

Nutrition and health claim labelling of food and the unique  
relationship between consumers, companies and legal instruments  
involved

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## Summary

**Title:** Nutrition and health claim labelling of food: Understanding the unique relationship between consumers, companies and legal instruments involved

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**Problem formulation:** Recent results from the European Food Information Council's consumer research on nutrition information and food labelling revealed that most consumers have little understanding of the nutrition information found on food products, feel that there is little authority regulating these matters and wish for a more trusted source of information and regulation and lastly it was found that consumers accept their limitations and have little motivation to even read or learn about nutrition information. Thus what are the reactions of the various legal authorities to this problem? How are food retailers and producers responding to the needs of the consumer? How are consumers then reacting to these two players in the industry and the changes they are making?

**Purpose:** The purpose of this research is to gain new perspective and a better understanding of relationship between consumers, companies and legal instruments in relation to nutrition and health claim labelling of food products.

**Method:** The nature of this multi-disciplinary research has led to the study of all three areas, business administration (containing consumer behaviour) and business law, which are contained in this paper. Functional foods are used as examples of nutrition and health claim labelling, as well as a review and some comparison between the legal systems of the EU, Sweden and the UK. The research carried out contains all three elements in which various past academic reports, studies, books, legal documents and articles were gathered for analysis. Most secondary research found was lacking in the area of how companies are meeting the challenges of food labelling, thus a company interview was chosen to fill in the information gaps.

**Conclusions:** There is a clear need for more open lines of communication between consumers, food producing companies and food authorities. Nutrition and health claim labelling play a large role in the food industry today, and with current trends as they are, it will continue to be in the future. The condition of this role will only improve if the three industry players work together to form more open communication, harmonised legislation and further research on ways of better communicating a clear and credible message of health to the public.

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## 1. Introduction

A survey from Hrovat *ET AL.* found that 84% of 200 adult Americans made their choice between two kinds of biscuits based on statements on health-conducive properties on the front-label without turning the package to study the nutrition facts.<sup>1</sup> The European Food Information Council in their latest consumer research results reported that, “The nutrition labels are spontaneously cited as a source of nutritional information in all groups in all countries (within Europe), but only few consumers say they really ever look at them.”<sup>2</sup> Since the labels, symbols and other marketing messages on the front of food packages are typically the most read, they are then just as important as the standard nutrition label on the back. Because of its great importance for marketing and general public communications of health, this area has recently received a lot of attention.<sup>3</sup>

### 1.1 Background

Today as consumers are becoming more aware of their diet and its effects on their health, they are becoming more and more selective of the foods they consume. Food production is becoming increasingly complex and in turn consumers are now interested in these processes and the information that is labelled on food products today. Most companies within the food industry have thus disclosed, through their labelling, nutritional information and the benefits their product could bring to the consumers’ diet. However, the communication of nutritional information should be presented in a clear, accurate and meaningful manner in order not to confuse or mislead the consumer. Today many food policy makers, consumer organisations, and even industry players are all seeking a more harmonised approach to handle this issue of labelling.

### 1.2 Problem discussion, purpose and research question

This research concerns consumer behaviour involving food nutritional labelling and or symbols and the issues companies in food industry are facing today in order to communicate their message. The issue of nutrition and health claim labelling of food products not only presents

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<sup>1</sup> Hrovat, K.B.; Harris, K.Z.; Leach A.D.; Russell B.S.; Harris B.V.; and Sprecher, D.L. *The new label, type of fat, and consumer choice.* Archives of family medicine. Volume 3 Pp. 690-695. August 1994.

<sup>2</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, February 2005. P. 3.

<sup>3</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 57, 2001.

food-producing companies with challenges; it also affects consumers and policy makers alike. The purpose of this research is to gain new perspective and a better understanding of the relationship between consumers, companies and legislative instruments in relation to nutrition and health claim labelling of food products.

Since functional food is a fairly new product idea in the food industry with little legislation behind it, the functional food market is sparking much controversy. Functional foods are reliant on the fact that consumers are informed about the properties of these foods and why they are beneficial to their diet. These products cannot survive without support from the food industry, consumers and especially legal support for the marketing of its specific health claim. Therefore using functional foods as an example of challenges facing the food industry today concerning labelling is ideal. There are still some barriers to consumer awareness and acceptance of functional foods, and these could be lightened or lifted for companies starting with an understanding of consumer behaviour and attitudes. Understanding consumers' cultural and risk perceptions associated with emerging innovations can assist companies who produce and market functional foods to gain better performance of their products.

The controversy is due to the fact that there is no one recognised definition of functional foods, thus each country and even region may have a different definition of what makes food a functional food. Thus consumers either are not informed at all or they are receiving mixed messages, from different advertising, media, etc., which increases the perception of risk in purchasing these products.

The European Union (hereafter EU) currently defines functional foods as:

A functional food is a food that contains an ingredient, a micronutrient or a naturally occurring chemical, which has demonstrated either significant and beneficial interactions with functions in the consumer or a reduction in the probability of contracting certain diseases.<sup>4</sup>

Whereas the Functional Food Science Centre in Lund defines functional foods as, “Functional foods are foods designed to provide a specific and beneficial physiological effect on health, performance and/or well-being extending beyond the provision of simple nutrients. The effect should be documented scientifically.”<sup>5</sup> One can begin to see the problems associated with marketing such products and also making country-to-country comparisons since there is no

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<sup>4</sup> FUFOSE (Functional Food Science in Europe), <http://europa.eu.int/comm/research/success/en/agr/0260e.html>. Visited on 17 May 2005.

<sup>5</sup> Functional Food Science Centre, <http://www.ffsc.lu.se/eng/ff/definition/> (Visited on 18 May 2005), Not a legal definition.

common legal definition. Some examples of functional food products that are commonly seen in the European market today are listed in Table 1 below. Examples of labels one may find on functional food products include: “With Omega 3”, “Palatable bread rich in the type of dietary fibre that might help you to lower cholesterol levels”.<sup>6</sup>

<b>Functional Food</b>	<b>Active Food Component</b>	<b>Target Function</b>
Yoghurts, sugar	Probiotics: Foods with beneficial live cultures as a result of fermentation or that have been added to improve intestinal microbial balance, such as <i>Lactobacillus</i> sp. <i>Bifidobacteria</i> sp. Prebiotics: A non-digestible component that has beneficial affects by stimulating the growth of bacteria in the colon. Examples include inulin and oligofructose.	Optimal intestinal function and intestinal microbial balance
Margarines	Added plant sterols and stanols esters	Decreased LDL-cholesterol (bad cholesterol) and decreased risk of coronary heart disease (CHD)
Omega-3 fatty acids enriched eggs	Omega-3 fatty acids	Control of hypertension, lipids metabolism

**Table 1 Examples of Functional Foods<sup>7</sup>**

So, what’s in a label exactly and how does this label affect the purchasing of foods? Does a consumer buy a yoghurt functional foods product instead of normal yoghurt due to the label or symbol on the package for example? Are they even aware that this is a functional foods product or do they just think that it’s healthy so they should buy it? Do consumers know what functional foods are compared to just low fat products for example? Does the functional foods label on the product make a difference in buying behaviour? If yes, then what are the consumer’s expectations when they purchase functional food products? Consumers tend to have a high perception of risk concerning functional food products.

### **1.3 Limitations**

The study is limited to only focus on nutrition and health claim labelling for the food industry from company, legal instrument and consumer behaviour perspectives. The research will not cover the issue of food safety, although it is acknowledged as an important issue and is related, however it would have only been a tangent to the main findings. The study of food choice and the influence of nutritional labels and health claims is typically a multi-disciplinary subject. Food choice encircles biological, economical, physical, social, cultural, psychological

<sup>6</sup> Examples were found on the package of a loaf of bread sold in Sweden.

<sup>7</sup> *The Basics: Functional Foods*. EUFIC Online, Annex 1, 2003. P. 5.

determinants as well as attitudes, beliefs and knowledge about food. However acknowledging that these determinants are all important factors, this study will only encompass the attitudes, beliefs, and knowledge about food.

The company interviewed in this research was interviewed over the telephone to their headquarters in Stockholm, Sweden and was a food retailing company with their own private label products. The interview was carried out in English with a company representative who is a Swedish national, thus some expression of opinion may be hindered by not interviewing in the participant's native Swedish language. Another limitation is the lack of comparison with an additional or more interviews, however due to lack of time and response rate this was not achieved. Thus the interview is recognised as just one point of view of a retailer and producer in the food industry, and is not to represent the industry as a whole.

Concerning the legal limitations of the thesis, it must be pointed out that the information on the proposed Regulation in Section 4.1.5 will be brief since it is only proposed. Even though the food industry needs to be aware of the proposed regulation, the main legal portion of the thesis will focus on the current Directives and other legal instruments that are already implemented, being that these are the most relevant for the food industry at present.

#### **1.4 Target Audience**

This research is directed towards individuals in the food industry, both policy makers and food producing and retailing companies, as well as students and teachers in business schools and those within food studies in general.

#### **1.5 Disposition**

*Chapter 2* discusses the methodology used, including choice of research method, the choosing and understanding of theoretical perspectives and choosing a specific research technique.

*Chapter 3* introduces consumer behaviour theory and literature. It serves as a basis for the empirical study and includes healthy vs. unhealthy food choice, nutritional and health claim labelling from a food industry and ethical perspective as well as consumer behaviour theory on food and functional food choice.

*Chapter 4* addresses business law aspects of nutritional labelling and health claims in the food industry. This chapter lays out the legal framework and covers all aspects of EU food law, a



comparison of Swedish and United Kingdom food laws and guidelines, as well as the Codex Alimentarius International Guidelines.

*Chapter 5* presents the conceptual framework and the integration of consumer behaviour and business law aspects pertaining to food choice and labelling. This chapter describes the inseparable relationship between the consumers, businesses, and legal instruments before the results of the empirical study are discussed.

*Chapter 6* reports the various empirical studies and describes the empirical data taken from previous studies and research, as well as a primary interview with a local Swedish company in the food industry. After all of the results are described and discussed, the paper continues with an analysis.

*Chapter 7* analyses and compares patterns within the various empirical studies, both primary and secondary. The studies support the link between the consumer, business and legal communities and suggest possible methods for meeting the challenges they face in the area of nutrition and health claim labelling of food.

*Chapter 8* gives results, conclusions and a recommendation for future research in the field of food labelling both nutrition and health claims.

## **2. Methodology**

This chapter is a discussion of the research methods used and why they were chosen. The method chosen should correspond to the purpose of the study in order to achieve the best results. Areas of methodology discussed begins with the choice of research method then continues to theoretical perspectives and end with a discussion of choosing a research technique.

### **2.1 Choice of research method**

When commencing in research one must decide the method of their research, and there are typically three types, deduction, induction and abduction. Each of these three methods has its advantages and disadvantages depending on the topic and goals of the research. Deduction is a method that allows the researcher to use existing theory in order to create something new. The induction method is to observe primary empirical data irrespective of past research to create something new. Lastly, the abduction method uses both deduction and induction to create something new, and is often used to verify or test theories. This study is mainly comprised of the abduction method of research. The study takes into consideration both past and primary empirical

data in order to present a new view on the relationship between consumers, companies and legal authorities within the food industry in regards to nutrition and health claim labelling.

This research mainly consists of secondary empirical data, academic articles, studies and theoretical models, as well as one primary interview. The literature selected was chosen starting with publications of food and functional food research organisations and policy makers. References were then taken from these documents to find new and related literature. All of literature used in this research is from academic journals, dissertations, and official publications of the European Union. All of the articles have been peer reviewed and checked for accuracy and authenticity. Legal instruments for this research consist of official European Community primary and secondary legislation, case law and other documents, as well as official legislative instruments of food labelling law concerning Sweden, the United Kingdom and Codex Alimentarius.

## ***2.2 Theoretical perspectives- understanding and choosing***

Today there are many theoretical perspectives pertaining to consumer behaviour and food choice. The theories that were chosen range from simple, like the Black Box Model, to more complex models such as Östberg's relational model, Ilmonen's diagram of food choice and Furst's conceptual model of food choice. All of the models give a greater understanding of consumer's behaviour when it comes to food choice. These models were chosen because each one has something a little different to offer to the area of consumer behaviour. They lay the basic framework for understanding consumers' food choice, which one can then use for further research to obtain a greater understanding.

## ***2.3 Choosing research technique***

The area of consumer behaviour in food choice with relation to nutrition and health claim labelling today is under-researched. Researchers are just beginning to understand what a label means to a consumer, if they understand them, or even use them in their decision-making process when purchasing food products. This research in addition to consumer behaviour in relation to food labelling introduces another subject area, this being business law or food law.

Although they are completely separate entities, they are both concerned with similar issues mainly consumer protection. Consumers do have faith in their countries' policies on food, and the policy-makers' goal is to maintain that faith by protecting the consumers' interests and

sustain a competitive market. In order to bridge these two areas further, an interview of how one food-producing and retailing company is handling these challenges of food labelling is added. Since it is the duty of every food-producing company to promote and sell their products they at the same time must adhere to consumer protection issues, thus the food-producing companies are stuck in the middle of this equation.



**Figure 1 Relational positioning of the research areas**

The nature of this multi-disciplinary research has led to the study of all three areas, which are contained in this paper. The research carried out must contain all three elements in which various past reports, studies, books, legal documents and articles were gathered for analysis. Most secondary research found was lacking in the area of how companies are meeting the challenges of food labelling, thus a company interview was then chosen to fill in the information gaps.

Due to language barriers as an American living in Sweden, techniques such as focus groups, face-to-face surveys or interviews with the general public was not possible. Although the majority of the population in Sweden speaks English, they may have some difficulty expressing themselves properly in English about the area of nutritional labelling and health claims. If another person were to conduct these surveys or interviews in Swedish, there is also a possibility of losing the meaning with translation.

Thus the interview with a food company manager in Sweden was the best method of realising the issues and problems that companies face when trying to convey a message through their product labelling.

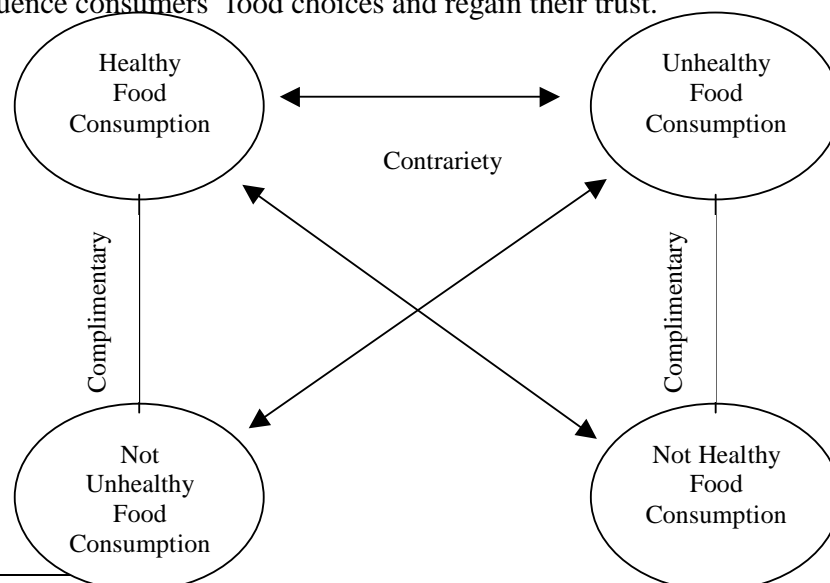
### 3. Consumer Behaviour: Theory and literature review

This chapter introduces consumer behaviour theory and literature. It serves as a basis for the empirical study and includes healthy vs. unhealthy food choice, nutritional and health claim labelling from a food industry and ethical perspective as well as consumer behaviour theory on food choice. The chapter ends with a discussion of consumer behaviour in relation to functional foods.

#### 3.1 Food Choices: Healthy vs. Unhealthy

How are consumers today to make healthy food choices when each industry or company is out to promote their products as being the healthy choice? Multiple studies have shown that consumers are generally concerned as to the types of foods they eat; consumers say that they are trying to eat less confectionary (for example).<sup>8</sup> However general sales of confectionary have risen over the last few years, thus the consumers' perception may not be entirely accurate.<sup>9</sup>

Today consumers can be confused at times with the number of nutritional advice coming from all different directions, and many of which have contradicted one another. Thus even though one expert may give an evaluation of risk for a particular food or food group, another expert may give an opposite opinion leaving the consumer to assess the risk for themselves. Once trusted sources of nutritional information are now being questioned, whether it is justified or not. Therefore a reinstatement of credibility needs to be restored at the highest level in order to positively influence consumers' food choices and regain their trust.



<sup>8</sup> Multiple studies include: Warde 1997, Östberg 2003, Svederberg 2002, EUFIC 2004, Menrad 2003, Baltas and D'Souza 2001 and Löfving 2005.

<sup>9</sup> Warde, Alan. Consumption, Food & Taste. SAGE Publications, London. 1997. P.81

**Figure 2 A relational model of healthy food consumption<sup>10</sup>**

Figure 2 above is a modified version of Greimas' semiotic square created by Jacob Östberg in his doctoral thesis. The basic idea of the model is that "health and risk are intimately connected and can be seen as two sides of the same coin...one could not meaningfully be conceptualised without the other"<sup>11</sup>. Therefore the meaning of the product is dynamic, in that it is constantly influenced by new messages about the product and of course the product itself.

One of the misperceptions by consumers when they speak of the consumption of healthy food, according to Östberg, is they do so in terms of "It feels good to eat it" rather than "I feel good when I eat it".<sup>12</sup> Thus it seems that consumers are not fully grasping that what they eat physically affects their body and the way it functions. Considering the consumers' current information gap, how do companies and others in the food industry meet this challenge? The key may lie in nutrition and health claim labelling of the various food products.

### **3.2 Nutritional and Health Labelling and Claims**

According to the Codex Alimentarius Commission<sup>13</sup>, "Food labelling is the primary means of communication between the producer and seller of food on one hand, and the purchaser and consumer of the other."<sup>14</sup> Their definition of nutrition labelling is, "...a description intended to inform the consumer of nutritional properties of a food. Nutrition labelling consists of two components: nutrient declaration and supplementary nutrition information. Nutrition declaration means a standardised statement or listing of the nutrient content of a food."<sup>15</sup> It is the obligation of the food industry to follow such nutrition and health claim labelling definitions and guidelines (which will be discussed further from a legal point of view in chapter 4). Thus, what are the perspectives of the food industry? What is legal may not always be ethical. What ethical

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<sup>10</sup> Östberg, Jacob. *What's Eating the Eater?* 2003. P. 117.

<sup>11</sup> Ibid. P. 117.

<sup>12</sup> Ibid. P. 77.

<sup>13</sup> The Codex Alimentarius is a single international reference point concerning food code for consumers, food producers and processors, national food control authorities and international food trade. Members of the Codex Alimentarius who have adopted the Codex General Guidelines include some 172 countries from all over the world.

<sup>14</sup> Codex General Standard for the Labelling of Prepackaged Foods: Preface. Codex Alimentarius Commission, <http://www.fao.org/DOCREP/005/Y2770E/y2770e01.html>.

considerations are taken in the food industry, considering the labelling and marketing of their products? These two questions are discussed below in the following two sections.

### **3.2.1 Food Industry perspective**

A study concerning namely the effects of nutrition information on brand choice was conducted in 2001 in Greece at Athens University of Economics and Business from professors George Baltas and Giles D'Souza. The main finding of the study was that the trade off between nutrition and taste factors of product attributes have important implications for marketing managers and researchers.<sup>16</sup>

Baltas and D'Souza suggest that:

From a managerial standpoint, nutrition labelling provides both a channel to demonstrate the nutritional properties of products and an incentive to improve the nutrient content of those that fail to meet consumer requirements in target markets. Nutrition information can also support advertising and communication programs based on diet-related claims.<sup>17</sup>

Therefore, most players in the food industry have accepted their legal obligations of labelling and have turned it into an opportunity to market their products (a further example will be shown in Chapter 6.2 An Interview with ICA). Companies in the industry today are using labelling standards as a marketing tool and a sign of quality, as will also be described later in Chapter 6 (6.2.1 An Interview with ICA).

Baltas and D'Souza's study has also shown that:

The study on the effects of nutrition information indicates that nutrition attributes do matter in product-choice decisions. The nutritional composition of the product determines its purchase probabilities and should be considered as an important aspect of overall product design.<sup>18</sup>

This suggests that companies in the food industry are completely aware that their nutrition information and labelling have great effect on the success of their product. They recognise that consumers do consider this in their decision making process of food choice, and also the matter in which the label is designed plays an important role. For functional foods, the label or health claim means everything, explains Sjöstrand from Magiform:

“We have a food with desired health effects but we are not able to tell consumers about it. It is important that we act in a responsible way, with well-documented research. Everything relies on this

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<sup>15</sup> Ibid: Codex Guidelines on Nutrition Labelling.

<sup>16</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 57, 2001.

<sup>17</sup> Ibid. P. 61.

<sup>18</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 57, 2001.

research – and being able to talk about the results.”<sup>19</sup>

Mark-Herbert conducted her studies in Sweden (Magiform is a Swedish company) and Baltas and D’Souza conducted their studies in Greece, since there is no one accepted definition of functional foods this makes country-to-country comparisons in the area of functional foods difficult. However Baltas and D’Souza give general suggestions for food product and marketing managers that can cross borders. Baltas and D’Souza suggest that product and marketing managers make conscious decisions on whether or not to highlight the nutrition and health claim labels on their packaging. They explain with an example of two different cereal-advertising campaigns:

Advertisers are usually given the nutritional content of the product, and they can either focus on this, as does Special K, or not, as does Frosted Flakes. The principal question is whether the advertiser should or should not focus on nutrition.<sup>20</sup>

However for functional foods, this (nutrition claim) is one of their main marketing messages and therefore cannot be avoided. Considering for functional foods that the whole concept of the product is to improve health, thus health claims for functional foods are one of the only methods for differentiating themselves from competitors. Baltas and D’Souza give a general food example using the cereal market:

For example, high values in ingredients such as fibre have helped adult cereal brands to launch successful advertising campaigns and become instantly recognized and differentiated from the competition. One may here parenthetically note that nutrition labelling issues may soon become even more prominent due to emerging information requirements including, of course, identification and description of organic and genetically modified food products.<sup>21</sup>

Whether or not to highlight nutritional value or lack of, is legal, however is this ethical to disguise poor nutritional values in order to market your product? Concerning functional foods, is it ethical to make health claims of prevention and improvement in health?

### **3.2.2 Ethical considerations**

A recent article from one Swedish and one Australian professor published in the journal of Corporate Governance, suggests that business ethics is either a proactive or reactive process and stresses the importance and the amount of impact these processes. They present the idea that the impact of business ethics is not just within the Corporation, but reaches also the customers,

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<sup>19</sup> Mark-Herbert, Cecilia. Functional Foods for Added Value: Developing and marketing a new product category. Swedish University of Agricultural Sciences, Uppsala, Sweden. P. 84. 2002.

<sup>20</sup> Baltas, George and D’Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 57, 2001.

<sup>21</sup> Ibid.

stakeholders and society in general.

Customers in the marketplace are becoming increasingly aware of, and increasingly discriminating against, corporations that fail to meet the consumers' criteria of acceptable versus unacceptable ethical business activities and management principles. We would contend that this concern does not just apply to customers, but to all stakeholders of the corporation and the society in general.<sup>22</sup>

Since there are no current laws regulating the nutrition and health claim labels on food products (only guidelines), this makes most labelling legal, however this doesn't necessarily make it ethical. Simply because there are no current laws or EU harmonisation on the topic of nutrition and health claims labels, does not also make the label ethical. There are many consumer organisations throughout Europe that are monitoring this exact topic. One example is the Swedish consumer organisation, Konsumentverket, based out of the capital Stockholm.

Konsumentverket has been active in targeting various product labelling they feel is inaccurate, unclear, and or confusing for the consumer to read. They are just one example of the many consumer organisations around the world, which are striving for companies to assume a more proactive approach to business ethics. Thus ensuring that solutions are not only what is best for the company, but is also what is best for the consumers and society at large.<sup>23</sup>

This and many other consumer organizations throughout the world are questioning advertising that may be legal but could also be confusing for consumers, especially in the area of functional foods. They are trying to combat advertising of foods that are claiming or alluding to be functional foods, but without scientific evidence and approval. Discussed further in Chapter 6 are the findings that most companies in the food industry are very much aware of, respect and work with the various consumer organizations in order to create a trusted and quality reputation or image. However the consumer organizations are watchful for functional foods and their health claims to ensure consumer understanding and protection.

### **3.3 Consumer Behaviour and Food Choice**

In order to gain perspective on consumer behaviour a few theories of purchasing choice should be laid out. The simplest model is the Black Box Model (below, Figure 1) that displays the buyer as a black box in the middle, which remains somewhat of a mystery in terms of the cognitive processes that happen within. Thus if a change is made to one of the inputs, it may then

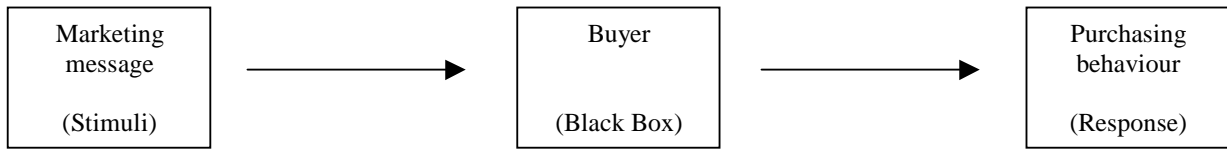
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<sup>22</sup> Svensson, Goran and Wood, Greg. *Proactive versus reactive business ethics performance: a conceptual framework of profile analysis and case illustrations*. Corporate Governance. Volume 4, Issue 2, 2004. P. 19.

<sup>23</sup> <http://www.konsumentverket.se>

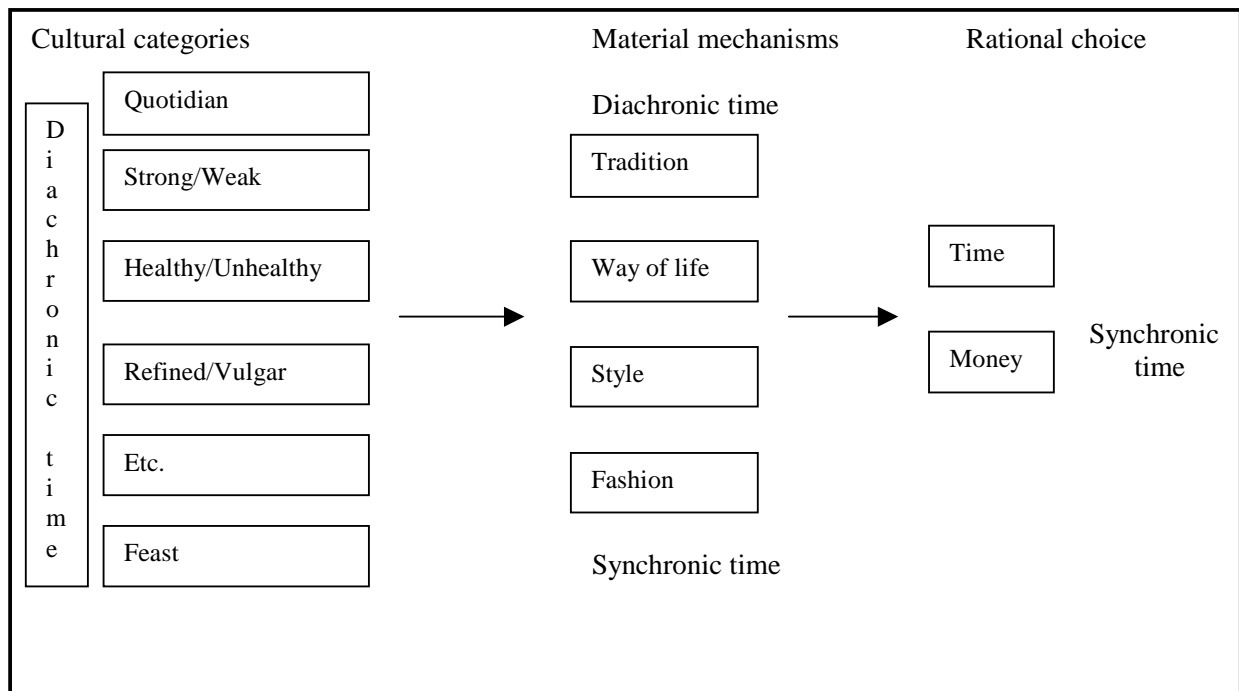


change the buyer's purchasing behaviour in the output. However the limitations with this simple model are that it does not explain or predict the purchasing behaviour, it simply paints a general picture of the beginnings of consumer behaviour.



**Figure 3 The Black Box Model**

Another, yet more complete and complex model of consumer behaviour in relation to food choice is Ilmonen's Food Choice Process. Ilmonen suggests that there are three levels of choice concerning food. The first and most general level is the cultural categories (six sub-categories are given) of food. The second level contains four mechanisms materialising these categories. The last level is the actual choice that occurs according to a rational means ends scheme, where the relation between incomes, prices and time are the means and the cultural categories and their materialisation form the ends.<sup>24</sup>



**Figure 4 Ilmonen's diagram of the food choice process**

<sup>24</sup> Ilmonen, Kaj. *Food Choice in Modern Society*. Labour Institute for Economic Research. Helsinki, Finland. Bibl. Nutr. Dieta, Volume 45, P. 49. 1990.

The above Figure 4 displays Ilmonen's model of the food choice process that is fixed to time in a "complex way". In the first level, the cultural categories are determined to have a long duration and change very slowly over time. This process forms a diachronic time choice process, unlike the means used in the consumer's choice, which tend to be linked to a more synchronic time choice process. Ilmonen suggests that, "As the contour of tradition and the way of life change slowly, style and fashion change quite rapidly. They try to keep up with the times."<sup>25</sup>

As Ilmonen's model attempts to illustrate the food choice process through three different levels, Furst *ET. AL.* present a more conceptual model of the food choice process. Their study consisted of 29 interviews with adults about how they make grocery store food choice decisions while shopping and in other settings. They were asked what influenced their choices and data from these influences are now illustrated in the structure of their conceptual model shown above describing a single choice event (Figure 5).<sup>26</sup> The factors involved in food choice were grouped into three major components: life course, influences and personal system, with their relationship to one another creating a "pathway" (indicated by arrows) leading to the point of choice.

The first component, life course, is comprised of personal roles and the social, cultural and physical environments to which a person has been exposed. The second component is based on the idea that each person's life course generates a set of influences: ideals, personal factors, resources, social framework and food context. In turn these influences inform and shape people's personal systems, which is the last major component. The personal systems component includes conscious value negotiations and unconsciously 'operationalised' strategies that may occur in a food-related choice situation.<sup>27</sup>

The model's funnel shape illustrates several attributes of the food choice process. First, a single food choice event results from the mixing and separating of the diverse set of personal and environmental inputs. The life course, a major ingredient in the process, gives rise to and shapes the influences that emerge in a food choice situation as well as the manner and extent to which the social and physical settings affect how people construct and execute personal systems of food choice. The value negotiation process within such a personal system is very dynamic, while strategies are more routine. Finally, the boundaries between components and processes are highly

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<sup>25</sup> Ibid.

<sup>26</sup> Ibid. P.247.

<sup>27</sup> Ibid. P. 250.

permeable, and much mutual shaping occurs between and within components.<sup>28</sup>

In general consumers typically use price as an indicator of quality, especially if they are not very knowledgeable about the product category. Functional foods happen to be a product category that is fairly unknown to the mainstream consumer, however price is not necessarily the main issue at hand for these products. The non-monetary influences on consumer behaviour and decision-making include perceived risk and time.

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<sup>28</sup> Ibid. P. 251.

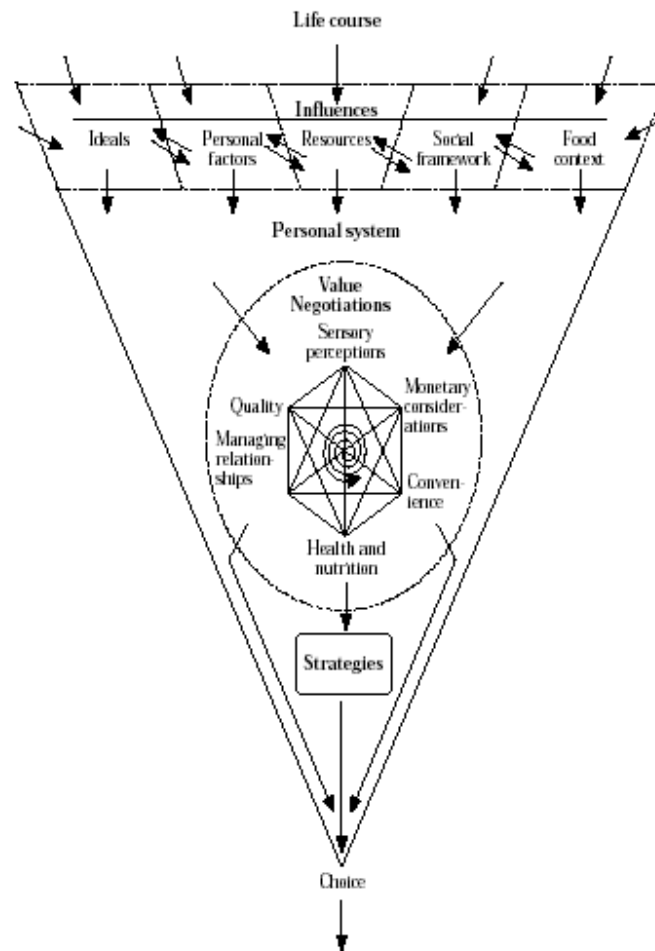
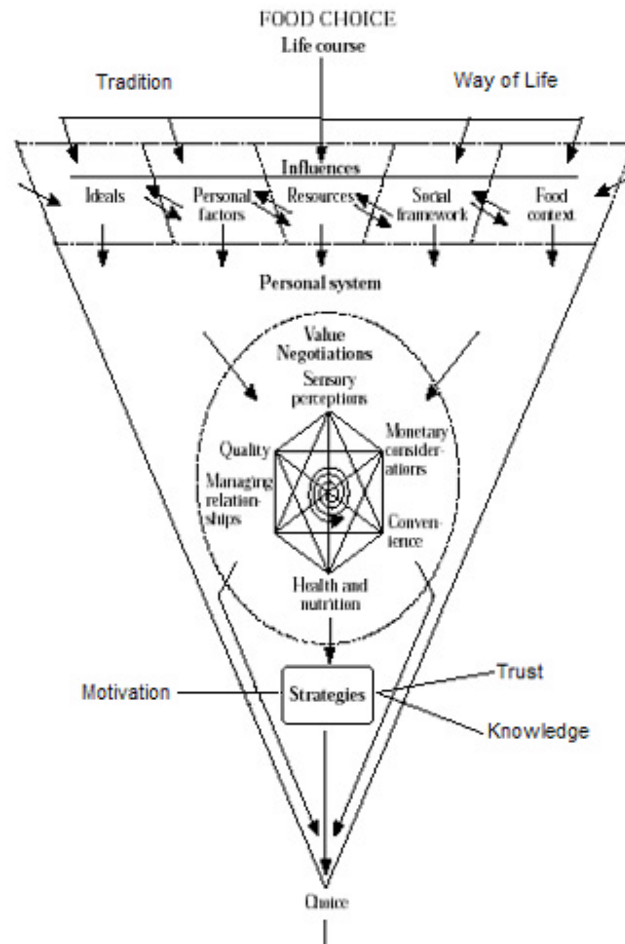


Figure 5 A conceptual model of the components in the food choice process<sup>29</sup>

### 3.3.1 Consumer Behaviour Framework: Furst Modified

Figure 6, shown below, is a modified version of Furst's *ET. AL.* conceptual model of the components in the food choice process (original is shown in Figure 5). The modified version contains a few elements of Ilmonen's diagram of the food choice process (shown in Figure 4) and also a few elements that are derived from the empirical studies (from the EUFIC, Svederberg and An Interview with ICA). The modified version of the model captures a more complete picture of consumer behaviour in terms of food choice and especially functional food choice. To compliment the model Ilmonen's 'Tradition' and 'Way of Life' and 'Time' (shown as a part of convenience in



**Figure 6 Modified conceptual model of the components in the food choice process**

Furst's model) mechanisms, and knowledge, trust and motivation are added from the empirical studies of Svederberg and the EUFIC.

Ilmonen's 'Tradition' mechanism of food choice "is the oldest of the mechanisms transforming the cultural categories into concrete food choices concerning both content and form."<sup>30</sup> The traditions in food habits and choice are ingrained in the mind over a lifetime and therefore are resistant to change. The second Ilmonen mechanism added to the figure is 'Way of Life', which depicts the role food plays in our everyday lives. Ilmonen states, "Ways of life can be differentiated from each other according to the importance food plays within them."<sup>31</sup> Over a 'life course' one's 'tradition' and 'ways of life' have certain influences that impact food choice.

<sup>29</sup> Furst, Tanis; *ET AL. Food Choice: A Conceptual Model of the Process*. *Appetite*. Volume 26, P. 251. 1996.

<sup>30</sup> Ilmonen, Kaj. *Food Choice in Modern Society*. Labour Institute for Economic Research. Helsinki, Finland. *Bibl. Nutr. Dieta*, Volume 45, P. 36. 1990.

<sup>31</sup> *Ibid.* P.40.

The influences in the modified model remain unchanged from the original in that ideals, personal factors, resources, social framework, and food context all serve as a central part in one's traditions, ways of life and their overall life course. These influences in turn reflect on one's personal system, which contains two major parts: value negotiations and strategies. The value negotiations include sensory perceptions, monetary considerations, convenience, health and nutrition, managing relationships and quality. Furst *ET. AL.* describes value negotiations as, "Values are contrasted with each other and juggled according to their significance for a particular food choice."<sup>32</sup>

Furst's *ET. AL.* value negotiations are also supported by other studies of food choice from Eva Svederberg, the EUFIC studies and An Interview with ICA (all discussed in Chapter 6). The two studies and interview recognise the importance of these value negotiations within the mind of the consumer when making food choices. The EUFIC reports their *Pan-European Survey of Consumer Attitudes to Food, Nutrition and Health* found that the top five influences on food choice in the old 15 European Member States are quality/freshness (74%), price (43%), taste (38%), trying to eat healthy (32%) and what my family wants to eat (29%).<sup>33</sup> For example, Svederberg's research (described further in Chapter 6) found participants characterised by groups 1 and 2 expressed that family diet and health concerns are a major force in food choice, which is also supported by the value negotiation of managing relationships and sensory perceptions.

Consumers are managing their relationships by adjusting their eating habits to that of their families', due mainly to health issues or taste. Svederberg's participants in group 4 also expressed that new or healthier foods may be better for their family, however if they don't like the taste the food gets thrown out.<sup>34</sup> Baltas and D'Souza's study also supports the importance of taste by stating, "Moreover, the results have revealed an explicit trade-off between the nutrition and taste aspects of specific product attributes."<sup>35</sup> Confirmation that just because a product is nutritious does not make it palatable enough for families to trade in their old eating habits.

Other components of value negotiations that are shared with other studies are monetary considerations and convenience. Ilmonen's diagram of the food choice process (shown in figure

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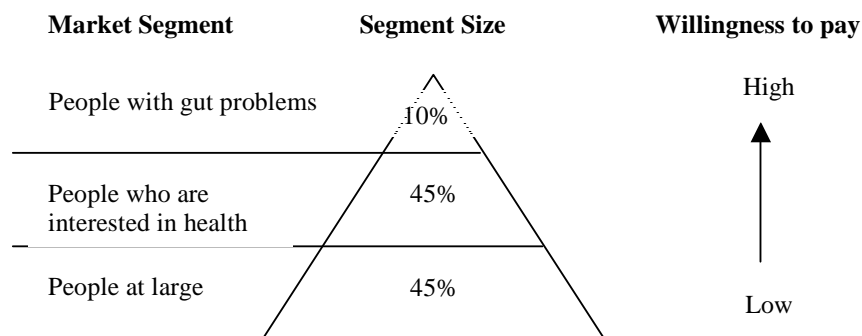
<sup>32</sup> Furst, Tanis; *ET AL. Food Choice: A Conceptual Model of the Process.* Appetite. Volume 26, P. 257. 1996.

<sup>33</sup> Bellisle, France. *The Determinants of Food Choice.* EUFIC Review, Number 17, P. 4. April 2005.

<sup>34</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages.* Pedagogical Reports 21, Lund University. Sweden. 2003. Pp. 24-25.

<sup>35</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 58, 2001.

4) also highlights that in the end a rational choice must be made concerning food and the two factors influencing this are time and money. Monetary negotiations are very important especially with functional foods for example. Many consumers may be concerned with their health, however changing their eating habits in the end depends largely on the cost. A doctoral thesis by Cecilia Mark-Herbert from Uppsala University on functional foods found that, “People at large are not interested in consuming an expensive product unless it is tasty and provides a perceived added value.”<sup>36</sup>



**Figure 6 Marketing strategy, illustrating different consumer segments’ expected willingness to pay for functional foods with added value<sup>37</sup>**

Figure 6 above is also from Mark-Herbert’s doctoral thesis, it suggests that the market that is willing to pay more for functional foods consists of some people who are interested in health and those with gut problems. Therefore the consumers’ consideration of money and or price of a product are a dominating factor.

The next overlap between models can be seen in Ilmonen’s time aspect and Furst’s *ET. AL.* convenience aspect. Although there are other aspects of convenience, time is central, and as Ilmonen states, “Time sets the limits for looking for food.”<sup>38</sup> Especially under stress consumers tend to purchase the products that they are familiar with, regardless of their nutritional or health value. The EUFIC, “...suggest that if work stress is prolonged or frequent, then adverse dietary changes could result, increasing the possibility of weight gain and consequently cardiovascular risk.”<sup>39</sup> Consequently time and convenience are not factors that can be influenced by food labels, it is only an internal value negotiation process.

<sup>36</sup> Mark-Herbert, Cecilia. *Functional Foods for Added Value: Developing and marketing a new product category*. Swedish University of Agricultural Sciences, Uppsala, Sweden. P. 83. 2002.

<sup>37</sup> Ibid. P. 84.

<sup>38</sup> Ilmonen, Kaj. *Food Choice in Modern Society*. Labour Institute for Economic Research. Helsinki, Finland. *Bibl. Nutr. Dieta*, Volume 45, P. 47. 1990.

<sup>39</sup> Bellisle, France. *The Determinants of Food Choice*. *EUFIC Review*, Number 17, April 2005. P. 3.

Since there was also much overlap between studies, the last aspect of value negotiations to highlight is health and nutrition. Furst *ET. AL.* describes this aspect as incorporating "...factors relating to disease avoidance or control, weight control and bodily well-being."<sup>40</sup> Three out of five of Svederberg's groups of participants were concerned about their health and preventing disease for themselves and their families. The EUFIC supports this value by stating, "Consumers want nutrition to be a part of their daily lives."<sup>41</sup> Consumers proclaim that they want nutrition to be a part of their lives and that they feel it is important, however do consumers simply think that it is something they should do instead of a genuine want? After value negotiations take place, a strategy is then forming in order to make the final food choice.

The second component of the personal system, strategies, has been modified to include motivation, knowledge and trust. Furst *ET. AL.* says of their participants that, "Strategies tended to be generally stable while allowing for flexibility."<sup>42</sup> The EUFIC suggests that much more work needs to be done in order to make a nutrition label "a useful tool for consumers" as well as to motivate the consumer to take the time to read the label.<sup>43</sup> Svederberg also found motivation to read labels and to change traditional eating habits is lacking, especially for group 5, which have a traditional view of eating habits and emphasised taste as a main determinant in food choice.<sup>44</sup> The next point added is knowledge, where a lack of nutrition knowledge among consumers is common and most accept their lack of knowledge and continue their old eating habits and avoid labels they do not understand.<sup>45</sup> The EUFIC states that, "The research suggested that the label confronts the consumer with everything they find difficult and negative about nutrition."<sup>46</sup> For that reason, understanding and positively influencing consumer behaviour in relation to functional foods is challenging.

### 3.3.2 Trends for Food Choice

Trends for food choice now and in the future are mainly a blending of three factors:

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<sup>40</sup> Furst, Tanis; *ET AL. Food Choice: A Conceptual Model of the Process.* Appetite. Volume 26, P. 258. 1996.

<sup>41</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, P. 4. February 2005.

<sup>42</sup> Furst, Tanis; *ET AL. Food Choice: A Conceptual Model of the Process.* Appetite. Volume 26, P. 260. 1996.

<sup>43</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, P. 4. February 2005.

<sup>44</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages.* Pedagogical Reports 21, Lund University. Sweden. 2003. Pp. 25-26.

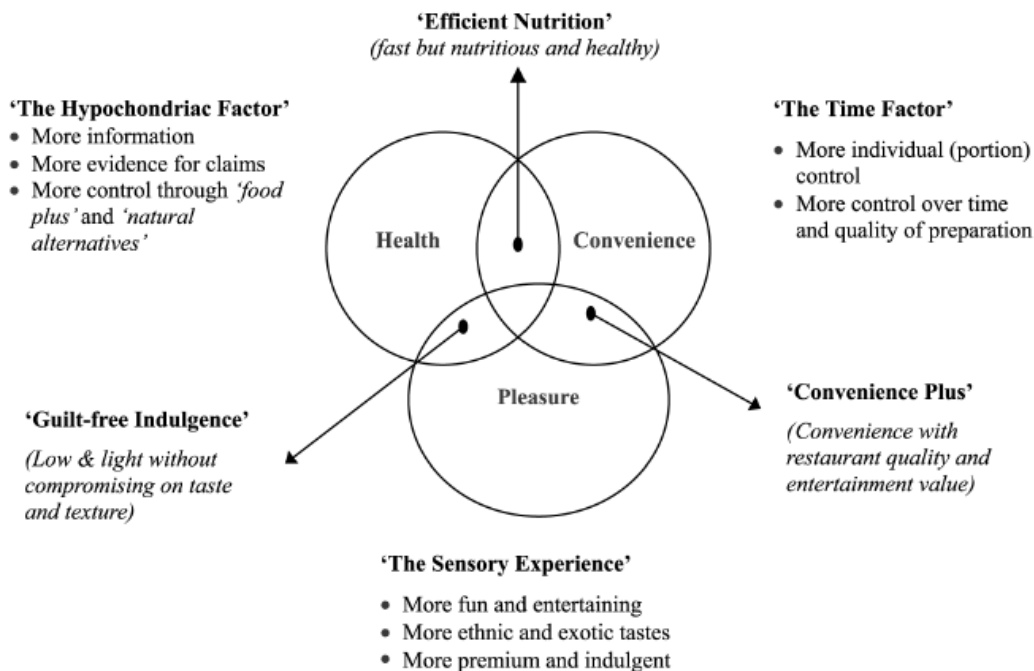
<sup>45</sup> *Ibid.* P. 39.

<sup>46</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, P. 3. February 2005.



health, convenience and pleasure. These elements are a part of Furst's conceptual model (shown in Figure 5), however Figure 7 (shown below) illustrates the main food choice trends that are shaping the food industry found by Gray *ET. AL.* in 2003. Gray *ET. AL.* provide trends that are slightly different from the elements in the Furst model.

For example, the blending of health and convenience denotes 'efficient nutrition' and thus the combination of the two elements (also shown in the Furst model) better express a current trend in consumer behaviour for food choice. 'Convenience plus', derived from the convenience and pleasure elements, illustrates the development of the food industry in that convenience foods today envelop more quality and entertainment value than in the past. Lastly, 'guilt-free indulgence' further demonstrates the development within the food industry showing that healthier products now have great taste and texture than the alternative healthy foods of the past.



**Figure 7 Main food choice trends shaping the food industry of the twenty-first century<sup>47</sup>**

The elements shown above in Figure 7 show the current and future trends for the twenty-first century. These trends are the key elements for understanding consumer behaviour today and also sheds light on consumer behaviour in regards to functional food. Gray *ET. AL.* state that,

<sup>47</sup> Reuters Business Insight (2000) in Gray, J. *ET. AL. Opportunities and constraints in the functional food market.* Journal of Nutrition and Food Science. Volume 33, Number 5, P. 215. 2003.

“Changing consumer attitudes will inevitably determine the longevity of the functional food phenomenon.”<sup>48</sup> The next section will review consumer behaviour in relation to functional foods today.

### 3.3.3 Consumer Behaviour and Functional Foods

Consumer behaviour in the area of functional foods is currently under-researched. However functional foods is seen as sustainable trend in the food market, especially with the enhanced interest of consumers in nutrition and health aspects as well as the ageing society (also known as the baby boomers), which may increase the demand for such products.<sup>49</sup> These trends were also supported by Gray *ET. AL.*, shown below in Figure 8, as well as the implications of these trends.

Consumer trends	Implications
Ageing population	Increased life expectancy
Demand on health services	Increased economic burden
Awareness of diet/health relationship	Increased demand for healthier foods
Proactive about health	Increased interest in products that may reduce the symptoms of ageing
	Increased demand for products which will prevent disease
Sources: Adapted from Goldberg (1994); Rebuk <i>et al.</i> (1995); ADA (1998) and Promar International (2000)	

**Figure 8 Key consumer trends driving demand for functional food<sup>50</sup>**

Even though there are trends driving the demand for functional foods, it does not mean that the food market is without challenges. One of the main challenges for functional foods, as mentioned previously, is the lack of consumer knowledge about the meaning of the term functional foods as well as the effects of specific ingredients. Klaus Menrad, of the Fraunhofer Institute for Systems and Innovation Research, writes:

In the United Kingdom, France and Germany, up to 75% of the consumers have not heard the term “Functional Food”, but more than 50% of them agree to fortify functional ingredients in specific food products. Thereby the acceptance to a specific functional ingredient is linked to the consumers knowledge of the health effects of specific ingredients.”<sup>51</sup>

Thus the biggest challenge for companies to persuade consumer behaviour in relation to functional foods is the knowledge barrier.

<sup>48</sup> Ibid.

<sup>49</sup> Menrad, Klaus. *Market and marketing of functional food in Europe*. Journal of Food Engineering, Volume 56, P. 185. 2003.

<sup>50</sup> Reuters Business Insight (2000) in Gray, J. *ET. AL. Opportunities and constraints in the functional food market*. Journal of Nutrition and Food Science. Volume 33, Number 5, P. 216. 2003.

<sup>51</sup> Ibid.

Another issue identified among consumer behaviour is the price premia for functional food products. Menrad reports that consumers are only willing to pay a limited price premia for such products, unless they have for example a serious stomach condition. Menrad states that, “In general, price premia of 30-50% are observed in high volume Functional Food segments like functional dairy products or ACE<sup>52</sup> drinks.”<sup>53</sup> An empirical study conducted last year by Patrik Löfving involving five Swedish consumer focus groups, found that important factors for adopting or rejecting a functional food product were: perceived health benefit, taste, price, sugar content, fat content, durability, availability, knowledge and in-store placement.<sup>54</sup>

Another study conducted by Frank *ET. AL.* found that:

...the connection between knowledge about health with actual behaviour they came to the conclusion that the general knowledge about health was good but the main problem was motivation when it came to acceptance and purchase of functional food.<sup>55</sup>

Consequently motivation is not only an issue for food in general but especially for functional foods, mainly due to a lack of knowledge. It is known that consumers have a growing interest in their health and nutrition, however this interest is only the beginning and the interest has not yet motivated the majority to change their eating habits.

## 4. Food Law

Almost no government is without policy, laws, and regulations on food, which affect everything from public health to education to the economy. These policies and laws dictate how food is described, labelled, and preserved. Thus everything from the nutritional labelling, health claims and marketing messages, and even symbols placed on the packaging are typically all government-regulated aspects of the food industry.

The legal market environment tends to create a moral approbation, condemnation or certain practices that influences the regulatory activities when introducing legislation. When new (stricter) legislation is introduced moral controversies can occur, especially the important moral consideration on use of advertising on kids. On this point, as well as other related points, consumer organisations everywhere are placing great pressure on the food law and policy makers

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<sup>52</sup> ACE was created in 1994 in Germany as a functional food drink, which is fortified with antioxidant vitamins A, C and E.

<sup>53</sup> Reuters Business Insight (2000) in Gray, J. *ET. AL. Opportunities and constraints in the functional food market.* Journal of Nutrition and Food Science. Volume 33, Number 5, P. 186. 2003.

<sup>54</sup> Löfving, Patrik. Confectionary with Functional Ingredients- What does the Swedish Consumer Say? Lunds Universitet, Department of Business Administration. P. 60. 04 February 2005.

<sup>55</sup> Frank, J. *ET. AL. Functional Foods God hälsa – igår, idag, imorgon?* P. 87. 2001.

in order to ensure that consumers' rights are protected and that an ethical marketing message is being communicated.

From a consumer knowledge perspective there is an information gap when it comes to reading and understanding the nutritional labels, symbols and health or nutritional claims on food packages. In a recent report from the European Food Information Council, a nutritional expert advised, "Nutrition is a science... and consumers are not scientists." Consistently industry studies have shown that most consumers do not know what these labels, symbols and messages mean for their diet as a whole.

Concerning the area of functional food law, Japan has led the world, being the first country to have a legally accepted definition of functional foods. Starting in 1991, Japan established the concept of Foods for Specified Health Use (FOSHU). The Minister of Health and Welfare must approve foods that are identified as FOSHU after the submission of comprehensive science-based evidence to support the claim for the foods when they are consumed as part of an ordinary diet.<sup>56</sup>

#### **4.1 EC Law**

From the European level, there are currently two directives on food labelling<sup>57</sup> and nutritional labelling<sup>58</sup>, existing case law, and a handful of corresponding Treaty articles. There is no current EU legislation harmonizing the labelling and testing requirements of functional foods, thus there is a conflict concerning the various national legislation on this matter. Most consider functional food to be positioned somewhere between food and pharmaceuticals, a "transitional zone".<sup>59</sup> Within Europe functional foods tend to be regulated by separate institutions and are thus subject to different regulation regimes. In turn a kind of "grey zone" emerges producing a high level of uncertainty between industry player and consumers alike.<sup>60</sup> However, a recently proposed regulation on nutrition and health claims made on foods is in the final stages of revision before it will be adopted by all member states of the European Union, which should bring about a much clearer "grey zone".

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<sup>56</sup> *The Basics: Functional Foods*. EUFIC Online, 2003. P. 2.

<sup>57</sup> Directive 2000/13/EC of the European Parliament and of the Council, Relating to the labelling, presentation and advertising of foodstuffs. OJ L109, P.29 of 06/05/2000.

<sup>58</sup> Council Directive 90/496/EEC on Nutrition labelling of foodstuffs. OJ L276, P. 40 of 06/10/1990.

<sup>59</sup> Menrad, Klaus. *Market and marketing of functional food in Europe*. Journal of Food Engineering, Volume 56, P.186. 2003.

<sup>60</sup> Menrad, Klaus. *Market and marketing of functional food in Europe*. Journal of Food Engineering, Volume 56,

#### 4.1.1 The Treaty's Principals

One cannot begin to discuss further the details of EC law concerning nutrition and health claim labelling until the basic principals of the Treaty Establishing the European Community (from here on EC Treaty), mainly Articles 2 and 3, are understood. Authors Steiner and Woods describe Articles 2 and 3 best, stating:

They (Articles 2 and 3) do not themselves impose specific legal obligations on the Member States. The detailed obligations are spelled out in specific provisions in subsequent parts of the treaty. Articles 2 and 3 nonetheless have interpretive value; they may be used to clarify the scope of the more precise treaty provisions.<sup>61</sup>

Therefore if there is a question of clarity of other EC Treaty provisions, then typically Articles 2 and 3 can be referenced for this purpose. One can observe as they become familiar with EC case law, that references to Articles 2 and 3 are used frequently to support arguments of the various parties.

Article 2 of the EC Treaty sets up the expectations for the Community and clearly states:

The Community shall have as its task, by establishing a common market and a economic and monetary union and by implementing common policies or activities referred to in Articles 3 and 4, to promote throughout the Community a harmonious, balanced and sustainable development of economic activities, a high level of protection and improvement of the quality of the environment, the raising of the standard of living and quality of life, and economic and social cohesion and solidarity among Member States.<sup>62</sup>

Thus Article 2 of the EC Treaty explains the common tasks for all Member States in order to achieve a smooth functioning common market and community.

The EC Treaty continues in Article 3 by elaborating on the specific activities to fulfil the tasks that are outlined in Article 2. The activities listed in Article 3 are lettered from (a) to (u), and cover everything from the prohibition of customs duties (letter a) to creating measures in the spheres of energy, civil protection and tourism (letter u). The activities relevant to this research concerning nutrition labelling would be:

- (a) the prohibition, as between Member States, of customs duties and quantitative restrictions on the import and export of goods, and of all other measures having equivalent effect;
- (b) a common commercial policy;
- (c) an internal market characterised by the abolition, as between Member States, of obstacles

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P.186. 2003.

<sup>61</sup> Steiner, Josephine and Lorna Woods. Textbook on EC Law. Eighth Edition. Oxford University Press, 2003. P. 42.

<sup>62</sup> Consolidated Version of the Treaty Establishing the European Community. Official Journal of the European Communities, OJ C325/40. 2002.

- to the free movement of goods, persons, services and capital;
- (g) a system ensuring that competition in the internal market is not distorted;
- (h) the approximation of the laws of Member States to the extent required for the functioning of the common market;
- (m) the strengthening of the competitiveness of Community industry;
- (p) a contribution to the attainment of a high level of health protection; and
- (t) a contribution to the strengthening of consumer protection<sup>63</sup>

All of the parts to Article 3 have additional corresponding EC Treaty Articles; Article 3(t) is regulated further in the EC Treaty in Article 153, which is discussed below in more detail.

#### **4.1.2 The Treaty, Secondary Legislation and Consumer Protection**

Article 153 of the EC Treaty establishes consumer protection. The Article states:

In order to promote the interests of consumers and to ensure a high level of consumer protection, the Community shall contribute to protecting the health, safety and economic interests of consumer, as well as to promoting their right to information, education and to organise themselves in order to safeguard their interests.

Given the stated EC Treaty article, the European Parliament and the Council of the European Union have also approved Directives to support the protection of consumers. Directive 2000/13/EC on the labelling, presentation and advertising of foodstuffs, clearly states in paragraph 6 of the preamble that, “The prime consideration for any rules on the labelling of foodstuffs should be the need to inform and protect the consumer.” The Parliament and Council of the European Community recognise and are working towards better consumer protection in the area of food labelling.

The preamble of this Directive continues in paragraph 8 to state not only the importance of consumer protection, but voices the relationship between this and free trade within the internal market.

Detailed labelling, in particular giving the exact nature and characteristics of the product which enables the consumer to make his choice in full knowledge of the facts, is the most appropriate since it creates fewest obstacles to free trade.<sup>64</sup>

Thus not only are law makers conscious of the issues of consumer protection, they are also balancing the proper functioning of the internal market mainly free trade, more formally known

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<sup>63</sup> Ibid. C325/40-41.

<sup>64</sup> Directive 2000/13/EC of the European Parliament and of the Council, Relating to the labelling, presentation and advertising of foodstuffs. OJ L109, P.29 of 06/05/2000.

as the Free Movement of Goods.

### **4.1.3 The Treaty and Free Movement of Goods**

The Free Movement of Goods is one of the four free movement rights protected under Community Policies established by the EC Treaty. The Free Movement of Goods are covered under Articles 23 to 31 of the EC Treaty, where Article 23 lays the groundwork by stating:

The Community shall be based upon a customs union which shall cover all trade in goods and which shall involve the prohibition between Member States of customs duties on imports and exports and of all charges having equivalent effect, and the adoption of a common customs tariff in their relations with third countries.

Thus the internal common market should be free of any restrictions on trade, both imports and exports. The EC Treaty continues further in Articles 28 to 30 to describe the types of restrictions that are prohibited between Member States. Articles 28 and 29 state, “Quantitative restrictions on imports (Article 28) and exports (Article 29), and all measures having equivalent effect shall be prohibited between Member States.” Article 30 provides derogations or justifications for these types of restrictions, yet does state that, “Such prohibitions or restrictions shall not, however, constitute a means of arbitrary discrimination or a disguised restriction on trade between Member States.” The derogation most important in the area of nutrition and health claim labelling is the protection of public health.

In order to succeed in claiming a justification on grounds of protection of public health, it is necessary to prove a real health risk, which is very difficult to prove. Usually this justification fails on account of either the principle of proportionality or because it constitutes “arbitrary discrimination or a disguised restriction on trade between Member States”<sup>65</sup>. Under the principle of proportionality, a measure is “justified” if it is necessary, and not more than is necessary, to achieve the desired result (proportionality test). Thus the measure must be a proportional means to achieve an end.<sup>66</sup>

#### **4.1.3.1 Relevant Case Law**

In the Netherlands an early case law example took place involving the free movement of goods and attempting a justification on grounds of public health, was the Case 174/82 of criminal proceedings against Sandoz BV.<sup>67</sup> Sandoz BV sold and delivered in the Netherlands commercial

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<sup>65</sup> Consolidated Version of the Treaty Establishing the European Community. Official Journal of the European Communities, OJ C325/47. 2002.

<sup>66</sup> [http://europa.eu.int/comm/justice\\_home/glossary/glossary\\_p\\_en.htm](http://europa.eu.int/comm/justice_home/glossary/glossary_p_en.htm)

<sup>67</sup> Judgment of the Court (Fifth Chamber) of 14 July 1983 in Case C-174/82: Criminal proceedings against Sandoz

goods for human consumption without authorisation from the responsible minister for food and beverages, to which vitamins had been added. The products had been lawfully marketed and sold in other Member States, however the Netherlands claimed justification on grounds of protection of public health. The European Court of Justice (from hereon the Court) found that there was no way to scientifically prove that the added vitamins were harmful to public health. The Court also prohibited national rules that require authorisation and proof that the marketing of the product in question meets a market demand.

Another example of case law involving the free movement of goods is the Commission versus France Case 24/00, which also encompasses an attempt at justifying on grounds of public health and consumer protection. The case concerned the French government hindering the marketing without establishing that their marketing poses a risk to public health of energy drinks with added vitamins, minerals, amino acids and other nitrogenous compounds. Since the French government did not prove such a risk to public health exists the Court declared in paragraph 76 of the judgement that:

...by failing to provide for a simplified procedure for having included on the national list of authorised nutrients those added to foodstuffs for daily consumption and foodstuffs intended for particular nutritional uses which are lawfully manufactured and/or marketed in other Member States...

Thus, the Court decided that the French national rules were not proportional to achieve the end desired and said that the French Republic had failed to fulfil its obligations under Article 28 of the EC Treaty.

Due to the absence of harmonisation at the European level on the matter of nutritional labelling, companies within the member states may have their free movement of goods rights infringed by reason of differing national rules. Currently the issue of nutritional labelling is up to the member states to decide the right policy for their state, according to the EC Treaty and other EU Directives that have been set forth. The lack of harmonisation has caused inefficiencies in the functioning of the internal market due to the hindrance on the free movement of goods.

#### **4.1.4 Current Directives**

Currently there are detailed rules on labelling (Directive 2000/13/EC) and nutritional labelling (Council Directive 90/496/EEC) of foods by the European Community. By the very nature of a directive, these rules are not harmonised, since each member state can choose how to

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BV. Arrondissementsrechtbank's - Hertogenbosch - Netherlands. European Court Reports 1983, P. 02445.



implement these rules. In addition some specific claims in the labelling of food was not included in these Directives.

Directive 2000/13/EC is on the approximation of the laws of the Member States relating to the labelling, presentation and advertising of foodstuffs. In the second and third paragraphs of the preamble the Directive states the reasons for adopting this Directive:

(2) Differences between the laws, regulations and administrative provisions of the Member States on the labelling of foodstuffs may impede the free circulation of these products and can lead to unequal conditions of competition.

(3) Therefore, approximation of these laws would contribute to the smooth functioning of the internal market.<sup>68</sup>

Also as mentioned above, paragraph 6 of the preamble also notes the importance of properly informing and protecting the consumer.

The Directive sets detailed rules on the exact labelling, presentation and advertising of foodstuffs; everything from the name of the product to the instructions for preparation of the food is given. Article 2 states the labelling and methods used must not: mislead the purchaser to a material degree as to the characteristics of the foodstuff, attributing to the foodstuff effects or properties which it does not possess, suggesting that the foodstuff possesses special characteristics when in fact all similar foodstuffs possess such characteristics, or attribute to any foodstuff the property of preventing, treating or curing a human disease, or refer to such properties.<sup>69</sup>

Article 18 paragraph 1 ensures compliance of these rules and avoids some conflicts with the differing national provisions by stating that lack of harmonisation is not a justification for non-compliance:

Member States may not forbid trade in foodstuffs which comply with the rules laid down in this Directive by the application of non-harmonised national provisions governing the labelling and presentation of certain foodstuffs or of foodstuffs in general.<sup>70</sup>

The only justifications for Article 18 paragraph 1 not to apply for non-harmonised national provisions is on grounds of: protection of public health, prevention of fraud and the protection of industrial and commercial property rights, indications of provenance, registered designations of origin and prevention of unfair competition (listed in paragraph 2).

Council Directive 90/496/EEC relates to nutrition labelling for foodstuffs, and recognises

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<sup>68</sup> Directive 2000/13/EC of the European Parliament and of the Council, Relating to the labelling, presentation and advertising of foodstuffs. OJ L109, P.29 of 06/05/2000.

<sup>69</sup> Ibid. P.30.

in the preamble the reasons for such a Directive:

Whereas there is growing public interest in the relationship between diet and health and in the choice of an appropriate diet to suit individual needs;

Whereas the Council and the Representatives of the Governments of the Member States meeting within the Council, in their resolution of 7 July 1986 on the European programme against cancer, considered the improvement of nutrition to be a priority;

Whereas knowledge of the basic principles of nutrition and appropriate nutrition labelling of foodstuffs would contribute significantly towards enabling the consumer to make this choice...<sup>71</sup>

Thus the representatives of the European Community are seriously concerned about the standard of nutrition labelling mainly for the sake of consumer protection and well being.

The Council Directive defines nutrition labelling as, "...any information appearing on labelling and relating to: energy value..." and a certain list of nutrients.<sup>72</sup> Thus it is only a nutrition claim if it represents, advertises, suggests or implies nutrition properties due to the energy or calorific value it provides and only those claims pertaining to energy shall be permitted. The Council Directive lays out the details of nutrition labelling from the nutrients contained and how they are to be listed as well as the proper calculation of the amount of energy within. However the Council Directive is limited to the fact that it only includes nutrition claims and not health claims as well. Currently there is a proposed Regulation that would cover nutrition and health claims within the European Community that would significantly change food labelling standards in many Member States (if not all).

#### **4.1.5 Proposed Regulation**

In contrast to Directives, Regulations, as stated by the EC Treaty in Article 249, "...shall have general application. It shall be binding in its entirety and directly applicable in all Member States." Meaning Member States are not allowed to choose a method of implementation (as with Directives); they only have a limited implementation time period in which to make the specified changes required by the Regulation. Thus the new Regulation 2003/0165 (COD) proposed, which is currently in its final stages before adoption, will require many Member States and food companies to change their policies and methods of labelling foods.

At first glance the current proposed Regulation seems to already be in line with many Member States' food policies stating:

The proposed rules would contribute to a high level of protection of human health and promote the protection of consumer interests by ensuring that foods bearing nutrition and health claims are labelled

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<sup>70</sup> Ibid. P.36.

<sup>71</sup> Council Directive 90/496/EEC on Nutrition labelling of foodstuffs. OJ L276, P. 40 of 06/10/1990.

<sup>72</sup> Ibid. P. 41.

and advertised in an adequate and clear manner allowing consumers to make informed choices.<sup>73</sup>

However, as one reads further into the Regulation and the official discussion paper, one will find they are suggesting that “pre-marketing approval” or “notification procedure” will be necessary to test the appropriateness of the claims and to decrease the number of disputes at the national and European Community levels. A suggested approach mentioned is to “compile a list of approved claims for each nutrient or substance and possibly their specific wording”, with the help of the “future” European Food Authority.<sup>74</sup> One Member State, Sweden, is taking steps to ease the transitional burden, once the new Regulation is passed.

## **4.2 Swedish Food Law**

In Sweden, currently there are no regulations concerning the nutrition and health claim labelling of food products (only guidelines). Swedish consumer organisations have voiced their concerns about the legal grey area in Sweden on this issue of nutrition and health claim labelling. The legal grey area in Sweden refers both to the labelling and marketing of food products and the credibility of its content. To make matters more complicated, there is only a self-regulating organisation that is monitoring these issues with foods and functional foods, not the government itself. Studies have shown that consumers place more trust in either experts (or doctors) or the government itself, thus in order to convey a clear and trusted message, functional food product legislation should be handled at the highest level.<sup>75</sup> If the pending EU regulation about functional food standard for labelling it a functional food passes (and other related information disclosure requirements), Sweden will have to make some adjustments to its legal position on functional foods, and many products will have to be retested, etc.

### **4.2.1 Health Claims Guidelines**

The EUFIC has noticed and given praise to Sweden in particular for establishing initiatives “in order to facilitate the use of health claims, including the adoption of guidelines and codes of practice in the various Member States of the EU, including Sweden”<sup>76</sup>. These guidelines and codes of practice are laid out for nutrient function claims, generic reduction of disease risk

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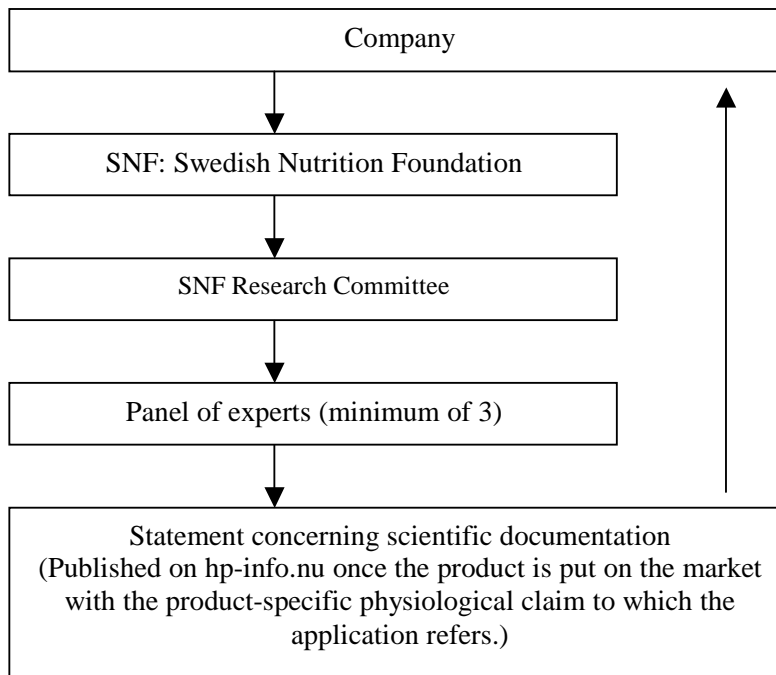
<sup>73</sup> Proposal for a Regulation of the European Parliament and of the Council on nutrition and health claims made on foods. Presented by the Commission of the European Union, 2003. P. 10.

<sup>74</sup> Discussion Paper on Nutrition Claims and Functional Claims. Prepared by Directorate General Health and Consumer Protection of the European Commission, 2001. P.10.

[http://europa.eu.int/comm/dgs/health\\_consumer/index\\_en.htm](http://europa.eu.int/comm/dgs/health_consumer/index_en.htm)

<sup>75</sup> Confirmed by: Grunert 2002, EUFIC 2004, Bellisle 2005 and Bareham 1995.

claims, and product-specific physiological claims (PFP) and examples of statements and labelling are given. All three types of claims must have scientific documentation, which is especially true for and stricter with the latter two types. Shown below in Figure 9 is an example of the Swedish process of evaluation of the scientific documentation of PFP claims. The process is quite thorough and is trusted by the majority of Swedish consumers.



**Figure 9** General model for processing of applications for product-specific physiological claims.<sup>77</sup>

#### 4.2.2 Keyhole Label and other Symbols

Taking Sweden's food industry as an example, one of the symbols widely recognised for designating healthier foods is the keyhole symbol.

When the labelling was introduced, the idea was to make it easier for consumers to choose low-fat and high-fibre alternatives within certain specific product groups where they may find it difficult to find the more nutritious alternatives, but where the fat content could vary considerably.<sup>78</sup>



Therefore it seems that the Swedish keyhole symbol has been successful in communicating a message of healthier food choices, and is respected by

<sup>77</sup> *Foods*. EUFIC Online, 2003. P. 2.

<sup>78</sup> Health Claims in the Labelling and Marketing of Food Products: The Food Sector's Code of Practice. Swedish Nutrition Foundation; Lund, Sweden. 2004.

<sup>78</sup> Swedish National Food Administration's administrative provisions on the use of a particular symbol. 2004

most consumers and industry players. The standards for the keyhole symbol have been revised in anticipation for the adoption of the EU proposal on nutritional and health claims, which is to take full effect (at the latest) by the end of the first half of 2006. Even though the keyhole symbol has strict standards for products who bear the mark, most consumers do not know specifically what it stands for. Most consumers only recognise the keyhole symbol as a mark of a generally healthy product choice compared to competitors.<sup>79</sup> The Swedish National Food Administration recognises that if the proposed EU Regulation is passed then a transitional period will be necessary for the food products that do not meet their labelling criteria (which is even different from the newly revised keyhole guidelines).

Another Swedish symbol of health is the KRAV label, standing for organic foods. Just as with the keyhole symbol, the KRAV label is also very trusted among consumers. So who may use the KRAV-label?



The KRAV-label is a registered brand, thus only the companies that have signed a contract with KRAV and is authorised by KRAV may use the name KRAV or the KRAV-label on a product. KRAV states that their label shall always be accompanied by the name of the producer, never alone. Producers, distributors and processors who wish to use the KRAV label (a registered trade mark) must be certified by KRAV and must have entered into a contract with KRAV. Companies and organisations, which are not members of KRAV or certified by KRAV must have previous acceptance in writing from KRAV before using the KRAV label or logo. The KRAV logo is a clear signal that the product is organically produced but does not say anything about the quality or healthiness, this must be guaranteed by the producer.<sup>80</sup>

### **4.3 UK Food Law**

In the UK it is the Food Standards Agency (FSA) who regulates and enforces food law and labelling, especially concerning nutrition and health claim labelling. In comparison with Swedish food law, the UK food laws, medicinal claims or claims of curing any human disease by a food products are prohibited. Due to past EC Regulations and Directives, Sweden and the UK do have similar basic principles when it comes to the labelling of food; however there are some differences that begin to appear in the area of symbols for nutrition and health claim labelling.

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<sup>79</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages*. Pedagogical Reports 21, Lund University. Sweden. 2003. P. 46.

### 4.3.1 UK Labelling Statutes

The Food Labelling Regulations 40 and 41 of Statutory Instrument 1996 No. 1499 states that any nutrition claim of food must be capable of fulfilling the claim, and the food must be marked or labelled with an indication of the particular aspects of its composition or manufacturing process that give the food its particular nutritional characteristics.<sup>81</sup> The Statute also states that claims on food products should not mislead the consumer in any way, just as in the EC Directives and Swedish guidelines. Statutes and other legislation listed on the government website of the UK pertaining to food was consistent in stating which, how and when various EC Directives and Regulations on food were implemented into UK national legislation.

### 4.3.2 Traffic Light Symbols

Just as in Sweden, the FSA in the UK would like to respond to consumers' needs and growing concerns with their health by also creating a symbol labelling system on food products. The FSA is currently undertaking a series of consumer research projects that test people's understanding of and preferences for a range of labelling concepts. There are three concepts that are now being tested: the simple traffic light which provides an overall (colour coded) rating for the food as a whole, with descriptive wording; multiple traffic lights with a separate high, medium or low rating (and corresponding green, amber or red colour coding) for each of fat, saturated fat, salt and sugar; GDA-based concept with colour coding that indicates the amount of fat, saturated fat, salt and sugar provided per serving, together with the GDA for each nutrient; accompanied by colours to indicate whether the content of each nutrient in the food is high, medium or low.<sup>82</sup>



Multiple traffic light label 1



Simple traffic light label 1

Shown above are two of the labelling options now being tested by the FSA. Although it

<sup>80</sup> <http://www.krav.se/english.asp?id=10&tab=english&option=label>

<sup>81</sup> Statutory Instrument 1996 No. 1499 Regulations 40 and 41. The Stationery Office Limited. Crown Copyright 1996. [http://www.legislation.hmso.gov.uk/si/si1996/Uksi\\_19961499\\_en\\_1.htm](http://www.legislation.hmso.gov.uk/si/si1996/Uksi_19961499_en_1.htm)

<sup>82</sup> <http://www.food.gov.uk/news/newsarchive/2005/mar/signpostconsult>

seems it is an easy labelling system for the consumers to understand, it does have negative connotations that may not be received well by food producers and consumers. The UK's leading retailer Tesco released news in April of this year disagreeing with the effectiveness of the traffic light system by stating:

Tesco was the first retailer to propose clearer front of pack labelling, opting initially to trial a 'traffic light' system. Subsequent research with customers over the last twelve months has shown that this system was too simplistic, for example, customers did not know how to treat amber and could not relate the system to daily consumption. Feedback also showed traffic lights could mislead customers by creating 'red foods' such as many dairy items, which in fact provide important nutrients like calcium.<sup>83</sup>

These are all fairly new developments; yet research shows that consumers are more in favour of labelling that is informative yet positive.<sup>84</sup> Consumers with diabetes for example, mentioned not wanting to be negatively reminded of their disease on food labels. Future developments in the UK for this traffic light labelling system will be interesting to follow.

#### **4.4 Codex Alimentarius International Guidelines**

The Codex Alimentarius is a single international reference point concerning food code for consumers, food producers and processors, national food control authorities and international food trade. Members of the Codex Alimentarius who have adopted the Codex General Guidelines include some 172 countries from all over the world.<sup>85</sup> The Codex Alimentarius gives countries the opportunity to join an international community in "formulating and harmonizing food standards and ensuring their global implementation."<sup>86</sup> They have a well-rooted reputation as being an international reference, and their General Guidelines, as a food code is known for its credibility and being the benchmark of food standards worldwide.

The Codex Alimentarius present General Guidelines that were adopted in 1985 (revised in 1991) at the international level. The Codex's General Guidelines are based on two principles. Firstly, no food should be described or presented in a manner that is false, misleading or deceptive, or that is likely to create an erroneous impression regarding its character in any respect; secondly, the person marketing the food should be able to justify the claim made. The Guidelines also describe those claims that should be prohibited, such as: claims that cannot be substantiated, claims implying that a balanced diet or ordinary foods cannot supply adequate

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<sup>83</sup> <http://www.tesco.com/corporateinfo/>

<sup>84</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages*. Pedagogical Reports 21, Lund University. Sweden. 2003. P. 19.

<sup>85</sup> <http://www.codexalimentarius.net/web/members.jsp?lang=EN>

amounts of all nutrients, and claims as to the suitability of a food for use in prevention, treatment or cure of a human disease.<sup>87</sup>

The main purposes of the Codex Guidelines are: to ensure that labelling is effective, that nutrition labelling does not describe a product or present information about it which is in any way false, misleading, deceptive or insignificant in any manner, and to ensure that no nutritional claims are made without nutritional labelling.<sup>88</sup>

The Codex Alimentarius website within the pages “About Us” state that creating a food code and such standards that is credible is a multidisciplinary task which is complex to say the least.

Creating standard that at once protect consumers, ensure fair practices in the sale of food and facilitate trade is a process that involves specialists in numerous food-related scientific disciplines, together with consumers’ organisations, production and processing industries, food control administrators and traders.

More recently in 1997, Codex Alimentarius has provided definitions for “nutrient content claim”, “comparative claim” and “nutrient function claim” and has adopted Guidelines for the use of nutritional claims and the conditions warranting these claims.

## **5. Conceptual framework: An integration of theories and problems**

This research brings together the three main actors in the food industry, consumers, food-producing companies and food law and other legal instruments. It is very difficult to talk about one and without including at least aspects of the other two. Within the area of food labelling, particularly nutrition and health claims, it is essential that reflections be made concerning the relationship and influence of all three actors as a whole and between one another.

I created Figure 10 below to present the relational positioning of the three main actors in the food industry, and is modified from Figure 1 to better illustrate the communication process between them. The Figure is a continuous cycle of information and communication between the three actors. Beginning at the top the policy makers adopt a new law or policy concerning the labelling of food. The food producing companies must adopt these measures and make changes to

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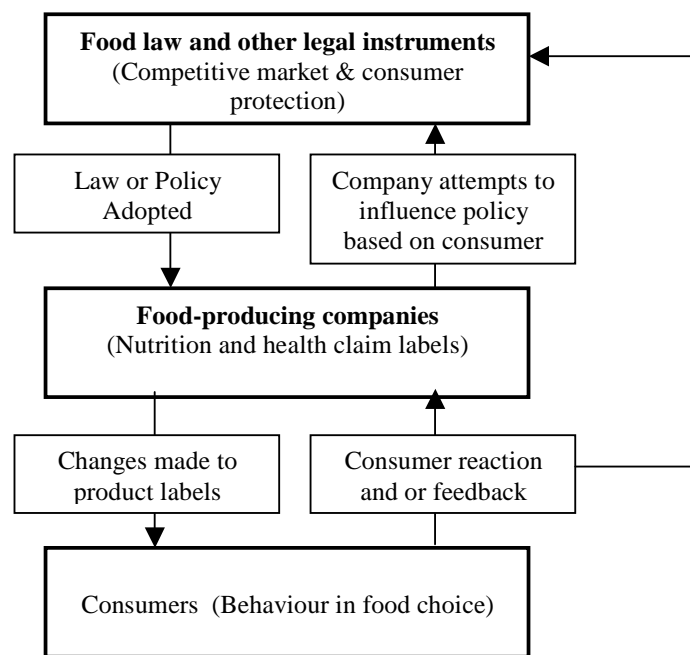
<sup>86</sup> [http://www.fao.org/documents/show\\_cdr.asp?url\\_file=//docrep/w9114e/W9114e01.htm](http://www.fao.org/documents/show_cdr.asp?url_file=//docrep/w9114e/W9114e01.htm)

<sup>87</sup> Proposal for a Regulation of the European Parliament and of the Council on nutrition and health claims made on foods. Presented by the Commission of the European Union, 2003. P. 3.

<sup>88</sup> Codex Guidelines on Nutrition Labelling. CAC/GL 2-1985 (Rev. 1-1993) [17].  
<http://www.fao.org/DOCREP/005/Y2770E/y2770e06.htm>.



their labels as needed. The product is then presented to the consumer for purchase, and the consumer's reactions and or behaviour in food choice is the key factor in influencing change and communication on the previous two levels of actors. The consumers' level of understanding of the labels and with their decision to purchase or not, to send complaints or not and such patterns are then analysed by the food producing companies as well as the law and policy makers. Food producing companies, based on the data received from consumers will then attempt to influence law and policy makers and authorities in order to sell more of their products.



**Figure 10 Relational positioning of research areas modified**

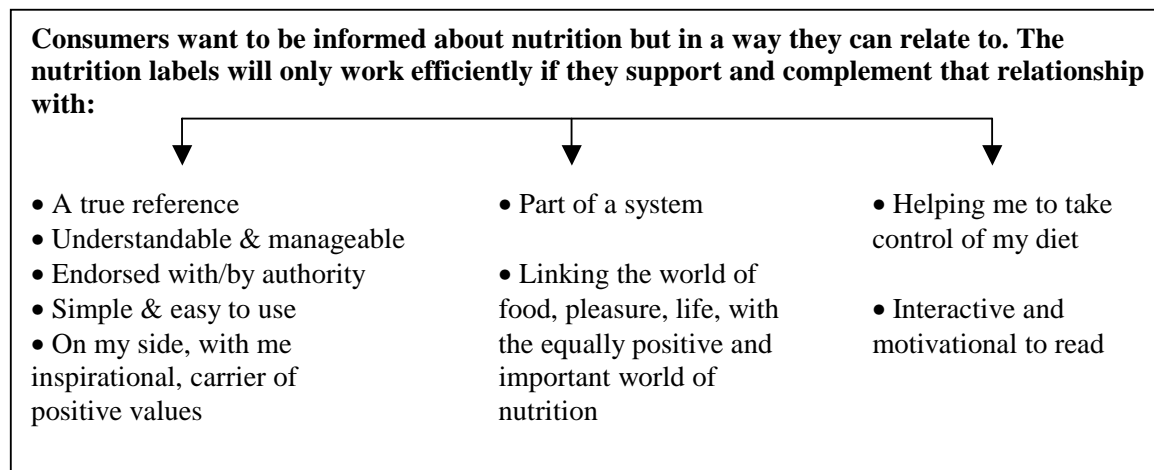
Each actor has different motivators and incentives they wish to achieve throughout this continuous communication process. Beginning at the top once more, the goal of food law and legal instruments is to inform and protect the consumer as well as insure a smoothly functioning internal market. The food producing companies' goal is to sell more products, maintain their brand image, and take care of their stakeholders. The consumers, on the contrary, are seeking food products of quality, reasonable price, good taste and healthy for them and their families. The conflicts of interest between the three groups are vast and complicated.

Given the complicated relationship between these three groups, Baltas and D'Souza's study (discussed in Chapter 3.2.1) has shown that companies are trying to use the legal

framework they are given as an opportunity for their products.<sup>89</sup> Stricter laws regarding labelling do require that companies change their labelling as necessary, however these changes can serve as an opportunity for marketing the product as giving clearer information, quality being self-evident, highlighting nutritional value or possible health improvements. Most successful companies are strictly adhering to new legislation, making the changes necessary and finding ways to use them to their advantage.

## 6. Empirical study

The European Food Information Council (here after the EFIC) recently conducted consumer research on nutrition information and food labelling in May and June of 2004. The key



**Figure 11 Consumers' requests for nutrition labels<sup>90</sup>**

challenges recognised for the current nutritional labels were the topics of little authority, little understanding and little motivation. The EFIC also suggests that the following elements need to be addressed: concise, clear and readable labels, stronger status of authority, and that the role of the nutrition label must be "activated" as an access point to help with the consumers' diet.<sup>91</sup>

### 6.1 Consumers' Views Regarding Health Claims

A recent study conducted by Eva Svederberg, on consumers' views regarding health claims on two food packages was carried out in Sweden on consumers aged 25 to 64. The study

<sup>89</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 61, 2001.

<sup>90</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, February 2005. P. 4.

<sup>91</sup> *Ibid.* P. 3.

consisted of individual semi-structured interviews concerning consumers' thinking about nutrition claims and health claims found on a package of margarine and a loaf of bread, both sold in Sweden. The analysis aimed at categorising how various types of food-related experiences affect their thinking about such texts.<sup>92</sup>

The analysis of this study focused on the participants' judgements of the texts on the two food packages, being their understanding of the concepts and expressions used and their judgement of the credibility of these concepts and expressions. As the two main parts of the analysis are understanding and credibility, the judgements given by participants during interviews were then formed in five basic categories of description, which are listed below in Table 3. These categories describe the whole-characteristics of the participating consumers' thinking about statements on health-conducive properties on the packages of the two food products included in the study.

- |   |
|---|
| <ol style="list-style-type: none"><li>1. Their thinking is based on their own and their family's health situation in the long term.</li><li>2. Their thinking is based on their own and the family's present health situation.</li><li>3. Their thinking is based on care for environmental issues locally and globally and care for their own health in relation to such issues.</li><li>4. Their thinking is based on ambivalence between traditional eating habits and care for health.</li><li>5. Their thinking is based on a traditional view of eating habits, where the taste of food which they are used to is emphasised.</li></ol> |
|---|

**Table 2 Whole-characteristics of how food-related experiences were expressed in the participants' thinking about nutrition claims and health claims on two functional food packages.<sup>93</sup>**

The study showed patterns between the five different whole-characteristic categories of participants. Participants belonging to the first category directed their thoughts about the two food products from a health point of view, where their view of which food products to choose for the promotion of health in the long run formed an entity. These participants' confidence in their own judgements was prominent.

Participants' judgements of the two products within the second category are that if the conceptualised meaning of nutrition claims and health claims are in line with their own health problems and needs. Since most participants in this category either have health problems or their family members do, thus they make food choices based on easing these problems. However they are general positive towards these products.

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<sup>92</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages*. Pedagogical Reports 21, Lund University. Sweden. 2003. P. 3.

<sup>93</sup> Ibid. P. 14.

Participants in the third category are described as a group of consumers who consider environmental reasons in their choices of food products, as well as for reasons of health. These participants are found to make conscious decisions about food products based on the list of ingredients, which should contain environmentally friendly and natural ingredients. Many mentioned that a single healthy food product should form part of a healthy lifestyle in general to promote health.

Participants whose thinking is based on ambivalence between traditional eating habits and care for health, considered the two food products to be wholesome. An obstacle, which characterised their thinking in relation to the nutrition claims and health claims on the packages of both products, were the absence of subjective symptoms used as excuses. Another obstacle was their difficulty to find a place for food products like these in their traditional eating habits.<sup>94</sup>

Participants in the fifth category have a traditional view of eating habits and emphasised taste as a main determinant in food choice. They are satisfied with their current eating habits and have difficulties sparking interest in the claims found on the two food packages during the interview. When introduced with new products with added nutritional value, these consumers focused on the possible taste as being most important. They also suggested that a possibility to taste the new product would be ideal before they could make a purchasing decision about the food product.

In summary, participants in categories 1 to 3 were found to express an eagerness to learn the meaning of concepts and expressions used. Many also searched for clarifications on the packages. In contrast, the participants that had traditional views of eating habits (categories 4 and 5) mostly accepted their lack of understanding of the concepts and shifted their concern to palatability. However all participants thought that most of the concepts found in the texts on the packages difficult to understand.

One interesting result of the study was the link between credibility of health claims and understanding of concepts found on the products. If participants did not understand the concepts in the text on the package, the credibility of the whole text was questioned. Some of the participants that did not understand the texts thought that such texts are simply for sales promotion, and therefore avoid purchasing these types of products. This lack of understanding creates a large barrier for food companies with nutrition and health claims on their products.

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<sup>94</sup> Ibid. P. 26.

## **6.2 An Interview with ICA**

The purpose of conducting an interview with a company in the food industry was to gain a better understanding of the challenges facing them today in the area of food labelling. The interview conducted was with ICA AB, which is Sweden's largest food retailer and one of the largest in the Nordic region as well. The ICA group has more than 40,000 employees and operates about 3,000 stores in Scandinavia and the Baltic countries. I was more than delighted when they promptly agreed to participate in my research, by scheduling an interview. The interview took place over the telephone to their headquarters in Stockholm with Christina Karlsson, one of ICA's dieticians and she also works within the health relations department.

One of the first questions asked was, as a retailer, how important or not is labelling in the success factor of your private label products? Karlsson answered with a definite yes, and that it is especially true with new products, such as ICA's new line of food products called "Gott Liv" (meaning Good Life in English). The target market for this new line is mainly families with children. The Gott Liv line, she explained, is comprised of products that are eaten often. Like with functional foods the labelling for this product line is very important, she explains, the Gott Liv labels are on front of the package that are shaped like dots. There are 5 different colours of dots that represent nutrition facts such as, calorie per portion, fat, salt, sugar and fibre.

Karlsson stated that ICA's pre-product launch studies have shown that consumers do not like too much information on the packages, they find it confusing, thus only the most important factors for that product are on the dot-like label (they never use more than 3 dot labels). Consumers recognise that there are different issues with different products as far as health is concerned. Karlsson listed examples such as cereals which usually contain added sugar thus with Gott Liv products cereals that are low in sugar and have healthy levels of fibre are labelled. Other examples given were jam and yoghurt with added sugar and with ham slices its fat content.

Karlsson said that the dot-like labels for the Gott Liv line would always have same colour of dot for the same nutrition factors. With new Gott Liv products being introduced every week, this will make it easier for the consumer to recognise the dot labels easier. She reinforced with an example of ketchup, that it does not take much sugar for a product to taste good, and that consumers just need to be more aware. ICA's goal she said is for their consumers to appreciate less sugar and salt in the product's taste. However she is aware that it is a process to change consumers' opinion of healthy foods, and maybe in the future the less sugar and salty products

will become the norm instead of the healthy option.

Karlsson reported that ICA is doing their best to encourage more healthy eating habits amongst their consumers. She listed examples such as labels to help the consumer with measuring portion sizes or serving sizes, for example products use decilitres, spoons and slices to describe the correct portion size. Karlsson confidently reported that ICA is up-to-date on all new legislation and proposed legislation, and that the necessary changes have been made to ease the adoption of the new proposed EU Regulation.

I mentioned to Karlsson that I saw a health report on the ICA website stating that for food allergies and intolerances ICA has devised a special committee to create positive and more clear labelling messages to the consumer. She mentioned that products that some consumers could be allergic to, the ingredients list is more detailed than other products to ensure that consumers are properly informed. ICA does not list negative warnings on their product labels but instead have more positive and clear statements about allergies.

My next question was, what problems arise when determining the best-fit label for a product in terms of communicating your marketing message clearly to the consumer? Karlsson stated that the quality assurance department is always checking and conducting consumer research and testing of the labels with consumers before they hit the shelves. She says that ICA strictly follows the Swedish Nutrition Foundation guidelines and the keyhole label to only those products that qualify for the symbol (but they try to get as many as they can for the keyhole symbol).

I asked Karlsson about the fact that most consumers do not know exactly what the keyhole symbol stands for, except that it's healthy, and is that ethical or should consumers know more? She answered with a simple, "...that's all they need to know of the keyhole that it's healthier in general don't need to know exact criteria." Karlsson stressed that at this point, ICA is happy if consumers recognise that keyhole products are healthier and purchase them instead of the unhealthier alternatives.

I was also curious that as a retailer, do consumer organisations have an influence on the supply and labelling of your products? Karlsson said that ICA definitely listens to the consumers and consumer organisations and takes their suggestions, comments, compliments, and complaints into account. She assures again that quality assurance in the factories is strict, and the ingredients list is longer at ICA (compared to the competition) to be thorough. She also said that ICA AB

works everyday side by side on these issues and have customer hotline and e-mail, and that most feedback is actually praise. Karlsson said that all of the praise that ICA receives is an inspiration to keep doing her job to the best of her ability.

I mentioned to her that I heard the new line of ICA Gott Liv products are being introduced now into the market, and it will be interesting to see their rate of success among consumers and if consumers will understand the labels and the meaning of these product labels. She said that since consumers don't have much time to thoroughly read labels, so symbols are a better form of communication. Without prompting Karlsson remarked on the UK's new traffic light labelling system saying that the system is discouraging to consumers, and that Tesco is banning traffic light system. In my own research later I found that Tesco did ban products with the traffic light symbols and opted for their own system, which is similar to ICA's Gott Liv line.

The interview came to a close with a short discussion of the responsibility of a retailer in terms of influencing consumers to make the right nutritious food choices. Karlsson said that as retailer you can inspire consumers, and communicate a positive message, which is always better than to point fingers at consumers with a red light for example (referring to the UK's traffic light labelling system). She mentioned that ICA has a magazine that contains health suggestions and inspiration that are available in their stores for free.

Karlsson was encouraged by the positive sales of the Gott Liv line, which sales are rising already with little promotion. She again enforced that the taste must be good; it is the key for families especially. Karlsson ended the conversation with, "A carrot isn't nutritious until you eat it." Meaning that a retailer can provide healthy products and a consumer can have good intentions, but these products are not nutritious until they are eaten.

## **7. Analysis and discussion**

This chapter analyses and compares patterns within the various empirical studies, both primary and secondary. The studies support the link between the consumer, business and legal communities and suggest possible methods for meeting the challenges they face in the area of nutrition and health claim labelling of food.

### **7.1 Consumers and Companies**

It is true today that many consumers are more aware of their health and interested in nutrition and how this will affect their health. However most consumers are unsure or confused

when it comes to applying this interest in nutrition to their daily eating habits. Not only do most consumers lack knowledge in the area of nutrition, they also have been found to have an "optimistic bias" when it comes to their own diet. The EUFIC reports that, "There is a low level of perceived need among European populations to alter their eating habits for health reasons, 71% surveyed believing that their diets are already adequately healthy."<sup>95</sup>

Thus these participants have traditional eating habits that they feel are sufficient enough to provide the nutrients that they need. The EUFIC suggests that in order for the 71% of the participants to change their eating behaviour, they first need to change their attitudes about their diet. They state, "Thus, a perceived need to undertake change is a fundamental requirement for initiating dietary change."<sup>96</sup> For consumers who do not know how to make use of nutrition information, there is a need for marketing campaigns that place nutritious products into situations of daily living and eating habits to make this transition easier for consumers.

Even though consumers today are more conscious of their health, know that their health is affected by what they eat and are attempting to apply this knowledge yet it seems their purchasing actions tell a slightly different story. There have been studies conducted in where they ask consumers their impression of products, their intention to purchase products and what would make them purchase a product. Nevertheless in reality sales do not necessarily correlate with the results found in these types of studies.

For example, mentioned above was a survey by Warde in 1997, which showed that consumers said that in the last year they tried to lessen their purchase of confectionary products. However general sales of confectionary for that last year had risen from the previous year, thus consumer intentions and perceptions are slightly altered from reality.<sup>97</sup> For this reason it is imperative that for food producing companies to understand consumer's purchasing decisions one must study the actual purchasing behaviour. In order to turn intentions into actions consumer behaviour must be researched to find the key motivators that create this transition in the consumers' minds. Product and marketing managers will need to capture these key motivators in their marketing campaigns to see possible changes in consumer purchasing behaviour.

Some of the key motivators or de-motivators that have been pointed out in studies from Svederberg 2002, EUFIC 2004, Bareham 1995, Bellise 2005 and more are: brand, traditional

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<sup>95</sup> Bellisle, France. *The Determinants of Food Choice*. EUFIC Review, Number 17, P. 4. April 2005.

<sup>96</sup> Ibid.

<sup>97</sup> Warde, Alan. *Consumption, Food & Taste*. SAGE Publications, London. 1997. P.81.



eating habits, producer or manufacturer, food regulations and organisations, credibility and perceived risk. These factors are not illustrated in the models that were introduced in Chapter 3, however the studies listed above have found these to be important factors in the motivation of a food purchasing decision. These factors could be captured in the nutrition and health claim labelling of their products, considering this is the most direct form of contact with the consumer.

Gray states:

In addition, given the powerful relationship that the multiple retailers have developed with food consumers they are likely to be a dominant force shaping the future acceptance of functional foods...As such, multiple retailers have become the arbiter of ethics and are, therefore, an important source of consumer confidence in and advice on food.<sup>98</sup>

Therefore, not only food producing companies but also food retailers play an important role in researching and motivating the purchasing behaviour of consumers. Karlsson from ICA AB also emphasised the importance of ethics and implementing all laws, in order to maintain consumer confidence in their ICA brand, other brands offered and their quality.

## **7.2 Sweden and UK Labelling Systems Compared**

Since legislation concerning nutrition and health claim labelling is not harmonised in the EU, there are many conflicts when food producing companies export their products to other Member States. This paper has introduced two systems of labelling in the EU, Sweden and the UK. In comparison with Swedish food law, the UK food laws, medicinal claims or claims of curing any human disease by a food products are prohibited. Due to past EC Regulations and Directives, Sweden and the UK do have similar basic principles when it comes to the labelling of food; however there are some differences that begin to appear in the area of symbols for nutrition and health claim labelling.

The Swedish rules on the use of symbols in their food labelling appear to be more established and successful in comparison to the UK. For example in Svederberg's study a couple of the participants stated that they have complete confidence in the Swedish food authorities, in that they would not allow food product labelling that was false or harmful to the consumers.<sup>99</sup> Whereas the UK is still experimenting with the best method of conveying a message of health to their consumers through the use of symbols and other labelling techniques, while for example the

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<sup>98</sup> Gray, J. *ET. AL. Opportunities and constraints in the functional food market*. Journal of Nutrition and Food Science. Volume 33, Number 5, P. 216. 2003.

<sup>99</sup> Svederberg, Eva. *Consumers' views regarding health claims on two food packages*. Pedagogical Reports 21, Lund University. Sweden. 2003. P. 17.

Swedish keyhole symbol is well established and trusted.

For that reason and although the UK has extensive legislation concerning the labelling of food products, whereas in Sweden it is a self-regulated system, the UK's legal system of labelling seems more difficult for food producing companies and retailers to put into practice. There appears to be more of collaboration in Sweden between the self-regulating food authority and the food producing companies and retailers. For example the FSA's traffic light symbol labelling system was banned by one of UK's largest food retailers, Tesco, due to negative consumer response. FSA in the future should attempt to collaborate with retailers and food producers in research to find the best solution and method of communicating a message of health to the consumers.

## **8. Conclusions**

This research involved the three main players in the food industry today, consumers, companies and legal instruments, and the relationship between them. As methods of food production become more complex, consumers are becoming more health educated and legal instruments more detailed, the need for harmonisation is strong. In order for these three players to better understand and compliment one another, first a harmonised legal system should be adopted.

### ***8.1 Harmonisation in a changing industry***

The complications of harmonising a legal system throughout Europe on an issue such as the nutrition and health claim labelling of food are great. However with the current proposed EU Regulation this complicated task may be realised. In the mean time, food producing companies must find ways to use their national laws and other international food guidelines to their advantage in order to communicate their labelling message to the consumer.

Baltas and D'Souza best describes the importance and aim of nutrition information and labelling for companies, saying:

Consumers pay increasing attention to their diet and to information appearing on food package labels and relating to the nutritional composition of the products. Nutrition information aims to enable informed consumer choices, raise the demand for healthy food products, and encourage competition on nutritional quality.<sup>100</sup>

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<sup>100</sup> Baltas, George and D'Souza, Giles. The Effects of Nutrition Information on Consumer Choice. Athens University of Economics and Business; Athens, Greece. Journal of Advertising Research. Volume 41, Issue 2, P. 58, 2001.

An Interview with ICA also shows that companies are now nudged into competing on nutritional quality and by encouraging their consumers to make healthy changes to their eating habits. The Codex Alimentarius Commission confirms that, “Food labelling is the primary means of communication between the producer and seller of food on one hand, and the purchaser and consumer of the other.”<sup>101</sup> Yet succeeding at labelling and in this new form of competition is easier said than done, considering that many consumers do not understand nutrition labels, claims and health claims.

Both the EFIC and report from Svederberg confirm that for a change in food choice to occur new products, and especially those with special health benefits, must be conceptualised as parts of ordinary meals and diets. Consumers respond better to a change in their diet if they can relate how it would complement their existing diet and also how to include these new products in every day meals.

Consumers want nutrition to be a part of their daily lives. Most importantly they need greater knowledge in order to make use of the nutrition label and to integrate this information into their daily dietary management. This is a true challenge for communicators and educators.”<sup>102</sup>

The EFIC recommends, “Campaigns that incorporate tailored advice that include practical solutions as well as environmental change are likely to succeed in facilitating dietary change.”<sup>103</sup> The EUFIC suggests improvements to nutrition labels be made, such as: do not list too much information; rank the information by importance; use clear references to link the information to their diet; make it “activating” and motivating; clear, standout and readable labels; consistency and uniformity across products; label design should be simple, attractive and well-structured, for example the same colour for the same nutrient, in order to be consistent and reduce confusion; label should be considered a “zone of trust and authority” with a clear sender, and accuracy should be beyond questioning; endorsed by a neutral, trustworthy official body (national or EU).<sup>104</sup>

A suggestion for future research is to study the actual food and functional food purchasing behaviour of consumers in relation to labels. That is to observe if the label or labels were read (on the front of the package, the back or both) and then possibly interview these consumers

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<sup>101</sup> Codex General Standard for the Labelling of Prepackaged Foods: Preface. Codex Alimentarius Commission, <http://www.fao.org/DOCREP/005/Y2770E/y2770e01.html>.

<sup>102</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June 2004. EUFIC Review, Number 2, P. 4. February 2005.

<sup>103</sup> Bellisle, France. *The Determinants of Food Choice*. EUFIC Review, Number 17, April 2005. P. 6.

<sup>104</sup> Nutrition Information and Food Labelling: Results of the EUFIC Consumer Research conducted in May - June

concerning their experience with the label and why or why not the product was placed in the basket for purchase.

Menrad's study affirms the EUFIC findings, especially for functional food, stating:

...targeted information activities to consumers and opinion leaders (like e.g. medical doctors, nutritional advisers) are regarded as crucial success factor for the marketing of Functional Food...successful information campaigns indicate that the message of the health effect of a specific product should be transferred relatively simple and easily to understand to the consumer. In addition, specialist terminology and medical details should be avoided in such campaigns.<sup>105</sup>

Since most people are unaware of or unfamiliar with the benefits of functional foods, the importance of education is the key. Educational messages about functional foods need to be in easy to understand terms, from consistent and credible sources.

In order to accomplish these tasks, both for functional food and food in general, harmonisation of laws at the highest level and collaboration between all three industry players needs to occur. There is a clear need for more open lines of communication between consumers, food producing companies and food authorities. Nutrition and health claim labelling play a large role in the food industry today, and with current trends as they are, it will continue to be in the future. The condition of this role will only improve if the three industry players work together to form more open communication, harmonised legislation and further research on ways of better communicating a clear and credible message of health to the public.

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<sup>105</sup> Menrad, Klaus. *Market and marketing of functional food in Europe*. Journal of Food Engineering, Volume 56, P.186. 2003.

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## Appendix 1

### Interview Guide and Notes for ICA

ICA AB  
Vallgatan 7  
170 85 Solna  
Sweden

**Date:** 11 May 2005  
**Time Duration:** 09:00-09:42  
**Method:** Telephone

**Thank you again for taking time out of your day to participate in my research. I'm not able to record this interview, however I will be typing your responses...  
May I have permission to use the ICA name and your name in reference to this interview in my research paper? Yes**

**Interviewee's name:** Christina Karlsson  
**Title of position:** dietician and health relations

**1. As a retailer, how important or not is labelling in the success factor of your private label products?**

Yes, especially new products Gott Liv, aiming at families and kids, eaten often products, labelling very important, ingredients, new products every week introduced, to make it easier for the consumer, help consumer with portion sizes/serving size, they use dl, spoons, slices, etc. to help

**2. Marketing, nutritional, health claims, etc. labelling?**

**3. I saw a health report on your website stating that for food allergies and intolerances ICA devised a special committee to create positive and more clear messages to the consumer. How long does it take to devise such a successful label, does it go through a process of approval through the company or another organisation (SNF)? And what about labels for other food product labels?**

Ingredients list is more detailed than other products, new legislation is implemented, no warnings, more positives, quality assurance to factories are strict, ingredients list is longer at ICA to be thorough, work everyday side by side on these issues

**4. What problems arise when determining the best-fit label for a product in terms of communicating your marketing message clearly to the consumer?**

Quality assurance department always checking, and SNF guidelines & keyhole strictly only those that apply, as many as they can, that's all they need to know of the keyhole that's it's healthier in general don't need to know exact criteria

**5. How much or what kind (if any) of legal and ethical considerations are a part of the labelling process? (Considering that most studies have shown that most consumers don't understand or simply misinterpret the nutrition labelling and health claims**

**that appear on food products.)**

- 6. Are these considerations considered a large barrier in labelling and successfully marketing and marketing or communicating a message to the consumer?**
- 7. How does Swedish law and food guidelines affect your labelling decisions? (Use of keyhole or KRAV symbols, etc.) Considering that over 800 ICA products have the keyhole symbol and sales on keyhole products rose 15%**
- 8. As a retailer, do consumer organisations have an influence on the supply and labelling of your products?**

Have customer hotline phone and e-mail, and most is praise, magazine has health suggestions and inspiration

- 9. As a retailer is it difficult to find quality suppliers that meet your labelling and quality standards for food? What are the criteria?**

- 10. Are you aware of the new proposed EU legislation that will significantly change the face of nutrition labelling and health claims in the food industry?**

**Examples of changes include: marketers being required to gain pre-approval for campaigns, etc. rules are much more strict.**

Consumers don't have much time so symbols are good, UK is discouraging to consumers, Tesco is banning traffic light system, not popular among retailer and food authorities

- 11. I heard the new line of ICA Gott Liv products are being introduced now into the market, it will be interesting to see their rate of success among consumers and if consumers will understand the meaning of these products.**

As retailer you can inspire consumer to have a positive message is always better than to point fingers at consumers, with a red light for example,

Gott Liv labels on front dots with diff colours, 5 diff, calorie per portion, fat, salt, sugar, fibre.

Never use more than 3, consumers said could be too much info, most important factors for that product go on, cereals, added sugar and fibre. Diff issues for diff products for jam its added sugar, yoghurt is also added sugar, ham slices fat, always have same colour for factors, sales are up already with little promo,

Consumers don't want too much info on front,

Taste must be good, for families especially, tested on consumer panels first before launched, not much sugar to taste good, ketchup example

Appreciate less sugar and salt product taste, it's a process to change consumers opinion of healthy foods, so then in the future these less sugar and salty products will become the norm instead of the healthy option

"A carrot isn't nutritious until you eat it"

## Appendix 2

### Svederberg's Methodology Details

**Table 1.** Each interview was divided into four parts.

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1. General views on information on food packages
  2. Views on the keyhole<sup>1</sup> and the KRAV<sup>2</sup>-symbols
  3. Views on nutrition claims, health claims and information on ingredients and nutrient value on the package of a margarine.
  4. Views on nutrition claims, health claims and information on ingredients and nutrient value on the package of a loaf of bread.
- 

**Table 2.** The following nutrition claims and health claims found on the package of a margarine and a loaf of bread, both sold in Sweden, were included in the study.

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*Statements on health-conducive properties and health claims on the margarine:*

- With Omega 3.
- A healthy balance between different fatty acids.
- A light mixture of cooking fats. Fat content 40%.
- Research shows that a low level of saturated fats has a favourable influence on cholesterol levels, and can thereby contribute to the prevention of coronary heart diseases. X has a low level of saturated fats, and also contains the oil Omega 3, of vital importance to health.

*Statements on health-conducive properties and health claims on the loaf of bread:*

- Palatable bread rich in the type of dietary fibre that might help you to lower cholesterol levels.
  - + Omega 3.
  - It is important to eat a sufficient amount of dietary fibre so as to keep your stomach in good trim. X is rich in wholesome dietary fibre from the wholemeal rye, oat bran and linseed.
  - Some soluble gel-forming types of dietary fibres found in both rye flour and oat bran can contribute to lowering the level of cholesterol in the blood. X contains plenty of fibres of this sort.
-

**Table 3.** The different steps in contextual analysis of interview data by means of Atlas.ti.

Atlas.ti	Point of departure, research objects and a broad outline of results		Contextual analysis
	The text on the package of a margarine	The text on the package of a bread	Point of departure
	Consumers' thinking about nutrition claims and health claims on the packages of the two food products		Research objects
Codes	Understanding and credibility		Main parts of the research objects
Code Families (8)	Understanding (6) <sup>2</sup> Barrier to understanding (9) Credibility (4) Barrier to credibility (4)	Understanding (6) Barrier to understanding (4) Credibility (5) Barrier to credibility (3)	Delimitation of meaning of main parts based on smaller parts
Networks at the individual level (Based on the code families, codes and quotations.)	Thinking about nutrition claims and health claims on the two food-packages in relation to participants' differing understanding of concepts and differing trust in statements.		Overall description at the individual level of participants' thinking
Category Families (5). (From the five categories of description.)	Five categories of description. Table 4.		Sorting of the overall descriptions at the individual level of the participants thinking as basis for categories of description
Codes and quotations in the Code Families (8) found in each of the Category Families (5)	For example that credibility tends to be related to the understanding of concepts used in the statements.		Delimitation of relations between and within parts, main parts and smaller parts. See above.
	Similarities and differences in the conceptualisation of the nutrition claims and health claims in the text on the margarine and the bread respectively.		Similarities and differences between the research objects