



Effect of Product Packaging on Consumer Behaviors

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Abstract. In recent years, the market has become increasingly crowded with identical products offered by numerous businesses. To make their products more competitive and increase the sales, a large number of companies adapted various techniques to influence and attract consumers. It is commonly believed that product packaging (PP) is one of the most powerful marketing technique, which acts as a silent communicator at the store shelf with the consumers, informing them basic information of the product while creating first impression to the consumers. This study analyzes the influence of various elements of packaging on consumer perception (CP) and buying decision by analyzing studies using questionnaire to collect data in the preliminary stage and SPSS software to analyze the correlation between the variables. According to the findings, there existed moderate relationships between consumer behavior (CB) and packaging color, quality, wrapper design and innovation, which highlighted the importance of product packaging in the market. Though extraneous variables could also play a role in influencing CB, packaging is an inevitable element that should be considered in improving the sales of a company.

Keywords: Packaging, Consumer Behaviors, First impression.

1 INTRODUCTION

Previous research indicates that most consumers make their decisions to purchase non-durable products at the store shelf [1]. The potential of packaging to communicate and influence choice is increased. Consumers who are often confronted with thousands of choices during shopping are overwhelmed by goods and services. A 1999 study conducted by Belch and Belch revealed that an American consumer encounter approximately 20,000 products in just 30 minutes while shopping at a supermarket. The staggering number of 20,000 highlights the intense competition among sellers in the market, bringing enormous competitive pressure to companies. In order to stand out from competitors and attract potential customers, businesses employ various marketing techniques to capture consumers' attention, increase the likelihood of them picking up their product for a closer look and eventually purchasing the product.

2 DEFINITION OF VARIABLES

2.1 Product Packaging

Product packaging, as one of the most popular marketing technique, plays a substantial role in brand marketing. Packaging possesses a distinctive value, allowing a business to achieve its competitive edge and acts as a tool for differentiation [2]. By designing the colors, patterns or materials used, a visually attractive packaging may be able to grab consumers' attention, creating a positive first impression to them. This not just differentiates the product among a wide range of parallel products, but increases the possibility of consumers' purchasing decision.

2.2 Consumer Intention and Purchasing Behavior

PP has become part and parcel of our daily life, particularly with an ongoing development of marketing concepts. It becomes one of the fundamental aspects of the production concept as it plays a crucial role in emphasizing the consumer's mental image of the product [3]. Previous studies have explored the relationship between packaging and CB, highlighting its significant role in shaping consumers' purchasing decisions. One study found that packaging could significantly alter consumers' attitudes towards a product [4]. The researchers observed that attractive packaging was associated with higher levels of purchasing intention and consumer loyalty, whereas unattractive packaging was linked to lower levels of consumer confidence. This finding suggested that the appearance of packaging could serve as a powerful tool for companies to build customer loyalty and enhance brand image. Another study investigated the effect of packaging on purchase intentions among online shoppers [5]. The researchers found that different types of packaging, such as using eco-friendly, sustainable materials, were more likely to encourage consumers to make a purchase decision. This result suggests that consumers have become more aware of the environmental impact of their purchases and are willing to accept eco-friendly packaging products.

In addition, packaging is used to communicate important information with customers. The content printed on the packaging such as safety warnings, ingredients or nutritional values is essential to consumers, as the information provided gives them a better understanding of the product, helping them to evaluate whether the product meets their needs and aligns with their preferences. For example, food packaging often includes labels indicating the amount of sugar, fat, salt and other nutrients in the product, which can help consumers make informed decisions about their dietary choices. Similarly, medication packaging may include instructions on when to take medication and how to take it properly, ensuring that the consumers receive the intended benefit from the product.

Furthermore, packaging can also play a role in creating a sense of urgency of a product, which can motivate consumers to make a purchase decision. For instance, Pop-Mart have introduced limited-edition blind boxes that had unique packaging designs to attract consumers. This special feature created a sense of exclusivity that greatly emphasized the "limited" feature of the blind boxes, which successfully prompted

consumers to act quickly before the offer expires. This behavioral phenomenon is known as "loss aversion", which individuals perceive potential losses as being greater than an equivalent to gains [6]. In this scenario, consumers were eager to acquire the blind-box as it was "limited" and they were under time-constrained: if they didn't buy it, other people would buy. The consumers were afraid of losing the opportunity of purchasing the limited-edition blind-box. Thus, the market sales of Pop-Mart limited-edition blind boxes remained good.

Therefore, the effects of PP on how consumers perceive and ultimately choose a product over competing options is undeniable. Companies could leverage the power of packaging by making the packaging appearance more attractive, using sustainable packaging materials, providing valuable information, etc. to change consumers' purchasing decisions and drive sales. This research will then provide deep analysis of the extent to which elements such as material, color, and consistency of brand image influence consumer perception and behaviors.

3 THE IMPACT OF PRODUCT PACKAGING ON CONSUMERS' PURCHASE INTENTION

3.1 The Subject of the Study

As the importance of visual search in time-constrained situations is given, one would expect the appearance of products to play an essential role in forming a brand's consideration sets [7]. A study pointed out that the PP is the shopper's window to the product, as it often projects the first impression consumers form about a product, its value or its quality [8].

3.2 Tools of Data Collection and Procedure

To investigate the data of packaging on CB, four variables were collected from questionnaire technique: Packaging Color (PC); Quality of Packaging (QP); Wrapper design (WD); and Packing Innovation (PI). For the color of packaging, specific colors can capture consumers' attention and create different moods; a customer's attitude towards a product is heavily influenced by color, which is likely to positively affect consumer buying intention [9]. Packaging material— any material such as wadding or packing—that has been specifically used to protect products. The consumer can change their choices of packaging material. Quality packaging attracts customers over inferior packaging. Thus, the material used for packaging has a strong influence on consumer purchasing behavior. As for the design of wrapper and Packing Innovation, the consumer's attraction is also greatly influenced by the overall product appearance. Children between the ages of 10 and 18 are typically the most sensitive to the look of a product. Businesses make every effort to create attractive packaging. Thus, these four elements of packaging acted as independent variables (IV), while the dependent variable (DV) was CB. The population of this study consisted of Karachi's educational institutions and students. In order to have a better generalizability, a sample size of 150 students

was selected using simple random sampling. As for the measure of the study, for a single variable, at least 13 questions were collected, and some of the questions could be obtained easily. Here is the definition of each variable: a 5-points itemized rating type scale (a Likert scale) was used to measure each variable by asking the seven questions, the rating was ranged from (one point) strongly disagrees to (five points) strongly agree [10].

3.3 Data Analysis and Results

In the data analysis, SPSS software was used to analyze two parts of the data. Measures of central tendency and dispersion was used in part one to describe and summarize [10]. Descriptive statistics was used as the first technique to generate results. It showed the mean, maximum, and minimum values of the data. In order to determine the relationship between two or more continuous variables, the study used Pearson's correlation analysis— Pearson's correlation coefficient ranges from zero (no correlation) to one (perfect correlation). (Significant association will depend on other aspects like group size) Correlations greater than 0.80 are typically regarded as being rather high.

The tables showed Descriptive Statistics of each IV, with valid N (list-wise). For PB statistics: 1 was the minimum value; 5 was the maximum value; the mean value was 3.74; and the value of standard deviation was 0.931. The number of observations, shown in the letter N, of each variable was 150. (see Table 1) In the descriptive statistics of PC, the minimum and the maximum value were the same in the previous table, the mean was 3.65 while the value of standard deviation was 0.944 (see Table 2). As for the statistics of QP, the data still ranged from 1 to 5, with the mean of 3.75 and standard deviation of 0.925, 150 observations. (see Table 3) For the data of WD, the mean was 3.69 and standard deviation was 0.897 (see Table 4). The last descriptive statistics showed descriptive statistics of PI, the differences of values between this variable and other variables were the value of mean (3.65) and the standard deviation of 0.965. (see Table 5)

Table 1. DS of Purchasing Behavior

| | N | Mean | Max. | Min. | Standard Deviation |
|----|-----|------|------|------|--------------------|
| PB | 159 | 3.74 | 5 | 1 | 0.931 |

Table 2. DS of Packaging Color

| | N | Mean | Max. | Min. | Standard Deviation |
|----|-----|------|------|------|--------------------|
| PC | 150 | 3.65 | 5 | 1 | 0.944 |

Table 3. DS of Quality Packing

| | N | Mean | Max. | Min. | Standard Deviation |
|----|-----|------|------|------|--------------------|
| QP | 150 | 3.75 | 5 | 1 | 0.925 |

Table 4. DS of Wrapper Design

| | N | Mean | Max. | Min. | Standard Deviation |
|----|-----|------|------|------|--------------------|
| WD | 150 | 3.69 | 5 | 1 | 0.897 |

Table 5. DS of Packing Innovation

| | N | Mean | Max. | Min. | Standard Deviation |
|----|-----|------|------|------|--------------------|
| PI | 150 | 3.65 | 5 | 1 | 0.965 |

There are 5 hypothesis in this study: there exists a correlation between PB and PC (H1), QP (H2), WD (H3), and PI (H4). According to the findings, the two variables (buying behavior and Packing color) in Table 2– were positively correlated, which could show in the values $r= 0.589$ and $p = 0.000149$. The values indicated that there was a moderate correlation between them, so H1 was accepted. In Table 3, PB and QP were also correlated, with values of $r= 0.539$ and $p = 0.000145$, which showed a positively moderate relation between the two variables. Thus, H2 was proved as well. The variables of PB and WD in Table 4 were positively correlated, with the obtained data of $r= 0.421$ and $p = 0.000149$. This showed a slightly weak but also moderate relationship between these two variables. Therefore, H3 could not be rejected. The last table between PB and PI had a correlation of $r= 0.554$ and $p = 0.000145$. The relation between these two variables was moderate. Hence, Hypothesis 4 was also accepted. Therefore, an appropriate picture or PC, or a package shape that was easy to handle, open, dose, or dispose of, is able to deliver happiness to consumers. Each of these elements played an essential part in capturing the attention of consumers.

3.4 Comparisons with Previous Research and Limitations

Previous studies supported the view that elements of packaging could impact consumer purchasing behavior and were valuable tools in marketing communication [7]. Nevertheless, some extraneous variables could have existed, affecting the data collected from the questionnaire and leading to erroneous results. Confounding variables such as verbal cues of salesperson or good storytelling of the product could have also affected consumer PB over a product through desire and attitudes[11]. These were variables that were hardly to control and measure. Hence, these extraneous variables could have played a distracting role in influencing the purchasing intention of consumers and resulted in false conclusions.

4 DISCUSSION

4.1 Comparisons with Previous Research and Limitations

The research revealed that CP and PB are influenced by various factors of PP. The relationship between elements such as color, quality, wrapper design and innovation and CB is strongly related, which highlighted how significant PP was and encourages companies to put extra work on improving their packaging.

4.2 Suggestions

It is highly recommended to the businesses that they should pay attention to product packaging. A good packaging is the key of success sales of the product. A good PQ, PC, WD, PI could inspire the consumer toward the product. It is also suggested that businesses and marketers should give proper consideration to a good packaging, as they will be held accountable for the failure of the goods if they introduce a poor packaging. Therefore, it is vital that marketing managers put their attention on packaging standards and conduct a strategy that takes PP into account along with other marketing-related factors such as brand consistency with the product or price labels (charm price, for example) and different dimensions.

5 CONCLUSION

Packaging has the power to alter CP and PB through various factors such as color, quality, wrapper design, innovation and material. Through a good PP, businesses could make their products stand out from their competitors, differentiating from other parallel products. An attractive packaging is able to capture consumers' attention and creates a good first impression by utilizing different elements of packaging, which greatly increases the possibility of consumers purchasing the product. As a silent communicator at the store shelf, packaging indeed plays an essential role in persuading consumers into buying the product. In the analyzed study above, the 5 hypothesis were all accepted due to their moderate relationship between CB and the variables. This research further validated the important relationship between PP and CP and their PB, which emphasizes the usefulness of packaging as a marketing technique in brand marketing. Though there might be other factors than packaging that influence CP and their PB, it is important for businesses not to overlook the effect of PP, as it did play a role in changing CP and purchasing decision. By properly utilizing the power of packaging, companies could drive consumer buying behavior and increase their competitiveness in the market.

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