# Perception of the Customers TOWARDS GREEN PRODUCTS: An Empirical Study

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ABSTRACT--Environmental deterioration has become a major societal concern in the modern age. An immediate action by business organizations, governments, and society is required to achieve a balanced growth to achieve socio-economic objectives without scarifying the environment. For many companies, marketing green products is still a matter of risk management. In developing countries, the retailers seem to prefer locally produced products, which are cheaper than imports, but still contribute to local communities. In this context, the present study examined the perception of the customers towards green products in Salem district. By adopting convenience sampling, 750 customers were selected from five municipalities. As an essential part of the study, the primary data were collected with the help of interview schedule. Statistical tools such as student t test, analysis of one-way variance, and percentage analysis were employed. The researcher suggests various measures to improve the scope of green product market.

**Key words--**Green products, green marketing, green labeling, environmental sustainability, social responsibility, ethical marketing, etc.

#### I. INTRODUCTION

Sustainable development and saving of environment are now recognized globally as overriding imperative to protect the earth from the activity inflicted on it by the human. Environmental degradation, rising global temperature, melting of glaciers and ice-berg in the polar region, and rising sea level affect the globe. Irrational resource consumption resulting from raw material acquisition, manufacturing, use and disposal are the main reasons for the global environmental carrying capacity being exceeded. Balancing between economic and environmental performance has become important for organizations facing competitive, regulatory, and community pressures. Hence, an immediate action by business organizations, governments, and society is required to achieve a balanced growth to achieve socio-economic objectives without scarifying the environment. Increasing environmental concern has become part of the overall organization culture and, in turn, has helped to reengineer the strategies of organizations.

# II. GREEN PRODUCTS

Environmental deterioration has become a major societal concern in the modern age. This concern towards the environment and society has led to the materialization of sustainable development which emphasizes the need to promote sustainability and advocates that form of development which minimizes harmful impact on the environment and society. The basic triangulation for this metamorphosis is composed of government, organizations, and people. As a result, the popularization of environmental concerns created a paradigm shift led

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by the government, consumer, and business sectors. Sustainable development encourages green consumption at every stage of creation of products. Green consumption on the other hand, is normally related to environmentally responsible consumption where consumers consider the environmental impact of purchasing, using, and disposing of various products, or using various green products. Over the last decades, environmental issues have become a main concern for the sustainable future of nations. For many companies, marketing green products is still a matter of risk management. Despite the high potential for innovation, companies often suffer from the lack of adequate financing as potential investors still perceive environmental innovation as risky investment. Green products, also known as eco-products, environmentally friendly products or sustainable products, might typically be manufactured in a more energy conservative way, be formed from recycled components, or be supplied to the market with less packaging. Green product has environmentally sound content or packaging in reducing the environmental impact. The common distinctiveness of products are: energy efficient, water efficient, low emitting, safe and healthy, recyclable, durable, biodegradable, renewable, and reused products.

#### III. REVIEW OF LITERATURE

Oyewole (2001) presents a conceptual link among green marketing, environmental justice and industrial ecology. The paper suggests a research agenda to determine consumers' awareness of environmental justice, and their willingness to bear the costs associated with it.Sanjay K. Jain and Gurmeet Kaur (2004) analysed the Indian consumers towards green marketing. For tapping the domain of environmentally friendly behaviours, multi-item scales were developed. A questionnaire was personally administered to sample of 250 consumers living in Delhi. The results reveal that respondents do believe in genuineness of sudden rise in environmental concern and perceive people are willing to take environmentally friendly steps to ameliorate environmental problems. Saxena and Khandelwal (2008) studied the consumer attitude towards green marketing. The primary data were collected from 321 consumers in the cities of Ghaziabad, Delhi, Bangalore, Chennai and Jaipur. The findings show that consumers have a strong positive attitude towards green marketing. Artee Agarwal (2010) studied the factors affecting green purchasing behaviour among Indian consumers. The primary data were collected from 695 respondents from Mumbai and Navi Mumbai. The study suggests that green marketers need to assess the value their customers place on green benefits. The consumers, industrial buyers and suppliers need to pressurize effects on minimize the negative effects on the environment-friendly.

Marius Claudy (2011) investigated the consumer resistance to green product innovation. The research was conducted in the context of micro generation that can be adopted by households to produce heat and electricity from renewable energy. Vishnu Nath, et al. (2012) examined the consumers' perception about environmental problems and green products. The primary data were collected from 22 respondents using structured interview in the Roorkee town of Haridwar district. The results indicate that consumers in tier III cities are aware about environmental problems. The study suggests that creative advertisement campaigns should be developed to spread the message of environmental sustainability. Syed Ahamed and Ravi (2012)investigated the consumer attractiveness towards ecofriendly products in FMCG sector and their impact of purchasing decision. The study suggests business organizations to follow strategies in order to get benefits from the environmentally friendly approach as green marketing offers business incentives and growth opportunities while it may involve start-up

costs, it will save money in long-term. Gurmeet Singh (2013) studied the effectiveness of the green marketing. The primary data were collected from 200 consumers of Ahmedabad city through questionnaire for consumers and schedule for companies. The study suggests that activeness about green marketing by government, companies, customer and society should be amplified as environment should be top priority. Geetha and Annie Jenifer (2014) studied the consumer behaviour towards purchase of eco-friendly products in Coimbatore. A sample of 100 consumers of eco-friendly products was selected among green consumers. Primary data were collected through structured questionnaire. The results indicate that major source of awareness of sample customers is friends. The major factors influencing the consumers to purchase eco-friendly products are benefit for health, quality and reliability.

Uma Maheswari (2015) analyzed the factors influencing purchase of green products by the respondents in Kanyakumari district. The study brought out the fact that though consumers are considerably well aware of green products, they are less concerned and committed to buy eco-friendly products. The study suggests that business organizations should start adopting green marketing strategies as it offers incentives and growth opportunities in the long-term. Morna Anamaria (2016) stated that younger consumers have intention to buy organic products. Most of the young consumers are aware of environmental protection and they have sufficient knowledge about the environment and willingness to pay more for green products. Uma Devi and Usha (2018) examined the awareness on green products of consumers, factors influencing the consumers in the choice of green products, and the pattern of purchase with respect to green products. The primary data were collected through questionnaire from 200 respondents in Coimbatore. The results reveal that there is a relationship between gender and acceptance towards challenges of organic products, marital status and acceptance towards consumption of organic products, and acceptance towards challenges of organic products and satisfaction towards organic products.

# IV. STATEMENT OF THE PROBLEM

The manufacturing, processing and consumption of goods involve the usage and damage of natural resources such as air, timber, fossil fuels ore and water. Increasing pollution and environmental damages due to conventional production methods have necessitated the marketing of green products. In a country like India with such large population, every consumer has a potential to lessen the adverse impacts on the environment by changing their consumption behaviour. Further, the environmental issues are complex in nature to understand and this has kept consumers from buying green products. Thus, it is one of the major challenges taking into consideration the limited knowledge on green products. The lack of understanding of eco label usage for products make it difficult for the consumers to differentiate between the nationally/internationally accepted eco labels and the spurious self-declared claims made by the manufacturers. Generally, green products are costly and face low awareness of the consumers. The attitude of Indian consumers towards green products is questionable. Many customers may not be willing to pay a higher price for green products which may affect the sales of the company. Therefore, convincing the consumers is a great challenge. Green marketing requires heavy investment in terms of technology enhancement, process modification, communicating benefits to customers, etc. Thus, green marketing initially will be a costly affair. Further, the firm may be forced to practice unfair means to cut cost to sustain in the competition and thus

the entire idea of going green will be a farce. In this context, the researcher has made an attempt to study the perception of the customers towards green products in Salem district.

# V. OBJECTIVES OF THE STUDY

The following are the objectives of the present study:

- 1. To know the awareness level of customers towards green products in Salem district.
- 2. To find out the factors influencing customers to purchase green products in Salem district.
- 3. To ascertain the satisfaction level of customers with green products in Salem district.
- 4. To assess the problems of customers in the purchase of green products in Salem district.
- 5. To offer suitable suggestions to get better the scope of green product market based on the findings of the study.

#### VI. TESTING OF HYPOTHESES

The following null hypotheses have been formulated and tested.

**H**<sub>01</sub>: The socio-economic profiles of customers will not have any influence on their awareness levelabout green products.

**H**<sub>02</sub>: There is no significant relationship among the respondents belonging to different demographic profiles towards factors influencing to purchase green products.

**H**<sub>03</sub>: There is no significant relationship among the customers belonging to different demographic profiles towards satisfaction with green products.

**H**<sub>04</sub>: There is no significant relationship among the customers belonging to different demographic profiles towards problems in the purchase of green products.

#### VII. METHODOLOGY

The present study is empirical in nature based on survey method. The study examined the perception of the customers towards green products in Salem district. The study is confined to 5 taluks of the Salem district namely, Attur, Valapady, Sankari, Mettur and Salem. This study is confined to two green product category viz. food products and cosmetics. In the present work, awareness level of green products, factors influencing customers to purchase green products, customers' satisfaction towards green products and problems of customers in the purchase of green products are mainly emphasized. By adopting convenience sampling, 150 customers were selected from each municipality. As an essential part of the study, the primary data were collected with the help of interview schedule. The secondary data were collected mainly from journals, magazines, books and unpublished dissertations. In the light of pre-testing, necessary changes were incorporated in the questions and their sequences. Statistical tools such as t test, analysis of variance, and percentage analysis were employed.

# VIII. ANALYSIS AND INTERPRETATIONS

Table 1: Comparison of Awareness between Respondents towards Green Products

Personal Variables	t Value	D.F	Table Value at 5% Level	Result
Gender	0.419	748	1.963	Not significant
Type of customer	0.035	748	1.963	Not significant
Family pattern	0.264	748	1.963	Not significant

Source:Primary Data.

The calculated t values for gender (0.419), type of customer (0.035), and family pattern (0.264) are less than the table value (1.963) at 5 per cent significance level. The test is not significant. Hence, no significant difference is found between the awareness level of the male and female customers, behavioural and think greens, and customers belong to joint and nuclear families towards green products in Salem district.

Table 2: Relationship between Demographic Variables and Awareness about Green Products

Demographic Variables	Source of Variation	Sum of Squares	D.F	Mean Squares	Calculated Value	Table Value at 5 %	Result		
Age	Between groups	3	71.403	23.801	1.084	2.617	Not		
	Within groups	746	16374.636	21.950	1.004	2.617 si	si	significa	significant
	Total	749	16446.039						
Education	Between groups	4	147.855	36.964	1.690	2 294	Not		
	Within groups	745	16298.184	21.877	1.090	2.384 significan	significant		
	Total	749	16446.039						
Occupation	Between groups	4	98.940	24.735	1.127	2.384	Not		
	Within groups	745	16347.099	21.942	1.127	2.364	significant		
	Total	749	16446.039						
Monthly income	Between groups	3	123.444	41.148	1.881	2.617	Not		
	Within groups	746	16322.595	21.880	2.01/	significant			
	Total	749	16446.039						

Taluk	Between groups	4	492.952	123.238			
	Within groups	745	15953.086	21.414	5.755	3.344	Significant
	Total	749	16446.039				

Source: Primary Data.

There is no significant relationship among the respondents belonging to different age groups, educational status groups, occupations, and monthly income groups towards awareness about green products in Salem district. On the other hand, a significant relationship is found among the respondents belong to different taluks towards awareness about green products.

**Table 3:** Comparison of Acceptance between the Respondents towards Factors Influencing to Purchase Green Products

Personal Variables	t Value	D.F	Table Value at 5% Level	Result
Gender	0.087	748	1.963	Not significant
Type of customer	0.714	748	1.963	Not significant
Family pattern	1.167	748	1.963	Not significant

Source: Primary Data.

The calculated t values for gender (0.087), type of customer (0.714), and family pattern (1.167) are less than the table value (1.963) at 5 per cent significance level. The test is insignificant. It means that there is no significant difference between the acceptance level of the male and female customers, behavioural and think greens, and customers belong to joint and nuclear families towards factors influencing to purchase green products in Salem district.

Table 4: Relationship between Demographic Variables and Factors Influencing to Purchase Green Products

Demographic Variables	Source of Variation	Sum of Squares	D.F	Mean Squares	Calculated Value	Table Value at 5	Result
Age	Between groups	3	104.647	34.882			Not
	Within groups	746	21430.681	28.727	1.214	2.617	significant
	Total	749	21535.328				
Education	Between groups	4	185.781	46.445	1.621	2.384	Not significant

	Within groups	745	21349.547	28.657			
	Total	749	21535.328				
Occupation	Between groups	4	138.682	34.670			Not
	Within groups	745	21396.646	28.720	1.207	2.384	significant
	Total	749	21535.328				
Monthly income	Between groups	3	21.271	7.090			Not
	Within groups	746	21514.057	28.839	0.246	2.617	significant
	Total	749	21535.328				
Taluk	Between groups	4	3294.834	823.708	33.643	3.344	Significant
	Within groups	745	18240.494	24.484	33.013	3.377	Significant
	Total	749	21535.328				

Source: Primary Data.

No significant relationship is found among the respondents belonging to different age groups, educational status groups, occupations, and monthly income groups towards factors influencing to purchase green productsin Salem district. However, there is a significant relationship among the respondents belong to different taluks towardsfactors influencing to purchase green products.

Table 5: Comparison of Satisfaction between Respondents towards Green Products

Personal Variables	t Value	D.F	Table Value at 5% Level	Result
Gender	1.167	748	1.963	Not significant
Type of customer	7.029	748	1.963	Significant
Family pattern	0.171	748	1.963	Not significant

The calculated t values for gender (1.167)and family pattern (0.171) are less than the table value (1.963) at 5 per cent level of significance. The test is not significant. Hence, there is no significant difference between the satisfaction level of the male and female customers, and customers belong to joint and nuclear families towards green products. Conversely, a significant difference is found between the satisfaction level of behavioural and think greens towards green products in Salem district

International Journal of Psychosocial Rehabilitation, Vol. 24, Issue 08, 2020

ISSN: 1475-7192

Table 6: Relationship between Demographic Variables and Satisfaction with Green Products

Demographic Variables	Source of Variation	Sum of Squares	D.F	Mean Squares	Calculated Value	Table Value at 5	Result
Age	Between groups	3	13.068	4.356			Not
	Within groups	746	22091.364	29.613	0.147	2.617	significant
	Total	749	22104.432				
Education	Between groups	4	179.495	44.874			Not
	Within groups	745	21924.937	29.429	1.525	2.384	significant
	Total	749	22104.432				
Occupation	Between groups	4	17.340	4.335	0.146	2.384	Not significant
	Within groups	745	22087.092	29.647	0.140	2.304	
	Total	749	22104.432		-		
Monthly income	Between groups	3	6.478	2.159	0.073	2.617	Not
	Within groups	746	22097.954	29.622	0.073	2.017	significant
	Total	749	22104.432		-		
Taluk	Between groups	4	4389.482	1097.370	46.150	3.344	Significant
	Within groups	745	17714.950	23.778	+0.130	3.344	Significant
	Total	749	22104.432				

Source: Primary Data.

There is no significant relationship among the satisfaction level of the respondents belonging to different age groups, educational status groups, occupations, and monthly income groups towards green products. However, there exist significant relationship among the satisfaction level of the respondents belong to different taluks towards green products.

Table 7: Comparison of Problems between Respondents towards Green Products

Personal Variables	t Value	D.F	Table Value at 5% Level	Result
Gender	0.322	748	1.963	Not significant
Type of customer	26.315	748	1.963	Significant
Family pattern	0.343	748	1.963	Not significant

Source: Primary Data.

The calculated t values for gender (0.322) and family pattern (0.343) are less than the table value (1.963) at 5 per cent level of significance. The test is not significant. Hence, there is no significant difference between the male and female customers, and customers belong to joint and nuclear families towards problems in green products. On the other hand, a significant difference is found between the behavioural and think greens towards problems in green products.

Table 8: Relationship between Demographic Variables and Problems with Green Products

Demographic Variables	Source of Variation	Sum of Squares	D.F	Mean Squares	Calculated Value	Table Value at 5	Result	
Age	Between groups	3	79.146	26.382	0.516	2.617	Not	
	Within groups	746	38172.722	51.170	0.510	2.017	2.017	significant
	Total	749	38251.868					
Education	Between groups	4	9.482	2.370	0.046	2.384	Not significant	
	Within groups	745	38242.386	51.332	0.040			
	Total	749	38251.868					
Occupation	Between groups	4	62.684	15.671	0.306	2.384	Not	
	Within groups	745	38189.184	51.261	0.300	2.364	significant	
	Total	749	38251.868					
Monthly income	Between groups	3	143.413	47.804	0.936	2.617	Not	
	Within groups	746	38108.455	51.084	0.930	2.01/	significant	
	Total	749	38251.868					

International Journal of Psychosocial Rehabilitation, Vol. 24, Issue 08, 2020

ISSN: 1475-7192

Taluk	Between groups	4	24172.974	6043.244	319.785	3.344	Significant
	Within groups	745	14078.894	18.898	313.703	3.311	Significant
	Total	749	38251.868				

Source: Primary Data.

There is no significant relationship among the respondents belonging to different age groups, educational status groups, occupations, and monthly income groups towards problems with the green products. However, there exist significant relationship among the respondents belong to different taluks towards problems with the green products.

#### IX. SUGGESTIONS

The marketers should emphasis on providing clear information about green products and eco-labels to promote customer familiarization with products and enhance their knowledge of green products. Public awareness campaigns are to be encouraged to educate customers about the benefits of green products. Marketers should use more online social network for advertising and promoting their green products. Certified labels for green products could also be introduced for qualified green products. Governments can impose new laws penalizing organizations that are involved in green-washing and to those that are causing detrimental effects in their production and manufacturing processes to the environment. The green alliances are to be encouraged for corporate enviropreneurship and entrepreneurial innovations that address environmental problems and result in operational efficiencies, new technologies and marketable green products. Life cycle assessment can make available the vital statistics on social, environmental and economic impact of products through the supply chain production process and after the purchase. Government can create more campaign throughout the advertising to influence the customers' perception toward green purchase. The government can partner with marketers to design innovative green package and to promote and attract the customers. The marketers should shows out the company is practicing the ethical business and involved in corporate social responsibility in promoting the green purchase. Environmental audit can be conducted to assess current performance.

# X. CONCLUSION

Environmental issues have become major concern for any organizations that want to succeed in the face of competition. Over the last decade, environmentalism has emerged to be a vital business movement due to increasing issues related to acid rains, depletion of the ozone layer, and degradation of the land and many more pressing environmental issues. As growing awareness about the implications of global warming, non-biodegradable solid waste, harmful impact of pollutants, etc. both marketers and consumers are becoming sensitive to the need for the switch into green products. The recent past has witnessed a growth in the interest, research and practice of green marketing among academicians, policy makers and practitioners. The researcher suggests various suggestions and policy measures to improve the scope of green product market.

#### REFERENCE

- Baker, W. E., & Sinkula, J. M. (2005). Environmental marketing strategy and firm performance: Effects on new product performance and market share. Journal of the Academy of Marketing Science, 33 (4), 461-475.
- 2. Carter, C., & Rogers, D. (2008). A framework of sustainable supply chain management: Moving toward new theory. International Journal of Physical Distribution and Logistics Management, 38 (5), 360-387.
- Geetha., & Annie Jenifer (2014). A study on consumer behaviour towards purchase of eco-friendly products in Coimbatore. Abhinav International Monthly Refereed Journal of Research in Management & Technology, 3 (3), 1-8.
- 4. Gurmeet Singh (2013). A study of evolution and practice of green marketing by various companies in India. International Journal of Management and Social Sciences Research, 2 (7), 49-56.
- 5. Madu, C.N., Kuei, C., &Madu, I.E. (2002). A hierarchic metric approach for integration of green issues in manufacturing: A paper recycling application. Journal of Environmental Management, 64, 261-272.
- Matos, S., & Hall, J. (2007). Integrating sustainable development in the supply chain: The case of life
  cycle assessment in oil and gas and agricultural biotechnology. Journal of Operations Management, 25 (6),
  1083-1102.
- 7. Moisander, J. (2007). Motivational complexity of green consumerism. International Journal of Consumer Studies, 31 (4),404-409.
- 8. Lakshmipathaiah, M.G., &Natarajan, C. (2019).Buying behaviour of customers towards green products in Tumkur district.Online International Interdisciplinary Research Journal, 9 (1), 13-20.
- 9. Oyewole, P. (2001). Social costs of environmental justice associated with the practice of green marketing. Journal of Business Ethics, 29 (3), 239-252.
- 10. Sanjay K. Jain., & Gurmeet Kaur (2004). Green marketing: An attitudinal and behavioural analysis of Indian consumers. Global Business Review, 5 (2), 187-205.
- 11. Sarkis, J. (2003). A strategic decision framework for green supply chain management. Journal of Cleaner Production, 11 (4), 397-409.
- 12. Syed Ahamed, S., & Ravi, A. (2012). Consumer perception and green marketing impression on FMCG sector: An empirical study in Krishnagiri district, Tamil Nadu. Indian Journal of Applied Research, 1 (12), 11-13.
- 13. Uma Maheswari, M. (2015). Purchase behaviour of consumers towards green products. The International Journal of Business & Management, 3 (7), 145-151.
- 14. Umadevi, P., &Usha, S. (2018). A study on customer perception towards organic green products with reference to Coimbatore. International Journal of Interdisciplinary Research in Arts and Humanities, 3 (1), 98-102.
- 15. Veleva, V., &Ellenbecker, M. (2001). Indicators of sustainable production: Framework and methodology. Journal of Cleaner Production, 9 (6), 519-549.
- 16. Vijai, C., &Natarajan, C. (2015). Customers' awareness towards green banking products of the select commercial banks in Cuddalore district: An empirical assessment. International Journal of Management Research, 3 (10), 1-5.
- 17. Vishnu Nath, et al. (2012). Green behaviours of Indian consumers. International Journal of Research in Management, Economics and Commerce, 2 (11), 488-498.