

A STUDY ON CONSUMER ATTITUDE TOWARDS GREEN PACKAGING ON FOOD PRODUCTS IN BILASPUR DISTRICT AT CHHATTISGARH

Dr. Anjaneya Sharma

Professor & Head, Department of Management, RSR Rungta College of Engineering and Technology, Bhilai

Abstract

Consumer attitude towards green packaging on food products is an important topic in the context of sustainability and environmental consciousness. Green packaging refers to packaging materials and practices that are designed to have minimal impact on the environment. This abstract aims to provide an overview of the current consumer attitudes towards green packaging on food products and providing protecting and convenience for consumer and relation to promoting the food products. Consumer attitudes towards green packaging on food products can be influenced by various factors. These factors include consumer awareness and knowledge about environmental issues, personal values and beliefs, perceived benefits of green packaging, and trust in companies and brands. This paper explains customer attitudes toward eco-friendly food products in Bilaspur district. To study consumer awareness, willingness to pay more for green packaging food products, and the relationship between gender, education, and income and consumer awareness of green packaging. Also looks at consumer knowledge, preference, and purchasing behavior when it comes to green packaging, as well as their perceptions of green packaging of food products.

Keywords: Green Packaging, Consumer Attitude, Food Products, Consumer Awareness, Environment Concern.

Introduction

Consumer attitude towards green packaging on food products is becoming increasingly important in today's society. With a growing concern for the environment and sustainability, consumers are seeking out products that align with their values. Green packaging refers to packaging that is made from recycled or renewable materials and can be easily recycled or composted. This type of

packaging is seen as more environmentally friendly and can help reduce waste and carbon footprint. Consumer attitudes towards green packaging on food products can have a significant impact on purchasing decisions and brand loyalty. Understanding these attitudes can help food companies make informed decisions on their packaging strategies and communicate the environmental benefits to consumers.

2. Green Packaging

Green packaging is the use of reusable, biodegradable, or compostable materials for product wrapping, packing, and shipping. It can also be used to describe manufacturing processes that recycle and reduce pollution.

The term "green packaging" refers to a package that is made of materials that are beneficial to the environment and other living creatures. The Giraffe management consultancy's founders, Robert Holdway and David Walker, and Mark Hilton, a senior environmental consultant at Enviros Aspinwall, characterised the goal of eco-design as "to reduce total lifespan impacts while maintaining performance and value for money." Eco-design packaging has the attributes of source reduction, reuse, recycling, and waste elimination for the packaging division (Holdway, Walker, & Hilton, 2002).

In general, packaging is a container that comes into direct touch with a product and serves to protect, hold, preserve, facilitate, identify, and commercialise it (Vidales Giovannetti, 1995). Or, Also known as the form and brand of a product, packing is described in marketing terms.

Due to increased consumer knowledge and easy access to information, packaging has completely changed in the last several years. Consumers of today are looking for a solution that best satisfies their needs because they are well aware of the environmental impact of packaging and resource waste. Environmentally friendly packaging is currently the most critical need, which means they want packaging that employs recycled materials, produces less waste, and can be recycled after use. (Sandu, R.M.,2014)

2.1. Importance of Green Packaging

The importance of global environmental conservation has increased in recent years. In this regard, green packaging is essential for reducing waste and pollution's negative effects and advancing sustainable development. Green packaging, also referred to as "eco-green packaging," "eco-friendly packaging," "sustainable packaging," or "recyclable packaging," uses environmentally friendly materials for packaging while always keeping in mind that products must be efficient and secure for the environment and human health.

Food or non-food products should all come in good packaging to safeguard the consumer; hence packaging is an important component of marketing. Packaging attracts clients while also acting as a channel of communication between businesses and their patrons. Products in today's world need to be protected, but packaging also needs to be environmentally sustainable. In other words, it must fulfil both specified environmental objectives and essential product requirements. Packaging serves four essential marketing objectives. The process starts with protecting and securing the product. Second, it is important for the product's promotion. Third, it facilitates recycling and lessens environmental harm while also making it simpler for users to use the products.

According to the Association of Plastic Manufacturers, the top three markets for plastics or polythene are packaging (39.6%), building and constructions (20.3%), and automotive (8.5 percent). Globalization has reached previously unheard-of levels, yet it has also resulted in a number of challenges. The usage of environmentally harmful packaging is just one illustration. On the continents of Asia and Europe, plastic packaging is disposed of in landfills. The package is left in the environment for a very long time when this method of disposal is used, seriously harming the ecological.

Green packaging was the solution, but it also provided a lot of benefits. It is created from ecofriendly materials and is recyclable, biodegradable, and energy-efficient. Producers, however, believe it is expensive and risky to move from conventional packaging to green packaging.

3. Literature Review

According to Nguyen Hoai Anh (2021), relating to functions of protecting , packaging made from minimal material were suspected not be solid enough to prevent contaminating and damage. Besides providing huge amount of benefit for the ecological value, consumers also consider price as an essential factor impacting on buying decision. The reliability of information on packaging was determined as an aspect impacting on customer behavior in term of promoting and providing convenience to the consumer.

Gheorghe, Anca Francisca, Cristina, Raluca (2022), The paper uses a quantitative study of 268 Romanian customers to examine their attitudes toward sustainable packaging. The study's goal is to find out how Romanian consumers feel about the function of eco-packaging in the establishment of sustainable behaviour. The study's major goals are to determine consumer preferences for different types of eco-packaging, as well as to learn why people buy green packaging and what role knowledge about eco-packaging plays in encouraging sustainability. The majority of respondents are aware of the environmental impact of packaging, and the main reasons for purchase are environmental protection, recycling, and a sense of responsibility. Paper, glass, and cardboard, as well as, to a lesser extent, plastic and wood, are preferred packaging materials.

G.Singh, N pandey (2023), The purpose of this study is to look at green packaging from a process perspective. It focuses on the behaviour of costs associated with constructing green packaging infrastructure in particular. The model was created using system dynamics in the study. To generalize the results, the model was tested on three industries that manufacture glass bottles. The study suggests that the cost of remanufacturing, which is initially higher due to recollection phases and reverse logistics costs, eventually becomes less expensive than new manufacturing as the system stabilizes and follows the same trend over time.

According to Igor Popovic , Bart A. G. Bossink and Peter C. van der Sijde (2023), There are only a few studies that have explicitly addressed the demographic characteristic of consumers who buy food products in environmentally friendly packaging. With regards to age study found that young Indian consumer posses environmental consciousness and are concerned with environment

protection. Gender is an important factor that predicts consumers choice of foods in environmentally friendly packaging and with regards to education factor found that the lowest level of education was associated with more focus on the product rather than packaging.

Gonzalo María, Alfredo Alcayde, Raúl Baños (2024), This research examines the impact of green packaging from both a business and consumer perspective, focusing on issues such as green packaging design and materials, green packaging costs, marketing strategies and corporate social responsibility related to green packaging, as well as the impact of green packaging on waste management, the circular economy, logistics, and supply chain management. The findings show that scholars and researchers are becoming increasingly interested in all of these elements, as evidenced by the increased number of journal publications in recent years. Given the increased awareness among businesses and consumers about the significance of promoting sustainable development through green packaging alternatives, the study's practical implications are considerable.

Raj Karan Gupta (2024), Sustainable packaging has grown in importance as a means of attaining long-term development while also conserving the environment. The purpose of this research is to look into the elements that influence Indian customers' desire for green packaging, or packaging that is not detrimental to the environment. The independent variables in this study include environmental concern, attitude toward green packaging, and willingness to pay, while the dependent variable is customers' purchase intention for green packaged products. The results of this study show that all three variables (environmental concern, attitude toward green packaged products, and willingness to pay) had a positive impact on the dependent variable (consumers' intention to buy green packaged products).

4. Objective of The Study

1. To identify consumer attitude toward green packaging on food product in Bilaspur district.
2. To identify consumer attitude toward green packaging in providing protecting and connivance for consumer.

3. To identify consumer attitude toward green packaging in relation to promoting the food products.

5. Research Methodology

5.1. Questionnaire Building

As mentioned above, a questionnaire survey is chosen as form of quantitative research. The questionnaire consisted of 3 sections: (1) Consumer attitude on ability of green packaging in fulfilling three major functions: protection and convenience. (2) Demographic information such as age, sex, education, occupation and annual income (3) consumer attitude toward green packaging in relation to promoting the food products.

5.2. Data Collection

The questionnaire was prepared in such a manner that it made the consumers respond in the most convenient way. The size of the sample for the pilot study is 50. As a Primary data collection, data were collected from the selected sample using the questionnaire method from Bilaspur District. As a secondary data collection, various published and unpublished researches, journals and internet sources were considered. A questionnaire comprised of 14 questions including likert scale. The questionnaire having various questions that aims to fulfill the objectives of the research.

5.3. Data Analysis & Findings

Demographic

This research aims to investigate the consumer attitude towards green packaging in the context of Food Product. According to the results of the collected data from the sample, there were 46% female respondents and 54% male respondents. As we see that the total respondents, who completed the survey, Maximum numbers of respondents was the age of the group 18-24 were students by occupation which represents the 48%, this indicates the youngsters are highly involved in Food Industry. 32% respondents were belonged to the age of 25 to 34. 12% respondents were belonged to the age of 35 to 44. 8% respondents were between the ages of 45 to 54. 18 respondents have a bachelor degree or were under graduation which was representing 36%. 22 participants on the master level of education which represented 44%. 10 respondents were research scholar which

was representing 20%. According to the results 15 were earning less than 10,000 which represents 31.1%. 7 respondents' earning was in between 10,000 to 50,000 which indicate 14.9%. 4 respondents have an income between 50000 to 1, 00,000 which represented 6.4%. 7 respondents have an income above 1, 00,000 which represented 12.8% of total sample. 17 were remaining respondents which represented 34.8% of total sample. 44% of the respondents is concerned about the protection of the environment. 38 % have recently bought food products which belong to green products. 42% find green packaging more attractive than plastic one. 52% would go for products with packaging that can be filled again (re-filled).

TABLE-1 GENERAL CONSUMER ATTITUDE TOWARDS GREEN PACKAGING

	SD (%)	D (%)	N(%)	A(%)	SA(%)	Mean	St Deviation
I prefer green product packaging while I shop.	1 1.6	6 9.7	11 17.7	17 27.4	15 24.2	3.78	1.075
I am aware of the fact that various brands provide green packaging.	2 (3.2)	4 (6.5)	17 (27.4)	14 (22.6)	13 (21.0)	3.64	1.83
I am familiar with the advantages of green products (packaging) for the environment and human health.	1 (1.6%)	1 (1.6%)	4 (6.5%)	22 (35.5)	22 (35.5)	4.26	.853

As shown in Table 1, three questions regarding the general consumer attitude on green packaging were analyzed by using mean value. Mean value is possible method to summarize the information in terms of observation by providing good approximation (Rao, Shi and Wu, 2014). Overview, all three statements gained a positive mean value. So, as the result has shown, the respondents have awareness, concern and knowledge of green packaging. The statement “I prefer green product

packaging while I shop gained 3.78 as mean value. This statement reflected the respondents “Environmental concerns”. Therefore, consumer’s consciousness and concern regarding to green issues were evaluated positively. However, the mean value was not significantly greater than 3, which means consumer was less concern about environment. I am aware of the fact that various brands provide green packaging and I am familiar with the advantages of green products (packaging) for the environment gained mean value is 3.64 & 4.26.

Therefore, the majority of participants agreed or strongly agreed that environmental awareness plays the most important role in their purchase decisions. They also acknowledged that environmental and human health considerations were made during the purchasing process.

TABLE -2 CONSUMER ATTITUDE TOWARD GREEN PACKAGING IN PROVIDING PROTECTING AND CONVENIENCE FOR CONSUMER

	SD (%)	D(%)	N(%)	A (%)	SA (%)	Mean	St Deviation
Packaging made from green material (i.e.: recycle material, biodegradable material...) is as beneficial as products packed in plastic.	7 11.3	6 9.7	16 25.8	11 17.7	10 16.1	3.22	1.298
I believe in th recycle/ reuse of products and its packaging.	1 (1.6)	1 (1.6)	4 (6.5)	16 (25.8)	28 (45.2)	4.38	.878
Products packed with minimal material lacks the ability to keep the products fresh and in good quality	1 (1.6)	1 (1.6)	16 (25.8)	18 (29.0)	14 (22.6)	3.86	.926
I prefer purchasing products that are more	3 (4.8)	2 (3.2)	12 (19.4)	13 (21.0)	19 (30.6)	3.88	1.166

informative about their packaging.							
I would go for products with packaging that can be filled again(refilled).	2 (3.2)	1 (1.6)	8 (12.9)	13 (21.0)	26 (41.9)	4.20	1.050

As shown in Table 2, six questions regarding Consumer attitude toward green packaging in providing protecting and convenience for consumer were analyzed by using mean value. Overview, all six statements gained a positive mean value. So, as the result has shown, the respondents have consumer attitude toward green packaging in providing protecting and convenience for consumer.

Consumer attitudes toward green packaging in providing protection and convenience for consumers have been steadily growing in recent years. With increased awareness of environmental issues and the desire to make more sustainable choices, many consumers are actively seeking out products that are packaged in eco-friendly materials.

Green packaging not only provides protection for the products inside but also offers convenience for consumers. Sustainable packaging materials, such as biodegradable or compostable materials, can effectively protect products during transportation and storage. Additionally, many green packaging solutions offer innovative features that enhance convenience, such as easy-open design or resealable options. Consumers appreciate the efforts of companies to reduce their environmental impact through sustainable packaging choices. They feel that by choosing products with eco-friendly packaging, they are contributing to a healthier planet. This positive perception can also enhance the brand image and reputation of companies that prioritize sustainable practices. However, it is important to note that while consumer attitudes toward green packaging are generally positive, there are still challenges to be addressed. Some consumers may perceive green packaging as being more expensive or less durable than traditional packaging materials. Therefore,

it is essential for companies to educate consumers about the benefits of green packaging, such as reduced waste and resource conservation.

TABLE – 3 CONSUMER ATTITUDE TOWARDS PROMOTING PRODUCT OF GREEN PACKAGING

	SD (%)	D (%)	N (%)	A (%)	SA (%)	Mean	St Deviation
I can pay more if the product is wrapped in eco friendly packaging as it will be less harmful to environment and human health.	4 (6.5)	5 (8.1)	13 (21.0)	16 (25.8)	12 (19.4)	3.54	1.199
I look for “green” packaging on the label due to it’s benefits.	2 (3.2)	3 (4.8)	11 (17.7)	21 (33.9)	13 (21.0)	3.80	1.030
I find green packaging more attractive than plastic one.	2 (3.2)	2 (3.2)	11 (17.7)	14 (22.6)	21 (33.90)	4.00	1.088
I look for green label first when choosing green product.	1 (1.6)	4 (6.5)	19 (30.6)	9 (14.5)	17 (27.4)	3.74	1.084
I recognize packaging product by it’s color, size, and shape.	4 (6.5)	1 (1.6)	10 (16.1)	24 (38.7)	11 (17.7)	3.74	1.084

As shown in Table 3, five questions regarding the consumer attitude towards promoting product of green packaging were analyzed by using mean value. Overview, all five statements gained a positive mean value. So, as the result has shown, the respondents have consumer attitude toward green packaging in relation to promoting the food products. The statement “I can pay more if the product is wrapped in eco-friendly packaging as it will be less harmful to environment & human health gained 3.54 as mean value. I look for green packaging on the label due to its benefits gained

mean value is 3.80. I find green packaging more attractive than plastic one. I look for green label first when choosing green product & I recognize packaging product by its colour, size and shape gained 3.74 mean value.

Many consumers now actively seek out products that are packaged in environmentally friendly materials such as recycled or biodegradable packaging. There are several reasons why consumers are drawn to products with green packaging. First and foremost, it aligns with their personal values and desire to reduce their environmental footprint. By choosing products with green packaging, consumers feel like they are making a positive difference and contributing to a more sustainable future.

6. Conclusion

The result of research were analysed based on 50 respondents answers. The aim of research was investigating consumer attitude towards the functions of green packaging, which are protecting quality, promoting product and providing convenience. The demographic analysis suggested that the results be analysed based on individuals group from 18 years old to 65 years old, those with a PhD, post graduated, bachelor's degree or graduated from high school/vocational school diploma and earning more than 1 lakh per month. Consumer attitudes based on experience were explored first, followed by the behavior of experienced respondents as measured by their willingness to support green packaging. Finally, the gathered analysis pointed out customer attitude towards functions of sustainable package; so that, based on available analysis investigated elements that have a negative impact on consumer perception.

When analysing customer attitudes towards the benefits of sustainable packaging, the results revealed that both inexperienced and experienced participants gave the benefits of ecological packaging's protection of product quality, promotion of the product, and convenience a positive grade. However, the research also identified characteristics that have an impact on customer attitudes when they are thinking about green packaging during the shopping process. For instance, packing constructed of thin materials was thought to be insufficiently sturdy to guard against contamination and damage. In addition to offering significant environmental benefits, customers

also view pricing as a crucial factor influencing their purchasing decisions. Finally, dependability reflected credibility; customers questioned the veracity of the information on the packaging. Finally, reliability represented trustworthiness since customers questioned the authenticity of the information on the packaging. It was revealed that one factor influencing customer attitudes in terms of promoting and giving convenience to the consumer was the reliability of information on green packaging.

References

1. Popovic, I., Bossink, B. and van der Sijde, P., 2023. Factors Influencing Consumers' Decision to Purchase Food in Environmentally Friendly Packaging: What Do We Know and Where Do We Go from Here? Available at: <https://www.mdpi.com/20711050/11/24/7197> .
2. Hoai Anh, N., 2021. *Consumer's Buying Behaviour Towards Green Packaging in Finland Consumers' Behavior Concerning Sustainable Packaging: An Exploratory Study on Romanian Consumers.* [online] Available at: <https://www.researchgate.net/publication/325444185_Consumers'_Behavior_Con
3. Singh, G. and Pandey, N., 2023. Revisiting green packaging from a cost perspective. *Benchmarking: An International Journal*, [online] 26(3), pp.1080-1104. Available at: <http://file:///E:/30_BIJ_remanufacturing.pdf>.
4. Wandosell, G., Parra-Meroño, M., Alcayde, A. and Baños, R., 2024. *Green Packaging from Consumer and Business Perspectives.* [online] Available at: <https://www.mdpi.com/2071-1050/13/3/1356>
5. Gupta, R., 2024. Exploring the factors affecting purchase intention towards green packaged products of Indian consumers. *E3S Web of Conferences*, 309, p.01084.
6. G. Madushanka, & V.R.Ragel. (2016). CONSUMER'S ATTITUDE TOWARDS GREEN PACKAGING: A STUDY ON TRINCOMALEE DISTRICT. South Eastern University of Sri Lanka
<https://www.seu.ac.lk/seusl/jm/publication/volume1/no2/consumers%20attitude%20towards%20green%20packaging.pdf>

7. Jerda, G., 2020. *GREEN PACKAGING: A PRACTICE OF SUSTAINABLE MANAGEMENT IN CONSUMER PERSPECTIVE*. [online] Jcreview.com. Available at: <<http://www.jcreview.com/fulltext/197-1603850838.pdf>>
8. Escursell, S., Llorach-Massana, P. and Roncero, M., 2021. *Sustainability in e-commerce packaging: A review*. Oloyede, O. and Lignou, S., 2021. Sustainable Paper-Based Packaging: A Consumer's Perspective. *Foods*, 10(5), p.1035.
9. Jerda, H. H., & Sahayaselvi, S. (2022, January). *Green packaging: An emerging need for sustainable development*. GREEN PACKAGING: AN EMERGING NEED FOR SUSTAINABLE DEVELOPMENT. Retrieved September 30, 2022, from https://www.researchgate.net/publication/351090197_GREEN_PACKAGING_AN_EMERGING_NEED_FOR_SUSTAINABLE_DEVELOPMENT
10. Pan, C., Lei, Y., Wu, J., & Wang, Y. (2020). The influence of green packaging on consumers' green purchase intention in the context of online-to-offline commerce. *Journal of Systems and Information Technology*, 23(2), 133–153. <https://doi.org/10.1108/jsit-11-2023-0242>.
11. Ker[en]Xin, W., Kar Sen, Y., & Devi Rajendran, S. (2020). A study on the benefits of eco-friendly packaging on sustainable supply chain management in fast moving consumer goods industry. *E3S Web of Conferences*, 136, 04092. <https://doi.org/10.1051/e3sconf/202313604092>