IOM Report on Front-of-Package Nutrition Rating Systems and Symbols

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Overview

- Reasons for reviewing Front-of-Package (FOP) nutrient rating systems

- Review committee findings for Phase I and Phase II

U.S. congress directed CDC to work through IOM to recommend FOP nutrition rating system/symbol
Main Reasons to Develop FOP Model

- Proliferation of FOP systems and symbols (private and public)

- Concern that inconsistent criteria is used among the different systems

- Concern that confusing messages or misinformation is communicated to the general public
FOP Rating Systems and Symbols Reports

- Phase I
  - Identify purposes of FOP
  - Evaluate existing systems in terms of strengths and weaknesses
  - Establish *Guiding Principles* to develop FOP system

- Phase II
  - Use *Guiding Principles* to select nutrients to include in FOP
  - Propose nutrient specific criteria that could be implemented for FOP system
Potential Purpose Front-of-Package Systems

- Provide targeted nutrition information
  - nutrients to limit
  - nutrients to encourage

- Facilitate comparisons of food items within categories

- Facilitate comparisons of food items across categories
Potential Purpose Front-of-Package Systems

- Summarize overall nutritional value of a product
- Provide information about contribution of food groups
- Encourage product reformulation
General Types of Front-of-Package Systems

- **Nutrient-Specific Systems**
  - Displays the content of select nutrients from the Nutrient Facts Panel

- **Summary Indicator Systems**
  - Single symbol, icon or score summarizes information about the nutrient content

- **Food Group Information Systems**
  - Symbols awarded based on presence of a food group or ingredient
Nutrient-Specific Systems

Systems with symbols that display the content of select nutrients on the basis of DV or GDA

Each 250ml bowl contains:

- **Calories**: 140 (7%)
- **Sugars**: 3.0g (3%)
- **Fat**: 1.0g (1%)
- **Saturates**: 0.3g (1%)
- **Sodium**: 0.3g (10%)

LOW
- **FAT**: 2g per 100g

LOW
- **SATURATES**: 0.5g per 100g

HIGH
- **SUGAR**: 42g per 100g

MED
- **SALT**: 200mg per 100g

Food is high in things you should be cutting down on.

Food isn't high or low in the nutrient, so an "OK" choice.

The more green lights, the healthier the choice.

SERVES 2 - HALF PIZZA PROVIDES:
- **CALS**: 495 (25%)
- **SUGAR**: 9.0g (10%)
- **FAT**: 18.3g (26%)
- **SAT FAT**: 9.2g (46%)
- **SALT**: 2.00g (33%)

OF YOUR GUIDELINE DAILY AMOUNT

Half of this pizza provides:
- **cal**: 617
- **fat**: 23.8g
- **total sugars**: 8.7g
- **sat fat**: 13.1g
- **salt**: 2.0g

PER 1 CUP SERVING:
- **140 CALORIES**: 1g SAT FAT
- **140 CALORIES**: 410mg SODIUM
- **140 CALORIES**: 5g SUGARS
- **140 CALORIES**: 1000mg POTASSIUM
- **140 CALORIES**: 20g VITAMIN A

5% DV
17% DV
29% DV
20% DV
Nutrient-Specific Systems

- Percent daily values Daily Values (%DV) or guideline daily amounts (%GDA)

- Traffic light colors or words to indicate a product contains high, medium or low amounts of a nutrients

- Declaration of calories per serving
Nutrient-Specific Systems

- May feature symbol based on claim criteria (FDA or non-FDA) such as “low fat” or “high fiber”

- In some cases both nutrients to limit and nutrients to encourage presented together

- Inconsistent regarding nutrients reported
Summary Indicator Systems

Single symbol, icon or score that provides summary information about the nutrient content of a product
Summary Indicator Systems

- May be based on nutrient thresholds or algorithms

- Only products meeting criteria have indicator or all products have indicator

- Systems may use identical or different criteria for different food categories (e.g., dairy, cereal products)
Summary Indicator Systems

- To indicate the nutritional quality, products are given;
  - Numeric score (i.e., 1-100)
  - Different # of symbols (i.e., 0, 1, 2, 3)

- Algorithm systems evaluate food products based on an equation that takes multiple nutrients (positive and/or negative) into account, in some cases weighted
Symbols are awarded to food product based on presence of a food group or ingredient.
Food Group Information Systems

- Unique criteria used for each system
- Multiple symbols can be awarded for a single product from different programs
Existing FOP Systems – Some Limitations

- Lack of transparent underlying criteria
- Inconsistent criteria across symbols, some appear to be arbitrary
- Mix of negative and positive criteria confusing to consumer
- Some positive nutrients highlighted unimportant for US health
- One symbol does not inform if >1 negative constituent (e.g., Na and saturated fat)
- Each system ranks a food differently
Phase I – Four Guiding Principles

- FOP labeling is one tool among many to encourage well-balanced, high-quality diet (e.g., Nutrition Facts Panel, MyPlate)
- FOP should focus on food components most strongly associated with diet-related chronic disease risk (overconsumption)
- FOP information should be consistent with Nutrient Facts Panel
- Should apply to as many foods as possible
FOP Rating Systems and Symbols Reports

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Phase II - IOM Front-of-Package Proposal

- Nutrition information to include:
  - Calories and serving size
  - Saturated fat/\textit{trans} fat
  - Sodium
  - \textit{Added sugar}
Phase II - IOM Front-of-Package Proposal

- Nutrition information **not** included;
  - Total fat
  - Cholesterol
  - Total carbohydrate
  - Total sugars
  - Protein
  - Vitamins and minerals other than sodium
Literature Reviewed

- Nutrition science and education
- Marketing and social marketing
- Public health
- Health literacy
- Health communication
- Information processing of other symbols
- Visual/package design
- Behavioral economics
- Food labeling policy
Basic Principles for FOP System

- Simple symbol to serve as cue to help consumers identify healthier products

- Priority populations
  - low literacy
  - low health motivation
  - limited nutrition knowledge
Basic Principles for FOP System

- FOP system should encourage;
  - Consumers to make healthier choices
  - Food and beverage companies provide healthier items through reformulation or new product development
  - Retailers to highlight healthier products

- Caloric content present for all items

- Serving size defined as currently consumed
Recommendation – Two Step Process

- Step 1 – Eligibility criteria
- Step 2 – Qualifying criteria

Base nutrient threshold levels on current regulatory definitions
Food or Beverage

Eligibility Criteria
Eligibility criteria met in all three areas

Qualifying Criteria
Qualifying criteria met in any of the three areas

Saturated Fat  Sodium  Added Sugar

0 POINTS

No points awarded if minimum criteria are not met in all three areas.

Saturated & Trans Fat  Sodium  Added Sugar

1 POINT  1 POINT  1 POINT

0–3 points awarded based on whether qualifying criteria are met in any of the three areas.
<table>
<thead>
<tr>
<th>Nutrition Facts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Serving size: 1 bar (40 g)</td>
</tr>
<tr>
<td>Servings Per Container: 5</td>
</tr>
<tr>
<td><strong>Amount per serving</strong></td>
</tr>
<tr>
<td>Calories: 150</td>
</tr>
<tr>
<td><strong>% Daily Value</strong></td>
</tr>
<tr>
<td>Total Fat: 4.5g</td>
</tr>
<tr>
<td>Saturated Fat: 2g</td>
</tr>
<tr>
<td>Trans Fat: 0g</td>
</tr>
<tr>
<td>Cholesterol: 0mg</td>
</tr>
<tr>
<td>Sodium: 105mg</td>
</tr>
<tr>
<td><strong>Total Carbohydrate</strong></td>
</tr>
<tr>
<td>Dietary Fiber: 9g</td>
</tr>
<tr>
<td>Sugars: 9g</td>
</tr>
<tr>
<td>Protein: 3g</td>
</tr>
<tr>
<td>Vitamin A: 2%</td>
</tr>
<tr>
<td>Calcium: 10%</td>
</tr>
</tbody>
</table>

*Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs.*

<table>
<thead>
<tr>
<th>Calories</th>
<th>2,000</th>
<th>2,500</th>
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<tbody>
<tr>
<td>Total Fat</td>
<td>Less than</td>
<td>65 g</td>
</tr>
<tr>
<td>Sat Fat</td>
<td>Less than</td>
<td>20 g</td>
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<tr>
<td>Cholesterol</td>
<td>Less than</td>
<td>300 mg</td>
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<tr>
<td>Sodium</td>
<td>Less than</td>
<td>2,400 mg</td>
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<tr>
<td>Potassium</td>
<td>Less than</td>
<td>3,500 mg</td>
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<tr>
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<tr>
<td>Dietary Fiber</td>
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<td>25 g</td>
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<td>Calories per gram:</td>
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<td></td>
</tr>
<tr>
<td>Fat</td>
<td>Carbohydrate</td>
<td>Protein</td>
</tr>
</tbody>
</table>
FOP Labeling System – Key Points

- One simple, standard symbol
- Display calories, serving size and 0 to 3 ‘points’
- Display on all grocery products
- Display on a consistent location and format
- Consistent with current labeling regulations
- Integrate with Nutrition Facts panel
- Non-proprietary and transparent
- Ongoing promotion program
FOP Labeling System – Recommendation #1

- **Simple**: not requiring specific or sophisticated nutritional knowledge to understand
- **Interpretive**: nutrition information is provided as guidance rather than as specific facts
- **Ordinal**: offering nutritional guidance using a scaled or ranked approach
- **Supported by communication**: with readily remembered names or identifiable symbols
Implementation of a FOP symbol system should involve multi-stakeholders, be multi-faceted, include an ongoing awareness and promotion campaign that includes monitoring, research, and evaluation.
Committee Membership

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Complete Reports

http://iom.edu/NutritionSymbols