

Effects of a Low Information Food Product Label on Consumer Perception

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Introduction

The Keyhole (Figure 1) is a voluntary scheme for food producers, but products labelled with the symbol must conform to nutritional regulations in different food groups, helping consumers to choose food containing less fat, salt and sugar and more whole grain and fibre. The Keyhole has been used in the Nordic countries for 20 years but is new in Iceland.

Recent studies have found that although most consumers claim to know the label, actual consumer knowledge about the label's meaning is very limited (Sørensen et al., 2013). More importantly, recent studies have found that the Keyhole label increases product satisfaction, the probability of product choice and willingness to pay (Lassen et al., 2014; Onozake, Melbye & Hansen, 2014; Thunström & Nordström, 2015) without negative impact on perceived taste (Thunström & Nordström, 2015). However, studies suggest that the label does not affect consumer perceptions of product healthiness (Lassen et al., 2014; Orquin & Scholderer, 2015) and is not used by consumers to identify healthier product choices.

The aims of the study were to estimate consumer knowledge about the Keyhole label and evaluate the label's effect on consumer perceptions of four product attributes (Attractiveness, healthiness, naturalness and tastiness) in addition to willingness to pay.

Method

- The study used a random sample (n=379) of 18-80 years old Icelanders living in the capital area
- The study was of experimental design. Respondents evaluated four ready-to-heat fish product concepts via online survey; a baseline product, a product including an ingredient claim only, a product including a full health claim and a product labelled with the Keyhole. In addition, respondents answered questions regarding their knowledge about the Keyhole label.
- All product attributes were measured on a Likert scale, excluding an open question addressing willingness to pay.
- Results were analyzed with repeated-measures ANOVA

Table 1. Constructs associated with the Keyhole label by Icelandic consumers (respondents stated their level of agreement/disagreement to the statement 'products with this label are...' on a 7 pt. Likert scale)

Association	Mean
Healthier than comparable products	5.8
Environmentally friendly	5.3
Natural	5.3
Contain healthier fat than comparable products	5.1
Contain less salt than comparable products	5.1
Organic	4.3



Figure 1. The Keyhole label

References

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Results

- 82% of respondents stated that they recognized the label.
- Despite that 'Healthier than comparable products' was the label's strongest association, consumers also related the label strongly to aspects unrelated to the label's actual meaning such as naturalness and environmental friendliness. In fact, those associations were stronger than the label's actual meaning: contains healthier fat and/or less salt than the comparable products (Table 1).
- The Keyhole label increased stated willingness to pay of 8.5% on average. This effect was stronger than the effect of health claims (6.9%) and nutrition claims (5.0%) (Table 2).
- In addition, the label increased perceptions of product concept's naturalness, healthiness and attractiveness. Despite not being the label's actual meaning the increase in perceived naturalness was equally strong to the increase in perceived healthiness (Table 2).
- The label did not affect perceived tastiness (Table 2).

Table 2. Mean scores for the four ready-to-heat fish product concepts. All items on 7 pt. Likert scale, excluding willingness to pay, which is represented as a ratio of the baseline product.

Concept	Attractive to me	Healthy	Natural	Tasty	Willingness to pay
Baseline	3.4	4.6	4.3	4.1	1.000
Ingredient claim only	3.3	4.7	4.1	4.0	1.050
Health claims	3.4	4.7	4.1	4.0	1.069
Keyhole	3.6	4.9	4.6	4.1	1.085
F	12.546	5.062	19.191	2.822	38.453
p	.000	.003	.000	.050	.000

Conclusions

In agreement with previous studies, the results show a high consumer recognition of the Keyhole label but limited actual knowledge about the label's meaning.

Nevertheless, the label has a substantial effect on perceived attraction, healthiness, naturalness and willingness to pay.

In fact, results showed that the Keyhole was superior to health claims on every dimension.

Results suggest a good potential for the Keyhole label as an effective way for consumers to choose healthier products while simultaneously providing food product manufacturers ground for increased profits.

The substantial effect of the label despite limited actual knowledge about its meaning suggests that consumers think of and evaluate products on an unspecific, abstract and/or general level, or even implicitly assume labels' meanings.

Future studies should further investigate the underlying cognitive process of the label's strong, positive effects.