

Regulatory Systems For Health Foods

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Safety Issues of Functional Foods

- Safety issues of functional foods are becoming popular day by day throughout the World and the safety issues are also triggering brains of researchers as well as consumers.
- It is very important to determine the right doses of the bioactive compounds/ phytochemicals to be incorporated into the food systems or to be administered as nutraceuticals.

Safety Scale of Functional Foods and Nutraceuticals

Functional foods

- Safe
- No strictly specified limits of consumption
- Provides slow results
- Consumed as basic food stuff along with main meals
- Very diverse
- Minimum standards for preparation
- Minimum education & regulations for sale
- Do not require medical advice before consumption

Nutraceuticals

- Less safe
- Strictly specified limits of consumption
- Provides fast results
- They are not the basic food stuff instead they are capsules, powders etc., and thus not taken during main meals
- Less diverse
- High standards for manufacturing & prescription
- Strict education & regulation for sale
- Should be taken after medical advice only

Regulations Related to Functional Foods

Functional foods are regulated by the United States , Food and Drug Administration(FDA) under the authority of two laws.

1. Federal Food, Drug and Cosmetics act (FDAC) of 1938 provides for the regulations of all foods and food additives.
2. The Dietary Supplements Health and Education act(DSHEA) of 1994 amended the FD& C act to cover dietary supplements and ingredients to dietary supplements.

Codex Alimentarius

Codex Alimentaris has been defined two types of nutrition claims:

Nutrient claims includes two types:

- 1. Nutrient content** claim that is a claim that describes the level of a nutrient contained in a food.
- 2. Nutrient comparative** claim is a claim that compares the nutrient levels and / or energy value of two of more foods.

Nutrition Content Claim

Nutrition claim means any representation which states, suggests or implies that a food has particular nutritional properties including but not limited to the energy value and to the content of protein, fat and carbohydrate, as well as the content of vitamins and minerals.

NUTRITION CLAIMS

Nutrition claim - means any claim which states, suggests or implies that a food has particular beneficial nutritional properties due to the energy (calorific) value (provides, provides at a reduced or increased rate; or does not provide;) and/or the nutrients or other substances (if contains; contains in reduced or increased proportions, or does not contain)

- Low energy
- Energy-reduced
- Energy-free
- Very low sodium/salt
- Sodium-free or salt-free
- Source of fibre
- Contains [name of the Nutrient or other substance]
- Increased [name of the energy free
- Low fat
- Fat-free
- Low saturated fat
- Saturated fat-free
- Low sugars
- Sugars-free
- With no added sugars
- Low sodium/salt
- Source of fibre
- High fibre
- Source of protein
- High protein

- Source of [name of vitamin/s] and/or [name of mineral/s]
- High [name of vitamin/s] and/or[name of mineral/s]
- Increased [name of the nutrient]
- Reduced [name of the nutrient]
- Light/lite
- Naturally/natural (linked to other nutrition claim e.g.
- Naturally high in fibre
- Source of omega-3 fatty acids
- High omega-3 fatty acids
- High mono unsaturated fat
- High poly unsaturated fat
- High omega 3 fatty acids
- High poly unsaturated fat
- High unsaturated fat
- No added sodium/salt
- Reduced [name of the nutrient]:

HEALTH CLAIMS

Health claims - Any claim that states, suggests or implies that a relationship exists between a food category, a food or one of its constituents and health;

The impact of a particular nutrient to the growth and development of the organism function

The impact on psychological function, behavior
Weight control or weight, or reduce feelings of hunger or an increase satiety, reduce energy available

The impact on the health and development of children

Risk Reduction of disease

FUNCTIONAL FOODS REGULATIONS IN INDIA

Food safety has become a big concern for consumers as well as government and regulatory bodies.

Food Safety and Standard Authority of India Act (FSSAI) 2006

Chapter IV, Article 22 of the act addresses nutraceutical, functional food, dietary supplements and the need to regulate these products such that anyone can manufacture, sell, or distribute or import these products.

These products include novel foods, genetically modified articles of food, irradiated food, organic food and food for special dietary uses, functional food, nutraceuticals and health supplements, whereas

Articles 23 and 24 address the packaging and labelling of food and restriction of advertisement regarding foods.

INTERNATIONAL REGULATIONS

Country	Regulation	Remarks
Japan	Foods for Specified health Use (FOSHU)	Approve the statements made on food labels concerning the physiological effects of the food on the human body
USA	Food and Drug Administration (FDA) has regulated the nutraceutical industry since 1947	Health claim may be authorize for a food based on a extensive review of the scientific literature
Canada	Health Canada regulates the health food industry & the Canadian food inspection agency enforces these regulations.	In canada, most of the nutraceuticals fall under the natural health Products Regulations of the food & Drugs Act which came into effect on January, 2004
New Zealand & Australia	Food Standards Australia & New Zealand (FSANZ)	
China	Food hygiene law of People's Republic of China & the Administrative licensing law of People's Republic of China	Effective from July 2005