School-based interventions to tackle the double burden of malnutrition in the Caribbean

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Focus of Presentation

• Background

• Policy development (6 point policy development package; school nutrition policies)

• Implementation Research (Behavioural intervention projects in select primary and secondary schools)
Situation Analysis

• **Increase** in dietary energy availability in the Caribbean.

• **Shift** from undernutrition to overnutrition:

  ➢ **Children 0-5 years**: Growing trend from 4.6% prevalence in overweight and obesity in 1990, to 6.9% in 2010, with a predicted prevalence of 8.3% in 2020 (de Onis et al).

  ➢ **Ages 6 to 20**: Overweight prevalence between 10.6% and 21.2% and an obesity prevalence between 7.1% and 25.4%.
CARPHA 6-point Policy Package

1. Labelling (mandatory NFP; regional guidelines; regulation; menus).

2. Nutrition standards and guidelines for schools and other institutions.

3. Food marketing (to reduce children’s exposure to unhealthy foods)

4. Nutritional quality of food supply (mandatory removal of trans-fats; salt and sugar reduction targets; guidelines for food service providers).

5. Trade and fiscal policies (sales taxes, tariff schedules, public assistance).

6. Food chain incentives.
### School Nutrition Policies

<table>
<thead>
<tr>
<th>Country</th>
<th>Status</th>
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<tbody>
<tr>
<td>Dominica</td>
<td>Almost complete</td>
</tr>
<tr>
<td>Grenada</td>
<td>Accepted by Cabinet</td>
</tr>
<tr>
<td>Jamaica</td>
<td>Being developed (SSBs banned)</td>
</tr>
<tr>
<td>Montserrat</td>
<td>Draft produced</td>
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<tr>
<td>St Kitts and Nevis</td>
<td>TC request received by CARPHA</td>
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<tr>
<td>St Lucia</td>
<td>Draft produced (SSBs banned)</td>
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<tr>
<td>St Vincent and the Grenadines</td>
<td>Draft produced</td>
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<tr>
<td>Trinidad &amp; Tobago</td>
<td>(SSBs banned)</td>
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Implementation Research in Schools

• Two schools-based behavioural intervention projects:
  ➢ 2008-2011 in select secondary schools in Grenada, St Kitts & Nevis, St Vincent & the Grenadines and Trinidad & Tobago (7 schools).
  ➢ 2017-2020 in select primary schools in Grenada and St Lucia (4 schools).

• Both projects funded by the World Diabetes Foundation.

• 3-year behavioural intervention project
• Intervention/control design.
Project Goal
• Prevention of diabetes and other chronic diseases through a schools-based behavioural intervention.

Project Strategy
• Promote healthy lifestyle behaviours to school children.

Project Outcomes
• Improved diet and physical activity patterns starting at the school level.
• Sustainable lifestyle intervention programme implemented in schools.
Implementation Research

The Lifestyle Intervention

Healthy schools promote healthy eating and active living

Diet and Physical Activity Behavioural Curriculum

Eat Fruits and Vegetables Daily
Eat a Variety of Foods Daily
Reduce Sugary Snacks & Drinks
Variety of Physical Activity Daily
1 Hour Moderate Physical Activity daily

Student

Eat Breakfast Daily
Reduce Salt & Fat Intake

School wide Promotional Activities

Supportive School Environment

Supportive Homes and Communities
Nutrition Surveillance Data

- Weight
- Height
- BMI
- Blood pressure
- Physical fitness assessments
- 24-hr recalls
- Focus group discussions

Support:
- Public health nurses and nutritionists in the community
- Physical education teacher
- Collaboration with Ministry of Sport, Health, Education
The Way Forward

• Advocating for the adaptation and replication of the intervention in all primary and secondary schools:
  - Tools are already developed (manuals, lesson plans, suggested activities etc.)
  - Key concepts can be incorporated into regular teacher in-service training
  - Incentivise schools to implement healthy lifestyle in
THANK YOU!