Impact of green marketing practices on consumer purchase intention and buying decision with demographic characteristics as moderator

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A B S T R A C T

The main purpose in this research is the recent phenomenon of “Green products” or environment-friendly products and its overall impact on the customers understanding, preference, attitude, buying behaviour, and their purchase decision about eco-friendly products. Along with independent and dependent variable, socio-demographic characteristics like age, gender, and educational background are taken as moderator to carry out this research. A theoretical framework is made which is supported by the literature review of the past researches. Respondents belong to 3 major cities of Saudi Arabia and total respondents were 245. Different tests have been conducted to analyze the data using SPSS 20. The methodology used for this research is analytical research methodology. Results show the significant relationship between dependent and independent variables. Purchasing of green commodities is the act of adding Environmental benchmark to other standards like price and quality while making the purchase decision. This support the findings of this study that Green products and Green marketing practices have a positive impact on consumers purchase intention of these products. Also, a positive relationship is found between green products and the perception of green products and green buying decision. Demographic Characteristics (Age, Gender and Qualification) enhances and strengthens the relationship between independent and dependent variables. Recommendations and suggestions are offered for the prevailing and new enterprises that help them to improve and promote green marketing practices by investing in corporate social responsibility and advertisement as well. Additional studies are required to extend the scope of this research in other areas and fields of green marketing.

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1. Introduction

In this new technological era, Environmental and health issues enforced the marketers and organizations to think about their products which can cause less harm to the earth and consumers. This leads to the concept of “Green Products” and then the Green Marketing practices. This is still an emerging concept and this research will throw light on the consumer’s approach, preferences and buying decision of the environment friendly products. Almost all organization tends to focus on making green products and following of Green Marketing practices.

There is no single and exact definition of Eco-friendly products. Different researchers and authors gave different explanation to it. Green Products, Eco-Friendly products, Environment-friendly products are some common names of such products which are less hazardous for the atmosphere and earth. At first, Consumers should be clear about the Green Products and Green Marketing idea. “Green products” mostly comes in the category of those products that have certain features which were developed with green procedure, or those products having less effect on the environment as a whole; Products which can protect the environment by using natural and less harmful resources (Fonseca, 2015).

AMA (The American Marketing Association) explains “Green Marketing” in a way, that it covers marketing of those products which are supposed to be ecologically harmless. It includes quite a lot of activities such as product alteration, variations to production processes, and packaging, advertising approaches etc.
Organizations must be worried about the environment and should focus towards manufacturing of Green Products along with creating the awareness among the consumers. Buyers should also be agreeable in consuming these environment-friendly products as it is a two way procedure. This could be only possible if marketers and organizations will promote and encourage the Green Marketing practices.

So this article mainly focuses on the Green Marketing Practices which will help the consumers to understand the concept and need of Green products which will ultimately impact the consumers buying decision of Eco-friendly Products. Demographic Characteristics (age, gender and Academic Qualification) will act as a moderator because it also influences the customers buying decision.

Old-Style production procedures are big cause in enhancing pollution and environmental harms which is forcing the marketers to produce and promote green products through green marketing practices. Globalization helps in increasing the awareness about environmental issues, use of eco-friendly products and their importance for both the consumers and Earth. So this leads to change and improve the product manufacturing method which will not harm the environment like eco-friendly packaging and using of less toxic materials and also using of new green marketing practices instead of traditional one.

No doubt, the awareness regarding importance of consuming green products is given, yet most of the consumers are still buying the non-environmental friendly products that are still impacting the environment negatively.

Therefore, to recognize and measure the consumer awareness and the acceptance level regarding green products and green marketing practices are the main focus of this study. Also, this research will find out the consumers buying behaviour and purchase decision of green products along with the consumers perception about environmental concerns.

Consumers play a vital role for the marketers to gain competitive edge and therefore marketers have to understand the consumer behaviour in order to make their green marketing practices successful. The main goals and aims of this investigation are as follows:

1. To know and spread the knowledge about Green products and Green marketing.
2. To investigate the consumers awareness and beliefs about environmental safety.
3. To study the consumers attitude towards the usage of green products.
4. To find out the link between the consumer awareness and their perception of eco-friendly products and services.
5. To investigate the effect of Demographic Characteristics (age, Gender and Qualification) in enhancing the relationship between Independent and Dependent variables.
6. To discover those aspects which persuade the consumers on purchasing decision of Environment-friendly products and services?
7. To assess the environmental concerns among the consumers when going through purchase decision process.

This study enhances the concept and understanding of Green products and Green marketing practices. Also, how Eco-friendly products and Green Marketing Practices will be beneficial for the both the Environment and consumers. This research will highlight the key factors that influence the consumers green buying behaviour and the impact on purchase decision. This study reveals the importance of saving the environment by using of green products that are made from less toxic materials. This research reveals that how socio-demographic characteristics impact the Green Consumers buying behaviour and purchase decision.

2. Literature review

Numerous studies are conducted on Green Marketing as it is now becoming an attractive and recent phenomenon in the research field. This section covers the past researches and findings about Eco-friendly products, awareness and perception of Green consumers and their buying intention and behaviour towards Green Products which supports this research conducted in major cities of Saudi Arabia.

2.1. Green marketing

Because of dreadful conditions of environment and earth since 1970's and 1980's, Conditional Marketing starts taking the form of Green Marketing. Green Marketing is focal point for the marketers because it delivers new opportunities and competitive edge as compared to the Traditional Marketing (Govender and Govender, 2016). Some specialists considered green marketing which comprises of all the activities that are intended to create and facilitate those exchanges that are planned to content human needs and desires in a way that the satisfaction of these needs have insignificant harmful impact on the environment (Schena et al., 2015).

Green Marketing can be also be defined in a way that it includes the use of those promotional tools that satisfies both the organizational and individual aims in such approach in which protection, safety and preservation of the natural environment is sustained (Mintu and Lozada, 1993).

Green Marketing covers variety of activities like alteration in the production procedure by using natural resources, change in the packaging and promoting through Green Advertising (Digel and Yazdanifard, 2014). The main goal of Green Marketing is to make and sell those products that are
not dangerous and precarious for the earth and environment and at the same time it also boost the consumers to buy green products so that they can also take part in protecting the environment (Stern and Ander, 2008). This indicates that Marketers and organizations must alter their approach in providing the products that are advantageous and beneficial to the Environment and consumers equally (Govender and Govender, 2016).

Green Marketing passes through diverse phases during its progress and each phase contains some explicit characteristics according to the environmental needs. There are basically 3 eras of Green Marketing named as:

1. Ecological Green Marketing (it includes all the environmental problems)
2. Green Environmental Marketing (it includes hygienic technology, competitive benefit etc.)
3. Sustainable Green Marketing (it comprises of sustainability and more demands and pressure of saving the environment)

**H1**: There is a positive relationship between Green Products/Green Marketing Practices and Awareness about the Environment.

### 2.2. Green product

A Green product is a product that is made in Environment-friendly manner, having least negative effects; product can be recycled, saves natural resources and is prepared locally (Digel and Yazdanifard, 2014).

Green Products comes in the category of those products which are naturally produce, non-toxic, pollution free, packed with natural and suitable components and having minimal impact on environment and human beings (Siddique and Hossain, 2018). Those products which are decomposable, recyclable, having less packaging and are made with organic procedure are considered as green products (Haery et al., 2013).

With the awareness and environment-concerned behaviour, consumers want eco-friendly products. They intend to consume green products and organic food because they think green products are healthy for them and environment which provide high quality as well. They are inspired by the value given by the Eco-friendly products like freshness, taste and hygiene (Govender and Govender, 2016).

Studies indicates positive correlation among the Consumer's awareness of environment and their approach towards the green products which means by increasing the awareness and knowledge about the surroundings, it also impact the consumers' preference concerning green products (Shaikh and Rahman, 2011).

**H2**: Green Product/ Green Marketing Practices has positive relationship with Perception about Green Products.

### 2.3. Green consumer

Green marketing can't be understood without knowing about Green Consumers. A consumer or customer who is not fond of using that product, which is destructive for the environment because of its production process is said to be as Green Consumer (Jaju, 2016). Green Consumers are those consumers whose buying behavior is motivated by environmental concerns and worries (Siddique and Hossain, 2018).

Many researches on Green Consumers have been done and given different names to green consumers like observant consumers towards environmental problems or those people who care for the natural environment and consumers who are familiar with the safety importance of society and earth (Haery et al., 2013).

A person who is conscious towards the well-being of the environment shows positive behaviour towards Green products and indulges in buying of such products is known as Green Consumer. Consumers are gradually becoming careful and conscious about the environment safety and feel themselves as socially responsible as well. Consumers are showing positive and supportive behaviour towards environmentally-friendly products and organizations which follow Green Marketing practices (Govender and Govender, 2016).

In order to understand the complexity of consumers' behavior in their selection of eco-friendly products, Two-dimensional model was given. This model categorizes the consumers into four divisions: Environmentally green consumers, Emerging green consumers, Price sensitive green consumers and Conventional consumers (D’Souza, 2004).

Green Products stimulate hygiene, protection, cost efficiency, recycled, suitability and apart from that they are considered as Energy Savers. Also they are formed from natural and biological resources through natural Production process having Environment-suitable packaging as well (Fonseca, 2015).

### 2.4. Green buying behaviour and purchase intention

The pattern of consumers that when, how, why and where to buy or consume the product is referred to Consumer Behaviour where the customer plays three different roles; user, payer and buyer. Consumer behaviour can also be stated in this way: 'the method and actions people involve in when searching for, choosing, purchasing, using, estimating, and disposing of products and services in order to fulfill their needs and desires' (Sehgal and Singh, 2010). Environmental values play a key part in pro-environmental behaviour: values affect people’s visions, which then have impacts on individual norms that lead to consumers’ pro-environmental behaviors (Maheshwari, 2014).
Green consumers buy those goods and products which they think have the positive impact on the environment (Haery et al., 2013).

There are various factors which influence the buying behaviour and the purchase intention of consumers like price or social norms. According to one of the study, consumers are persuaded by the social norms and the approval from the society which shows positive relation between social norms and the purchase intention but it varies from society to society as well (Jaju, 2016). Green purchase intention is the possibility and readiness of an individual to provide fondness to eco-friendly products over the conventional products in their purchase intention which are harmful (Rashid, 2009).

Green consumer’s purchase pattern and intention can only be recognized if green buying behaviour is examined and if those factors are identified which are motivating the Consumers. Green behaviour can be explained in a way that consists of those actions that will have a direct influence on ecosystem (Jaju, 2016). Negative connection is found between Green purchase behaviour and higher price in various studies. It means consumers are not willing to buy more green products because they are expensive than the conventional products (Bhowal and Kalita, 2016).

Green products demand is growing day by day and consumers are encouraging those green practices which have minimum impact on the environment like recycling, saving of paper or electricity, Organic food and less chemical usage in making of products, etc. This shows the Green consumers are realizing that their buying behaviour will ultimately impact the environment so they are feeling the sense of responsibility towards the ecosystem and thus indulging themselves in buying Green Products (Han et al., 2010). Green purchase behaviour includes activities like consumption of eco-friendly products, environment-friendly equipment’s and machines which cause less harm to the environment, energy-saving cars electrical appliances etc. (Siddique and Hossain, 2018).

Green marketing is practiced in many countries and these practices are influencing the consumers in increasing their knowledge and awareness about green products and their usage impact on Environment so transferring consumers in buying of green products. Innovative and new opportunities have been formed and emerged for the marketers to produce and sell eco-friendly products and practice green marketing because of the change in the consumers’ purchasing models which has been shift to buy green products more (Haery et al., 2013).

H3: Green Products/Green Marketing Practices has positive impact on Purchase Intention.

2.5. Green buying decision

Green marketing is a broad research area and now green buying decision is also becoming a vibrant topic to investigate. There are various factors which influence Consumer’s Decision Making process. Most important factor is the Consumer’s awareness and information about the certain product.

Kotler and Keller (2009) proposed 5 stages of Buying-decision process which includes problem recognition, information search, evaluation of alternatives, purchase decision and post-purchase behaviour. Customers gather as much information as they can and their choice and buying decision is also based on their beliefs, attitude and knowledge.

Consumers tend to focus on collecting information from different sources. There are basically two types of decisions: the behavioral influence perspective and the experimental perspective (Fonseca, 2015).

Consumer decision making style is considered emotional and intellectual methodology that can be useful to explore about consumers that how they make decision towards shopping and purchasing behavior. In other words, this finding shows that, consumer decision making style is the rational procedure of making decision to purchase a specific product among ranges of products and then they make decision to repurchase that product or not (Hassan and Nor, 2013).

Several studies have been done on green marketing and the approaches, used for communication in order to influence the consumer purchase behaviour. In one study, it is found that a correlation exists between consumers’ environmental views and their sureness on the performance of green products (Jaju, 2016). There are different factors which cover functional aspects of the products and the emotional well-being of the consumers and these factors are source of influence for the consumer’s purchase decisions for the green products and services (Polo, 2015). Environmental concern and attitude impact the purchasing decision of consumers. Consuming and acquiring of eco-friendly products may improve the sustainability of the earth and the environment (Shaikh and Rahman, 2011).

It is necessary to understand the consumer behaviour in order to understand his/her decision making process. Investigators found that purchasing green products can lead people into unselfish behaviour. Buying those products that claims to be prepared with low environmental influence can set up —moral identifications in individual minds. (Sehgal and Singh, 2010). Purchasing of green commodities is the action of adding Environmental benchmark to other standards like price and quality while making the purchase decision (Dagher et al., 2015).

One of another study reveals that consumers use their existing awareness and knowledge about eco-friendly products in determining their realization of environmental welfare, Green reliability and financial benefits so that they can make a Green product purchasing decision. Also, findings of one research identify Green Product awareness as an
essential factor that has an impact on green purchase decision Green. So, it shows the positive relationship between green product awareness and consumer purchase decision (Siddique and Hossain, 2018).

H4: Green Products has positive correlation with Buying Decision.

2.6. Demographic characteristics and green products/green marketing

Demographic characteristics which include Age, Gender, and Income etc. also impact the behaviour and decision making of the green products. It varies from society to society and from country to country. One of the finding shows that green buying decisions of young customers of urban area is influenced by the price of the green products. So, price impact the buying decision of young consumers (Bhowal and Sharma, 2015).

These factors are broadly used for the research purpose in field of Green Marketing. According to one of the research, young adults are mostly inclined towards buying of green products because of the natural and social environment and awareness (Govender and Govender, 2016).

Education and age plays a significant role in prompting the consumer's green purchase intention and green consumption behaviour (Shama, 2015). The youngsters tend to buy more green products because of the concern and admiration related to the environment but this finding does not end the possibility of other age groups to be more concerned about using eco-friendly environment (Hello and Momani, 2014).

Some researches show the peer impact on consumer behaviour. Peer group impact has an important influence on youngster's societal situation (Jamal et al., 2016).

One of the researches determines that age and education are related to environmental knowledge and awareness. This research claims that demographic variables have no positive correlation with green purchase intention. Also, demographic variables are not appropriate in explaining environmental consumer behavior (Ansar, 2013).

H5: Demographic characteristics (Age, Gender and Qualification) will increase the relationship between the Green Products and Perception about Green Products.

H6: Demographic characteristics (Age, Gender and Qualification) will increase the relationship between the Green Products and Purchase Intention.

H7: Demographic characteristics (Age, Gender and Qualification) will strengthen the relationship between the Green Products and Buying Decision.

H8: Demographic characteristics (Age, Gender and Qualification) will enhance the relationship between the Green Products and Awareness about the Environment.

With the above discussion and past researches, the suggested theoretical framework is given in Fig. 1 in order to back and support of finding the impact of green marketing practices on consumer purchase intention and buying decision while keeping in mind the perception about green products and also the awareness regarding environmental issues.

3. Research methodology

3.1. Study design

The present research is Quantitative research. The methodology has been used for this research is Investigative Research methodology or Analytical Research methodology. Data was collected by using two mediums for analyze, i.e. Primary and Secondary data. For the purpose of Secondary data collection, Books, thesis, reports, journals and articles were used. Primary data was gathered by using Questionnaire.

To achieve the desired outcome, the data is collected from the respondents, which consists of all ages and gender having different educational backgrounds. Individual unit of analysis is selected for the study. The statistical executed in this study are correlation, regression and moderation.

3.2. Population

The population of this study comprises of general people living in Saudi Arabia. For collecting data, main research area consists of Jeddah, Dammam and Riyadh which are the major cities of Saudi Arabia.

3.3. Sample size

In this study primary data is collected through questionnaire. This research comprises of 3 demographic questions and 15 observed questions using Likert scale of 5. Questionnaires are filled and sent through Google Form in Saudi Arabia cities (Jeddah, Dammam and Riyadh) 247 completely filled questionnaires are used for data analysis. Data is collected from individuals of all age groups, both males and females having different educational background.

3.4. Sampling technique

Convenient sampling technique is used for collecting data. It is kind of non-probability sampling in which data would be collected which is convenient. It is not possible to collect the data from all the residents of Saudi Arabia so major cities are selected for the data collection and Google form method is used as well. Advantage of this sampling technique is that data assembles quickly in this technique.
3.5. Measurement of variables

All the items are measured on five-point Likert scale. The Questions in the Questionnaire are adopted with some changings according to the sample and different origin (Fonseca, 2015).

3.6. Statistical technique

In this study, statistical package for social sciences (SPSS) is used to analyze the data for sample description and description statistics. Regression, moderation and correlation analysis is done to explore data.

4. Results and analysis

4.1. Demographic profile of sample

In this study, data was gathered from both genders male and female. Most of the respondents were female. 69.6% were female while 29.1% were male respondents. Most of respondents belong to age group of 18-23 years. There were 34.8% who belong to age group of 18-23, 27% from age group of 24-29, 18.2% were from age group of 30-35 and 10.5% belong to age group of 35-41 while from the age group of above 42 there were 9% respondents. Frequencies and percentages of demographic profiles are shown below in Table 1.

In this study, data was collected from respondents having different educational backgrounds. Mostly respondents have done Masters having 34.0% which is highest among all. There were 25.0% who have completed High School degree and 23.4% respondents have done PHD while only 10.5% people belong to Bachelor's degree. Table 2 shows the frequencies and percentages of educational background of the respondents.

| Table 1: Demographic analysis |
|--------------------------------|
| Demographics | Frequencies | Percentage |
| Gender | | |
| Male | 72 | 29.1% |
| Female | 172 | 69.6% |
| Age | | |
| 18-23 | 86 | 34.8% |
| 24-29 | 66 | 27% |
| 30-35 | 45 | 18.2% |
| 35-41 | 26 | 10.5% |
| Above 42 | 22 | 9% |

| Table 2: The frequencies and percentages of educational background of the respondents |
|---------------------------------------------|
| Demographics | Frequencies | Percentage |
| Educational Status | | |
| High School Degree | 64 | 25.0% |
| Bachelors | 27 | 10.5% |
| Masters | 87 | 34.0% |
| PHD | 60 | 23.4% |
| Others | 9 | 3.5% |

4.2. Interpretation and analysis

4.2.1. Reliability analysis

Reliability is the degree to which a valuation tool produces stable and constant results. Table 3 shows that Cronbach Alpha for Green Products is 0.893, Value is 0.807 for Perception about green products, 0.799 for Purchase Intention, is 0.855 for Buying decision and 0.745 for Awareness about Environment. As all Alpha values lies in between 0.7 to 1, therefore all variables are considered to be reliable. So, the questionnaire over all reliability is considered reliable for further study. Values of Charon Bach Alpha of each variable is shown in Table 3 along with no. of items.
A moderator is that variable which identifies the situations under which given predictor is related to an outcome. It describes “when” Dependent and Independent Variables are related. Also, moderating variable changes the direction or magnitude of the relationship between two variables. In this study, Demographic Characteristics (Age, Gender and Qualification) are taken as moderator. All three of them were computed first and then moderation test is applied.

4.2.5. Moderation analysis

4.2.2. Validity test

The validity of all variables is examined independently through factor analysis, which exhibit that all variables are loaded in single factor and as the overall validity of all variables are loaded in four distinct constructs which shows that data is valid and further inquiry can be done on it.

4.2.3. Test of normality

The p-value for Kolmogorov test and Shapiro – Wilk test should greater than 0.05 (p> 0.05). The P-value of all variables are less than 0.05 as shown in Table 4 so it can be say that data is not normal so therefore it can be further check using skewness and Kurtosis. The P-value is less than 0.05 so it can be concluded that data is normally distributed.

| Variable                        | Skewness | Kurtosis |
|---------------------------------|----------|----------|
| Green Products                  | 0.893    | 0.1256   |
| Perception about Green products | 0.807    | 0.116    |
| Purchase Intention              | 0.799    | 0.438    |
| Buying decision                 | 0.855    | 0.494    |
| Awareness about Environment     | 0.745    | 1.256    |

Descriptive Analysis is used to check the normality of the data and measures the uniformity of the respondents towards the variables. The skewness acceptable range is between -1 to +1 and the acceptable range of kurtosis lies between -3 to +3. Keeping in view the Table 5, values of skewness and Kurtosis for Green Products is -0.871 and 0.438, for Perception about Green Products is -0.462 and 0.116, for Purchase Intention is -0.342 and -0.494, for Buying decision is -0.207 and -0.661 and for Awareness about the Environment is -0.879 and 1.256. All variables have the values of skewness and kurtosis in the acceptable range so data is considered normal for further analysis.

4.2.4. Correlation

In order to study the relationship between the variables, Correlation analysis has been applied as shown in Table 6. It range lies between +1 to -1. 0 correlations mean that there is no relationship between the variables. +1 shows highly positive correlation and -1 shows highly negative correlation between the variables. Table 6 shows the correlation between the variables. The highest strong positive relationship is between Perception of green products and GP that is 63% and it shows the significant result (p< 0.05). Similarly, it can be seen that there is weak relationship between Awareness about Environment and PI that is 29% but shows more significance as compared to others. Second highest positive relationship from Table 6 is found between GBD and GP i.e. 48% shows the significant result. Also, relationship between PI and GP is 41% and relationship between AWE and GP is 43%. Likewise, Table 6 also shows the weak relationship between PI and Perception about Green products i.e., 34%.

4.2.5. Moderation analysis

A moderator is that variable which identifies the situations under which given predictor is related to an outcome. It describes “when” Dependent and Independent Variables are related. Also, moderating variable changes the direction or magnitude of the relationship between two variables. In this study, Demographic Characteristics (Age, Gender and Qualification) are taken as moderator. All three of them were computed first and then moderation test is applied.
co-efficient value of DMG is 0.75 which shows the increase in DMG. If we increase one score, it increases the value of DMG. The p-value of DMG is 0.046 which is less than 0.05; it shows the significant contribution to explain DMG.

Table 7: Parameters estimation of regression model 1

| Perception about green products | Coefficient | p-value |
|-------------------------------|-------------|---------|
| DMG                           | 0.83        | 0.0014  |
| Interaction Term              | -0.195      | 0.086   |

R-Square = 0.19; P**=0.01; P*= 0.05

Model 2:

\[ Y = PI \quad X = GP \quad M = DMG \]
\[ Y = 0.32X + 0.139M - 0.007I \]

Table 8 shows the model parameters of the model 2. The p-value of interaction term is 0.948 which shows the insignificant result. It can be said that interaction term does not play the important part to contribute the PI. The beta co-efficient value of Purchase Intention is 0.32 shows the increase in the PI. If we increase one score, it will result in a change of 0.32 score in the purchase intention. The p-value is 0.21 which is more than 0.05 which shows the insignificant contribution to explain the PI. The beta co-efficient value of DMG is 0.13 which shows the increase in DMG. If we increase one score, it increases the value of DMG. The p-value of DMG is 0.70 which is more than 0.05; it shows the insignificant contribution to explain DMG.

Table 8: Parameter estimation of regression model 2

| Purchase Intention | Coefficient | p-value |
|--------------------|-------------|---------|
| DMG                | 0.320       | 0.217   |
| Interaction Term   | -0.007      | 0.948   |

R-Square = 0.123; P**=0.01; P*= 0.05

Model 3:

\[ Y = BD \quad X = GP \quad M = DMG \]
\[ Y = 0.183X - 0.27875 + 0.116I \]

Table 9 shows the model parameters of the model 3. The p-value of interaction term is 0.34 which shows the insignificant result. It can be said that interaction term does not play the important part to contribute the BD. The beta co-efficient value of buying decision is 0.18; shows the increase in the BD. If we increase one score, it will result in a change of 0.18 score in the buying decision. The p-value is 0.51 which is more than 0.05 which shows the insignificant contribution to explain the BD. The beta co-efficient value of DMG is -0.27 which shows decrease in DMG and showing negative relation. If we increase one score, it decreases the value of DMG. The p-value of DMG is 0.47 which is more than 0.05; it shows the insignificant contribution to explain DMG.

Table 9: Parameter estimation of regression model 3

| Buying Decision | Coefficient | p-value |
|-----------------|-------------|---------|
| DMG             | -0.2764     | 0.478   |
| Interaction Term| 0.116       | 0.346   |

R-Square = 0.162; P**=0.01; P*= 0.05

Model 4:

\[ Y = AWE \quad X = GP \quad M = DMG \]
\[ Y = 0.362X + 0.271M - 0.060I \]

Table 10 shows the model parameters of the model 4. The p-value of interaction term is 0.59 which shows the insignificant result. It can be said that interaction term does not play the important part to contribute the AWE. The beta co-efficient value of awareness about environment is 0.36 shows the increase in the AWE. If we increase one score, it will result in a change of 0.36 score in the awareness about environment. The p-value is 0.17 which is more than 0.05 which shows the insignificant contribution to explain the AWE. The beta co-efficient value of DMG is 0.27 which shows the increase in DMG. If we increase one score, it increases the value of DMG. The p-value of DMG is 0.47 which is more than 0.05; it shows the insignificant contribution to explain DMG.

Table 10: Parameter estimation of regression model 4

| Awareness about Environment | Coefficient | p-value |
|-----------------------------|-------------|---------|
| DMG                         | 0.362       | 0.178   |
| Interaction Term            | -0.060      | 0.595   |

R-Square = 0.092; P**=0.01; P*= 0.05

5. Key findings

Results reveal that consumers have a positive view towards eco-friendly products and services. Majority of the consumers is of the view that it is necessary to use the green products which will not damage and harm the earth, environment and consumers themselves. Also, consumers are conscious and are well aware about the different environmental issues and concerns. Maximum respondents are familiar with the Green or Environmental-friendly products. Consumers want to buy Eco-friendly products instead of Non-environmental friendly products. Results of past study are similar to the present research which reveals that consumers want eco-friendly products. They plan to consume green products and organic food as they think green products are healthy for them and environment. They are motivated by the value given by the Eco-friendly products like freshness, taste and hygiene (Govender and Govender, 2016). Another study also indicates positive correlation among the Consumer’s awareness of environment and their attitude concerning the green products which support the findings of this research (Shaikh and Rahman, 2011).

The key element that influences the purchase of green products is the awareness regarding green products and environmental harm. Majority of the
respondents show concern towards Eco-friendly products and Green Marketing practices. Findings of this study is in align with the findings of another study which shows that Consumers are showing positive and supportive behaviour towards environmentally-friendly products and organizations which follow Green Marketing practices (Govender and Govender, 2016).

Most consumers take environmental issues very seriously and show positive attitude towards purchasing of Green products. This finding is also supported by previous study which reveals that Green consumers are realizing that their buying behaviour will ultimately impact the environment so they are feeling the sense of responsibility towards the ecosystem and thus indulging themselves in buying Green Products (Han et al., 2010).

Another finding of the present research shows that Demographic Characteristics (Age, Gender, and Qualification) does not significantly contribute in explaining the relationship between Green Products and all dependent variables. Results of one of the past study contradicts with the findings of the present research as it states that Education and age plays a significant role in prompting the consumer’s green purchase intention and green consumption behaviour (Sharma, 2015). But at the same time, one of the researches is in support of this finding and concludes that age and education are related to environmental knowledge and awareness and claim that demographic variables have no positive correlation with green purchase intention. Also, demographic variables are not appropriate in explaining environmental consumer behavior (Ansar, 2013).

6. Research limitations and future study recommendations

Every study has some limitations and recommendations for further study. This study also has some boundaries beyond which future research can be conducted. The very first limitation is the small population. Only three major cities were catered in this research so data should be collected from other small cities and Arab countries as well. In addition to this, investigators should study the causes and ground reasons for sluggish and slow progress in adoption and promotion of eco-friendly products.

Also, upcoming studies should observe the buying behaviour of specific green product as this research examined the overall purchasing behaviour of green products. Research is desirable to observe more precise buying behaviors and decisions like electricity saving products, organic food and recycling of plastic bags etc.

Furthermore, future studies can be conducted to understand the challenges and factors that are confronted while executing the Green Marketing practices in a society. Researchers can explore the green buying behaviour and environmental concern of teenagers only as in this study most of the respondents belong to 18-23 age groups. Also, the impact of parents on teenagers can be studied in future researches while buying of green products.

In this research, the impact of income level and marital status is not seen so additional studies can also see the impact of both these demographic characteristics while buying of environmental-friendly products. Further studies must observe the different societal role of females (e.g., employed, independent) and how such a role can affect green behavior.

7. Suggestions and recommendations

There is no doubt in this notion that Green Products and Green Marketing concept is still an emerging concept so it is still required to inculcate the Eco-friendly behaviour among the consumers. It is recommended to develop and increase the green products awareness in consumers through different green marketing strategies and campaigns. Companies should add information about eco-friendly products and its advantages in their official websites and Web-based advertising will be beneficial to create awareness among consumers.

Environmental safety and attitude towards Eco-friendly products can be indulged in the minds of up-coming generation from their childhood. Companies should focus on the Green Product practices, Quality and Price so that it motivates the consumers to buy them. Marketers should focus on Green Advertising and Green Packaging as well in order to gain attention of Consumers which will influence their purchasing decision. This is only possible if efforts are made at every level (Individual, Companies, and Governments) to make ‘Green Culture’ in the society. Everyone should feel the responsibility in saving the environment and it could only be possible by consuming green products.

8. Conclusion

After the conduction of this research, it can be concluded and summarized in the way that majority of the consumers are well aware of the green products and the environmental concerns as well. So, positive attitude is seen towards eco-friendly products and green marketing practices. But a lot of awareness is still required in order to make purchase of green products more accessible and familiar.

Many attributes and elements affect the buying intention and purchase decision on which marketers can pay attention to make it a culture of the society. Continuous hard work and effort is required in this field by everyone in order to save the environment from hazards. Companies should manufacture the green products and promote the use of these products through green marketing practices and approaches. Green marketing is still in its early stages, which requires a lot of research and study on green products and green marketing practices to
fully discover its potential and benefit in the long run.

Compliance with ethical standards

Conflict of interest

The authors declare that they have no conflict of interest.

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