Different Criteria for Different Food Categories: the Swedish Keyhole Labelling Scheme

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The National Food Administration (NFA)...

...is the central supervisory authority for matters relating to food, including drinking-water

...has the task of protecting the interests of the consumer by working for
- safe food of good quality
- fair practices in the food trade
- healthy eating habits

...is directly responsible to the government
Discussion points

- Category-based tools for making healthier choices
- The keyhole as an example
- A category system
- Basic facts of nutrient intake
- Different criteria for different groups
- The keyhole is used as nutrient profiling in the Swedish Code of Practice for Health Claims
- How to set the criteria for nutrients in a category system?
Short history of the Swedish keyhole

• **1983** A Swedish Food Committee proposed a new labelling system: low, middle, high – fat, sugar, salt, dietary fibre (*never applied*)

• **1985** Northern Sweden: Norsjö project: Heart symbol
  Aim: Prevention of cardiovascular diseases

• **SLVFS 1989:2**
  Implementation of the keyhole symbol by NFA into The Swedish Code of Statutes (1989:2)

• **1992** Ready-prepared products and restaurants included

• **LIVSFS 2005:9**
  June 1: Revision of rules after EU notification
  Discussion with stakeholders
Sweden: Tools for making healthier choices
…based on food categories

Food circle
NFA 1963/1991

Food pyramid
Coop 1974

Plate model
NFA (1978) 1992

Keyhole symbol
NFA 1989/2005
Why a keyhole symbol?

National Food Administration
Trade mark 1989
Low in fat, sugar, salt; high in fibre
...easier to choose healthier
e.g. dairy products (milks)
A quick healthier choice for consumers

No keyhole

No keyhole

No keyhole
...”includes” 5 nutrition claims:

i.e. nutrient *comparative* claim,
for lower fat, lower saturated + trans fatty acids
lower sugars, lower sodium
and/or *higher* in fibre

...is in itself a nutrient profiling category system
with the aim: *using* the symbol on food packages
Quick choice for consumers: Keyhole or traffic light?

Keyhole labelling = GO!

- Lower in Fat
- Lower in Saturated + trans fatty acids
- Lower in Sugars (mono+disaccharides)
- Lower in Salt (sodium)
- Higher in Dietary fibre

Traffic light labelling

NFA has already made one choice for the consumer.
She only has to look for the keyhole when choosing healthier.
Food circle: no sugar(s), no "junk foods"

- Proteins
  - Iron from meat (Zn, Se)
  - Fish: DHA + EPA, vit D

- Fat, saturated fats

- Fat, saturated + trans fats
  - Unsaturated fatty acids
  - Vitamins A, D, E

- Fibre, (calcium)
  - Vitamins as folate
  - Bioactive substances

- Fibre, whole grain
  - B-vitamins, minerals
  - Bioactive substances

- Vitamins, minerals
  - B-vitamins, bioactive substances

- Whole grains

- No sugar(s), no "junk foods"
The categories within th keyhole

Nine main groups. In total 26 product groups

9  1. Dairy products, vegetarian alternative
2  2. Margarine and spreads
1  3. Meat*
1  4. Fish*
1  5. Mixed products* and vegetarian alternatives
3  6. Ready-prepared products; pizza/pies/pirogi; soups
1  7. Fruit and berries
1  8. Vegetables, potatoes
7  9. Cereals: bread, breakfast cereals, flour, gruel
<table>
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<tr>
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<th>The keyhole – a positive choice</th>
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<tbody>
<tr>
<td></td>
<td>All kind of food groups <em>not</em> included in the system</td>
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1. **Included: 1989 + 2005**
   - **Food circle groups**: dairy-, fish-, meat-, vegetarian products
   - fish, meat, fruit & veg cereals

2. **Not within – yet?**
   - Nuts, oils, eggs, drinks etc

3. **Deleted 2005**
   - Too sweet: Ice cream
   - whey products (50% lactose)

4. **Never be included (”junk food”)**
   - Energy dense products
   - Lots of fat and sugars
**Basic facts of nutrient intake**

1. Different kinds of foods contain different levels of nutrients by nature, or as products
e.g. milk 0.1-ca 4% fat, fish 2-20% fat, margarine 30-80%

2. Nutrient intake = sum of
   nutrient content \( \times \) amount (portion) \( \times \) frequency

3. There are no absolute levels for “low” or “high”
   Keyhole system = a relative scheme;
   comparing levels of nutrients within a given product group

4. Criteria can and should be changed over time
## Different criteria for different food categories

### Fat

**Per cent of fat (g/100g)**

- Dairy products: <0.5-17% fat
- Edible fats < 41% fat

**Meat, meat and fish products <10%**

**Fresh, deep frozen fish all fat levels**

### Fatty acids

- Edible fats
  
  < 33% saturated and trans fatty acids of the total fat content

### Energy per cent of fat: max 30 E%,

- Ready meal dishes, pies/pizza/pirogi, soups

### Sugars:

- mono- + disacharides: Not added or max 3, 9, 10, 13 g / 100 g

### Sodium:

- No sodium added or max 400, 600,1200 mg / 100 g

### Dietary fiber:

- at least 3 - 4.5 g / 1000 kJ
Incitament for product development

1989 very few cheeses low in fat
Now: one out of eight cheeses contain <17% fat
Sodium<480 mg/100 g=1.2% salt
The keyhole is used as nutrient profiling in the Swedish Code of Health Claims

Claim 9: Based on epidemiological studies
A healthy lifestyle and a well-balanced diet high in whole grain products
a) reduces risk of coronary heart disease,
b) reduce risk of heart disease.
Product x has a high whole grain content i.e. >50% whole grain / dry substance

Nutrient profile for soft bread:
- fat <7 g/100g
- total sugars <10 g/100g
- sodium <600mg/100 g
- dietary fibre >4.5 g/1000kJ
How to set the criteria for nutrients in a category system?

• Science based. Yes, but…
• One has to accept…
• … that there are no absolute (scientific true) thresholds when setting criteria for the concepts ”low(er), high(er)…”
• Thresholds can and should be changed over time.
• Be practical and pragmatic!
• Look at the composition of products on the market
• Concerns must be taken to other aspects of food, i.e consumer acceptability, taste, texture, microbiology…
A category system
based on the same idea as the keyhole labelling,
should be developed in the coming rules for

nutrient profiling
of nutrition and health claims