Purchase Intentions and Consumers Attitude towards Environment: A Study of Eco-friendly Products in FMCG Sector

Dr. Showkat Hussain Gani
Assistant Professor
College of Business Administration
King Saud University, Al Muzahimiyah
Kingdom of Saudi Arabia

Abstract

Due to the increased environmental interest and recital attempts of governmental and non-governmental organizations, the preceding decade has observed a marvelous rise in environmental awareness globally. The brisk economic growth in the last years and uncontrolled consumption pattern are instigating environmental relapse and over utilization of natural resources globally. As consumers, people can condense the bearing of their purchase behavior on the environment and create a difference through their purchase decision. They have the supremacy to create an opportunity for businesses that are using “eco-friendly” or “environment-friendly” as a constituent of their value proposition. The objective of this research is to explore factors which affect the purchase of eco-friendly products in FMCG (Fast Moving Consumer Goods) sector in India and to reveal the factors used by corporates from the marketing-mix components (product, price, place and promotion) that have an impact on green purchase attitudes and to explore if some factors are more critical than others. Moreover, the other factors from the opinion of the consumer, such as the word of mouth and satisfaction, will be studied. The research uses a quantitative research blueprint which includes data compilation based on a survey and further examination and testing data using simple correlations, multiple regression, and ANOVA. The outcome of the research denotes that satisfaction (through past experience), advertising/promotion and word of mouth impact the purchase decisions of consumers towards environment-friendly products. The study would be of immense help to the companies in FMCG sector as they get a clue about the best marketing strategies that they can implement to comprehend the consumers’ attitudes and purchase intentions towards environment-friendly products. Furthermore, these corporates will have insight about how to outline environmental-friendly consumers in India and to develop effective messages that will purposefully and emotionally allure to their target customers and accordingly make marketing strategy.

Keywords: Market Behavior, Consumer Behavior, FMCG, Goods, Green Marketing, Environmental-friendly Products, Marketing Strategies, Target Market

INTRODUCTION

Due to the amplified environmental concerns and concerted efforts of governmental and non-governmental organizations, the past decade has observed a marvelous boost in environmental awareness...
globally. “Green Marketing” and “Environmental Marketing” appear often in the press and media. Numerous governments throughout the globe have become so involved in green marketing activities that they have challenged to legalize them. One of the greatest hindrances with the green marketing domain is that there has been little effort to academically explore environmental or green marketing. This growth in environmentalism is also leading the consumers to demand the so called “green” or “environment friendly” products (Sheu, 2010) and as such the green product market is increasing at an implausible rate. Social marketing literature outlooks green consumer behavior as a form of ethically oriented consumer behavior that is encouraged not only by consumers’ own personal needs but also by their interest for the good of society in general (Diamantopoulos et al., 2003). While consumers’ environmental interests have moved into mainstream marketing, it is useful from a marketing perspective to examine how consumers make notified choices about green products (D’Souza et al., 2006). Shrewd business firms today view green expansions as market opportunities rather than simple guidelines and policies to be match (Pickett-Baker and Ozaki, 2008).

The quick economic growth in the last years and uncontrolled consumption pattern are causing environmental degradation and over exploitation of natural resources globally. The end results of environmental degradation are depletion of stratospheric ozone layer, global warming, noise and light pollution, pollution of sea and rivers, acid rain and desertification (Ramlogan, 1997). A general degradation of the corporal environment is encouraging people to bring changes for the improvement of the present state of the environment. As consumers, people can ease the influence of their purchase behavior on the environment and make a noteworthy difference through their purchase decision. They have the influence to create an opportunity for businesses that are using “eco-friendly” or “environmentally friendly” as an element of their value proposition. With an increase in the social and political strains, profit oriented firms welcome green marketing strategies and use these environmental concerns as a source of competitive advantage (Chen & Chai, 2010). As per a recent “Green Buying Behavior: Global Online Survey” conducted in 2012 on the comparatively well off groups of Brazilian, Chinese and Indian consumers, it has examined that while “quality” and “price” are still the dominating factors driving shoppers’ buying decisions, green descriptors are also playing a big role now than ever before. Shoppers are more concerned with the manner their food is produced, particularly, with the negative publicity accompanying modern efficiency-driven production processes. Consequently, manufacturers and retailers are quick to use green elements as a point of distinction. From household goods to beauty products and groceries, terms such as “natural”, “organic”, “locally sourced”, and “fair trade”, are now increasingly present on ingredient lists and labels, and many customers are ready to pay a premium for them. Another research on attitudes towards sustainable consumption about the Europeans (based on a sample of 26,500 respondents) made in April 2009 disclosed that more than 80% of European citizens thought that “a product’s influence on the environment is a significant element when deciding which products to buy.

Many research studies have been conducted in developed and developing nations that examine the consumer’s attitude and behavior towards buying environment-friendly/green products but most of them concentrate on one or two marketing-mix components but they do not address the ways that the corporates use to encourage consumers to buy environment-friendly products. For example, the impact of price, quality, and brand loyalty have been observed in many studies.
But there is a very little literature that considers other influences such as the promotion of the eco-friendly goods or word of mouth effect on the purchase decision. Also, in perspective of the India, the studies concerning the green consumers’ attitudes or purchase intentions particularly relating to FMCG (Fast Moving Consumer Goods) sector are also insignificant. Most of Indian studies associate to deciding the level of consumers’ consciousness about green products and the factors influencing the consumer attitude and behavior towards these products. Keeping this in mind, the aim of the present research is to examine factors which influence/stimulate the purchase of environmental or eco-friendly (EF) products in FMCG sector and to exhibit the factors used by companies from the marketing-mix components (product, price, place and promotion) that have an impact on green purchase attitudes and to inspect if some factors are more significant than others. Moreover, the other factors will be observed from the perspective of the consumer. The study converges on the purchase of environment friendly products in the fast moving consumer goods sector (FMCG) also known as consumer packaged goods (CPG) sector. FMCG is the non-durable products mainly sold in retail stores, having a short useful life, that consumers routinely buy and use right away, for instance, food items, health care products, cosmetics etc.

Review of Literature

This segment presents a succinct indication of the studies pertaining to green buying behaviors, attitudes, and intentions of the consumers towards the products. First, it contains all non-Indian researches related to the theme and the second it gives a concise indication of a few Indian studies.

Robertson (1971) observed that (i) the customer may make decisions in a “non-rational” way. Because he/she may not protect, process or cautiously assess all the obtainable information; (ii) there is not a particular succession of stages which must crop up as in Lavidge and Steiner’s view. Any such representation must allow customers to “skip” stages; and (iii) the representation must also offer response loops because such a procedure will not, unavoidably, be linear and one-dimensional. Antonides (1998), however, given that customers are habitually not rational and do not make decisions of purchasing that maximize utility. The term “rationality” is increasingly regarded as unrealistic and places customers outside the cultural context.

Follows and Jobber (2000) in their research experientially test a consumer model of environmentally accountable purchase behavior as a basis to clarify attitude formation using covariance structural analysis. The model effectively predicts the purchase of environmentally responsible and non-responsible product alternatives. The research verifies a hierarchical relationship from values, to product feature attitudes, to purchasing intention, to purchase behavior. Kollmuss and Agyeman (2002) discover an array of methodical structures and external and internal factors that prop up pro-environmental behavior and finds diverging and struggling factors related to consumers’ daily decisions. The study deduces that no single classic model adequately describes the void between environmental responsiveness and pro environmental behavior. Baker and Ozaki (2008) evaluate consumer behavior and advertising to recognize how consumers are induced to buy greener products. They have conducted their study on 52 mothers who shop at supermarkets and report a correlation between consumer confidence in the performance of green products and their pro-environmental beliefs in general. The outcomes suggest that although most consumers cannot simply recognize greener products, yet they would prefer the products of green companies.
Keen, Cherie (2004), attempted to find out the attributes that are crucial in determining preference of customers regarding alternatives of retail shopping. The theoretical driven study allowed expanding the consumer power behavior theories. The study had two main objectives: (a) to identify the structure the customers’ intention and (2) to examine the trade-offs customers are willing to make.

Jain and Kaur (2004), challenge to make an assessment of the level of environmental responsiveness, attitudes, and behavior widespread among the Indian consumers. The research finds that there is a high degree of environmental apprehension and behavior and the Indian consumers have been significantly affected by green communication movements. They depict compliance to take environmentally friendly actions, inquire about environment related facts, and pursue activities that help in preserving the environment and averting pollution. Manaktola and Jauhari (2007) investigate the factors affecting the consumer attitude and behavior towards green practices in the implanting industry in India and also review the consumers’ intentions to disburse for these practices using quantitative and qualitative research methodology. Their research put forward the fact that Indian consumers using hotel services are mindful about eco-friendly practices in India as they support the hotels that have acclimatized green practices. But they are not keen to negotiate on service worth nor do they want to pay additional for these services.

Vani, et al. (2010) studied consumer behavior in Bangalore city concerning toothpaste brands and explored that consumer responsiveness of toothpaste is less in city of Bangalore. Oral care marketplace proffers massive potential as dissemination and per capita usage of oral care products is very little in India. Moreover, the research established that brand image, advertising and offer perform a significant function in buying toothpaste, occasionally based on the offer the consumer contrast with challenger product and choose the finest one. Product characteristic was also examined by the consumer for choosing a brand. Replacing of one product to other company product chiefly depends on advertisement, brand name, packaging accessibility and rise in price.

Ali et. al. (2011) explores consumers’ intention to buy environmentally friendly products in Pakistan. The research aims to explore three things, firstly the hypothesised relationship between predictor and criterion variable viz: green purchase intention (GPI) and green purchase attitude (GPA), secondly, to reveal the relationship of criterion variable and outcome variable i.e. GPI and GPB and finally, to find out the moderating effect of perceived product quality and price (PPP&Q) between GPB and GPI. The end results authenticate that consumers are all set to purchase green products frequently, but these products must carry out competitively in the matter of price and quality just like the conventional products. Cheah and Phau (2011) in their research intend to classify the main precursors and moderators that effect consumers’ eagerness to purchase environmentally friendly products in Australian university. The outcomes explicate that the attitudes towards environmentally friendly products are considerably correlated with three precursors i.e. eco literacy, interpersonal influence and value orientation. Moreover, perceived product inevitability is recognized as a vital moderator disturbing the relationship between attitudes toward environmentally friendly products and the eagerness to purchase these products.

Gam (2011) deems that there are many variables that effect Environmental Fashion Clothing (EFC) purchase decisions of the consumers that must be recognized for apparel companies to efficiently market eco-friendly products. So, the author intends to identify whether fashion and shopping orientation are the
determinants of EFC purchase intention. Using factor analysis and a series of linear regression analyses, the study indicates that one fashion orientation factor, two shopping orientation factors, and three environmental concern and eco-friendly behavior factors are considerably connected to consumers’ purchase intention regarding EFC. Rahbar and Wahid (2011) examine if the green marketing instruments (i.e. environmental advertisement, eco-label and eco-brand) as a variable, disturb the consumer’s actual purchasing behavior among Penang’s consumers (state in Malaysia). The study shows that there exists a significant relationship between trust in eco-label, eco-brand and buying behavior. It confirms that the respondent’s trust in eco-label and eco-brand has a constructive effect on consumer’s actual buying behavior.

Ishaswini and Dutta (2011) in their research reveal the Indian consumers’ pro-environmental apprehensions, knowledge of environmental issues and responsiveness of eco-friendly products and investigate if pro-environmental apprehensions among consumers are prognostic of their green purchasing behaviour. The outcomes point out that consumer’ pro-environmental apprehensions and responsiveness towards eco-friendly products significantly influence their green buying behavior. Mannarswamy (2011) studies the awareness level of the customers of green products in Coimbatore and to assess the customers’ attitudes towards these products with the assistance of primary as well as secondary data. The research finds that even though the customers in Coimbatore are responsive to environmental issues and green products in the market but there are fewer enhancements in their attitude and behavior towards the green purchase. Mahapatra (2013) empirically inspects the approach of Indian consumers towards the environment and tries to comprehend the factors that affect environment conscious behavior towards the green products. The research depicts that the most noteworthy factors effecting consumers’ green purchasing are the personal advantage, price, the convenience of use, performance, availability, apprehension for environment and health concern. These factors in conjunction with product category have an important influence in deciding the total premium that an individual is ready to pay for green products.

Cherian and Jacob (2012) analyze the theoretical structure of green marketing and examine the numerous ways in which the diverse consumer characteristics are associated with the concept of green marketing. The research deduces that it is essential to form strategies and plans in relation to green products and apply them so as to direct and help the retailers and customers towards a green transformation. Danseh et. al. (2012) goal to evaluate the connections between four variables i.e. attitude toward purchasing green products, skewed norms, perceived behavioral restraint and past understandings with green products and propensity to purchase these products and the involvement of those variables in this attitude. The rulings of the research confirm that all variables have a constructive correlation with the attitude to buy green products. The research also forecasts the involvement of each variable. Suki (2013) aims to look at the impact of consumers’ environmental interests, responsiveness to green product, price and brand image on their buying decision of green products. The research was commenced on the basis of reactions from the apprentice in a public university in the Federal Territory of Labuan, Malaysia. The outcomes legalized the information that consumers’ buying decision of green products are considerably affected by the responsiveness to price and brand image.

Prajapati and Thakor (2012) inspected the pioneering promotional and competitive methods used by toothpaste companies in the rural market and its bearing on consumer buying behavior in Gujarat. According to study, rural consumers are more apprehensive about the brand name and quality of the oral care products purchased by them. Also, it was also established that the rural consumers stick to the same
products once they find that certain brands are appropriate to them, they do not alter it easily due to many influences, such as friends, or social groups, and lack of accessibility to their common brands. In the category of toothpaste, Colgate and Close-up are the most preferred and favorite brands. Price, color, promotional schemes, and product availability are the most influencing factor when they purchase toothpaste. The rural customers are usually following the directives of the retailers for purchasing the toothpaste and also deem the promotional scheme when purchasing the toothpaste and the prices off schemes are the most influencing factor to them. When there are special price discounts and dentist recommend them to buy the toothpaste they certainly purchase it.

Vaishnani (2012) has inspected and calculated brand equity perception in with orientation with sales promotion schemes for preferred FMCG goods and it is accomplished that there is no noteworthy dissimilarity between brand equity perceptions among gender as one of the demographic variables. Distant from it, it is accomplished that there is a noteworthy differentiation between brand equity perceptions among various employment grade. In addition to it, it is apparent that self-employed shoppers contrast to not employed shoppers, recognize sales promotion schemes less constructively. Moreover, it is accomplished that there is no important disparity between brand equity perception and academic prerequisite.

Franco, et al. (2012) has analyzed and concentrated on using the theory of modern portfolio in price promotions, which has become a major element in the marketing mix of stimulating sales, especially in the FMCG environment. The premise of this study is that prior constraint of the theory of modern portfolio in marketing can be beaten through the use of price promotion brackets. This is confirmed through research of FMCG data and it is shown that price promotions can be optimized to maximize return without increased risk.

Table Summary of the factors influence Purchasing Intentions of Environment-Friendly Products

<table>
<thead>
<tr>
<th>Author</th>
<th>Factors</th>
<th>Product/Group Respondents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aertsens et al. (2009)</td>
<td>Attitudes, subjective norms, perceived, behavioral control</td>
<td>Organic foods</td>
</tr>
<tr>
<td>Chen and Chang (2012)</td>
<td>Green perceived values, perceived risk, perceived trust</td>
<td>Information and electronics products</td>
</tr>
<tr>
<td>Follows and Jobber (2000)</td>
<td>Attitudes towards environmental consequences and individual consequences</td>
<td>Diapers</td>
</tr>
<tr>
<td>Ismail et al. (2012)</td>
<td>Perceived risk, social norms and perceived quality</td>
<td>Genetically modified food</td>
</tr>
<tr>
<td>Junaedi (2007)</td>
<td>Ecological affect</td>
<td>Daily food</td>
</tr>
<tr>
<td>Kalafatis et al. (1999)</td>
<td>Attitudes, subjective norms and perceived control</td>
<td>Wood/Furniture</td>
</tr>
<tr>
<td>Kim and Chung (2011)</td>
<td>Attitude, subjective norm, perceived control, and past experience</td>
<td>Organic personal care products</td>
</tr>
<tr>
<td>Oliver and Lee (2010)</td>
<td>Green information seeking, self-image and social values</td>
<td>Cars</td>
</tr>
<tr>
<td>Mei, Ling and Piew (2012)</td>
<td>Environmental knowledge, environmental attitude, government initiatives, peer pressure and eco-label</td>
<td>Activist groups</td>
</tr>
<tr>
<td>Ramayah, Lee and Mohamad (2010)</td>
<td>Attitudes towards environmental consequences and individual consequences</td>
<td>Diapers</td>
</tr>
<tr>
<td>Teng and Wang (2015)</td>
<td>Attitude, subjective norm, and trust</td>
<td>Organic food</td>
</tr>
</tbody>
</table>
In the context of the above studies conducted by different authors across the continent, no such studies were conducted particularly to marketing mix and purchase intentions of EF-products in India. Therefore, the present research will try to bridge this research gap.

**Objectives of the Study**

Following objectives were laid down to carry out the current study;

1- To examine the factors/elements from the marketing-mix used by the FMCG companies in India to affect the consumers’ purchasing attitudes towards environment-friendly (EF) products.
2- To identify the extent of the impact of these factors on the purchase of EF products in India.
3- To inspect the effect of other factors like word of mouth and satisfaction on their purchase decisions.
4- To examine the relationship between positive attitude towards EF products and purchase intention in the context of FMCG sector companies in India

**Marketing-Mix**

The Marketing mix is composed of four elements (i.e. the 4Ps - product, price, place, and promotion) (Kotler and Keller, 2009). Marketing-mix modeling allows marketers to comprehend in which direction they have to invest in the 4Ps, such as "what strategies they have to elaborate?" "How to allocate resources for each factor?" in order to satisfy customers’ expectations (Kotler and 2009). The present research aims to disclose that each of these four elements (product, price, promotion and place) influence consumers’ attitudes and hence their decisions to buy environmental-friendly products. Our research focuses on the “Quality” aspect regarding the ‘Product’ element; “Willingness to pay extra price” regarding the “Price” element; “Advertising” aspect regarding ‘Promotion’ and ‘Ease of availability/ Knowledge of its location’ regarding the “Place” element.

**Product**

The product includes “the whole bundle of utilities (or benefits) acquired with the aid of consumers in the change procedure”. The quality of the product, its package, its functionalities, and its layout are some of the most important features inside the product mix. In our present study, we are particularly aware of the quality of the product and the eco-friendly products in FMCG sector.

**Price**

As stated by AMA, the price is “the formal ratio that indicates the quantities of money services or goods needed to acquire a given quantity of services or goods (marketingpower.com).

**Place**

This marketing mix element appears when “firms decide the most effective channels of outlet through which to sell their products and how best to get them here” (Blackwell et al, 2006, p.49). Kotler and Keller describe the place as including channels, assortments, coverage, location and inventory (2009, p.62).
Promotion

According to Kotler and Keller (2009, p. 63) promotion involves “advertising, sales promotion, sales force, direct marketing and public relations”. However, in our present research we will mainly focus on advertising because our survey deals with purchase intentions and attitudes towards eco-friendly products in FMCG sector.

Word of Mouth

The word of mouth is the communication of ideas, opinions, comments, and information between two or more people in an informal way, neither one of which is a marketer. It has an immense role in promoting the product (including the green products) by affecting the purchase decision. The research suggests testing the proposition that friends and family may influence consumer’s purchase decision of environment-friendly products.

Satisfaction

Satisfaction plays a significant role in the attitude of the consumer’s towards EF products. Satisfaction is the result of the quality of the product, performance, price and previous purchase experience.

Purchase Intention

Purchase intention can be stated as “what consumers think they will buy”. Intentions of the consumer play an important role in marketing strategies (to implement four P strategies) because they allow organizations to evaluate how many products could be manufactured according to the demand. To predict the purchase intention, organizations can interview shoppers about their past purchase behaviors in order to forecast their future behaviors and demand but the products that people used to buy in the past may be distinctive of those they may purchase. Therefore, another method is to ask consumers what they intend to do (Blackwell et al., 2006, p. 409-410, 742).

Attitudes

In a psychological sense, attitude is defined as a “tendency that is expressed by evaluating a particular entity with some degree of favor or disfavor” (Eagly and Chaiken, 1993, p. 1).

Customer Perception

Perception is the process through which a consumer selects, organizes and interprets into a sensible and coherent image of the world, thereby attaining sensory information awareness (Schiffman Kanuk). Consumers act and react on the basis of their perceptions that also underline the consumer preferences.

Purchase Frequency

The practice of frequency marketing by many firms is typically through formal loyalty programs, which aim to encourage repeat purchase and increase customer retention. Therefore, purchase frequency is the number of occasions during a period of time that a consumer purchases a particular product or buys from a particular seller.
**Conceptual Model**

On the basis of the study of the literature available about green attitudes and purchase intention, the following conceptual model has been suggested for the research.

**Figure: Conceptual Model of Purchase Intentions of EF-Products**

The conceptual model illustrates that the four marketing-mix elements and word of mouth assist in consumers’ attitude formation concerning green products and ultimately lead to purchase decision. This model is motivated from the study of Wanninayake and Randiwela (2008) and Purohit (2011) with adjustments as per the demand of the research objectives.

Therefore, the following research hypothesis will be tested:

**Testable Hypothesis**

- H1: Price and consumers’ attitudes towards EF products are positively correlated.
- H2: Product and consumers’ attitudes towards EF products are positively correlated
- H3: Promotion and consumers’ attitudes towards EF products are positively correlated.
- H4: Word of Mouth and consumers’ attitudes towards EF products are positively correlated.
- H5: Place and consumers’ attitudes towards EF products are positively correlated.
- H6: Satisfaction and consumers’ attitudes towards EF products are positively correlated.
- H7: Consumers’ attitudes towards EF products and purchase of these products are significantly correlated

**Research Methodology & Data Analysis**

The research necessitates compilation of data on each of the four marketing-mix components, also on other factors like word of mouth, in order to scrutinize which factors influence attitudes and buying intention of green products, and to what degree. For this reason, the research uses a quantitative research design which includes data compilation based on a study and the additional analysis and examination of
data in association with the research objectives. The sample consists of 650 respondents belonging to Delhi who were chosen on the basis of convenience random sampling. The respondents were made to fill up a well-structured closed-ended questionnaire consisting of questions split into two portions. The first portion contained demographic facts and the second portion contained questions relating to the perception, attitudes and the buying intentions of the respondents on eco-friendly products. Each question is gauged on a five-point Likert scale with response options ranging from strongly disagree to strongly agree or from less purchased to more purchase. Prior to further data collection, the researcher conducted a pilot study to check the appropriateness of the tool used in this research. A total of 512 finished and authenticated questionnaires were received. After the data compilation, the reactions are processed and examined with the assistance of SPSS Statistical Software. After examining the demographics of the data, the consistency of the reactions is tested using Cronbach’s Alpha and then the reactions are assessed and processed using factor analysis and multiple regressions so as to scrutinize and measure the influence of various independent variables (Product, Price, Promotion, Place, Word of Mouth) on the dependent variable (purchase intention of environmental-friendly products).

**Analysis & Interpretation of Results**

This segment contains analysis and interpretations of the outcomes through various measurements. The sample consists of 512 responses, the demographic details of which are tabularized below in Table 1:

<table>
<thead>
<tr>
<th>Table (1): The Demographic Features of the Sample</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gender</strong></td>
</tr>
<tr>
<td>Actual Number</td>
</tr>
<tr>
<td>Percentage</td>
</tr>
<tr>
<td><strong>Age</strong></td>
</tr>
<tr>
<td>Actual Number</td>
</tr>
<tr>
<td>Percentage</td>
</tr>
<tr>
<td><strong>Status</strong></td>
</tr>
<tr>
<td>Actual Number</td>
</tr>
<tr>
<td>Percentage</td>
</tr>
<tr>
<td><strong>Income</strong></td>
</tr>
<tr>
<td>Actual Number</td>
</tr>
<tr>
<td>Percentage</td>
</tr>
</tbody>
</table>

**Findings of the Demographic Features are Listed through the Points Below:**

1- The percentage of women, (58%), is more than men, (42%), but the difference between them is not high.

2- The sample consist of 48.6% respondents between the age group of 18 to 24 years (mostly comprising of the students); 42.1% of the respondents belong to the age group of 25-44 years and very less percentage i.e. 9.1% belong to the age 45 and above.

3- More than half of the respondents (54.8%) are students; the second most important group comprises
of the employed people (38%); whereas there is minority of unemployed (4.8%) and retired (2.1%) persons.

4- 59.1% of the respondents have some income whereas 41% have no income.

In order to compare the means of two groups of the variable (like male and female) and to check if there is no effective difference between these means, an independent and paired sample t-test has been used in the study. If the level of significance is more than 0.05, it means there is no difference, whereas, if it is less than 0.05, the difference is significant. The findings of the t-test indicate that:

1- Even though the females buy more EF products i.e. food/health care/cleaning products (looking at the mean values), the outcomes of t-test show that no significant difference was there (P>0.05).

2- There are significant differences between the ages of our sample (p<0.05). The main differences are between the age group 18-24 years which is significant because the majority of our respondents are in this age group as (P Value is < 0.05).

3- There was no significant difference in status; the category ‘Employed’ and ‘Student’ have the more close value to the level of significance as (P Value is > 0.05).

4- People having income have more frequency to buy EF products compared to people without income so there exists significant difference between the groups as (P Value is < 0.05).

**Simple Correlation and Cronbach’s Alpha**

To test our research hypothesis, we are required to relate every marketing mix element and the word of mouth and satisfaction to the attitudes and the buying intentions (actions) of the consumers concerning environmental-friendly products. As such, we compiled data on some items equivalent to each of these factors to create new variables for the research. Firstly, the consistency of our data is checked by using the Cronbach’s alpha which reveals an internal consistency between the variables and ensures minimum errors and stable outcomes. The outcomes of Cronbach’s Alpha test are displayed in Table 2:

**Table (2): Cronbach’s Alpha Test**

<table>
<thead>
<tr>
<th>Variables</th>
<th>No. of Items</th>
<th>Cronbach’s Alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td>Product (quality)</td>
<td>3</td>
<td>0.683</td>
</tr>
<tr>
<td>Promotion/Advertisement</td>
<td>2</td>
<td>0.784</td>
</tr>
<tr>
<td>Place</td>
<td>2</td>
<td>0.692</td>
</tr>
<tr>
<td>Word of Mouth</td>
<td>2</td>
<td>0.75</td>
</tr>
<tr>
<td>Attitude</td>
<td>5</td>
<td>0.776</td>
</tr>
<tr>
<td>Purchase Frequency</td>
<td>3</td>
<td>0.644</td>
</tr>
<tr>
<td>Price</td>
<td>1</td>
<td>NA</td>
</tr>
</tbody>
</table>

The outcomes depict that for the variables attitude, word of mouth and advertisement, the Cronbach’s alpha values are more than 0.700, which means that the reliability between items is consistent enough. However, for the variables purchase frequency, product quality and place, the values are above 0.600 but less than 0.700, which specify a weak degree of internal consistency between the items. But as we cannot eliminate out
these variables to test our hypothesis so we will accept this alpha. After confirming the internal consistency of the variables we measure the correlation of the variables, the outcome of which is shown in Table 3. This displays Pearson’s correlation of different variables with the dependent variable ‘Purchase Intention’.

**Results of the Analysis Highlight That:**

1- ‘Price’ includes of one item ‘Willingness to pay extra price for EF products’ shows positive and good moderate relationship with the purchase intentions. (H1)

2- ‘Product Quality’ which includes three items i.e. ‘Eco-friendly products are healthy’, ‘Good performance of these products’ (perceptual & observed) and ‘Superior performance in contrast to the conventional products’(advanced features, EF) is positively correlated with the purchase intentions of EF products. (H2)

3- ‘Promotion/Advertisement’ comprises of ‘I pay attention to EF advertising, and ‘I believe in such advertising’ also shows a positive relationship with the purchase intentions. (H3)

4- The variable ‘Word of Mouth’ comprises of two items ‘I listen to the opinions of family/friends regarding EF products’ and ‘I pay attention towards that’ is also positively correlated with the purchase intentions. (H4)

5- ‘Place’ comprises ‘Easy availability of EF products’ and ‘Knowledge of the location of these products’ also shows a positive relationship with the purchase intentions. (H5)

6- Another variable ‘Purchase Frequency of Environment-friendly FMCG products’ is composed of the purchase frequency of ‘food’, ‘health care/ cosmetic products’ and ‘cleaning products’ also shows a positive correlation with the purchase intention. (H6)

7- The variable ‘Attitude’ comprises of the items like ‘Improves image on using these products’, ‘Feel trendy on buying these products’ etc. This also shows a positive correlation with the purchase intentions. (H7)

**Table (3): Pearson’s Correlation of The Variables with Purchase Intention**

<table>
<thead>
<tr>
<th>Variables</th>
<th>Pearson’s Correlation* with Purchase Intention</th>
</tr>
</thead>
<tbody>
<tr>
<td>Price/ Willingness to pay premium</td>
<td>Correlation 0.579</td>
</tr>
<tr>
<td>Purchase Frequency</td>
<td>Correlation 0.670</td>
</tr>
<tr>
<td>Place</td>
<td>Correlation 0.370</td>
</tr>
<tr>
<td>Attitude (Word of mouth and advertising)</td>
<td>Correlation 0.694</td>
</tr>
<tr>
<td>Product Quality</td>
<td>Correlation 0.431</td>
</tr>
<tr>
<td>Satisfaction</td>
<td>Correlation 0.769</td>
</tr>
</tbody>
</table>

*Significance for all variables=.000

**Multiple Regression and Anova**

In proportionate with our research aims, we require to decide the factors disturbing the purchase intention of Environmental Friendly (EF) products and the factor/s that have most significant influence on purchase intention, so we use multiple regression for that purpose.
Table (4): Summary of Multiple Regressions

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R²</th>
<th>Adjusted R²</th>
<th>Std. Error of Estimates</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>0.766</td>
<td>0.589</td>
<td>0.550</td>
<td>0.767</td>
</tr>
</tbody>
</table>

Table (5): Results of Anova Test

<table>
<thead>
<tr>
<th></th>
<th>Sum of Squares</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regression</td>
<td>128,446</td>
<td>18,408</td>
<td>31,191</td>
<td>0.000</td>
</tr>
<tr>
<td>Residual</td>
<td>99,3452</td>
<td>.566</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>2137014</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Dependent Variable: Purchase intention of EF products

Table 4 and 5 show the results of multiple regression and ANOVA. The R² is equal to 0.589 which means that 58.8% of the variance of the purchase intention of EF product is explained by six variables of our model, so it is a satisfactory result. The significance of this result is confirmed by looking the ANOVA table, with a level of significance equal to 0.000 (Table 5).

Table (6): Coefficients -Multiple Regressions

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized coefficients</th>
<th>Standardized coefficients</th>
<th>t</th>
<th>Sig.</th>
<th>Correlations</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>(Constant)</td>
<td>-0.532</td>
<td>0.447</td>
<td>-1.223</td>
<td>0.184</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Product Quality</td>
<td>0.017</td>
<td>0.110</td>
<td>0.012</td>
<td>0.158</td>
<td>0.890</td>
<td>0.013</td>
</tr>
<tr>
<td>Place</td>
<td>0.103</td>
<td>0.076</td>
<td>0.071</td>
<td>1.367</td>
<td>0.189</td>
<td>0.106</td>
</tr>
<tr>
<td>Purchase Frequency</td>
<td>0.394</td>
<td>0.079</td>
<td>0.297</td>
<td>5.088</td>
<td>0.000</td>
<td>0.366</td>
</tr>
<tr>
<td>Attitude (Word of mouth and advertising)</td>
<td>0.328</td>
<td>0.093</td>
<td>0.246</td>
<td>3.537</td>
<td>0.002</td>
<td>0.268</td>
</tr>
<tr>
<td>Satisfaction</td>
<td>0.335</td>
<td>0.076</td>
<td>0.277</td>
<td>4.542</td>
<td>0.000</td>
<td>0.331</td>
</tr>
<tr>
<td>Price/ Willingness to pay premium</td>
<td>0.218</td>
<td>0.063</td>
<td>0.207</td>
<td>3.424</td>
<td>0.002</td>
<td>0.257</td>
</tr>
</tbody>
</table>

By looking at the values of beta in table 6, a comparison can be made of the factors which contribute more or less to the variance of purchase intention. Looking at the results, it can be stated that purchase frequency (Beta=0.297) and satisfaction (Beta=0.277) contribute significantly towards the purchase intention with a significance equal to 0.000 (<0.01). Consumers’ attitude (Beta=0.246) and willingness to pay premium/price (Beta=0.207) also influence the purchase intention significantly with a level of significance 0.001 (<0.01). However, product quality (Beta=0.012) and place (Beta=0.071) have no contribution towards the purchase intention of EF products (level of significance>0.01). Thus, our conceptual model explains more than half (58.7%) of the variance of the purchase intention. Out of it, purchase frequency explains 6.16% (Square of Part correlation) of the variance, followed by satisfaction 5.36% and attitudes (Word of mouth) 3.18%. Thus, purchase frequency of FMCG EF products makes the biggest contribution, followed by satis-
faction, attitudes, and price. As such, the model explains that the factors which contribute the most towards the purchase intention of EF products are satisfaction through their past experience with the product, word of mouth i.e. communications from their peers and family as well as the promotion through advertising.

Findings of the Study

The main aim of the research was to examine the factors from the marketing-mix used by the FMCG companies in India to influence the consumers’ buying attitudes towards environmental-friendly (EF) products and also the degree of their impact, besides surveying the impact of other factors like word of mouth and satisfaction. A modified research model has emerged that has added a new aspect to the well-accepted marketing-mix model in the name of ‘word of mouth’ and ‘satisfaction’. Going back to the research hypothesis, we get that:

1- About Price/Willingness to pay an extra price, the outcomes disclose that most of our sample is keen to pay extra price for EF products, thus, they have constructive attitudes towards the price element and they are willing to pay more for products that have constructive effects on the environment. The outcomes divulge that price contributes significantly (Beta=0.207) to describe the variance of buying intention. Thus, we can accept our hypothesis H1. Certainly, people having an earning are more ready to pay an extra amount than individuals without an earning, which is rational also. As more than half of our sample consists of people having to earn, our outcomes can be simplified.

2- Concerning Product/Product Quality, the empirical outcomes show that even though consumers think that EF products are fine for the environment (looking at the mean value) i.e. they have a constructive attitude towards these products, but they deem that traditional products are more proficient than eco-friendly ones. Moreover, the outcomes of multiple regression confirm that product quality has no noteworthy contribution towards the buying intention of EF products (Beta=0.012), even though a correlation (=0.431) exists between the two variables. So, we can fractionally accept our hypothesis H2. Thus, customers do not buy green goods for their quality feature, but for other reasons explained below. In case of the product quality, green consumes will not negotiate on it, so businesses must improve green product quality as well as concentrate on environmental advantages of a product, and disclose these aspects with customers in order to accomplish the recognition in the market. (D’Souza., Taghian & Lamb, 2006).

3- Regarding Promotion/Advertising, our outcomes depict that Advertising was positively linked to purchase intention. There are significant differences in our sample, as people having an earning usually pay more notice and they believe in green advertising. Certainly, advertising is a part of attitude and this attitude represents one of the independent variables used in our multiple-regression, which describes the most significant contribution (Beta= 0.246) to the variance of purchase intention. So, we accept hypothesis H3.

4- The research depicts the significance of ‘word of mouth’ as people pay much notice to the attitude of their family and friends regarding EF products as well as they advocate them to others. The variable ‘Attitude’ composed of ‘word of mouth’ and ‘advertising’ has a positive correlation with the purchase intention (0.0694). Therefore, we accept hypothesis H4.

5- ‘Place’ which includes ‘Easy availability of EF products’ and ‘Knowledge of the location of these products’ has low Cronbach’s alpha (0.692) in contrast to the other variables. Also, there exists a low correlation between place and purchase intention (0.370) specifying that a weak correlation is there between these variables. Thus our hypothesis H5 could be partially accepted since consumers ap-
pear to know well where the EF goods are but this information does not influence to buy i.e. it has no relationship with the purchase intention. Therefore, companies should pay more notice on the proper exhibition of EF products to reach the prospective consumers.

6- The survey shows that the variables ‘price’, ‘promotion’, ‘word of mouth’ and ‘satisfaction’ are positively and significantly influencing the attitudes and hence the purchase intention of EF products. However, in case of ‘product quality’ and ‘place’, we cannot fully accept the hypothesis, So, we cannot fully accept our hypothesis H6 because individuals have enough positive attitudes towards EF product quality, but it may not necessarily be converted into purchase intention.

7- The findings show that purchase intention was positively correlated to satisfaction (Pearson coefficient= 0.769). According to the outcomes, the purchase frequency of EF products and satisfaction describe the most involvement to the variance of purchase intention. It implies that the more people buy EF goods and the more they are satisfied with the perceived quality of their previous purchases of products, the more they are set to repeat purchase of these goods that can lead to brand loyalty toward these brands. Thus, we can accept our hypothesis H7 that assumes that satisfaction towards EF goods leads to purchase intention of these goods.

**Summary & Conclusion**

Sustainability of the business is the thought that has received considerable attention from both academicians and practitioners, and environmental issues have brought about modifications in consumer demands and behaviors. (Mendles and Polonsky, 1995). The current research demonstrates that the major factors affecting the attitudes and purchase intentions of the environment-friendly products are satisfaction from the past understandings, promotional activities/advertising and word of mouth communications by friends, family, and peers. Constructive attitudes regarding readiness to pay the extra price for EF products are also correlated with buying intention. Moreover, product quality and place element should not be disregarded by the organizations in the process of the new product offering to the customers.

Therefore, organizations targeting to increase market penetration for their EF product offerings should develop campaigns directed at rising apprehension about environmental quality in the consumer base. The research can enable marketing managers to plan the relevant marketing strategies on marketing mix elements so as to satisfy the potential target market, thereby earning profits for themselves. They can offer suitable and advanced environmental-friendly products in the market to take care the environmental concerns. The study would be of great assistance to the companies in FMCG sector as they get an idea about the best marketing strategies that they can adopt to comprehend the consumers’ attitudes and purchase intentions towards eco-friendly products. Furthermore, these companies will have foretold about how to profile environmental-friendly consumers in India and to create effective messages that will practically and emotionally appeal to their target customers. In a nutshell, it was concluded that marketing mix and its effectiveness was positively related. It was also revealed that people form attitudes towards FMGC products on the basis of their beliefs, knowledge, and perception about these environmental-friendly products.
References:


- Ohtomo, S. and Y. Hirose.; (2007). “The Dual-process of Reactive and Intentional Decision-making In-


