

Impact of Consumer Awareness about Sustainability on Purchase Decision: A Case of Apparel Retailers

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Abstract

Wide spread campaigns regarding the merits of sustainable consumption created by various agencies and media have been increasing awareness among customers and business organizations to act more responsibly. Indian consumers, as their counterparts in any other nation, feel empowered when it comes to the environment and are taking some action in their daily lives to reduce consumption and waste. In many emerging countries like India, there is still a little data available regarding the impact of awareness of sustainable consumption in purchasing apparels. Hence, researching into the aspects of sustainable consumption and its impact on purchases from organized retailing would reveal many implications to the retailers and governments. The main objectives of the study include finding the consumer awareness towards sustainability and its impact on sustainable consumption. By using mall-intercept survey method a total of 98 samples were collected through a structured questionnaire and analysed. The major findings of the study reveal that the age, education and income is having association with consumer awareness about sustainability. Consumers sustainable purchase preference varies from one product category to other category. Customers associate sustainable consumption to the store level operations such as promotion and in-store ambiance. Consumers gave a high priority for the statements which are related to store operations (promotion, store ambiance, labels and information, price).

Keywords

Sustainable Consumption, Retailers, Apparels

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Introduction Sustainability as a field of study has been widely accepted by the various branches of knowledge ever since the publication of the Brundtland Commission report in 1987. Many researches are confirming that unsustainable production and consumption patterns are the prime reasons for environmental deterioration. Wide spread campaigns regarding the merits of sustainable consumption created by various agencies and media have been increasing awareness to act more responsibly. Indian consumers, as their counterparts in any other nation, feel empowered when it comes to the environment and are taking some action in their daily lives to reduce consumption and waste. In this present situation retailers have an important role to play not only in promoting sustainable consumption but also to influence consumers' purchase decision. Hence, researching into the aspects of sustainable consumption and its impact on purchases from organized retailing would reveal many implications to the retailers and governments. Various studies on sustainable consumption have produced mixed findings. However, many of these studies have been conducted with respect to food and grocery retailing. In many emerging countries like India, there is still a little data available regarding the impact of awareness of sustainable consumption in purchasing apparels. Findings of this study would be useful to the apparel retailers who consider sustainability as their one of the marketing strategies and gives meaningful implications to the government and other agencies.

Literature Review

The Brundtland Commission report in 1987 defined sustainable development as 'development that meets the needs of the present without comprising the ability of future generations to meet their own demands'. Sustainable consumption plays a major role in achieving the sustainable development. Sustainable consumption is defined as the use of goods and services that respond to the basic needs and bring a better quality of life, while minimizing the use of natural resources, toxic materials and emissions of waste and pollutants over the life cycle, as not to jeopardize the needs of future generations (WBCSD 2008). Sustainable consumption is meeting the needs of consumers while being environmentally conscious and bring an inclusive growth. It also emphasizes the fact of better quality of life like poverty alleviation, economic growth, health, education and environment protection (ESCAP, Promoting sustainable).

There is a growing research interest in the field of sustainable consumption behaviour among consumers of emerging countries like India. This is not just because of ecological impact but also the way most of firms in India consider sustainability in their marketing strategies. Aspects such as green marketing and corporate social responsibility have been gaining attention of the organizations in India. Governments and other agencies are creating awareness among the mass about their consumption behaviour. Hence, one could see the reflections of all these efforts in the consumer behaviour. Various factors like consumer awareness and knowledge of the environment, environmental attitudes, lifestyles, values etc. influence the sustainable consumption behaviour. Some studies show that demographic variables have significant influence on sustainable consumption behaviour (Adamantios 2003 et al). There is one study which has developed and validated sustainable development behaviour scale through qualitative research including demographic variables (HU Biling et al: An Empirical Study). Studies are also found in the areas of analysing relationships between socially conscious and frugal consumer behaviours (Miriam Pepper et al: 2009). Research papers also found that there is an absence of sustainable consciousness among consumers in all the fields of their consumption (Martina Schafer et al: 2009). In most of the cases, consumers' willingness is not transferring into purchases because of several barriers like availability, affordability, convenience, product performance, conflicting priorities, scepticism and force of habit (WBCSD 2008). A 2005 study states that sustainable buying behaviour is the influence of perceived consumer effectiveness, collectivism and value orientations (Yeonshin and Sejung 2005). There are no significant differences between gender in their environmental attitudes and attitudes on green products (Tan and Lau 2010). Consumers' attitude towards the green purchases is influenced by the subject's man-nature orientations, degree of collectivism, degree of affect and marginally, ecological

knowledge (Ricky Y K: 2001). A south Asian academic research paper reveals that consumers are ready to buy green products more often, but their major concerns are price and quality. They also expect that green product must perform competitively just like the traditional products (Afzaal Ali and Athar Ali et al: 2011). A research paper brought out from the Environmental Protection Agency of Danish Ministry of the Environment discusses the role of retailers in sustainable consumption and production. This paper divides all possible environmental initiatives of retailers into three broad categories. They are *upstream activities-planning their stock and how it is produced*; *in-store activities- how retailers sell*; and *downstream activities-how retailers communicate with their consumers*. Andrea Prothero, Susan Dobscha et al (2011) in their study emphasizes the opportunities for consumer research and public policy in the domain of sustainable consumption. The study brings out the need for public policy and establishing marketing and business systems that encourage organizations and people for sustainable production and consumption. Silvia Cacho and Leila Loussaief (2010) explored youth's perception of Sustainable Development initiatives of French food retailers and evaluated the impact of such initiatives on the store image of the retailers. The study found out that store image is influenced by the perceived sustainable development initiatives. Further it explains the influencing factors as sympathy, responsibility, humanity, innovativeness and willingness to improve. MahmoodManafi, RoozbehHojabri (2011) concluded in their study that firms need to consider sustainable issues in their strategic orientation as consumers are becoming increasingly aware of environmental issues. Research findings from the study conducted by Christopher Gan, Han Yen Wee et al (2008) reveal that environmentally conscious customers are more likely to purchase green products. It also found that the traditional product attributes such as price, quality and brand are still the most important factors that consumers consider in purchasing green products.

Objectives of the Study

1. To find out consumer awareness towards sustainability.
2. To examine the influence of consumer awareness towards sustainability on consumption.
3. To examine the influence of demographic factors in purchasing eco-friendly products from organized retailers.
4. To analyse factors influencing purchase of eco-friendly apparels from organized retailers.

Research Methodology

Population: The population for the study is all customers who purchase apparels from organized retail stores.

Research instrument: A questionnaire was developed to collect the responses from the customers regarding their awareness about sustainability and its influence in purchasing apparels from organized retail stores. Statements of attitudes were framed using Likert scale in order to examine various factors that influence customers for purchasing sustainable or eco-friendly apparels.

Sampling method: Mall Intercept Method i.e. customers who visited the organized apparel stores were intercepted and questionnaire was administered. A total of 98 valid responses were collected.

Hypothesis

To meet the set objectives following hypothesis is tested for its significance.

H_0 : There is no difference in awareness (regarding sustainability) level based on demographic variables namely gender, income and education.

Factor analysis is used to examine the influence of various factors in purchasing sustainable or eco-friendly apparels from retailers.

Data Analysis

Gender of the respondents:

Table 1: Gender

		Frequency	Per cent
Valid	Male	60	61.2
	Female	38	38.8
	Total	98	100.0

Out of 98 respondents, 60 respondents (61.2%) are males and 38 respondents (38.8%) are females.

Age group of the respondents:

Table 2: Age

		Frequency	Per cent
Valid	20-25	3	3.1
	26-30	15	15.3
	31-35	51	52.0
	36-40	29	29.6
	Total	98	100.0

Almost half of the respondents i.e.52% are in the age group of 36-40 years. There are 29.

6% respondents falling in the age group of (36-40); 15% are in the age group of (26-30) and 3.1% of respondents are in the age group of (20-25).

Monthly income of the respondents:

Table 3: Income

		Frequency	Per cent
Valid	10k-20k	8	8.2
	21k-30k	40	40.8
	31k-40k	19	19.4
	41k-50k	20	20.4
	Above 50k	11	11.2
	Total	98	100.0

Nearly 41% of the respondents are having the income bracket of Rs.21,000-30,000; 20.4% of the respondents fall under income bracket of Rs.41,000-50,000; 19.4% of the respondents come under income of Rs.31,000-40,000; 11.2% of the respondents have income above Rs.50,000 and 8.2% of the respondents income is between the range of Rs.10,000-20,000.

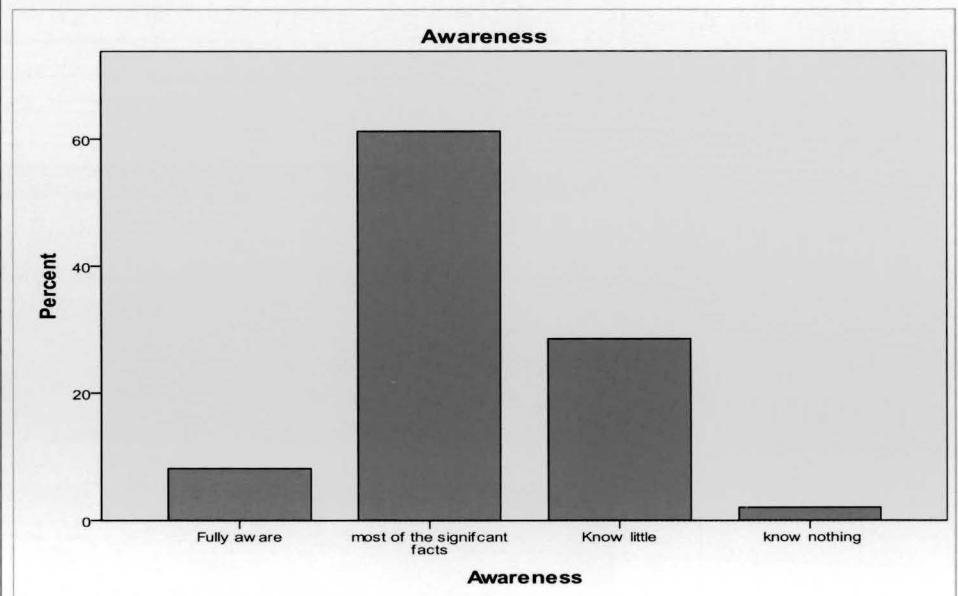
Education of the respondents

Table 4: Education

		Frequency	Per cent
Valid	Matriculation	2	2.0
	Intermediate	8	8.2
	Degree	59	60.2
	PG	26	26.5
	Doctoral	3	3.1
	Total	98	100.0

From the above table it is noticed that 60.2% of the respondents are graduates; 26.5% are post graduates; 3% are doctorates; 8% have completed their intermediate and 2% of the respondents have only passed the matriculation examination.

Awareness Level



From the above graph it is noted that more than 60% of the respondents know most of the significant facts of sustainability and 8% are fully aware of it.

Hypothesis Testing

H_0 : There is no difference in awareness (regarding sustainability) level based on gender.

Table 5.1: Gender * Awareness Cross Tabulation

Count

		Awareness				Total
		Fully aware	Most of the significant facts	Know little	Know nothing	
Gender	Male	4	33	21	2	60
	Female	4	27	7	0	38
Total		8	60	28	2	98

Table 5.2: Chi-Square Tests

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	4.909	3	.179

The significance value is more than 0.05 and hence null hypothesis is accepted. There is no association between gender and awareness (regarding sustainability).

H_02 : There is no difference in awareness (regarding sustainability) level based on age.

Table 5.3: Age * Awareness Cross Tabulation

Count

		Awareness				
		Fully aware	Most of the significant facts	Know little	Know nothing	Total
Age	20-25	0	0	2	1	3
	26-30	1	4	9	1	15
	31-35	2	35	14	0	51
	36-40	5	21	3	0	29
Total		8	60	28	2	98

Table 5.4: Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	37.854	9	.000

The significance value is less than 0.05 and hence null hypothesis is rejected. There is association between age and awareness (regarding sustainability).

H_03 : There is no difference in awareness (regarding sustainability) level based on education.

Table 5.5: Education * Awareness Cross Tabulation

Count

		Awareness				
		Fully aware	Most of the significant facts	Know little	Know nothing	Total
Education	Matriculation	1	0	0	1	2
	Intermediate	0	0	7	1	8
	Degree	2	38	19	0	59
	PG	3	21	2	0	26
	Doctoral	2	1	0	0	3
Total		8	60	28	2	98

Table 5.6: Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	71.769a	12	.000

The significance value is less than 0.05 and hence null hypothesis is rejected. There is association between education and awareness (regarding sustainability).

H_04 : There is no difference in awareness (regarding sustainability) level based on income

Table 5.7: Income * Awareness Cross Tabulation

Count		Awareness				Total
		Fully aware	Most of the significant facts	Know little	Know nothing	
Income	10k-20k	1	2	3	2	8
	21k-30k	0	23	17	0	40
	31k-40k	2	14	3	0	19
	41k-50k	4	12	4	0	20
	Above 50k	1	9	1	0	11
Total		8	60	28	2	98

Table 5.8: Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	38.579	12	.000

The significance value is less than 0.05 and hence null hypothesis is rejected. There is association between income and awareness (regarding sustainability).

Respondents buying patterns analysis

Factor analysis is used to find out what kind sustainable or green products consumers usually purchase.

Table 5.9: KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.575
Bartlett's Test of Sphericity	Approx. Chi-Square	108.327
	df	15
	Sig	.000

KMO test value 0.575 indicates the sample adequacy for conducting the factor analysis. Similarly, Bartlett's test value of 0.000 indicates high level of significance.

Table 5.10. Communalities

	Initial	Extraction
EcoPurchase F&B	1.000	.799
EcoPurchaseFMCG	1.000	.769
EcoPurchaseT&C	1.000	.304
EcoPurchaseMedicine	1.000	.683
EcoPurchaseCosmetics	1.000	.609
EcoPurchaseOthers	1.000	.375
Extraction Method: Principal Component Analysis.		

Communalities values indicate that the consumers purchase eco-friendly products from products categories such as food and beverages and fast moving consumer goods. Consumers also make an attempt to purchase organic or natural medicines and cosmetics. But, consumers buying eco-friendly textile and clothing have least communality value indicating less preference in purchasing eco-friendly textile and clothing products.

Factor Analysis

Factor analysis is conducted to examine the important factors that influence consumers to purchase eco-friendly or sustainable apparels from organized retailers.

Table 5.11: KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.536
Bartlett's Test of Sphericity	Approx. Chi-Square	144.829
	df	105
	Sig.	.006

KMO test value 0.536 indicates the sample adequacy for conducting the factor analysis. Similarly, Bartlett's test value of 0.006 indicates high level of significance.

Table 5.12: Communalities

	Initial	Extraction
Always Purchase Eco Apparels	1.000	.692
Natural Fibres	1.000	.688
Organic Colours	1.000	.642
Affordable	1.000	.669
Price Sensitive	1.000	.581
Price Comparison	1.000	.726
Recycle	1.000	.646
Info on Labels	1.000	.523
Identify	1.000	.738
Personnel Assist	1.000	.618
Personnel Expertise	1.000	.580
Communication	1.000	.551
Promotion	1.000	.778
Rewards	1.000	.588
In Store Ambiance	1.000	.707
Extraction Method: Principal Component Analysis.		

The above communality values indicate that the consumers gave a high priority for the statements which are related to store operations such as retail price (0.726), green labels (0.738), promotion (0.778) and in-store ambiance (0.707). It is also noted that consumers gave least priority for the statements which are related to products and sales person expertise.

Discussion and Recommendation

The results of the above analysis suggest consumers are aware about sustainability issues. Consumers understand the most the significant facts of sustainability. From the study it is observed there is no association between gender and awareness regarding sustainable consumption. It is also revealed that age, education and income have their influence in the awareness level regarding sustainable consumption. It is interesting to note that the awareness level regarding sustainable consumption and its influence in purchase decision varies from one product category to other product category. Consumers' sustainable consumption is frequently noticed in food and beverages and FMCG; and very less frequently in case of textile and clothing. In case of apparel purchases from an organized retail store, the influence of store level operations precedes product and price related factors in consumers preference to purchase eco-friendly or sustainable apparels. Consumers remain price sensitive and compare prices of the non-eco-friendly apparels in purchasing eco-friendly apparels. The factors that mostly influence in purchasing sustainable apparel products are store promotions, use of identifying labels to convey the products are eco-friendly and store ambiance.

The findings of the study show important implications to the apparels retailers. As a consumer associates sustainable consumption to the store level operations such as

promotion and in-store ambiance, apparel retailers can design their promotions and in-store ambiance considering eco-friendly aspect to attract more customers. Apparel retailers also focus on highlighting eco-friendly aspect of a particular product through labels because customers identify them easily. It is also an important implication for the apparel retailers to plan their assortment to include apparel products which are made out of natural fibres and organic colours. Since consumers always look for availability, quality at affordable price, retailers shall always try to maintain the quality in eco-friendly apparels. There is an observed behaviour of price comparison between eco-friendly and non-eco-friendly apparel products and hence retailers shall focus in better communication and promotion.

Limitation and future research

The limitation of this study is that the sample was restricted to a single geographic area i.e. Hyderabad (India). Further, the number of respondents may not portray the population responses with regard to purchase of eco-friendly apparels from retailers. The study covered a limited set of factors influencing sustainable consumption. Therefore, further study may aim at exploring all relevant factors that influence sustainable consumption. Further studies may be carried out in the areas of devising retail servicing and promotion strategies and its probable responses from consumers.

Conclusion

Consumer awareness about sustainability is transforming into an influencing factor in consumer purchase decision. When compared with other product categories such as food and beverages or FMCG, there is less impact of this awareness about sustainability in apparel purchases. Consumers of apparel retailers associate their sustainable consumption more with retail promotions, sustainable identification labels and in store ambiance. Therefore, apparel retailers may focus their sustainable initiatives more in downstream activities such as store display, promotions, communications and visual merchandising.

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