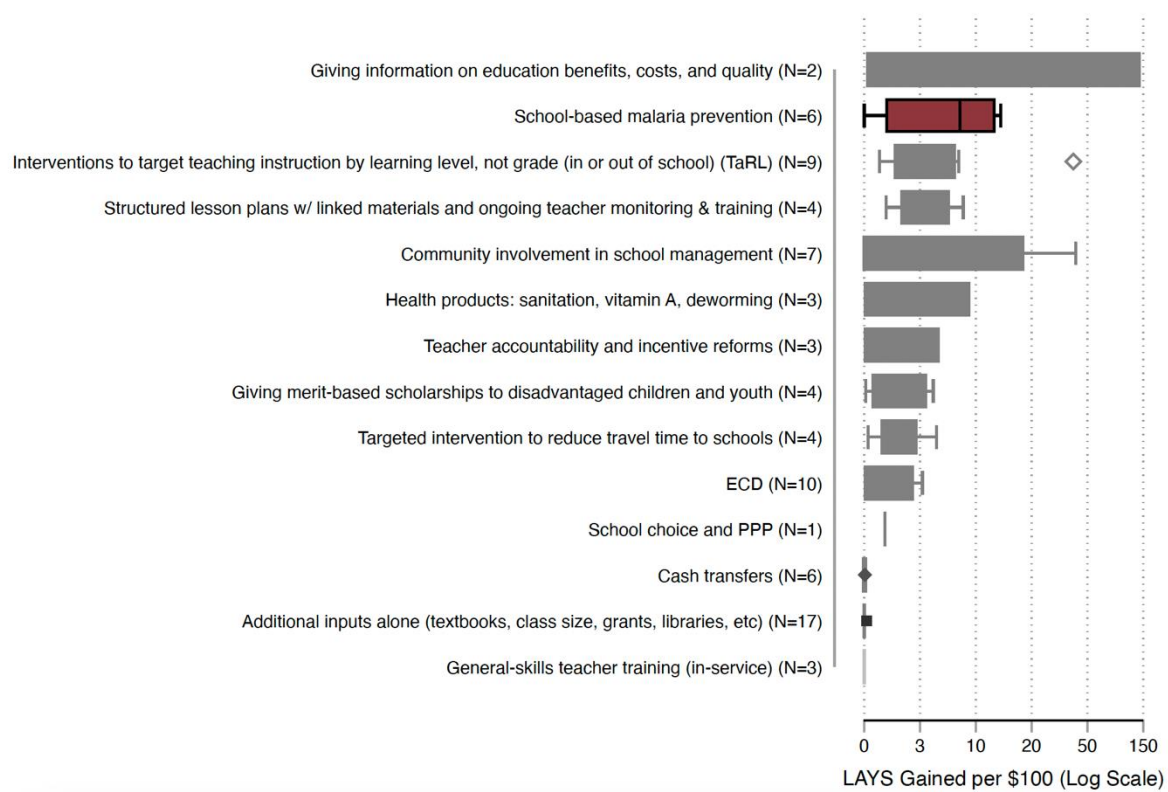
The Analytics & Metrics and Good Examples Communities of Practice of the Research Consortium; additional sources: [3-12]

### **3. The wellbeing of the learner is increasingly recognized as a key determinant of educational achievement.**

There is growing evidence that the well-being and education of school children both depend on a strong school platform which delivers a quality education and promotes health and well-being, resulting in a substantial increase in cross-sectoral policy guidance focused on school-age children and adolescence. The 2023 UNESCO report on school health, for example, emphasized the role of

good health, nutrition, and wellbeing as essential to maximize education potential and provides the most comprehensive overview of school health and nutrition programmes and policies worldwide. Other agencies have similarly published guidance that bolster support for a holistic package of school health and nutrition interventions, including on the complementarities of health and education investments (e.g., Global Partnership for Education, WHO, etc.), the role of diets and food systems (e.g., FAO, UN Nutrition, WFP, etc.), and around the development of human capital (e.g., Global Financing Facility, USAID, World Bank Group, etc.). Research on specific health concerns, such as for malaria, have also shown that school-based interventions to prevent infection can improve cognitive skills and education outcomes by a similar order of magnitude to more direct education interventions (Figure 1).

Figure 1. Cost-Effectiveness of School-Based Malaria Chemoprevention in Enhancing Cognitive Skills and Education Outcomes; Compared to the Cost-Effectiveness of Selected Education Interventions



The Analytics & Metrics and Impact & Evidence Communities of Practice of the Research Consortium; additional sources: [13-18]

**4. New research on school-age children confirms the importance of good nutrition during the vulnerable phases of development throughout the “next 7,000 days”.**

Investing in the first 1,000 days of life is crucial for survival, and investments through the “next 7,000 days” are essential to secure wellbeing into adult life and for the next generation. Health and nutrition research to date has overwhelmingly focused on children under five years of age: representing some 40% to 80% of published health research on young people under 20 years. In contrast, only 10% of published research is about the health of school-age children (5 to 14 years of age), making the schoolchild the most neglected age-group in terms of research focus. This is important because

neglect of research has led to neglect and under-recognition of the health problems of this age group. Emerging research by nutritionists over the past year has revealed the importance of nutrition interventions during the years when children are in school, and in particular, around puberty, to sustain well-being and healthy development. The importance of nutrition at school-age has been specifically identified through the US NIH/USDA/Research Consortium BOND-KIDS project, the creation of special interest groups within the UK Nutrition Society to strengthen nutritional research in school-age children, and in Europe by the Hohenheim Declaration of the 2023 Hidden Hunger Conference. This has also shown the need to identify specific indicators for the nutrition of school-age children and adolescents, which aligns very well with the development of the Data and Monitoring Initiative led by WFP.

The Nutrition Measurement Community of Practice of the Research Consortium; additional sources: [18-21]

### **New Insights into Effective Policies**

- 1. Policy changes to school meals programmes can immediately strengthen the community response to environment and climate and, through the power of procurement, help change agricultural practices in the longer term.**

A new White Paper produced by the Research Consortium shows that school meals offer this unique opportunity because of their reach and scale: in many countries school meals represent more than 70% of all publicly managed food systems. Two sets of policy changes are involved. The first group of policy changes are those directly controlled by national governments. Governments hold the policy levers of national programmes and can bring about changes that can have direct effects on critical areas that influence all their young people now and throughout their lives. The biggest effects are in the following four priority areas: menu changes which encourage dietary shifts which promote planetary and population health; clean and energy efficient cooking methods; prevention of food loss and waste, and reduction of plastic use; and action-oriented and holistic food education to help establish life-long healthier and more sustainable food practices. The second group of policy changes builds on the power of procurement to create demand from the agricultural sector for school foods from ecologically sustainable local farm systems, where possible, stimulating local approaches to agriculture which are regenerative, and which promote biodiversity, resilience, and food sovereignty. The policy influence here is less direct, and the power of procurement plays the major role if governments make the active and deliberate policy shifts in where they source school food. Planet-friendly dietary changes can be cost-neutral; having significant impacts on children's nutrition and on carbon emissions at no extra cost. Some changes can actually reduce costs, such as moving to flexitarian diets from those based on some current food standards; switching from open fires to cooking stoves; and waste reduction that effectively reduces the per-capita cost of food.

The Diet & Food Systems Community of Practice of the Research Consortium; additional sources: [22]

- 2. National school meals programmes successfully target multiple policy objectives, with health and nutrition, education and social protection among the most commonly reported aims.**

As shown in Figure 2, low-income countries typically target an average of 3 objectives, almost twice the scope of the 1.6 targeted by upper-middle-income countries. Health and nutrition is the most common objective in all income settings, and the relevance of non-health and nutrition objectives is inversely related to income level. In contrast, the policy relevance of education appears to decline as countries become wealthier. Income transfers are the third most common objective, and the relevance of transfers appears to decline with income level, perhaps because of a reduction in the vulnerable

population decreases and the increased availability of other options for social assistance. This perspective broadens the value proposition of the role school meals programmes and expands the range of tools that countries have at their disposal to address several of the most common developmental challenges.

Figure 2. School meals objectives at a programme level, percentage of programmes (N=185)

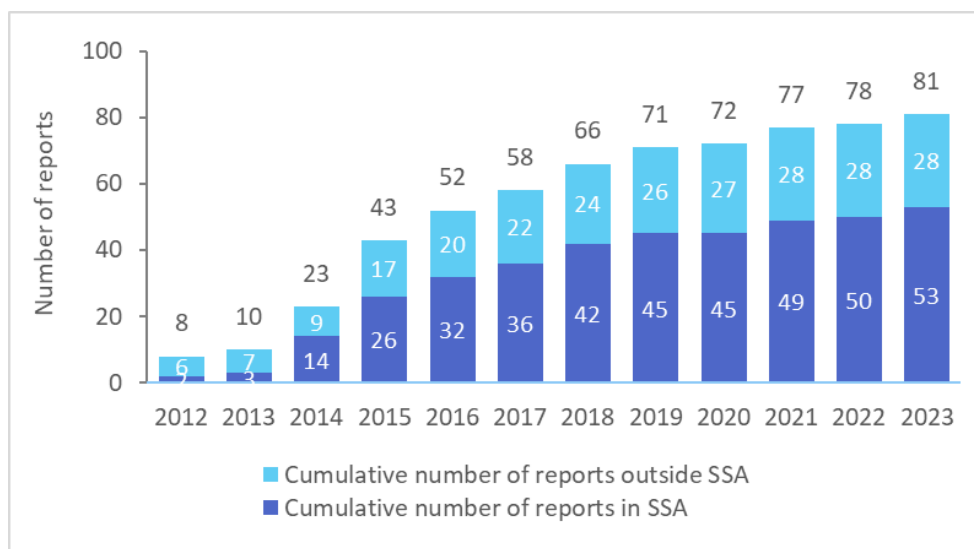
Objective	Low income	Lower-middle income	Upper-middle income	High income	Total
Education	100.0	91.5	78.8	69.8	83.6
Income transfer	85.0	78.7	69.7	63.5	73.2
Health and nutrition	90.0	93.6	93.9	93.7	92.9
Agriculture	62.5	48.9	30.3	30.2	42.1
Obesity	5.0	17.0	30.3	68.3	34.4
Average number of objectives per programme	3.0	2.2	1.7	2.1	2.2

The Research Consortium Secretariat; additional sources: [23-25]

### 3. The most popular metric used by countries to assess their national school meals policies is the World Bank SABER policy tool.

National school health and nutrition programmes experienced a decade of consistent growth up to 2020. To assist this process, the World Bank SABER (Systems Approach for Better Education Results) policy tool was introduced in 2012, and was included in the WFP policy for school meals in 2013. As shown in Figure 3, at least 81 low- and lower-middle-income countries have subsequently chosen this approach as their main policy tool to help design or strengthen their programmes. The tool is used to identify policy gaps and suggest solutions, and some countries have used the tool several times over sequential years to track and guide policy change. The results of the SABER reviews suggest that the tools were most relevant to strengthening programme design and implementation, as well as assessing the financial capacity of the programmes. The tool has now been in active use for 11 years, and the longevity of the SABER instrument together with its robust effectiveness in practical applications suggests that it continues to be the policy tool of choice by countries for strengthening the design of their national school meals programmes.

Figure 3. Cumulative number of SABER School Health and School Feeding exercises completed since 2012 globally and in sub-Saharan Africa, by year



The Research Consortium Secretariat; additional source: [26]

#### 4. Analysis of public policies in eight high-income countries identifies three common challenges and suggests three solutions that can help ensure equitable coverage.

The “Good Examples” community of practice has the goal of conducting case studies of the national programmes in all 90 member countries, with the longer term aim of using comparative analysis to identify common challenges and their solutions. To provide proof of principle, cases studies from an initial 8 countries have been reviewed. The review identified context-specific challenges to implementation fidelity related to three issues: transparency of national data, and in particular around costs; the availability of food systems-based standards that consider sustainability; and accessibility for the most vulnerable students. The review suggests that solutions to these common challenges require: i) a consistent monitoring tool or methodology to track procurement, costs, and the impact of the school menus on sustainability targets; (ii) food systems-based school canteen standards to produce school meals with minimal waste, in line with sustainability objectives; and (iii) a of review eligibility criteria to increase school meals uptake among disadvantaged children. Currently 24 country case studies are underway or completed, and new studies are being commissioned.

The Good Examples Community of Practice of the Research Consortium; additional sources: [3-12]

#### Translating New Insights into Policy

Based on the evidence available after two years of analysis, the Research Consortium for School Health and Nutrition calls upon the 90 member states of the School Meals Coalition to consider supporting the following priority areas of policy change as we move forward:

1. **Institutionalize within existing national school meals programmes the policies identified in the White Paper “*Rethinking food systems and school meals: climate, environment, biodiversity and food sovereignty*”**, which seek to encourage nutritious and sustainable planet-friendly school meals sourced from ecologically sustainable agriculture, including policy changes that prioritize nutrient rich and plant-based school meals, efficient cooking methods for school kitchens, minimize food waste and plastic pollution, and holistic food education curricula, as well as school food procurement approaches that help promote regenerative agricultural practices that help enhance biodiversity, agroecological approaches and food sovereignty.

2. **Prioritize health and nutrition research focused on school-age children** to improve the availability of evidence as well as monitoring and evaluation indicators to guide the design of school meals and complementary programmes that bolster human capital formation across the next 7,000 days.
3. **Agree new indicators to track the nutrition of school-age children and adolescents**, which can contribute to the ongoing discussion about the creation of an SDG indicator on school meals.
4. **Develop country case studies and value-for-money analyses across all School Meals Coalition member states** to document good examples from ministries, departments, and agencies in working across key sectors to deliver these multi-sectoral programmes efficiently and equitably. The case studies developed to date demonstrate that case studies and value-for-money analyses are a useful learning tool for advancing our understanding of how to optimize school meals programme design, both for the country that is being studied, and for other Coalition member states.
5. **Consider whether the School Meals Coalition member states should adopt the World Bank SABER policy tool** as a way of tracking how current policies compare against good practice and as a tool to develop ambitious but realistic national commitments to improve and scale current national programming.

**Acknowledgements:** This Statement was prepared by the Research Consortium for School Health and Nutrition as part of its commitment to the School Meals Coalition. It was conceived and written by the members of the Research Consortium Secretariat (Donald Bundy, Linda Schultz, Kate Morris, and Samantha Owen) who are entirely responsible for the content. We would like to thank the following members of the Research Consortium for valuable discussions in the preparation of this Statement: Robert Akparibo, Noam Angrist, Sylvie Avallone, Ulrike Arens-Azevedo, Fatima Barry, Biniam Bedasso, Lauren Cohee, Juliana Cohen, Lesley Drake, Christina Economos, Tom Forzy, Ugo Gentilini, Celine Giner, Bibi Giyose, Peter Hangoma, Darren Hughes, Isabelle Iversen, Sophie Kostelecky, Elizabeth Kristjansson, Heli Kuusipalo, Moustapha Lo, Gabriella McLoughlin, Gilbert Miki, Muna Osman, Silvia Pastorino, Dan Raiten, Alice Renaud, Samrat Singh, Marco Springmann, Stéphane Verguet, Meseret Zelalem.

## **Key References**

1. World Food Programme. State of School Feeding Worldwide, 2022. WFP, Rome.
2. Drake LJ, Lazrak N, Fernandes M, Chu K, Singh S, Ryckembusch D, Nouzi S, Bundy DAP, Burbano C. Establishing Global School Feeding Program Targets: How Many Poor Children Globally Should Be Prioritized, and What Would Be the Cost of Implementation? *Front Public Health*. 2020 Dec 2;8:786.
3. Cohen JFW, Verguet S, Giyose BB, Bundy DAP. Universal free school meals: the future of school meal programmes? *The Lancet*. 2023.
4. Cohen JFW, Hecht AA, McLoughlin GM, Turner L, Schwartz MB. Universal School Meals and Associations with Student Participation, Attendance, Academic Performance, Diet Quality, Food Security, and Body Mass Index: A Systematic Review. *Nutrients*. 2021 Mar 11;13(3):911.
5. Avallone S, Giner C, Nicklaus S, Darmon N. (2023) School Food Case Study: France. Working Paper. London School of Hygiene & Tropical Medicine, London. <https://doi.org/10.17037/PUBS.04671091>
6. Bremner M, Defeyter G. (2022) School Food Case Study: England. Working Paper. London School of Hygiene and Tropical Medicine, London. <https://doi.org/10.17037/PUBS.04671121>
7. Brennan M, Jones J, McKendrick J. (2022) School Food Case Study: Scotland. Working Paper. London School of Hygiene and Tropical Medicine, London.
8. Brophy S, Woolley K. (2022) School Food Case Study: Wales. Working Paper. London School of Hygiene and Tropical Medicine, London.
9. Furey S, Woodside J. (2022) School Food Case Study: Northern Ireland. Working Paper. London School of Hygiene and Tropical Medicine, London.
10. Ministry of Education, Culture, Sports, Science and Technology, Japan, Ministry of Agriculture, Forestry and Fisheries, Japan. (2023). School Food Case Study: Japan. Working Paper. London School of Hygiene and Tropical Medicine, London.
11. Ruetz AT, Tasala K, McKenna M, Marin A, Michnik K, Edwards G, Engler-Stringer R, Everitt T, Maximova K, Mosby I, Seko Y, Woodruff S. (2023) School Food Case Study: Canada. Working Paper. London School of Hygiene and Tropical Medicine, London. <https://doi.org/10.17037/PUBS.04671115>
12. Toossi S, Cohen J, Clift J, Turner L, Gosliner W, Schwartz M. (2023) School Food Case Study: United States of America. Working Paper. London School of Hygiene and Tropical Medicine, London. <https://doi.org/10.17037/PUBS.04671116>
13. Angrist N, Jukes MCH, Clarke S, Chico RM, Opondo C, Bundy DAP, et al. School-based malaria chemoprevention as a cost-effective approach to improve cognitive and educational outcomes: a meta-analysis. 2023.
14. Bundy DAP, de Silva N, Horton S, Jamison DT and Patton GC. 2017. Child and Adolescent Health and Development (with a Foreword by Gordon Brown). Volume 8. In DT Jamison, R Nugent, H Gelband, S Horton, P Jha, R Laxminarayan and C Mock, eds. *Disease Control Priorities* (3rd edition). Washington, DC, World Bank.



15. Kristjansson E, Osman M, Dignam M, Labelle PR, Magwood O, Galicia AH, Hughes PC, Wells GA, Krasevec J, Enns A, Nepton A, Janzen L, Shea B, Liberato SC, Garner JA, Welch V. School feeding programs for improving the physical and psychological health of school children experiencing socioeconomic disadvantage. *Cochrane Database of Systematic Reviews*. 2022; 2022(8).
16. UNESCO. Ready to learn and thrive: school health and nutrition around the world. Paris: UNESCO. 2023.
17. Verguet S, Limasalle P, Chakrabarti A, Husain A, Burbano C, Drake L, Bundy DAP. The broader economic value of school feeding programs in low- and middle-income countries: estimating the multi-sectoral returns to public health, human capital, social protection, and the local economy. *Frontiers in Public Health* 2020; 8:587048.
18. Hohenheim Declaration, Stuttgart, Germany. 2023. Accessed: <https://hiddenhunger.uni-hohenheim.de/en/hoh-decl>
19. Raiten DJ, Bundy DAP, DeBernardo D, Steiber A, Popoutsakis C, Jimenez B, Proano G, Rozga M, Gibbs K, Bremer AA. Biomarkers of Nutrition for Development – Knowledge Indicating Dietary Sufficiency (BOND-KIDS) Project: Executive Summary. Under review.
20. Schultz L, Hangoma P, Jamison D, Bundy DAP, on behalf of the author group. Cross-national experiences on child health and development during school-age and adolescence: the next 7,000 days. *Disease Control Priorities, Fourth Edition, Volume 1*. Under development.
21. Verguet S, Gautam P, Ali I, Husain A, Meyer S, Burbano C, Lloyd-Evans E, Coco M, Mphangwe M, Saka A, Zelalem M, Giyose B, Li Zhihui, Erzse A, Hofman K, Giner C, Avallone S, Kuusipalo H, Kristjansson E, Schultz L, Bundy DAP, on behalf of the Analytics & Metrics Community of Practice of the Research Consortium for School Health and Nutrition. Investing in school systems: conceptualizing returns on investment across the health, education, and social protection sectors. *BMJ Global Health*, in press.
22. Rethinking food systems and school meals: climate, environment, biodiversity and food sovereignty: A White Paper of the Research Consortium for School Health and Nutrition, an initiative of the School Meals Coalition. Working Paper led by Silvia Pastorino.
23. Bedasso B. Center for Global Development. 2023. Not My Problem: Breaking Down Sectoral Silos in School Meals. Available from: <https://www.cgdev.org/blog/not-my-problem-breaking-down-sectoral-silos-school-meals>
24. GCNF. 2021 Global Survey of School Meal Programs. 2021. Available from: <https://survey.gcnf.org/2021-global-survey/>
25. Bundy DAP, Gentilini U, Schultz L, Bedasso B, Singh S, Okamura Y, Iyengar HTMM, Blakstad MM. School meals, social protection and human development interventions: revisiting trends, evidence, and practices. *World Bank Social Protection Working Paper Series*, under development.
26. Schultz L, Renaud A, Bundy DAP, Barry FB, Benveniste L, Burbano C, Lo MM, Neitzel J, O’Grady N, Drake L. A decade of experience with the World Bank SABER Policy Tool: the metric of choice for assessing and tracking national school meals policies? Under development.

