

Green Pricing Model with Mental and R&D Share: A Strategy for non Green Firms

Sayyad Mohsin Raza¹, Mahmood A. Husain Mahmood², Shahid Mahmood³, Sree Krishna Bharadwaj H.^{4*}

¹National College of Business Administration & Economics, Lahore; ²Graduate School of Business, Universiti Kebangsaan Malaysia; ³College of Management Science, Shenzhen University China; ⁴BMS College of Law, India

*E-mail: krishnabharadwaj211@gmail.com

Abstract

The research on green marketing practices is going popular now a day but still many companies are lagging behind in development of green products. Thus, these companies may follow the green marketing mix approach to get competitive advantage in term of profitability. This study focused on only one element of green marketing mix (i.e Green Price). SPSS was used to interpret the results while the data was collected from employees of Unilever. The relation of green price is studies with mental and R&D share and study provided the significant results. The derived model can be used by non green firms to add green element at least in their sales operations.

Keywords: Green Marketing; Green Price; R&D share; Mental share; Green Firms

Introduction

Rajeshkumar (2012) defines Green Marketing as a popular and growing trend where the market facilitates products that are environment-friendly on an individual as well as animal and planet basis. Nagaraju & Thejaswini (2014) Climate change and global warming has been increasing continuously over the past decades and the public is more aware and concerned about environmental problems. To protect the Earth's environmental health and resources, businesses and consumers are adapting eco-friendly practices and products. To increase social consciousness, the businesses are applying green marketing practices and reaching out to consumers with green messages.

Green Marketing has been defined in multiple ways-

- Pride and Ferrell (1993) states that the organization designs and promotes environment friendly products. The pricing and distribution is planned accordingly. This design is also referred to as environmental or sustainable marketing.

- M. J. Polonsky and P. J. Rosenberger (2011) "All activities designed to generate and facilitate any exchanges intended to satisfy human needs or wants such that the satisfaction of these needs and wants occurs, with minimal detrimental impact on the natural environment."

Increasing media exposure puts pressure on organizations to adopt eco-friendly procedures. Green marketing has evolved with product packaging and presentation of green practices adopted by organizations. Legislative pressure and pressure of environmental groups have genuinely improved sustainable marketing plans and eco-responsibility of organizations.

- Wiser and Pickle (1997) explains that the marketing of green products emphasizes personal health, convenience, quality and price. However, green product sales have not been very impressive.

Recently, there has been a proliferation of "green" products which is likely to provide more data on consumer willingness-to-pay for public goods.

- Ansar (2013) claims that the difference between traditional marketing and green marketing is that green marketing manufactures differentiates pricing and promotes environmentally safe goods and services without compromising customer satisfaction. This has become an integral part of companies and the society in general.

- Digel and Yazdanifard (2014) states that green marketing includes changes in the production process, progression in packaging, transformations in production line and advertising.

Green Consumers have been defined as-

- Elkington (1994: 93) A green consumer avoids products that-
 - Consume an unbalanced amount of energy.
 - Damage the environment during manufacture, use or disposal.
 - Generates preventable waste.
 - Involve unnecessary animal cruelty.
 - Use materials derived from threatened species and environments.
 - Adversely affect other countries.
- A person “who adopts environmentally-friendly behaviours, and/or who purchases green products over the standard alternatives” (Verneker & Wadhwa, 2011).
- A consumer who has a positive outlook towards the environment and purchases green products (Balderjahn, 1988).
- Green consumers choose green products over conventional options; adopt eco-friendly methods of use and disposal. Studying Green Consumer behaviour involves understanding the customer’s purchasing habits (Wasik, 1996; Ottman, 1993; Caimcross, 1992; Vandermerwe and Oliff, 1990; Simon, 1992).

Thogersen and Olander (2002) A business is now assessed by its profits, contribution to human potential and its harmony with both natural and artificial resources. Selling and cleaning-up environmentally products are both equally hard. Organizations need to recycle materials and use organic ingredients for manufacturing products. Marketing eco-friendly goods is hard in general due to consumer purchase behaviour which can only be improved through awareness and changes in purchasing values and attitudes of the consumers.

Literature

Green business

The Department of Environmental Affairs and Tourism (2005) observes that globalization has changed the way a business is conducted. Exploitation of natural resources and growing pressure on the environment has invariably linked trade and the environment. Environmental degradation is not the only motivation behind companies adopting green marketing. Singh (2012) concludes that green marketing within firms is largely influenced by legislative pressure, stakeholder and competitive pressure, corporate social responsibility and opportunity. Bhatia and Jain (2013) claims that consumers prefer eco-friendly products and companies that follow green practices. Rayapura (2014) states that a Nielson global study found that an estimated 55% of online consumers located across sixty countries were willing to pay more for products and services from socially and environmentally friendly companies. The demand for green products, services and companies have increased significantly. Therefore, consumer demand is primary reason for adapting green marketing practices (Marcacci, 2013). Samarasinghe (2012) claims that the motivation is to strike as balance between company objectives along with social and environmental concerns.

The green marketing mix

Davari & Strutton (2014) explains that the green marketing mix includes product development, pricing, promoting and distributing strategies that are specifically designed to promote and preserve environmental welfare. Companies are often forced to implement these policies while displaying an advertisement or launching a product in the market.

Green product

Diglel and Yazdanifard (2014) defines a green product as one that is produced in a way that minimizes adverse environmental effects, is a recycled product and/or is packaged using recycled materials, is manufactured locally and preserves natural resources. The rise in demand of green products is because the modern day individuals perceive green products to be healthy and organic. Green products are of higher quality and contribute in preserving the environment (Ottoman & Mallen, 2014). Magnet, Roche and Münnich (2009) claims that customers prefer the benefits of green products that include freshness, taste, safety, health. The savings on energy costs also plays a significant role.

Green price

Burrow (2008) explains that price is the amount an individual has to pay to obtain an item. Customers generally choose not to buy perceive green products as they perceive them to be expensive (Bukhari, 2011). The younger generation who have greater spending capabilities are looking for green products and are willing to pay the price (Anvar & Venter, 2014). Abzari, Faranak, Sharbiyani & Morad (2013) found that customers are willing to pay a higher price if the benefits of consumption of a green product outweigh its price.

Green promotion

Aesthetic product packaging is an effective method of marketing and informing consumers about a product. Packaging contains and protects the product. It also identifies and describes the products and makes them marketable. Agyeman (2014) believes product packaging heavily influence consumer's choice of buying a green product. Green consumers are mostly women and they read labels of green products to see how it was manufactured, whether the product is ecologically compatible, CFC-free, biodegradable etc (Laroche, Begeron & Barbaro-Forelo, 2001). Modern marketers can influence consumer preference and decision making by emotional advertising (Ahem, 2013).

Green place

Kontic (2010) believes customers are not willing to travel far to purchase green products. Location and accessibility has a substantial impact on the buying pattern of consumers. Products need to be positioned broadly in the market place. Gittell, Magnusson & Mirenda (2015) studied that easy availability of green products in supermarkets will encourage green purchase.

The relationship between Green Marketing and Consumer Purchasing Behaviour

The marketing consists of 4 P's; product, price, promotion and place.

Young, Hwang, McDonald, and Oates (2010) found out that 30% of consumers expect green products to be energy-efficient and eco-friendly during the process of manufacture, use and disposal. Consumers also expect green products to help water conservation. Halbright & Dunn (2010) explains that many international firms use green products to balance its revenues with its responsibility to reduce environmental pollution. For example, Toyota produces a car 'Prius' which has an environmentally friendly engine that uses emission-reducing gasoline which reduces the amount of carbon dioxide and nitrogen oxide released into the atmosphere. Low price strategies used by firms is effective and encourages customers to buy eco friendly products. This also provides competitive advantage for the firm in the marketplace. If the price is high, firms market them as

premium products with higher quality while also providing better specifications and appearance (Chandra, 2009). Green advertising has three aspects, first content is about an environmental concern; second content talks about how the firm has improved the production process to pursue eco-friendly practices and then the advertisement focuses on the environmental responsibility as a part of the firm's image (Sharma, 2011). Mohr, Webb, and Harris (2001) states that firms with higher corporate social responsibility positively affect the purchasing decisions of consumers. It also creates a positive evaluation of the firm.

Methodology

This study is quantitative approach and we used questionnaire strategy. The basic method used for this research is descriptive- correlation method. The data was collected from 138 employees of Unilever and simple random sampling method was used.

Tools of data collection

The following methods were used for data collection:

1- Historical study: This method comprises the detailed literature available on green marketing and specially its component i.e green pricing.

2- Study in field: In order to measure the effect of green pricing on mental share and R&D share, self made questionnaire was developed.

SPSS software was used to analyze following hypothesis.

H₁: Green price has a positive and significant effect on mental share increase.

H₂: Green price has a positive and significant effect on research and development share increase.

The validity was checked by face validity and the reliability was checked by cronbach's alpha and its value was 0.870 which is acceptable.

Results

In order to judge the hypothesis SPSS was used and Spearman's rank correlation coefficient of two variables of green price and mental share were obtained and their significance was checked. According to the below given table that is the result of SPSS output the estimated value of correlation coefficient between these two variables is equal to 0.481. This is a positive value that confirms positive correlation between the two variables and is significant at level $\alpha = 0.05$, because p-value is less than 0 (i.e 0.01). Thus, H₁: "Green price has a positive and significant effect on mental share" increase is accepted.

Table 1. Spearman's rank correlation (Green price and mental share)

Green Marketing Mix	
Variables	Market share
Correlation Co efficient	0.481
P- Value	0.01

The hypothesis "H₂: Green price has a positive and significant effect on research and development share". In order to study the significance between green price and research and development share Spearman's rank correlation coefficient of two variables of green price and vocal share were obtained. According to table 2, the result of SPSS output the estimated value of correlation coefficient between these two variables is equal to 0.517. This is a positive value that

confirms positive correlation between the two variables and is significant at level $\alpha = 0.05$, because p-value is less than 0.05.

Table 2. Spearman's rank correlation coefficient of two variables of green price and vocal share

Green Price	
Variables	Market share
Correlation Co efficient	0.519
P- Value	0.02

Conclusion

Research on green marketing is going very popular these days even several companies are focusing towards green industrial practices. The study has taken once independent variables and two dependent variables. Green price is taken as independent variable, mental and R&D share is taken as dependent variable and this study shows the positive results which clearly indicate the strong relationship. Two hypotheses were made and as a result it was found that green price has effect mental share and research and development share of any product. Thus companies or marketing managers should focus on green pricing if they to increase the mental share and R&D share.

References

- Abzari, M., Faranak, S.S., Sharbiyani, A.A. and Morad, A.P. (2013). Studying the effect of green marketing on market share increase, *European Journal of Natural and Social Sciences* (online), 2(3), pp. 641-653.
- Agyeman, C.M. (2014). Consumer's Buying Behavior towards Green Products: an exploratory study, *International Journal of Management Research and Business Strategy* (online), 3(1), pp. 188-19.
- Ahern, L. (2013). *Why emotion beats reason in green marketing*
- Anvar, M. and Venter, M. (2014). Attitudes and Purchase Behavior of Green Products among Generation Y Consumers in South Africa, *Mediterranean Journal of Social Sciences* (online), 5(21), pp. 183-194.
- Balderjahn, I. (1988). Personality variables and environmental attitudes as predictors of ecologically responsible consumption patterns. *Journal of Business Research*. 17 pp. 51-56.
- Bhatia, M. and Jain, A. (2013). Green Marketing: A Study of Consumer Perception and Preferences in India, *Electronic Green journal* (online), 1(36), pp. 1-19
- Bukhari, S.S. (2011). Green Marketing and its Impact on Consumer Behavior, *European Journal of Business and Management* (online), 3(4), pp. 375-383.
- Burrow, J.L. (2008). *Marketing*. 2nd ed. Ohio: Thomson South-Western.
- Cairncross, F. (1992). *Costing the Earth: The Challenge for Governments, the Opportunities for Business*. Harvard Business School Press. Boston, Massachusetts
- Chandra, M. (2009), Green marketing: A new dimension in the marketing field. *Economic Challenger*.
- Davari, A.A. and Strutt, D. (2014). Marketing Mix Strategies for Closing the Gap between Green Consumers' Pro environmental Beliefs and Behaviors, *Journal of Strategic Marketing* (online), 22(7), pp. 563-586.

- Department of Environmental Affairs and Tourism. South Africa. (2005). *Environmental Assessment of Trade related. Agreements and Policies in South Africa* (online). Pretoria: Department of Environmental Affairs and Tourism (DEAT).
- Diglel, A. and Yazdanifard, R. (2014). Green marketing and its Influence on Buying Behavior and the Attitudes of Purchasers towards Eco-friendly products, *Global journal of Management and Business Research* (online), 7(11), pp. 11-18.
- Gittel, R., Magnusson, M. and Mirenda, M. (2015). *Green Marketing Strategy and The Four P's of Marketing*.
- Halbright, R., & Dunn, M. (2010). *Case study: The Toyota Prius*.
- Kontic, I. (2010). Greening the marketing mix: A case study of the Rockwool Group (online). BBA, Jönköping International Business School.
- Laroche, M., Bergeron, J. and Barbaro-Forleo, G. (2001). Targeting consumers who are willing to pay more for environmentally friendly products, *Journal of Consumer Marketing* (online), 18(6), pp. 503-520.
- Marccaci, S. (2013). *The Big Green Opportunity for America's Economy*.
- Manget, J., Roche, C., and Münnich, F. (2009). *Capturing the Green Advantage for Consumer Companies* (online).
- Mohr, L. A., Webb, D. J., & Harris, K. E. (2001). Do consumers expect companies to be socially responsible? The impact of corporate social responsibility on buying behavior. *The Journal of Consumer Affairs*, 35(1), 45-72.
- Nagaraju, D. B., & Thejaswini, H. D. (2014). Consumers' perception analysis-market awareness towards ecofriendly fmcg products-a case study of Mysore district. *IOSR Journal of Business and Management*, 16, 64-71.
- Ottman, J. A. (1993). *Green Marketing: Challenges & Opportunities for the New Marketing Age*. McGraw-Hill, New York
- Ottoman, J. and Mallen, D. (2014). *5 Green Marketing strategies to earn consumer trust*.
- Polonsky, M. J. & Rosenberger, P. J. (2001). Re evaluating green marketing: a strategic approach. *Business Horizons*, 44(5), pp 21-30.
- Rajeshkumar, M. L. (2012). An overview of green marketing. *Naamex International Journal of Management Research*, 2, 128-136.
- Rayapura, A. (2014). *New Nielsen Study Says Consumers Are Ready to Pay More for Social Responsibility*.
- Samarasinghe, R. (2012). A Green Segmentation: Identifying a Green Consumer Demographic Profiles in Sri Lanka. *International Journal of Marketing and Technology* (online), 2(4), pp. 318-331.
- Sharma, Y. (2011). Changing consumer behaviour with respect to green marketing- A case study of consumer durables and retailing. *International Journal of Multidisciplinary Research*, 1(4)
- Simon, F. (1992). Marketing Green Products in the Triad. *The Columbia Journal of World Business*. Fall and Winter, 268-285.
- Singh, S. (2012). Green Marketing: Challenges and Strategy in the changing scenario. *International Journal of Advanced Research in Management and Social Sciences* (online), 1(6), pp. 164-172
- Vandermerwe, S. and Oliff, M. D. (1990). Customers Drive Corporations Green. *Long Range Planning*, 23(6), 10-16

- Vernekar, S.S. and Wadhwa, P. (2011). Green Consumption: An Empirical Study of Consumers Attitudes and Perception regarding Eco-Friendly FMCG Products, with special reference to Delhi and NCR Region. *Opinion*, Vol 1, N0 1, December 2011. pp.64-74.
- Young, W., Hwang, K., McDonald, S., & Oates, C. J. (2010). Sustainable consumption: Green consumer behavior when purchasing products. *Sustainable development*, 18, 20-10. doi: 10.1002/sd.394