



## Health Claims in Food Products: Buyers Attitude and Behaviour in Indonesia

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**ABSTRACT:** This study explores the dynamics of health claims in food products and investigates the attitudes and behaviors of buyers in Indonesia. With a growing global trend towards healthier lifestyles, understanding consumer responses to health-related claims on food items is crucial. The research delves into the factors influencing buyer attitudes, examining the impact of demographic variables, socio-cultural nuances, and individual attitudes towards health claims. Through a combination of qualitative and quantitative methodologies, the study aims to unveil patterns in consumer decision-making processes and discern the extent to which health claims influence purchasing behaviors in the Indonesian market. By shedding light on the intricate interplay between health claims and consumer choices, this research contributes valuable insights for both the food industry and policymakers seeking to foster healthier dietary practices in Indonesia.

**KEYWORDS:** Attitude, Behavior, Food label, Marketing Health Claims.

### INTRODUCTION

In recent years, there has been a growing interest in the relationship between health claims on food products and consumer behaviour, particularly in Indonesia. This dynamic Southeast Asian country is experiencing significant shifts in consumer preferences and attitudes towards food products, partly driven by increasing health awareness and concerns. Health claims, which are statements on food packaging that suggest health benefits, have become a pivotal element in food marketing strategies. This study seeks to explore the intricate relationship between health claims on food products and the behaviour of Indonesian consumers. It aims to comprehensively understand how these claims influence consumers' purchasing decisions, dietary choices, and overall attitudes toward food products. This study can offer valuable insights into the dynamics of health-conscious consumerism in a diverse and rapidly evolving market.

A food label's primary function is to inform consumers and aid in the sale of the products. When consumers purchase food, information on the labels significantly impacts their purchases. This information is vast and varies depending on the product (Prinsloo, Van Der Merwe, Bosman, & Erasmus, 2012). Lifestyle has recently developed into an element that is significant and frequently used to describe how customers decide what to eat (MeiFang Chen, 2009). Someone's lifestyle is the pattern of one's life in the world, represented by activities, interests, and opinions (Kotler & Keller, 2009). Indonesia is the fourth most populous country globally, with more than 250 million. Based on self-reported survey data, the AIA Healthy Living Index calculates a composite score that accounts for people's level of health satisfaction and how frequently they engage in healthy behaviours, including regular exercise, eating a nutritious diet, getting enough sleep, and scheduling regular medical checkups. Indonesia is in the top five positions in South-East Asia. Indonesia also reported an increase in the overall satisfaction of health in 2018. The COVID-19 pandemic also changed individual motivation to become more health-conscious (Barak & Mudgil, 2023).

### PREVIOUS RESEARCH ON VARIABLES INFLUENCING HEALTH CLAIM

A person's ability to choose the type of food they want to consume can vary by several variables. Variables like individual characteristics, household, and the capacity for information processing and health valuation can contribute to someone's dietary preference and purchasing decision to consume foods. Consumer-related factors, such as health considerations, sensory factors, social interactions, familiarity and habit, psychographics, and demographics, and market-related factors, such as price and promotion, according to Sanlier (2010), are some factors that influence consumers' food choices.

Demographics are frequently included in consumer surveys to identify how to target and connect with different buyer categories and assist in accounting for preference differences. These metrics offer can lead to portraits of the consumers who make these



purchases (Dagevos, 2005; Maehle et al., 2015). According to Glanz et al., (1998), healthiness and price are the two major components of food purchasing behaviour. These two drivers play hand in hand in determining someone's behaviour on food purchasing decisions. The study of Bower, Saadat, and Whitten (2003) indicated that “healthy” and “high price” were the primary factors in people choosing to buy or choose not to buy a fat spread with health benefits. They claimed that the potential customer health benefits could drive up the cost of such products. Another study also observed a high correlation between high prices and organic food. Hill and Lynchenhaun (2002) fund that price signals indicate the quality and benefits of organic food items which consumer tend to perceive organic food as healthier than conventionally cultivated food.

According to Renahy et al., 2010, women are more active seekers than men regarding health. This comes from the studies that particularly examined gender as a factor in information-seeking activity. This also aligns with a study according to Rice (2006), which found that female is one of the strongest and most consistent predictors of health information seeking. Regarding these studies, gender will be examined for different behaviours toward health claims in food products.

### RESEARCH DESIGN

In the examination of buyers’ attitude and behaviour towards health claims in food products, this study falls under the purview of research methodology, which is crucial in revealing the patterns of consumer attitude and behaviours. This study adopts a quantitative approach to delve into the multifaceted landscape of consumers knowledge, perception, and perceived attitude toward health claims in the scope of food marketing.

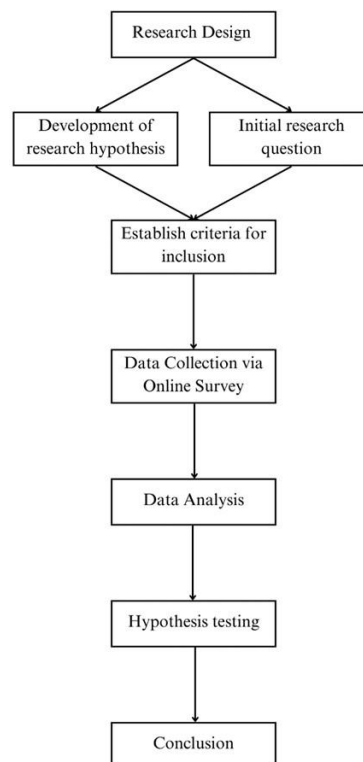


Figure I. Research Design

### MATERIAL AND METHODS

This research was performed quantitatively to achieve the objectives described above. Quantitative research uses primary numerical data and statistical interpretations under a rational, rigorously objective framework (Leung, 2015). The research design is cross-sectional, allowing data to be collected at a single point in time. The cross-sectional data collection is chosen because a cross-sectional design is relevant when assessing the prevalence of attitudes, traits and knowledge in validation and reliability studies (Ulrik, 2018).



The research instrument employed in this study is an online survey created using Google Forms. Google Form is chosen in this study because it was the most convenient way to approach respondents in Indonesia with different city with limited amount of time. the platform allows for various question types, including multiple choice, Likert scale, and open-ended questions, thereby facilitating both quantitative and qualitative data collection. Furthermore, Google forms also offers a user friendly and efficient platform for data collection, enabling to creates structure questionnaire that aligns with research objectives. The utilization of Google Forms as the research instrument ensures ease of distribution, accessibility for a diverse range of participants, and streamlined data aggregation, contributing to the overall effectiveness of the research study.

**RESULTS AND ANALYSIS**

The sociodemographic characteristics of the individual who participated in this study are given in Table 4.1, divided by gender, age, education level, occupation, and monthly income. According to gender, the respondents were almost divided equally; 51.5% are male, followed by female respondents 48.5%. Regarding the level of education, most of the respondents are bachelor’s graduates (47,2%) followed by masters (33,10%). Most of the respondents in this study are employed (69,9%), reaching almost 70% of the total.

Linear regression was used to see if there is any relationship between the intensity of purchasing food products and health claims that has a significant impact on buyers’ attitudes and behaviours towards it. The table below shows that the linear regression model with an R-squared of 0.3 and a Multiple R of 0.5 indicates that the included independent variables explain a moderate proportion of the variability in the dependent variable. While the relationship is not extremely strong, it is statistically significant, and the model provides some insight into the factors influencing the intensity of purchase with buyers’ behaviour and attitudes toward health claims in food products.

**SUMMARY OUTPUT**

Multiple R	0.554052
R Square	0.307365
Adjusted R Square	0.285306
Standard Error	0.451386
Observations	163

**Table I. ANOVA Results**

	<b>df</b>	<b>SS</b>	<b>MS</b>	<b>F</b>	<b>Significance F</b>
Regression	5	14,19536827	2,839073653	13,93413396	2 ,87312E-11
Residual	157	31,98868081	0,203749559		
Total	162	46,18404908			

The regression model is statistically significant as indicated by a very low p-value (2.87E-11) suggesting that at least one of the predictor variables in the model has a significant effect on the dependent variable. The residual degrees of freedom (df) represent unexplained variability in the model. The residual sum of squares (SS) is 31.98868081, and the mean square (MS) is 0.203749559, indicating the average unexplained variability. In summary, the overall regression model is statistically significant.

According to Kassulke et al. (1993), A stronger health-oriented belief and healthier behaviour are associated with individuals seeking and obtaining health-related information. This is shown in the analysis results of respondents who are more likely to exercise. As in this study, exercise has been chosen as one of the variables concerning healthy behaviour. Respondents who exercise regularly, a minimum of three times a week, are the ones who are most satisfied with their lifestyle. Respondents who exercise monthly are more likely to choose neutral and unsatisfied with their health satisfaction. However, when the ANOVA test was tested to compare attitudes toward their interest in health claims, there were no significant differences in each group with different exercise habits.



This shows that healthy behaviour in physical activity did not contribute to different attitudes towards health claims. However, when looking at the most appealing health claims divided by each group, respondents who exercise 3 times a week. have a soft spot for food products with "high in protein" claims. As mentioned previously, there are two variables this study uses to determine if someone has healthy behaviour. The second variable we use is their belief that eating positively will impact their health. When diving into their belief that eating positively will impact their health condition, almost half of the total respondents agree that a good diet is the key to someone's healthy state. However, no high frequency has shown that the more exercise someone puts in, the more they believe that good diet habits lead to a healthy life. Out of respondents who exercise thrice a week, 41% strongly agree that a good diet is crucial to a healthy person. At the same time, 27% of them choose strongly to disagree. This shows a similar point of view for the respondent who exercises monthly to never. 44% of the group strongly agree with the statement. Meanwhile, 21% of them strongly disagree.

Regarding gender, it has been observed that men frequently lack the desire and drive to interact with health-related information during stressful life events and in general (Wellstead, 2011). According to Stefan Ek's (2013) study, Females showed statistically more interest in health-related information and are more active in research on health-related topics. In addition, according to research on gender roles and social constraints of masculinity, men tend to be unaware and lack the competency to search for health-related information and seek out what they know to be available (Courtenay, 2000). From the analysis of this study, the most appealing health claims for males are "low in sugar" and "high protein." are the most popular health respondent chose as for females, food with "low calorie" and "low in sugar" are the most attractive health claims to consider. These findings have proved to be the same as those of Knapik et al. (2016). According to Knapik et al., women typically choose health claims to lose weight, whereas men typically choose claims that can support their muscle mass and increase strength and performance, one of which is the importance of protein consumption. This also aligns with the finding that male respondents exercise more than female respondents. This is also concluded why females and males have different interests in the most appealing health claim.

Female respondents are more likely to seek information regarding the nutritional information and list of ingredients when purchasing food. However, both females and males are aware and have a good attitude towards the willingness to seek knowledge of what food they consume. On the contrary to previous studies and research, male is most likely to consider health claims when buying food product than women, but women are also likely to consider health claims. From this study, both males and females have a positive attitude toward health claims in food products, showed by the ANOVA test regarding attitude toward food with a health claim, both genders show no significant difference in facing their interest. According to Fullmer and Geiger (1991), better educated and older female are typically the ones who are more interest in nutrition. Comparing to the findings in this study, male respondent is more likely to buy only specific food product with a health claim concerning the higher their educational level. On the other hand, the higher the educational level of the female respondents in this study, they are likely to prioritize food products with health claims, and overall, regardless of their educational level, female respondents tend to choose products with a health claim than male respondent n this study.

According to Aschemann-Witzel and Grunert, 2015, Bialkove et al., 2016, and Lahteenmaki, 2013, Health claims and Nutritional Claims have a minimal impact on influencing consumer preferences and willingness to pay. Furthermore, several studies found an even lower chance of purchasing decisions on food with health claims and nutrition claims (Berning et al., 2011; Kiesel & VillasBoas, 2013). From the analysis of buyer's attitudes toward health claims in Indonesia, the results show that respondents pay more attention to the ingredients and nutritional facts in the food packaging. Health claims have the lowest percentage, the buyer's important factor when choosing a food product. These results are backed by the respondent's frequency of purchasing food products with a health claim. Only 29.4% of respondents have always purchased it weekly, and 65.6% of other respondents only purchased it occasionally.

Regarding the credibility of food products with a health claim backed by scientific and regulatory approval, both genders agree that the two components must be put in the food packaging. This finding contrasts with the previous findings and research regarding gender and the lower motivation and willingness to interact with health-related information. According to the survey, the results differ from the previous research findings because male respondents in this study have more exercise habits than female respondents. This led to the previous findings: respondents who exercise more have shown more interest and positive attitude towards products with health claims. From the survey, out of the 84 male respondents, 35 exercise at least three times a week, and 30 exercise once a week. This only leads to 19 or 22% of male respondents being less active than the other male respondents. While at the same time, female respondent has an overall lower exercise habit. Almost half of the female respondents, 41.77%, only exercise monthly.



Haws, Reczek, and Sample's (2017) study found that consumers believe healthier food is more expensive than less healthy foods. According to Glanz, Basil, Maibach, Goldberg, & Snyder (1998), health labels can modify and influence consumer health perceptions, such as price and taste. Regarding interest in purchase behaviour on food with a health claim and the sociodemographic variables in the income level, with regards to genders and their attitudes towards food products with a health claim and how much it influences their purchasing decision compared to taste, both genders are willing to compromise taste for health claims, given the per cent of both male and female have a similar percentage of 33% and 34% respectively choosing "high impact" when asked about "how much does health claim to influence your purchasing decision compare to taste?" have a similar percentage of 33% and 34% respectively. Furthermore, regarding health claims influencing purchasing behaviour compared to the price, 41.4% of female respondents feel neutral about it, and 30.37% of female respondents showed willingness to buy products with health claims compared to the price. This same number also goes with the male respondents: 33.3% of male respondents felt neutral regarding the questions, and 38% chose food products with a health claim compared to price.

Hasler (2018) finds that health claims have been linked to limited success and may be misleading to consumers. This aligns with the findings from this study regarding respondent experience with misleading and unexpected health claims. Out of all respondents who participated in this study, they have been experiencing misleading health claims. This shows how a health claim can be biased and part of deceptive marketing.

In Indonesia, the "Halal" label and BPOM have been the most essential parts of the food packaging label for a long time. Indonesia has one of the world's highest Muslim populations globally. Consuming Halal food is very crucial for Muslims in addressing what to eat. While BPOM, the Food and Drug Supervisor Agency, is Indonesia's government control system for medicine and food. Both labels are the two essential factors that usually go side by side in food packaging in Indonesia.

From the analysis, both males and females have positive attitudes toward acknowledging nutritional facts and the list of ingredients in a food product. Over half of the total respondents in this study think that BPOM and Halal labels do not correlate with a healthy product. Furthermore, linked to the results of a point 5 Likert scale asking about their opinion if there a policy and regulation for a more specific healthy label in food products, respondent shows a high enthusiast (strongly agree) with the statement.

## CONCLUSION

Variables used in this study are a person's interest in healthy behaviour, gender, and socio-demographics. The parameter used to measure respondent's healthy behaviour is their exercise intensity and belief that a good diet leads to good health. As a previous study mentioned, good behaviour impacts someone's interest in buying a product with health claims. For this study, exercise level most significantly impacts the type of health claims they chose. However, all groups with different exercise backgrounds react positively toward health claims in food products. Regarding gender, females tend to choose health claim that supports weight loss, while males tend to choose health claim that can support their performance in strength. Regarding education, females with higher education are more likely to prioritise products with health claims; meanwhile, males with higher education tend to buy products with specific health claims. The study shows no significant differences in attitude towards health claims in food behaviour regarding different variables. They all react positively regarding their interest and knowledge towards health claims on food products. Various variables and socio-demographics regarding buyers' attitudes and behaviour show similar frequency. This is shown by the results of the ANOVA test, T-test, and the results of Cronbach alpha, which all show reliability in responding to health claims in food products. However, the conclusions answering research questions from this study are:

1. The most appealing health claims among the respondents are low sugar and low fat. At the same time, yoghurt and dairy alternatives are food categories that consider the type of food they tend to pick in association with health claims.
2. The most significant Factors influencing buyers' attitudes towards health claims are their physical habits. Physical habits influence what type of health claims they tend to choose.
3. Gaps shown in this study are extensive as more variables might be needed to show somebody's health and interest in health claims.

## REFERENCES

1. Barak, S. and Mudgil, D. (2022) 'Application of bioactives from herbs and spices for improving the functionality and shelf life of dairy products-A Review', *Biointerface Research in Applied Chemistry*, 13(2), p. 141. doi:10.33263/briac132.141.



2. Chen, M. - Fang. (2009). Attitudes toward Organic Foods among Taiwanese as Related to Health Consciousness, Environmental Attitudes, and The Mediating Effects of a Healthy Lifestyle. *British Food Journal*, (Online), 111 (2)..
3. Courtenay, W.H. (2000) 'Constructions of masculinity and their influence on men's well-being: A theory of gender and health', *Social Science & Medicine*, 50(10), pp. 1385–1401. doi:10.1016/s0277-9536(99)00390-1.
4. Dagevos, H. (2005) 'Consumers as four-faced creatures. looking at food consumption from the perspective of contemporary consumers', *Appetite*, 45(1), pp. 32–39. doi:10.1016/j.appet.2005.03.006.
5. Ek, S. (2013) 'Gender differences in health information behaviour: A Finnish population-based survey', *Health Promotion International*, 30(3), pp. 736–745. doi:10.1093/heapro/dat063.
6. Fullmer.S, Geiger CJ. (no date) Consumers' knowledge, understanding, and attitudes toward health claims on food labels, *Journal of the American Dietetic Association*. Available at: <https://pubmed.ncbi.nlm.nih.gov/1846891/> (Accessed: 07 September 2023).
7. Hasler, C.M. (2008) 'Health claims in the United States: An aid to the public or a source of confusion?', *The Journal of Nutrition*, 138(6). doi:10.1093/jn/138.6.1216s.
8. Hill, H. and Lynchehaun, F. (2002) 'Organic milk: Attitudes and consumption patterns', *British Food Journal*, 104(7), pp. 526–542. doi:10.1108/00070700210434570.
9. Knapik, J.J. et al. (2015) 'Prevalence of dietary supplement use by athletes: Systematic Review and meta-analysis', *Sports Medicine*, 46(1), pp. 103–123. doi:10.1007/s40279-015-0387-7.
10. Kotler P & Armstrong G (2015) *Products, services, and brands: building customer value*. Principles of Marketing, 16th ed., p. 264. Boston, MA: Pearson.
11. Leung, L. (2015) 'Validity, reliability, and generalizability in qualitative research', *Journal of Family Medicine and Primary Care*, 4(3), p. 324. doi:10.4103/2249-4863.161306.
12. Lähteenmäki, L. (2013) 'Claiming health in food products', *Food Quality and Preference*, 27(2), pp. 196–201.
13. GLANZ, K. et al. (1998) 'Why americans eat what they do', *Journal of the American Dietetic Association*, 98(10), pp. 1118– 1126. doi:10.1016/s0002-8223(98)00260-0.
14. Sanlier, N., Karakus, S. (2010): Evaluation of food purchasing behaviour of consumers from supermarkets, *British Food Journal*, no. 112, pp. 140-150.
15. Runert, K. G., & Wills, J. M. (2007). A review of European research on consumer response to nutrition information on food labels. *Journal of Public Health*, 15(5), 385–399. Ding, W. and Marchionini, G. 1997 A Study on Video Browsing Strategies. Technical Report. University of Maryland at College Park.

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