Contents lists available at GrowingScience

Uncertain Supply Chain Management

homepage: www.GrowingScience.com/uscm

The effect of green marketing on consumer behavior among Saudi women

Fuad Mohammed Alhamdi[a,b*]

[a]*Associate Professor, Department of Management, College of Business Administration in Hawtat Bani Tamim, Prince Sattam bin Abdulaziz University, Saudi Arabia*
[b]*Associate Professor, Department of Marketing and Production, Collge of Administrative Sciences, Thamar University, Yemen republic*

A B S T R A C T

This study investigates the direct impact of green marketing, green brands, green purchasing decisions, eco-label, and the theory of planned behavior on consumer behavior among women in Saudi Arabia, in addition to knowing the role of the theory of planned behavior as a moderating variable of the relationship between green marketing, green brands, green purchasing decisions, eco-label, and the theory of consumer behavior among women in Saudi Arabia. Questionnaires were distributed to 414 women in Saudi Arabia, and the data were analyzed using partial least squares structural equation modeling (PLS-SEM) for 377 valid questionnaires for analysis and hypothesis testing. This study evaluates a structural model to understand the impact of various factors on consumer behavior among Saudi women, focusing on environmental labels, green purchasing decisions, green brands, green marketing, and the Theory of Planned Behavior (TPB). The analysis confirms that environmental labels have a positive and significant effect on consumer behavior, supporting the hypothesis that they influence sustainable consumption. Conversely, green purchasing decisions, green brands, and green marketing do not show a statistically significant effect on consumer behavior, challenging assumptions that these factors alone drive sustainable choices. The TPB was found to moderate the impact of environmental labels and green brands but did not consistently influence consumer behavior or interact effectively with other factors like green purchasing decisions and green marketing. The study's findings suggest that while environmental labels are crucial, green marketing and branding strategies need to be more comprehensive. Additionally, TPB's role as a moderator varies, indicating the need for context-specific approaches to understand and influence consumer behavior better. The study highlights the importance of tailored strategies and continued research to refine models and interventions for promoting sustainable consumption.

Article history:
Received June 3, 2024
Received in revised format July 25, 2024
Accepted August 29 2024
Available online
September 2 2024

Keywords:
Green marketing
Consumer behavior
Saudi women

1. Introduction

The evolution of consumer behavior led to the emergence of the term "green consumer behavior". This concept is an extension of the global consumer movement, which started with an increased awareness of consumers' rights to obtain products that are safe, suitable, and environmentally friendly (Chen & Hong, 2016; Wiederhold & Martinez, 2018). Research indicates that green consumer behavior encompasses preferences for eco-friendly products and services, sensitivity to and appreciation of local cultures, a desire for new experiences, and a tendency to actively participate rather than remain passive (Siagian & Cahyono, 2021). It also refers to individuals who are highly environmentally conscious and make purchasing decisions based on environmental considerations, contrasting with those who are less attentive to such issues (Chen et al., 2014, 2015). Despite the growing demand for eco-friendly products and services, the supply has not kept up, highlighting a gap in meeting this demand. This growing focus on environmentally friendly behavior is pushing companies to adopt socially responsible and

* Corresponding author
E-mail address f.alhamdi@psau.edu.sa (F. M. Alhamd)

ISSN 2291-6830 (Online) - ISSN 2291-6822 (Print)

doi: 10.5267/j.uscm.2024.9.004

environmentally ethical practices (Kolk, 2016; Wahyuni et al., 2020). The shift towards sustainable consumption has given rise to green marketing, a subset of traditional marketing strategies that emphasizes the promotion of green products, pricing, distribution, and advertising (Nekmahmud & Fekete-Farkas, 2020; Tsai et al., 2020).

Green marketing, also known as environmental, ecological, social, organic, or sustainable marketing (Martínez et al., 2020; Nekmahmud & Fekete-Farkas, 2020), focuses on marketing activities designed to protect the environment (Chung, 2020; Islam, 2018). It involves various practices related to environmental issues, corporate social responsibility, and sustainability, including activities such as product modifications for environmental friendliness, packaging adjustments, and promotional campaigns centered on eco-friendly themes (Al-dmour et al., 2023; Sreen et al., 2018; Kusuma & Damanik, 2017; Satrio et al., 2021). The study of consumer behavior involves analyzing how individuals, groups, or organizations select, purchase, and dispose of products, services, experiences, or ideas to meet their needs, as well as the impact of these processes on both the consumer and society (Perner, 2009). A key focus is on the purchasing behavior of individuals and households when acquiring goods for personal use (Madhavan & Kaliyaperumal, 2015). Marketers' actions significantly influence consumer behavior, which in turn shapes marketing strategies aimed at targeting consumers (Bruwer et al., 2011; Hsu, et al., 2018).

Consumer behavior is a multifaceted process involving cognitive, emotional, and physical activities related to the selection, purchase, and disposal of products and services to satisfy needs and desires (Kotler & Keller, 2006; Alzoubi et al., 2022). This behavior is complex and driven by various stages, influenced by external factors such as culture, society, location, and family (Abd Alia & Alhamad, 2022; Alshali & Ahmed, 2021; Akram et al., 2022; Sharma, 2021). Buying decisions involve assessing the likelihood of purchasing a brand (Phelps & Hoy, 1996), encompassing the stages of need identification, researching alternatives, selecting a product, making the purchase, using it, and deciding whether to repurchase or switch based on previous experiences (Perner, 2008). Customer purchase intentions reflect the probability of a consumer choosing a particular product (Phelps & Hoy, 1996) and are linked to cognitive behavior concerning how customers plan to buy specific brands, products, or services (Kwek et al., 2010; Alhamad, et al., 2015). Factors influencing purchase intentions and decision-making include word of mouth, product features, and price (Sheu, 2010). Celebrity endorsements can positively impact consumer buying behavior, as individuals often imitate their favorite celebrities, leading to increased sales of endorsed products (Forbes, 2011; Puiyi & Priscilla, 2012; Faraj, & Alhamad, 2022). However, not all celebrity endorsements are effective; marketers need to carefully choose endorsers who align well with the product to ensure success (Ohanian, 1991). Successful advertising strategies should involve credible, trustworthy celebrities with appealing characteristics and ensure that the endorser's persona aligns with the product’s features to foster a favorable perception (Ajzen, 1980). Numerous internal and external factors influence consumer behavior. Consumer habits are significantly influenced by cultural, social, and personal characteristics, such as age, gender, reference group, social class, and religious and ethnic group. These are examples of external influences; psychological factors, on the other hand, include motivation, perception, attitude, and learning (Noel, 2009; Szigeti et al., 2011).

2. Literature study and hypothesis development

2.1 Green marketing on consumer behavior consumer behavior among Saudi women

Numerous studies have elucidated the significance of green marketing in the corpus of existing knowledge (Abraham, 2011). The notion of green marketing encompasses several practices and patterns, such as altering products, production procedures, packaging and labeling, and advertising tactics (Podvorica, 2020; Polonsky, 1994). According to (Peattie, 1995). And (Welford, 2013), green marketing is the management process that addresses identifying, anticipating, and meeting customer needs and desires. These kinds of operations will take place amid the backdrop of profitable and sustainable methods. A business's responsibility is to focus on creating safer products while adapting to the environment's quick changes as a result of growing difficulties (Hasan & Ali, 2015; Devi Juwaheer, 2012). Green marketing and associated tactics are becoming an important instrument for corporate sustainability and improving performance (Papadas, 2017). However, as environmental sustainability and customer segmentation have grown over time, the idea of green marketing has changed (Dangelico, 2017). The process of trying to create different methods to reach consumers who care more about the environment is known as "green marketing" (Polonsky, 2008). As a result, green consumers will be defined as the primary consumer group that abstains from consuming goods that could endanger or harm living things (Podvorica, 2020). Nonetheless, businesses and individuals alike view the issue of sustainability as a top priority (Papadopoulos et al., 2010). Customers' profound concern for the environment has been noted since the 1990s, and as a result, their behavior has altered (Simon, 1992). Such actions have paved the way for environmentally friendly green marketing and sustainable products (Cleveland et al., 2005). Additionally, empirical research revealed a discrepancy between pro-environmental sentiments and green purchasing behavior, according to marketers of green products (Farzin et al., 2020; Ferraz et al., 2017). Individuals' views regarding environmental harm are legitimate within the context of industry (Barber, 2010). Being environmentally responsible has an effect on all business categories, according to a different study (Prahalad & Hamel, 1994). Meanwhile, other researchers (Galarraga Gallastegui, 2002). expounded on the idea that eco-labeling is a significant component that will impact customers' purchasing patterns and resultant purchase outcomes. Nonetheless, since the 1980s, the public's uncertainty about green products has been the main cause for concern (D'souza, et al., 2006). Ecologically conscientious consumers, meanwhile, make various efforts to maintain a cleaner environment. According to a recent survey (Kardos et al., 2019; Bhaskaran, 2006), customers don't trust the abundance of eco-labeling on products. Consumer behavior is significantly influenced by green packaging and branding, according to other recent studies (Chen et al., 2017; Mishra et al., 2017; Yang, et al., 2019). Thus, the cost and nature of green products influence

consumer behavior (Mishra et al., 2017). Consumer perceptions of green products are being more widely communicated over time (Ottman, 2017). As a result, it's critical that information on green products be disseminated in a style that's clear and accessible to a range of consumers (Mazur, 2016). We now discuss some of the major aspects influencing this in order to gain a deeper understanding of the subject.

H_1: *GM affects CBASW.*

2.2 Eco-Labeling consumer behavior consumer behavior among Saudi women

Because it communicates information about the product's features and the buyers' environmental concerns, eco-labeling has a big impact on how people behave toward things (Mishra & Sharma, 2014). It offers product information about environmental issues to a wide spectrum of consumers as well as business users. Eco-labeling is a significant factor in the creation of environmental policies and the encouragement of the usage of ecologically friendly goods and services. Furthermore, this is in line with comparable frameworks and the multi-stakeholder policy (Mishra & Sharma, 2014). Nonetheless, consumers' perceptions of eco-labeling have led to some misunderstanding and may make it difficult for them to forecast the environmental quality of items (Wymer & Polonsky, 2015). A product's environmental impact is seen as a legitimate feature and an essential component of its life cycle. Consumers can identify goods and services with the lowest lifetime environmental impact thanks to eco-labels (Papadas et al., 2019). The raw materials are extracted, produced, and finally disposed away in this life. The material that has already been published on eco-labeling for both labeled and unlabeled items has addressed a variety of business policies and plans (Papadas et al., 2019). Examined has also been the product rivalry based on eco-labeling (Moravcikova et al., 2015). Furthermore, eco-labeling is also discussed in the literature under the heading of green technology investment. Studies on investment, environmental quality behavior, and price competitiveness for eco-labeling, for example, have been conducted (Fliegelman, 2010). Low-quality businesses have been found to face fierce competition, and their effectiveness rises when eco-labeling is used as a primary strategy to save costs associated with low-quality product purchases (Kotler & Armstrong, 2010). Eco-labeling is a major strategy utilized by policy makers to promote more consumable and sustainable items in the market (Davari, A., & Strutton, 2014).

H_2: *EL affects CBASW.*

2.3 Green Purchasing Decisions and Women's Consumer Behavior

Research has shown that attitudes toward green consumer behavior differ among women (Awad, 2011; D'Souza et al., 2007; Lee, 2008, 2009; Murad & Ahmed, 2012; Oerke, & Bogner, 2010; Patel et al., 2017; Schell et al., 2020; Sun et al., 2019; Xiao and Dunlap, 2007; Zhao et al., 2014). However, other studies suggest that the difference may not significantly affect green purchasing decisions (Akehurst et al., 2012; Khari, 2014, 2015; Nguyen et al., 2019; Shamdasani et al., 1993; Tilikidou & Delstavrou, 2014). Some research suggests that some female consumers (women) tend to score higher on green criteria and are more motivated to make eco-friendly purchases, which significantly influences green purchasing decisions (Lee 2009; Mourad & Ahmed, 2012). According to Lee (2009) female consumers represent a promising market for eco-friendly products, a view supported by (Murad & Ahmed, 2012; Patel et al., 2017; Mourad & Ahmed, 2012) found that their model was significant for middle-aged women but not for older women. (Mourad and Ahmed, 2012) also noted that women generally have more trust in green products, are more satisfied with them, and make green purchasing decisions. In addition, (D'Souza et al., 2007; Xiao & Dunlap, 2007) found that women are more likely to participate in recycling. Research by (Baco & Rapozzo, 2010) and Patel et al. (2017) revealed that women with a positive attitude toward green products are typically aged between 25 and 54 years, while recent studies (Sun et al., 2019; Shiel et al., 2020; Wang et al., 2020) have highlighted the significant influence of age on green consumer behavior. In terms of education and green consumer behavior among women, research suggests a positive relationship between education and green preferences, which is reflected in green purchasing decisions (Awad, 2011; Balderjan, 1988; Mourad & Ahmed, 2012; Nath et al., 2015; Nguyen et al., 2019; Patel et al., 2017; Rice, 2006; Sun et al., 2019; Wang et al., 2020). For example, Rice (2006) found that higher educational qualifications among women lead to more pro-environmental behavior, which was confirmed. Others observed that more educated female consumers tend to be greener, a finding also supported by Awad (2011). Nath et al. (2015) highlighted that education plays a key role in promoting environmental sustainability. Nittala, 2014) confirmed this by observing that educated female consumers in India are more willing to pay extra for green products. However, some studies suggest that education may have a negative or negligible effect on green consumer preferences (Murad & Ahmed, 2012; Straughan & Roberts, 1999). Straughan and Roberts (1999) found no positive association between education and green attitudes, while Murad and Ahmed (2012) reported that green purchasing attitudes are significant among less educated consumers but not among those with higher education. In addition, some research suggests that education may not significantly influence women's green decisions (Akehurst et al., 2012; Shamdasani et al., 1993; Tilikidou, & Delistavrou, 2014). Khare (2014, 2015) noted that green consumer preferences do not vary significantly across different educational levels. However, Patel et al. (2017), Sun et al. (2019), Shahsavar et al. (2020), Shel et al. (2020), Wang et al. (2020) all confirmed the significant impact of education on women's green consumer behavior. Based on the above, the following hypothesis was formulated:

H_3: *GPD significantly and positively influence CBASW.*

2.4 Green Brands and Female Consumer Behavior consumer behavior consumer behavior among Saudi women

Research indicates notable differences among female consumers when it comes to green purchasing decisions (Erdogan et al., 2012; Laroche et al., 2001; Luo & Deng, 2008; Mainieri et al., 1997; Ork & Bogner, 2010), with women showing a higher level of engagement in environmental behaviors (Hunter et al., 2004; Xiao & Hong, 2010). For instance, a study revealed that 57% of female consumers are influenced by green brands and adjust their buying habits accordingly, compared to just 40% of those not influenced by green brands who still prefer to pay more for eco-friendly products (Laroche et al., 2001). Research on Indian consumers by Jain and Kaur (2006) highlighted that women are more attracted to green brands. Lee (2009) and Erdogan et al. (2012) also found that female consumers are more responsive to green brands and green marketing initiatives. Additionally, Smith (2010) and Smith and Brewer (2012) found that women are more inclined to spend on green products, although Schell et al. (2020) noted that female consumers are somewhat less drawn to green products.

Conversely, some studies suggest that women are less environmentally concerned than men and less influenced by (Balderjahn, 1988; Mustafa, 2007; Patel et al., 2017). For example, Patel et al. (2017) observed that men demonstrate higher levels of green behavior compared to women, while Mustafa (2007) and MacDonald and Hara (1994) noted that women's interest in green products often stems from environmental concerns triggered by green brands. However, many researchers argue that there is no significant cognitive difference in green consumption behavior between male and female consumers (Akehurst et al., 2012; Awad, 2011; Cheah, 2015; Mourad & Ahmed, 2012; Paço & Raposo, 2010; Rice, 2006; Samdahl & Robertson, 1989; Shamdasani et al., 1993; Suplico, 2009). Nath et al. (2015) also found that female consumers have comparable green attitudes to their male counterparts. More recently, Nguyen et al. (2019) and Shahsavar et al. (2020) confirmed that gender influences green consumer behavior. Based on the above, the following hypothesis is formulated:

H_4: *GD has a positive and direct impact on CBASW.*

2.5 Theory of Planned Behavior (TPB) and Female Consumer Behavior consumer behavior consumer behavior among Saudi women

The Theory of Planned Behavior (TPB) is frequently utilized to understand green marketing and consumer behavior (Han & Kim, 2010). According to TPB, an individual's intention to engage in a behavior is influenced by their attitude towards the behavior, subjective norms, and perceived behavioral control (Ajzen, 2011). In the realm of green marketing, TPB can be employed to elucidate how various elements of green marketing such as green advertising, green value, and green brand innovativeness affect consumer attitudes towards eco-friendly products or services and their subsequent repurchase intentions (Chen, 2010; Uddin, & Khan, 2018). Ansar (2013) found that the success of green advertising is contingent upon green marketing strategies, highlighting how advertisements can shape consumer attitudes towards green products. Chen (2010) demonstrated that a green brand's value has a positive effect on consumer attitudes, which in turn enhances repurchase intentions. Additionally, Lin et al. (2019) found that green brand innovativeness provides a competitive edge to firms by influencing consumer attitudes and increasing repurchase intentions. Conversely, subjective norms, such as green brand loyalty, are connected to TPB because loyal customers are more likely to feel social pressure or support for making environmentally friendly purchases (Rahbar & Wahid, 2011; Martinez, 2015). Perceived behavioral control, such as green awareness, is also related to TPB. Consumers who are well-informed about environmental issues and sustainable practices often feel more capable of making educated choices regarding green products or services (Mostafa, 2007a,b) Mahasuweerachai and Suttikun (2022) observed that individuals with higher levels of green awareness and satisfaction are more inclined to engage in pro-environmental behaviors, such as buying eco-friendly products. Similarly, Chen et al. (2018) found that green awareness positively impacts consumers' intentions to engage in environmental behaviors, including repurchasing green products.

H_5: *TPB positively and directly affects CBASW***.**
H_6: *TPB moderates the relationship between GM and CBASW***.**
H_7: *TPB moderates the relationship between EL and CBASW.*
H_8: *TPB moderates the relationship between GD and CBASW.*
H_9: *TPB moderates the relationship between GPD and CBASW.*

3. Methodology

3.1 Research Design, Measures, and Sampling Technique

The research design encompasses the methods employed to carry out the study, gather data, and assess variables pertinent to the research topic. Essentially, it provides a structured plan and framework to address the research questions. This study utilized a cross-sectional survey approach to investigate the relationships among various variables. In survey research, the "unit of analysis" refers to the particular focus of the study, which may involve individuals, groups, or households related to the research question.

3.2 Study Population and Sample

The study focused on women in the Kingdom of Saudi Arabia to assess consumer behavior. A total of 414 questionnaires were distributed to the sample of women, and 384 responses were returned. After reviewing the returned questionnaires, the researcher identified 17 as invalid for analysis, leaving 377 valid questionnaires for analysis and hypothesis testing.

3.3 Study Tool and Measures

The study employed a questionnaire aligned with the concepts outlined in the study framework. The measures for various concepts were as follows: GM was assessed using four items from Lee et al. (2021); GD was measured with four items from Shahsavar et al. (2020); EL was evaluated with four items from Papadas et al. (2019); GPD was gauged using four items from Shahsavar et al. (2020); TPB was measured with a four-item scale from Mahasuweerachai and Suttikun (2022); and CBSW was assessed with five items from Satrio et al. (2021). Responses were evaluated using a five-point Likert scale (strongly agree (5); agree (4); neutral (3); disagree (2); strongly disagree (1), based on modifications by Gibbs et al. (2004).

3.4 Data Collection Procedures

The researcher utilized revised questionnaires to gather data from the study population and sample of women in Saudi Arabia. Responses were measured using a five-point Likert scale, with choices ranging from “strongly disagree” (1) to “strongly agree” (5). The questions were designed to investigate the factors affecting consumer behavior among women in Saudi Arabia. Data collection occurred over a two-month span, from May 2024 to June 2024. Due to the sample's characteristics, the survey was administered via Google Forms, with questionnaires distributed through email and WhatsApp groups.

4. Results

Table 1
Variables and code

variables	Code
Green Marketing	*GM*
Green Brands	*GD*
Green Purchasing Decisions	*GPD*
Eco-label	*EL*
Theory of Planned Behavior	*TPB*
consumer behavior among women in Saudi Arabia	*CBASW*

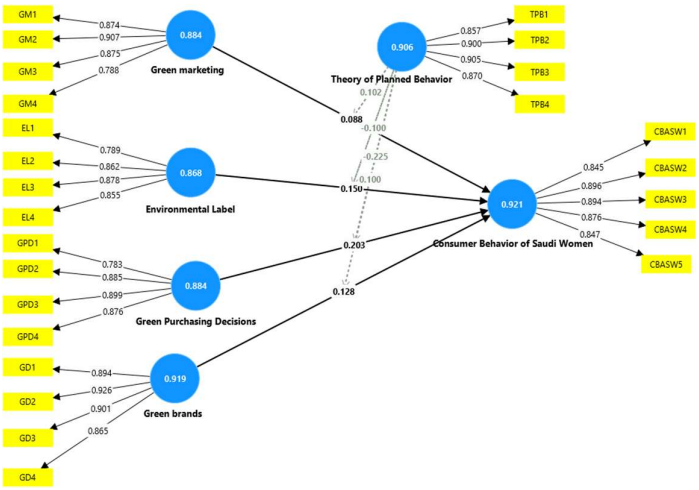

Fig. 1. The PLS algorithm of the measurement model. EFA, Construct reliability and validity

In exploratory factor analysis (EFA), components were evaluated and constructs were refined using an eigenvalue threshold of 1 or greater (Hair,, 2017). The eigenvalue indicates the proportion of variance a component explains in the observed variables. This method identified dimensions that explained 86% of the variance. Table 2 displays descriptive statistics, including composite reliability (rho_c) and alternative composite reliability (rho_a) values (Hair et al., 2010). Dimensions with Cronbach’s alpha values exceeding 0.7 demonstrated strong reliability (Galanis, 2013). Construct validity was assessed through discriminant and convergent validity tests. Convergent validity was evaluated using Composite Reliability (CR) and Average Variance Extracted (AVE), with results showing meaningful relationships among construct components. The AVE

was above 0.5, and the CR was greater than 0.7. Table 2 includes information on discriminant and convergent validity, as well as cross-loading and variance inflation factors (VIF), which support the model's validity and reliability. For details, see Table 2.

Table 2
EFA, Construct reliability and validity

	EFA				Construct reliability and validity			
	Outer loadings	Outer weights	VIF	Factor loadings	Cronbach's alpha	Composite reliability (rho_a)	Composite reliability (rho_c)	AVE
CBASW1	0.845	0.242	2.427	0.844				
CBASW2	0.896	0.232	3.728	0.895				
CBASW3	0.894	0.225	3.685	0.893				
CBASW4	0.876	0.226	2.948	0.875				
CBASW5	0.847	0.223	2.493	0.846	0.921	0.921	0.941	0.760
EL1	0.789	0.302	1.701	0.788				
EL2	0.862	0.293	2.603	0.861				
EL3	0.878	0.295	3.051	0.876				
EL4	0.855	0.293	2.320	0.854	0.868	0.867	0.910	0.717
GD1	0.894	0.277	3.681	0.893				
GD2	0.926	0.272	4.734	0.925				
GD3	0.901	0.281	3.189	0.900				
GD4	0.865	0.286	2.438	0.864	0.919	0.918	0.943	0.804
GM1	0.874	0.315	3.067	0.873				
GM2	0.907	0.286	3.936	0.907				
GM3	0.875	0.283	2.669	0.874				
GM4	0.788	0.278	1.806	0.786	0.884	0.886	0.920	0.743
GPD1	0.783	0.277	1.688	0.782				
GPD2	0.885	0.294	3.139	0.884				
GPD3	0.899	0.286	3.474	0.898				
GPD4	0.876	0.302	2.440	0.876	0.884	0.886	0.920	0.744
TPB1	0.857	0.281	2.290	0.855				
TPB2	0.900	0.275	3.669	0.899				
TPB3	0.905	0.269	3.810	0.904				
TPB4	0.870	0.309	2.359	0.869	0.906	0.907	0.934	0.780

Table 3
Discriminant validity (HTMT)

variables	CBSW	EL	GPD	GB	GM	TPB	TPB × GM	TPB × EL	TPB × GPD	TPB × GB	AVE
CBSW											0.760
EL	0.877										0.717
GPD	0.889	0.950									0.744
GD	0.844	0.905	0.907								0.804
GM	0.830	0.892	0.930	0.893							0.743
TPB	0.839	0.883	0.883	0.847	0.833						0.780
TPB × GM	0.788	0.819	0.819	0.831	0.805	0.828					
TPB × EL	0.815	0.835	0.822	0.828	0.782	0.838	0.939				
TPB × GPD	0.836	0.852	0.854	0.844	0.811	0.859	0.963	0.956			
TPB × GB	0.794	0.834	0.821	0.840	0.800	0.828	0.967	0.956	0.961		

Campbell and Fiske (1959) defined discriminant validity as the extent to which latent variables are distinct from one another (Hair, 2013; Churchill Jr, 1979). It is established when the square root of the average variance extracted (AVE) for each construct exceeds the correlations with other constructs (Hair, 2013; Gefen et al., 2000; Kling, 2001). Table 3 demonstrates that discriminant validity is met, as the diagonal values (AVE) are higher than the off-diagonal values (correlations with other constructs). The variance inflation factor (VIF) values in this analysis ranged from 0.804 (GD) to 0.717 (EL), all of which are above the threshold of 5 (Sarstedt et al., 2021). This suggests that the structural position score has a significant and positive impact and that there is no multicollinearity among the predictor items or constructs. Consequently, each factor was statistically independent from the others, providing evidence of satisfactory discriminant validity.

Table 4
Fornell-Larcker criterion

variables	CBSW	EL	GPD	GB	GM	TPB
CBSW	0.872					
EL	0.786	0.847				
GPD	0.803	0.832	0.862			
GD	0.777	0.808	0.817	0.897		
GM	0.750	0.782	0.822	0.806	0.862	
TPB	0.771	0.783	0.789	0.774	0.746	0.883

The Heterotrait-Monotrait ratio (HTMT) measures the true correlation between two constructs when they are adequately assessed, as discussed by Gold, A. (2001) and Hair Jr. (2014). Gold et al. (2001) recommended that the HTMT value should

be below 0.90 to confirm discriminant validity. The HTMT compares the average correlations of indicators within the same construct to the average correlations across indicators measuring different constructs (HTMT correlations). Therefore, Table 5 shows that an HTMT threshold of 0.90 is appropriate. Discriminant validity was assessed to determine how distinctly each construct is separated from others, focusing on the relationships between variables within the validity differentiation domain. According to Kline (2016), the model's estimate did not exceed 0.95. The model's validity was evaluated by examining the square root of the average variance extracted for each construct and the correlations among them, as outlined by Fornell and Larcker (1981). Table 3 presents the results of the Fornell-Larcker Criterion, showing that no values exceeded the 0.95 threshold indicated by Fornell and Larcker (1981). (Refer to Table 4).

Table 5
Cross loadings

variables	CBASW	EL	GD	GM	GPD	TPB
CBASW1	**0.845**	0.720	0.694	0.664	0.664	0.752
CBASW2	**0.896**	0.682	0.670	0.652	0.652	0.685
CBASW3	**0.894**	0.686	0.675	0.636	0.636	0.626
CBASW4	**0.876**	0.685	0.665	0.651	0.651	0.646
CBASW5	**0.847**	0.648	0.681	0.664	0.664	0.643
EL1	0.680	**0.789**	0.626	0.630	0.630	0.637
EL2	0.658	**0.862**	0.719	0.712	0.712	0.714
EL3	0.662	**0.878**	0.695	0.661	0.661	0.653
EL4	0.658	**0.855**	0.694	0.642	0.642	0.646
GD1	0.691	0.722	**0.894**	0.736	0.736	0.721
GD2	0.678	0.757	**0.926**	0.754	0.754	0.694
GD3	0.701	0.746	**0.901**	0.713	0.713	0.698
GD4	0.714	0.671	**0.865**	0.686	0.686	0.662
GM1	0.699	0.711	0.747	**0.874**	0.874	0.694
GM2	0.635	0.677	0.706	**0.907**	0.907	0.669
GM3	0.628	0.669	0.660	**0.875**	0.875	0.625
GM4	0.617	0.633	0.656	**0.788**	0.788	0.577
GPD1	0.661	0.691	0.685	0.683	**0.683**	0.663
GPD2	0.702	0.736	0.723	0.757	**0.757**	0.697
GPD3	0.683	0.717	0.715	0.707	**0.707**	0.683
GPD4	0.720	0.723	0.695	0.687	**0.687**	0.676
TPB1	0.671	0.720	0.724	0.679	0.679	**0.857**
TPB2	0.658	0.708	0.666	0.666	0.666	**0.900**
TPB3	0.644	0.679	0.659	0.655	0.655	**0.905**
TPB4	0.738	0.659	0.681	0.634	0.634	**0.870**

Consumer Behavior of Saudi Women = CBSW, Environmental Label = EL , Green Purchasing Decisions = GPD, Green brands=GD, Green marketing =GM, Theory of Planned Behavior= TPB.

Table 6
The summary of model fit

	Saturated model	Estimated model
SRMR	0.053	0.067
d_ULS	0.911	1.473
d_G	0.698	0.762
Chi-square	1391.578	1418.536
NFI	0.830	0.827

In SEM-PLS, the "standardized root mean square residual (SRMR)" is used to evaluate the model fit before testing the proposed relationships through structural modeling. Henseler et al. (2015) suggest that a good model fit is indicated by an SRMR value below 0.08. The results showed an SRMR value of 0.053, reflecting a satisfactory level of model fit (Hu & Bentler, 1999).

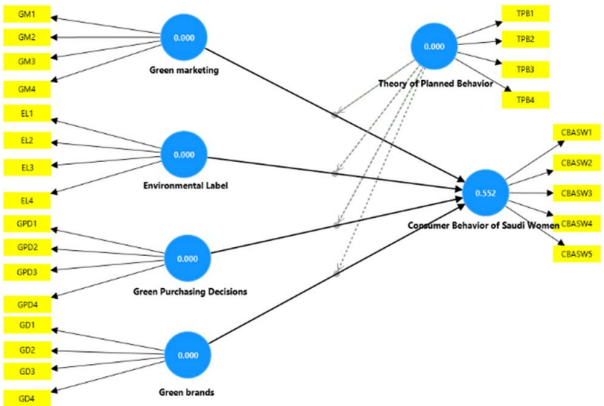

Fig. 2. The PLS algorithm of the measurement model. Q2

Table 7
R^2 and Prediction power (Q^2)

Variable	R^2	Q^2
CBASW	0.749	0.552

Evaluation metrics such as the coefficient of determination (R^2), predictive importance (Q^2), and the coefficient of determination (R^2) assess the extent to which the variance in the endogenous variable is accounted for by the exogenous variables. Hair et al. (2017) suggest that the coefficient of determination should be 0.75 for strong, 0.50 for moderate, and 0.25 for weak explanatory power. According to Table 7, the CBASW's R^2 value is 0.749, which is considered substantial since it exceeds the 0.75 threshold. Effect size measures gauge the impact of excluding certain exogenous variables on the latent endogenous variables. Hair et al. (2013) outlined that effect sizes are categorized as 0.02 for no effect, 0.15 for moderate effect, and 0.35 for high effect. The current analysis indicates a strong effect in the model being evaluated. Additionally, the predictive relevance (Q^2) of the model is deemed significant if it is greater than 0, as per Hair et al. (2017). Table 10 shows a Q^2 value of 0.552, which is positive and signifies that the model demonstrates sufficient predictive validity.

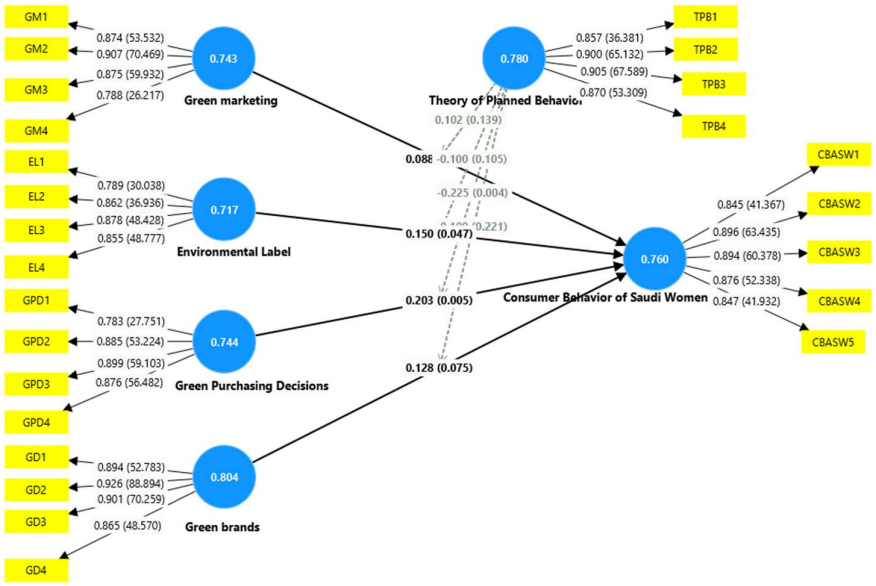

Fig. 3. The PLS algorithm of the measurement model. Hypothesis testing

Table 9
Hypothesis testing

H	Variables	beta	Sample mean (M)	S .d	Bias	2.5%	97.5%	T values	P values	Result
H1	EL→ CBSW	0.150	0.147	0.075	-0.003	0.001	0.292	2.821	0.005	Supported
H2	GPD → CBSW	0.203	0.199	0.072	-0.004	0.068	0.348	1.779	0.075	Not Supported
H3	GD→ CBSW	0.128	0.122	0.072	-0.006	-0.006	0.272	1.380	0.167	Not Supported
H4	DM → CBSW	0.088	0.091	0.064	0.004	-0.037	0.210	1.653	0.098	Not Supported
H5	TPB → CBSW	0.120	0.123	0.072	0.003	-0.016	0.264	1.479	0.139	Not Supported
H6	TPB × GM → CBSW	0.102	0.103	0.069	0.001	-0.028	0.243	1.620	0.105	Not Supported
H7	TPB × EL→ CBSW	-0.100	-0.107	0.062	-0.007	-0.227	0.015	2.900	0.004	Supported
H8	TPB × GPD → CBSW	-0.225	-0.220	0.078	0.005	-0.384	-0.079	1.224	0.221	Not Supported
H9	TPB × GD → CBSW	0.100	0.098	0.081	-0.002	-0.062	0.257	2.821	0.005	Supported

5. Discussion of results

The evaluation of the structural model in Table 10 clearly shows that the hypotheses supported by the study have a t-value greater than 1.65, thus all theories were verified and the hypotheses directly related to the current research were approved. H1

is EL → CBSW. The study showed that the effect of EL on CBSW is positive, direct, significant and statistically significant, and the relationship between EL and CBSW is positive (beta value = 0.150; T = 2.821; P < 0.05), which means that H1 is accepted and this is an acceptable and supported hypothesis. This study explores the factors affecting female consumer behavior, focusing on their green purchasing decisions for eco-friendly products and examining the relationships between the proposed model's hypotheses. The PLS-SEM analysis reveals that EL significantly influences CBSW, thereby supporting hypothesis (H1). These findings align with results from previous studies conducted in developed countries (Martínez,etal.2020; Yadav & Pathak, 2016 ; Lee, 2016 ; Cheung & To, 2019; Kautish et al., 2019; Xu, 2020; Tong et al., 2020; Chen & Peng, 2012; Bashir, 2019; Arısal, 2016) and demonstrate that EL positively impacts both environmental purchasing decisions and CBSW (Bashir, 2019 ; Cheung et al., 2015).H2 is GPD → CBSW. The study showed that GPD has no positive effect on CBSW, meaning that GPD has no effect and is statistically significant on CBSW, but the relationship between GPD and CBSW is positive (beta value = 0.203; T = 1.779; P > 0.05), and therefore H2 is rejected and this is an unacceptable and unsupported hypothesis. The current study's findings on the link between green purchase decisions and consumer behavior challenge the conclusions of Ewerhard et al. (2019) and Thangavel et al. (2022). The study suggests that stronger promotion of green marketing by a company leads to increased green purchase decisions, whereas poor green marketing efforts result in fewer green purchases (Panungkelan et al., 2018; Yulianthi & Sadguna, 2020). Green marketing encompasses a range of environmentally friendly practices, including sustainable packaging, product modifications, and eco-conscious manufacturing processes, all aimed at meeting customer needs and influencing consumer behavior (Dangelico & Vocalelli, 2017; Rajput et al., 2022). H3 is GD → CBSW. The study showed that GD has no positive effect on CBSW, i.e. GD has no statistically significant effect on CBSW, but the relationship between GPD and CBSW is positive (beta value = 0.128; T = 1.380; P > 0.05), therefore H3 was rejected, which is an unacceptable and unsupported hypothesis. In today's world, growing concerns about pollution, heightened consumer awareness of environmental issues, and the demand for green brands to adopt eco-friendly practices have created a strong impetus for these brands to act responsibly. However, this study found that green brands did not positively influence the consumer behavior of Saudi women, contrary to the findings of several other studies (Niinimäki et al., 2020; Taghikhah et al., 2019; Ghadge et al., 2021; Huang et al., 2021; Moshood et al., 2022; Erdem & Doğan, 2023; Shaharudin et al., 2020). Despite increasing consumer concern about environmental and health issues, and a willingness to pay more for eco-friendly products (Srivastava & Gupta, 2023; Antunes et al., 2023; Dekhili & Achabou, 2012; Gam et al., 2010; Xu et al., 2012), this particular study did not observe the same trend among Saudi women. The findings of this study offer valuable insights into the effects of green branding, green brand equity, and green brand innovation. It revealed that green branding does not have a positive impact on the behavior of Saudi female consumers, which is inconsistent with the results from earlier studies (Leonidou et al., 2013; Rahbar & Wahid, 2011; Lee, 2008). This study's results also challenge previous research suggesting that green advertising can positively influence consumer behavior (Sharma, 2021 ; Leonidou et al., 2013 ; Dangelico, R. M., & Vocalelli, 2017) and that companies with a strong positive brand image are more likely to see an increase in repurchase intention [49]. Furthermore, the study indicates that neither green branding nor its associated equity positively affects green repurchase intention, contradicting earlier findings (Sharma et al., 2022 ; Liao et al., 2020). H4 is DM → CBSW. The study showed that DM has no positive effect on CBSW, i.e. DM has no statistically significant effect on CBSW, but the relationship between DM and CBSW is positive (beta value = 0.088; T = 1.653; P > 0.05), therefore H4 was rejected, which is an unacceptable and unsupported hypothesis. This study explored the link between green marketing practices and the green consumer behavior of women. It utilized specific questions focused on deliberate green purchasing in the context of green marketing. Consequently, the findings differ significantly from earlier research on green purchasing. The study discovered notable differences in green marketing practices and consumer behavior among female consumers. It showed that green marketing does not influence female consumer behavior in Saudi Arabia, contradicting previous studies (Akehurst et al., 2012; Awad, 2011; Khare, 2015; Mourad & Ahmed, 2012; Paço & Raposo, 2010; Rice, 2006; Samdahl & Robertson, 1989; Shamdasani et al., 1993; Suplico, 2009). Nath et al. (2015) also observed that female consumers were equally likely to engage in green behavior, and Nguyen et al. (2019) found that gender did not impact green consumer behavior. In contrast, Shahsavar et al. (2020) identified a role for gender in influencing green consumer behavior. Additionally, the study revealed significant variations in green marketing practices and consumer behavior among female consumers of different age groups. These findings are at odds with those of (Akehurst et al. 2012 ; Khare (2014, ; Nguyen et al. 2019 ; Shamdasani et al. ,1993; and Tilikidou & Delistavrou , et al., 2014 ; while recent studies (Sun et al., 2019; Wang et al. 2020) have presented different results. The findings of this study also conflict with earlier research (Elmas, 2019; Panungkelan et al., 2018; Puspitasari et al., 2021; Utami, 2020), which reported a positive and significant link between green marketing and survival or purchase decisions and consumer behavior. H5 is that TPB → CBSW. The study showed that TPB has no positive effect on CBSW, i.e. TPB has no statistically significant effect on CBSW, but the relationship between DM and CBSW is positive (beta value = 0.120; T = 1.479; P > 0.05), therefore H5 was rejected, which is an unacceptable and unsupported hypothesis. The results of this study align with findings from Yadav and Pathak (2016) and Hsu et al. (2017). Despite the frequent use of the Theory of Planned Behavior (TPB) in researching green purchasing behavior, many studies have failed to show a strong connection between a positive attitude toward green purchasing and actual purchase decisions. This suggests that TPB relationships may not fully explain green purchasing behavior and consumer behavior. This observation is supported by research from Tan (2011) and Joshi and Rahman (2017). The effectiveness of TPB's behavioral measures in the realm of environmental behavior is still debated, as there is often a disconnect between attitudes and actual behavior in green consumer psychology. To address this, future research should incorporate cognitive factors to better predict green purchasing behavior. This might involve revising existing TPB frameworks or adopting approaches tailored to specific cultural and local contexts. Scholars such as Chan (2001), Joshi and Rahman (2017), and Wei et al. (2017) have advocated

for the inclusion of these factors in studying green consumer behavior. H6 is that TPB × GM → CBSW. The study showed that GM has no positive effect on CBSW when using TPB as a moderator variable, i.e. GM has no statistically significant effect on CBSW when using TPB as a moderator variable, i.e. TPB did not moderate the relationship between GM and CBSW, and the relationship between DM and CBSW is positive (beta value = 0.102; T = 1.620; P > 0.05), therefore H6 was rejected, which is an unacceptable and unsupported hypothesis. H7 is that TPB × EL → CBSW. The study showed that EL has a positive effect on CBSW when using TPB as a moderator variable, i.e. EL has a statistically significant effect on CBSW when using TPB as a moderator variable, i.e. TPB moderates the effect between EL and CBSW, and the relationship is negative, as (beta value = -0.100; T = 2.900; P < 0.05), and therefore H7 was accepted, which is an acceptable and supported hypothesis. H8 is that TPB × GPD → CBSW. The study showed that GPD does not have a positive effect on CBSW when using TPB as a moderator variable, i.e. GPD does not have a statistically significant effect on CBSW when using TPB as a moderator variable, i.e. TPB did not moderate the effect between GPD and CBSW, and the relationship between GPD and CBSW is negative, as (beta value = -0.225; T = 1.224; P > 0.05), and therefore H8 was rejected, which is an unacceptable and unsupported hypothesis. H9 is "TPB × GD → CBSW". The study showed that GD has a positive effect on CBSW when using TPB as a moderator variable, i.e. GD has a statistically significant effect on CBSW when using TPB as a moderator variable, i.e. TPB moderates and enhances the effect between GPD and CBSW, and the relationship between GD and CBSW is positive (beta value = 0.100; T = 2.821; P < 0.05), and therefore H9 is accepted and is an acceptable and supported hypothesis.

6. Contributions

Theoretical Contributions

The study validates that environmental labels have a positive and significant effect on consumer behavior among Saudi women. This supports and extends the theory that environmental labels can effectively influence consumer choices, particularly in the context of Saudi Arabia, adding empirical evidence to the theoretical understanding of environmental labeling's role in sustainable consumption.

The study provides insight into how TPB moderates the relationship between environmental labels and consumer behavior, showing a negative effect. This contributes to the theoretical discourse by suggesting that TPB may influence the effectiveness of environmental labels in specific contexts, challenging or refining existing models of consumer behavior.

The lack of significant findings regarding green marketing and green purchasing decisions challenges prevailing theories that assume these factors alone are sufficient to drive consumer behavior. This calls for a reevaluation of theoretical models that prioritize these variables as primary drivers of sustainable consumer behavior.

The study's results on the interaction between TPB and green brands provide theoretical contributions by showing that TPB enhances the effect of green brands on consumer behavior. This adds depth to the understanding of how psychological theories can interact with marketing strategies to influence consumer decisions.

Practical Contributions

The positive effect of environmental labels on consumer behavior suggests that businesses should prioritize clear and effective environmental labeling in their marketing strategies. This practical approach can lead to increased consumer trust and preference for products with recognized environmental benefits.

Given that green purchasing decisions alone did not significantly impact consumer behavior, businesses and policymakers may need to implement more comprehensive strategies that integrate green purchasing with additional incentives or educational efforts to drive meaningful change.

The study's findings indicate that while green brands alone may not be highly influential, combining green branding with other effective marketing tactics could enhance consumer response. Practical applications include integrating green branding into broader campaigns that emphasize product quality and benefits.

The practical implication of TPB's varying effectiveness suggests that businesses and policymakers should tailor their engagement strategies based on consumer psychology and context-specific factors. Customizing approaches to align with the unique motivations and barriers of different consumer segments can enhance the effectiveness of sustainability initiatives.

The insights from the study provide valuable information for policymakers to design effective regulations and incentives that consider the varying impacts of different sustainability factors. Understanding which elements are most influential can help in crafting policies that better support environmental and consumer behavior goals.

The study highlights areas where further research is needed, such as the interaction between green marketing and consumer behavior. Practical contributions include identifying gaps and directing future research efforts to develop more effective strategies for promoting sustainable consumer behavior.

7. Implications

Theoretical Implications

The study confirms that environmental labels significantly influence consumer behavior among Saudi women, validating theories that emphasize the importance of such labels in promoting eco-friendly consumption. This supports the theoretical understanding of how environmental cues can positively impact consumer choices.

The findings challenge the universal applicability of theory of planned behavior in explaining green consumer behavior. While theory of planned behavior was effective in moderating the impact of Environmental Labels and Green Brands, it did not consistently influence consumer behavior on its own or in combination with other factors like Green Purchasing Decisions and Green Marketing. This suggests a need for refining theory of planned behavior integrating additional variables to capture the complexities of green consumer behavior more accurately.

The study demonstrates that the theory of planned behavior can act as a moderator in specific contexts, enhancing the relationship between Environmental Labels and consumer behavior, and between Green Brands and consumer behavior. However, it failed to moderate the relationship between Green Purchasing Decisions and consumer behavior. This indicates that the effectiveness of the theory of planned behavior as a moderator varies depending on the context and specific variables involved.

Practical Implications

Organizations should prioritize the promotion of environmental labels, as they have a significant positive effect on consumer behavior. Emphasizing these labels can help companies effectively drive sustainable consumer choices among Saudi women.

Since Green Purchasing Decisions, Green Brands, and Green Marketing did not have a significant impact on consumer behavior, companies may need to reassess their marketing and product design strategies. Exploring alternative or combined approaches could be more effective in influencing consumer behavior.

While theory of planned behavior alone may not be sufficient, its effectiveness can be enhanced when combined with factors such as Environmental Labels and Green Brands. Practitioners should consider integrating TPB with these elements to improve its impact on sustainable consumer behavior.

The study highlights the importance of developing customized strategies that account for local cultural contexts and specific consumer segments. A one-size-fits-all approach may not be effective in promoting green consumer behavior, so tailored strategies are necessary for driving sustainability initiatives effectively.

The findings underscore the need for continued research to identify additional variables and refine models that better explain and influence sustainable consumer behavior. This ongoing research will help in developing more effective strategies and interventions to promote green consumption.

Implications for Society

The study highlights the significant impact of environmental labels on consumer behavior among Saudi women. This suggests that enhancing awareness and accessibility of these labels can promote more environmentally responsible consumption patterns in society. By supporting products with clear environmental labels, consumers contribute to sustainability efforts and encourage businesses to adopt greener practices.

The lack of significant impact from Green Purchasing Decisions on consumer behavior indicates that simply encouraging green purchases may not be sufficient to drive widespread behavioral change. This suggests that society may need more comprehensive education and incentives to influence purchasing habits effectively. Programs and policies that integrate practical benefits or rewards for green purchasing could be more impactful.

The findings suggest that Green Brands alone do not significantly influence consumer behavior. This implies that while green branding is important, it may need to be part of a broader strategy that includes other elements such as product functionality and price. For societal change, it's crucial to develop comprehensive campaigns that combine green branding with additional value propositions to enhance consumer engagement.

Green marketing's lack of significant effect on consumer behavior suggests that traditional marketing approaches may need to be re-evaluated. This highlights the importance of innovative and targeted marketing strategies that go beyond generic green messaging. Society would benefit from marketing practices that are more relatable and resonate with consumers' values and needs.

The study’s insights on TPB's role as a moderator in specific contexts imply that TPB can be a valuable tool for understanding consumer behavior when combined with other factors. However, its effectiveness varies. This points to the need for societal programs and policies that consider multiple behavioral theories and factors to create more effective interventions for promoting sustainable behavior.

The study underscores the importance of context-specific strategies for influencing consumer behavior. In Saudi Arabia, integrating local cultural and social factors into sustainability campaigns could enhance their effectiveness. For societal impact, tailored approaches that address specific consumer concerns and preferences are essential for promoting sustainable practices.

The findings suggest a need for continued research to refine and improve models of consumer behavior. Investing in research that explores new variables and innovative strategies will contribute to a more nuanced understanding of how to promote sustainable behavior effectively. Societal advancements in sustainability will benefit from ongoing research and evidence-based approaches.

Acknowledgement

The author extended his appreciation to Prince Sattam bin Abdulaziz University for funding this research work through the project number (2023/01/27465).

References

Abd Alia, Z. N., & ALhamad, A. M. (2022). Behavior financial theory and analysis of investor behavior in the capital markets in lebanon. *Journal of Management and Economic Studies, 4*(2), 82-90.

Abraham, N. (2011). The apparel aftermarket in India–a case study focusing on reverse logistics. *Journal of Fashion Marketing and Management: An International Journal, 15*(2), 211-227.

Ajzen, I. (1980). *Understanding attitudes and predicting social behavior*. Englewood cliffs.

Ajzen, I. (2011). The theory of planned behaviour: Reactions and reflections. *Psychology & health, 26*(9), 1113-1127.

Akehurst, G., Afonso, C., & Martins Gonçalves, H. (2012). Re-examining green purchase behaviour and the green consumer profile: new evidences. *Management decision, 50*(5), 972-988.

Al-dmour, H., Hadad, H., & Al-dmour, R. (2023). The impact of the adoption of green marketing on corporate performance of non-profitable organizations: empirical study. *Social Responsibility Journal, 19*(1), 1-19.

Alhamad, A. M., Osman, A., Manaf, A. H. B. A., Abdullah, M. S., & AlShatnawi, H. A. M. (2015). The impact of cross-cultural leadership on management performance in international organizations: A Malaysian perspective. *Asian journal of social sciences & humanities, 4*(3), 110-119.

Alshali, N. M., Alhattali, N. H., & Ahmed, E. R. (2021). Behavior of Consumers and Green Product: A Study in Oman. *International Journal of Business and Management Invention, 10*(9), 40-51.

Alzoubi, H., Alshurideh, M., Kurdi, B., Akour, I., & Aziz, R. (2022). Does BLE technology contribute towards improving marketing strategies, customers' satisfaction and loyalty? The role of open innovation. *International Journal of Data and Network Science, 6*(2), 449-460.

Ansar, N. (2013). Impact of green marketing on consumer purchase intention. *Mediterranean Journal of Social Sciences, 4*(11), 650-655.

Antunes, S., Garrido, S., & Bairrada, C. (2022, May). The influence of consumer optimism and pessimism on purchasing intention of eco-friendly clothing by Generation Z: model proposal. *In International Conference on Quality Innovation and Sustainability* (pp. 237-248). Cham: Springer International Publishing.

Arısal, İ., & Atalar, T. (2016). The exploring relationships between environmental concern, collectivism and ecological purchase intention. *Procedia-Social and Behavioral Sciences, 235*, 514-521.

Awad, T. A. (2011). Environmental segmentation alternatives: buyers' profiles and implications. *Journal of Islamic Marketing, 2*(1), 55-73.

Balderjahn, I. (1988). Personality variables and environmental attitudes as predictors of ecologically responsible consumption patterns. *Journal of business Research, 17*(1), 51-56.

Barber, N. (2010). "Green" wine packaging: targeting environmental consumers. *International Journal of Wine Business Research, 22*(4), 423-444.

Bashir, S., Khwaja, M. G., Turi, J. A., & Toheed, H. (2019). Extension of planned behavioral theory to consumer behaviors in green hotel. *Heliyon, 5*(12).

Bhaskaran, S. (2006). Incremental innovation and business performance: small and medium-size food enterprises in a concentrated industry environment. *Journal of Small Business Management, 44*(1), 64-80.

Bruwer, J., Saliba, A., & Miller, B. (2011). Consumer behaviour and sensory preference differences: implications for wine product marketing. *Journal of Consumer Marketing, 28*(1), 5-18.

Campbell, D. T., & Fiske, D. W. (1959). Convergent and discriminant validation by the multitrait-multimethod matrix. *Psychological bulletin, 56*(2), 81.

Cheah, I., Phau, I., & Liang, J. (2015). Factors influencing consumers' attitudes and purchase intentions of e-deals. *Marketing intelligence & planning, 33*(5), 763-783.

Chen, A., & Peng, N. (2012). Green hotel knowledge and tourists' staying behavior.

Chen, C. C., Chen, C. W., & Tung, Y. C. (2018). Exploring the consumer behavior of intention to purchase green products in belt and road countries: An empirical analysis. *Sustainability, 10*(3), 854.

Chen, S. C., & Hung, C. W. (2016). Elucidating the factors influencing the acceptance of green products: An extension of theory of planned behavior. *Technological Forecasting and Social Change, 112*, 155-163.

Chen, Y. C., Shang, R. A., & Li, M. J. (2014). The effects of perceived relevance of travel blogs' content on the behavioral intention to visit a tourist destination. *Computers in Human Behavior, 30*, 787-799.

Chen, Y. S. (2010). The drivers of green brand equity: Green brand image, green satisfaction, and green trust. *Journal of Business ethics, 93*, 307-319.

Chen, Y. S., Hung, S. T., Wang, T. Y., Huang, A. F., & Liao, Y. W. (2017). The influence of excessive product packaging on green brand attachment: The mediation roles of green brand attitude and green brand image. *Sustainability, 9*(4), 654.

Cheung, M. F., & To, W. M. (2019). An extended model of value-attitude-behavior to explain Chinese consumers' green purchase behavior. Journal of Retailing and Consumer Services, 50, 145-153.

Cheung, R., Lau, M. M., & Lam, A. Y. (2015). Factors affecting consumer attitude towards organic food: An empirical study in Hong Kong. Journal of Global Scholars of Marketing Science, 25(3), 216-231.

Chung, K. C. (2020). Green marketing orientation: Achieving sustainable development in green hotel management. *Journal of Hospitality Marketing & Management, 29*(6), 722-738.

Churchill Jr, G. A. (1979). A paradigm for developing better measures of marketing constructs. *Journal of marketing research, 16*(1), 64-73.

Cleveland, M., Kalamas, M., & Laroche, M. (2005). Shades of green: linking environmental locus of control and pro-environmental behaviors. *Journal of consumer marketing, 22*(4), 198-212.

D'Souza, C., Taghian, M., Lamb, P., & Peretiatko, R. (2007). Green decisions: demographics and consumer understanding of environmental labels. *International Journal of Consumer Studies, 31(*4), 371-376.

D'souza, C., Taghian, M., & Lamb, P. (2006). An empirical study on the influence of environmental labels on consumers. *Corporate communications: an international journal, 11*(2), 162-173.

Dangelico, R. M., & Vocalelli, D. (2017). "Green Marketing": An analysis of definitions, strategy steps, and tools through a systematic review of the literature. *Journal of Cleaner production, 165*, 1263-1279.

Davari, A., & Strutton, D. (2014). Marketing mix strategies for closing the gap between green consumers' pro-environmental beliefs and behaviors. *Journal of Strategic Marketing, 22*(7), 563-586.

Dekhili, S., & Achabou, M. A. (2013). Price fairness in the case of green products: enterprises' policies and consumers' perceptions. *Business Strategy and the Environment, 22*(8), 547-560.

Devi Juwaheer, T., Pudaruth, S., & Monique Emmanuelle Noyaux, M. (2012). Analysing the impact of green marketing strategies on consumer purchasing patterns in Mauritius. *World Journal of Entrepreneurship, Management and Sustainable Development, 8*(1), 36-59.

Elmas, M. S. H. (2019). The influence of green marketing, attribute tourism products, e-WOM The visit decision. *International Journal of Social Science and Business, 3*(1), 46-54.

Erdem, M. B., & Doğan, N. Ö. (2023). Green transformation in logistics within the scope of the European green deal. *In Managing Inflation and Supply Chain Disruptions in the Global Economy* (pp. 179-198). IGI Global.

Erdogan, M., Akbunar, S., Asik, U. O., Kaplan, H., & Kayir, C. G. (2012). The effects of demographic variables on students' responsible environmental behaviors. Procedia-Social and Behavioral Sciences, 46, 3244-3248.

Ewerhard, A. C., Sisovsky, K., & Johansson, U. (2019). Consumer decision-making of slow moving consumer goods in the age of multi-channels. *The International Review of Retail, Distribution and Consumer Research, 29*(1), 1-22.

Faraj, N. A. F., & Alhamad, A. M. (2022). The Effect of Online Classes on Students' Performance During the Outbreak of The Covid-19 Virus "A Case Study at the University of Halabja in Northern Iraq". *Journal of Management and Education (JOMAE), 1*(3), 18-35.

Farzin, A., Yousefi, S., Amieheidari, S., & Noruzi, A. (2020). Effect of green marketing instruments and behavior processes of consumers on purchase and use of e-books. *Webology, 17*(1), 202-215.

Ferraz, S. B., Buhamra, C., Laroche, M., & Veloso, A. R. (2017). Green products: A cross-cultural study of attitude, intention and purchase behavior. *RAM. Revista de Administração Mackenzie, 18*(05), 12-38.

Fliegelman, J. E. (2010). The next generation of greenwash: diminishing consumer confusion through a national eco-labeling program. *Fordham Urb. LJ, 37*, 1001.

Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of marketing research*, *18*(1), 39-50.

Galanis, P. (2013). Validity and reliability of questionnaires in epidemiological studies. *Archives of Hellenic Medicine/Arheia Ellenikes Iatrikes, 30*(1).

Galarraga Gallastegui, I. (2002). The use of eco-labels: a review of the literature. *European Environment, 12*(6), 316-331.

Gam, H. J., Cao, H., Farr, C., & Kang, M. (2010). Quest for the eco-apparel market: a study of mothers' willingness to purchase organic cotton clothing for their children. *International Journal of Consumer Studies, 34*(6), 648-656.

Gefen, D., Straub, D., & Boudreau, M. C. (2000). Structural equation modeling and regression: Guidelines for research practice. *Communications of the association for information systems, 4*(1), 7.

Ghadge, A., Er Kara, M., Mogale, D. G., Choudhary, S., & Dani, S. (2021). Sustainability implementation challenges in food supply chains: A case of UK artisan cheese producers. *Production Planning & Control, 32*(14), 1191-1206.

Gold, A. H., Malhotra, A., & Segars, A. H. (2001). Knowledge management: An organizational capabilities perspective. *Journal of management information systems, 18*(1), 185-214.

Hair Jr, J. F., Matthews, L. M., Matthews, R. L., & Sarstedt, M. (2017). PLS-SEM or CB-SEM: updated guidelines on which method to use. *International Journal of Multivariate Data Analysis, 1*(2), 107-123.

Hair Jr, J. F., Sarstedt, M., Hopkins, L., & Kuppelwieser, V. G. (2014). Partial least squares structural equation modeling (PLS-SEM): An emerging tool in business research. *European business review, 26*(2), 106-121.

Hair, J. F., Ringle, C. M., & Sarstedt, M. (2011). PLS-SEM: Indeed a silver bullet. *Journal of Marketing theory and Practice, 19*(2), 139-152.

Hair, J. F., Ringle, C. M., & Sarstedt, M. (2013). Partial least squares structural equation modeling: Rigorous applications, better results and higher acceptance. *Long range planning, 46*(1-2), 1-12.

Hair, J., Hollingsworth, C. L., Randolph, A. B., & Chong, A. Y. L. (2017). An updated and expanded assessment of PLS-SEM in information systems research. *Industrial management & data systems, 117*(3), 442-458.

Han, H., & Kim, Y. (2010). An investigation of green hotel customers' decision formation: Developing an extended model of the theory of planned behavior. *International journal of hospitality management, 29*(4), 659-668.

Hasan, Z., & Ali, N. A. (2015). The impact of green marketing strategy on the firm's performance in Malaysia. *Procedia-Social and Behavioral Sciences, 172*, 463-470.

Henseler, J., Ringle, C. M., & Sarstedt, M. (2015). A new criterion for assessing discriminant validity in variance-based structural equation modeling. *Journal of the academy of marketing science, 43*, 115-135.

Hsu, C. L., Chang, C. Y., & Yansritakul, C. (2017). Exploring purchase intention of green skincare products using the theory of planned behavior: Testing the moderating effects of country of origin and price sensitivity. *Journal of retailing and consumer services, 34*, 145-152.

Huang, X., Yang, S., & Shi, X. (2021). How corporate social responsibility and external stakeholder concerns affect green supply chain cooperation among manufacturers: An interpretive structural modeling analysis. *Sustainability, 13*(5), 2518.

Hunter, L. M., Hatch, A., & Johnson, A. (2004). Cross-national gender variation in environmental behaviors. *Social science quarterly, 85*(3), 677-694.

Islam, D. (2018). Tinjauan penerapan konsep green marketing dalam pelestarian lingkungan. *Jurnal Pamator: Jurnal Ilmiah Universitas Trunojoyo, 11*(1), 10-18.

Jain, S. K., & Kaur, G. (2006). Role of socio-demographics in segmenting and profiling green consumers: an exploratory study of consumers in India. *Journal of International Consumer Marketing, 18*(3), 107-146.

Joshi, Y., & Rahman, Z. (2017). Investigating the determinants of consumers' sustainable purchase behaviour. *Sustainable Production and consumption, 10*, 110-120.

Kardos, M., Gabor, M. R., & Cristache, N. (2019). Green marketing's roles in sustainability and ecopreneurship. Case study: Green packaging's impact on Romanian young consumers' environmental responsibility. Sustainability, 11(3), 873.

Kautish, P., Paul, J., & Sharma, R. (2019). The moderating influence of environmental consciousness and recycling intentions on green purchase behavior. *Journal of Cleaner Production, 228,* 1425-1436.

Khare, A. (2014). Consumers' susceptibility to interpersonal influence as a determining factor of ecologically conscious behaviour. *Marketing intelligence & planning, 32*(1), 2-20.

Khare, A. (2015). Antecedents to green buying behaviour: a study on consumers in an emerging economy. *Marketing Intelligence & Planning, 33*(3), 309-329.

Kling, J. R. (2001). Interpreting instrumental variables estimates of the returns to schooling. *Journal of Business & Economic Statistics, 19*(3), 358-364.

Kolk, A. (2016). The social responsibility of international business: From ethics and the environment to CSR and sustainable development. *Journal of World Business, 51*(1), 23-34.

Kotler, P., & Armstrong, G. (2010). Principles of marketing. Pearson education.

Kotler, P., & Keller, K. L. (2006). Marketing management 12e. New Jersey, 143.

Kusuma, P. A., & Damanik, J. (2021). Strategi pemulihan dampak wabah covid pada sektor pariwisata di daerah istimewa Yogyakarta. *Journal of Tourism and Economic, 4*(1), 47-59.

Kwek, C. L., Tan, H. P., & Lau, T. C. (2010). Investigating the shopping orientations on online purchase intention in the e-commerce environment: a Malaysian study. *Journal of Internet Banking and Commerce, 15*(2), 1.

Laroche, M., Bergeron, J., & Barbaro-Forleo, G. (2001). Targeting consumers who are willing to pay more for environmentally friendly products. *Journal of consumer marketing, 18*(6), 503-520.

Lee, H. J. (2016). Individual and situational determinants of US consumers' buying behavior of organic foods. *Journal of International Food & Agribusiness Marketing, 28*(2), 117-131.

Lee, K. (2008). Opportunities for green marketing: young consumers. *Marketing intelligence & planning, 26*(6), 573-586.

Lee, K. (2009). Gender differences in Hong Kong adolescent consumers' green purchasing behavior. *Journal of consumer marketing, 26*(2), 87-96.

Lee, S. E., Jung, H. J., & Lee, K. H. (2021). Motivating collaborative consumption in fashion: Consumer benefits, perceived risks, service trust, and usage intention of online fashion rental services. *Sustainability, 13*(4), 1804.

Leonidou, C. N., Katsikeas, C. S., & Morgan, N. A. (2013). "Greening" the marketing mix: Do firms do it and does it pay off?. *Journal of the academy of marketing science, 41*, 151-170.

Liao, Y. K., Wu, W. Y., & Pham, T. T. (2020). Examining the moderating effects of green marketing and green psychological benefits on customers' green attitude, value and purchase intention. *Sustainability, 12*(18), 7461.

Luo, Y., & Deng, J. (2008). The New Environmental Paradigm and nature-based tourism motivation. *Journal of Travel research, 46*(4), 392-402.

MacDonald, W. L., & Hara, N. (1994). Gender differences in environmental concern among college students. *Sex Roles, 31*, 369-374.

Madhavan, M., & Kaliyaperumal, C. (2015). Consumer buying behavior-an overview of theory and models. *St. Theresa Journal of Humanities and Social Sciences, 1*(1), 74-112.

Mahasuweerachai, P., & Suttikun, C. (2022). The effect of green self-identity on perceived image, warm glow and willingness to purchase: A new generation's perspective towards eco-friendly restaurants. *Sustainability, 14*(17), 10539.

Mainieri, T., Barnett, E. G., Valdero, T. R., Unipan, J. B., & Oskamp, S. (1997). Green buying: The influence of environmental concern on consumer behavior. *The Journal of social psychology, 137*(2), 189-204.

Martínez, M. P., Cremasco, C. P., Gabriel Filho, L. R. A., Junior, S. S. B., Bednaski, A. V., Quevedo-Silva, F., ... & Padgett, R. C. M. L. (2020). Fuzzy inference system to study the behavior of the green consumer facing the perception of greenwashing. *Journal of cleaner production, 242*, 116064.

Martinez, P. (2015). Customer loyalty: Exploring its antecedents from a green marketing perspective. *International Journal of Contemporary Hospitality Management, 27*(5), 896-917.

Mazur, A. (2016). How did the fracking controversy emerge in the period 2010-2012?. *Public Understanding of Science, 25*(2), 207-222.

Mishra, P., & Sharma, P. (2014). Green marketing: Challenges and opportunities for business. *BVIMR Management Edge, 7*(1).

Mishra, P., Jain, T., & Motiani, M. (2017). Have green, pay more: An empirical investigation of consumer's attitude towards green packaging in an emerging economy. *Essays on Sustainability and Management: Emerging Perspectives*, 125-150.

Moravcikova, D., Krizanova, A., Kliestikova, J., & Rypakova, M. (2017). Green Marketing as the Source of the Competitive Advantage of the Business. *Sustainability, 9*(12), 2218.

Moshood, T. D., Nawanir, G., Mahmud, F., Mohamad, F., Ahmad, M. H., & AbdulGhani, A. (2022). Sustainability of biodegradable plastics: New problem or solution to solve the global plastic pollution?. *Current Research in Green and Sustainable Chemistry, 5*, 100273.

Mostafa, M. M. (2007a). A hierarchical analysis of the green consciousness of the Egyptian consumer. *Psychology & marketing, 24*(5), 445-473.

Mostafa, M. M. (2007b). Gender differences in Egyptian consumers' green purchase behaviour: the effects of environmental knowledge, concern and attitude. *International journal of consumer studies, 31*(3), 220-229.

Mourad, M., & Serag Eldin Ahmed, Y. (2012). Perception of green brand in an emerging innovative market. *European journal of innovation management, 15*(4), 514-537.

Nath, V., Agrawal, R., Gautam, A., & Sharma, V. (2015). Socio–demographics as antecedents of green purchase intentions: a review of literature and testing of hypothesis on Indian consumers. *International Journal of Innovation and Sustainable Development, 9*(2), 168-187.

Nekmahmud, M., & Fekete-Farkas, M. (2020). Why not green marketing? Determinates of consumers' intention to green purchase decision in a new developing nation. *Sustainability, 12*(19), 7880.

Nguyen, N., Greenland, S., Lobo, A., & Nguyen, H. V. (2019). Demographics of sustainable technology consumption in an emerging market: The significance of education to energy efficient appliance adoption. *Social Responsibility Journal, 15*(6), 803-818.

Niinimäki, K., Peters, G., Dahlbo, H., Perry, P., Rissanen, T., & Gwilt, A. (2020). The environmental price of fast fashion. *Nature Reviews Earth & Environment, 1*(4), 189-200.

Nittala, R. (2014). Green consumer behavior of the educated segment in India. *Journal of international consumer marketing, 26*(2), 138-152.

Noel, H. (2009). *Basics marketing 01: Consumer behaviour* (Vol. 1). Ava Publishing.

Oerke, B., & Bogner, F. X. (2010). Gender, age and subject matter: Impact on teachers' ecological values. *The environmentalist, 30,* 111-122.

Ohanian, R. (1991). The impact of celebrity spokespersons' perceived image on consumers' intention to purchase. *Journal of advertising Research*.

Ottman, J. (2017). *The new rules of green marketing: Strategies, tools, and inspiration for sustainable branding*. Routledge.

Panungkelan, L., Tumbel, A., & Tawas, H. (2018). Analisis Pengaruh strategi green marketing dan corporate social responsibility terhadap keputusan menginap di Hotel Swiss Bell Maleosan Manado. *Jurnal EMBA: Jurnal Riset Ekonomi, Manajemen, Bisnis dan Akuntansi, 6*(3).

Papadas, K. K., Avlonitis, G. J., & Carrigan, M. (2017). Green marketing orientation: Conceptualization, scale development and validation. *Journal of Business Research, 80*, 236-246.

Papadas, K. K., Avlonitis, G. J., Carrigan, M., & Piha, L. (2019). The interplay of strategic and internal green marketing orientation on competitive advantage. *Journal of Business Research, 104*, 632-643.

Papadopoulos, I., Karagouni, G., Trigkas, M., & Platogianni, E. (2010). Green marketing: The case of Greece in certified and sustainably managed timber products. *EuroMed Journal of business, 5*(2), 166-190.

Patel, J., Modi, A., & Paul, J. (2017). Pro-environmental behavior and socio-demographic factors in an emerging market. *Asian Journal of Business Ethics, 6*, 189-214.

Peattie, K. (1995). *Environmental Marketing Management: Meeting the green challenge, financial times management*.

Perner, L. (2008). *Consumer behavior: the psychology of marketing*; University of Southern California.

Phelps, J. E., & Hoy, M. G. (1996). The Aad-Ab-PI relationship in children: The impact of brand familiarity and measurement timing. *Psychology & marketing, 13*(1), 77-105.

Podvorica, G., & Ukaj, F. (2020). The role of consumers' behaviour in applying green marketing: An economic analysis of the non-alcoholic beverages industry in Kosova. *Wroclaw Review of Law, Administration & Economics, 9*(1), 1-25.

Polonsky, M. J. (1994). Green Marketing Regulation in USA and Australia: The Australian Checklist. *Greener Management International,* 44-52.

Polonsky, M. J. (2008). An introduction to green marketing. *Global Environment: Problems and Policies, 2*(1), 1-10.

Prahalad, C. K., & Hamel, G. (1994). Strategy as a field of study: Why search for a new paradigm?. *Strategic management journal, 15*(S2), 5-16.

Pui Yi, A. Y. (2012). Effects of celebrity endorsement on consumer purchasing intention of apparel products. Published undergraduate Thesis, The Hong Kong Polytechnic University, 1-175.

Puspitasari, C. A., Yuliati, L. N., & Afendi, F. (2021). Pengaruh green marketing, kesadaran lingkungan dan kesehatan terhadap keputusan pembelian produk pangan organik melalui sikap. *Jurnal Aplikasi Bisnis Dan Manajemen (JABM), 7*(3), 713-713.

Rahbar, E., & Wahid, N. A. (2011). Investigation of green marketing tools' effect on consumers' purchase behavior. Business strategy series, 12(2), 73-83.

Rajput, N., Sharma, U., Kaur, B., Rani, P., Tongkachok, K., & Dornadula, V. H. R. (2022). Current global green marketing standard: changing market and company branding. *International Journal of System Assurance Engineering and Management, 13*(Suppl 1), 727-735.

Rice, G. (2006). Pro-environmental behavior in Egypt: Is there a role for Islamic environmental ethics?. *Journal of business ethics, 65*, 373-390.

Samdahl, D. M., & Robertson, R. (1989). Social determinants of environmental concern: Specification and test of the model. *Environment and behavior, 21*(1), 57-81.

Sarstedt, M., Ringle, C. M., & Hair, J. F. (2021). *Partial least squares structural equation modeling. In Handbook of market research* (pp. 587-632). Cham: Springer International Publishing.

Satrio, D., Yunitarini, S., & Rizqiani, N. (2021). Application of green marketing mix of beauty products on sales through purchase decisions as intervening variable. *Asian Management and Business Review,* 81-94.

Schell, C. J., Dyson, K., Fuentes, T. L., Des Roches, S., Harris, N. C., Miller, D. S., ... & Lambert, M. R. (2020). The ecological and evolutionary consequences of systemic racism in urban environments. *Science, 369*(6510), eaay4497.

Shahsavar, T., Kubeš, V., & Baran, D. (2020). Willingness to pay for eco-friendly furniture based on demographic factors. *Journal of Cleaner Production, 250*, 119466.

Shamdasani, P., Chon-Lin, G. O., & Richmond, D. (1993). Exploring green consumers in an oriental culture: Role of personal and marketing mix factors. *Advances in consumer research, 20*(1).

Sharma, A. P. (2021). Consumers' purchase behaviour and green marketing: A synthesis, review and agenda. *International Journal of Consumer Studies, 45*(6), 1217-1238.

Sharma, V., Maheshkar, C., & Poulose, J. (2022). Green Supply Chain Management: Attaining Sustainable Competitive Advantage. *In Emerging Trends in Decision Sciences and Business Operations* (pp. 235-260). Routledge India.

Sheu, J. B. (2010). A hybrid dynamic forecast model for analyzing celebrity endorsement effects on consumer attitudes. *Mathematical and Computer Modelling, 52*(9-10), 1554-1569.

Shiel, C., do Paço, A., & Alves, H. (2020). Generativity, sustainable development and green consumer behaviour. *Journal of Cleaner Production, 245*, 118865.

Siagian, A. O., & Cahyono, Y. (2021). Strategi pemulihan pemasaran UMKM di masa pandemi COVID-19 pada sektor ekonomi kreatif. *Jurnal Teknologi Dan Sistem Informasi Bisnis, 3*(1), 206-217.

Simon, F. L. (1992). Marketing green products in the triad. *Columbia Journal of World Business, 27*(3-4), 268-285.

Smith, K. T. (2010). An examination of marketing techniques that influence Millennials' perceptions of whether a product is environmentally friendly. *Journal of Strategic Marketing, 18*(6), 437-450.

Sreen, N., Purbey, S., & Sadarangani, P. (2018). Impact of culture, behavior and gender on green purchase intention. *Journal of retailing and consumer services, 41*, 177-189.

Straughan, R. D., & Roberts, J. A. (1999). Environmental segmentation alternatives: a look at green consumer behavior in the new millennium. *Journal of consumer marketing, 16*(6), 558-575.

Sun, Y., Liu, N., & Zhao, M. (2019). Factors and mechanisms affecting green consumption in China: A multilevel analysis. *Journal of cleaner production, 209*, 481-493.

Suplico, L. T. (2009). IMPACT OF GREEN MARKETING ON THE STUDENTS'PURCHASE DECISION. *Journal of International Business Research, 8*.

Szigeti, O., Szakály, Z., (2011). Marketing. Available online: https://docplayer.hu/11185064-Marketing-szigeti-orsolya-szakalyzoltan. html (accessed on 11 November 2021).

Taghikhah, F., Voinov, A., & Shukla, N. (2019). Extending the supply chain to address sustainability. *Journal of cleaner production, 229*, 652-666.

Thangavel, P., Pathak, P., & Chandra, B. (2022). Consumer decision-making style of gen Z: A generational cohort analysis. *Global Business Review, 23*(3), 710-728.

Tilikidou, I., & Delistavrou, A. (2014). Pro-environmental purchasing behaviour during the economic crisis. *Marketing Intelligence & Planning, 32*(2), 160-173.

Tong, Q., Anders, S., Zhang, J., & Zhang, L. (2020). The roles of pollution concerns and environmental knowledge in making green food choices: Evidence from Chinese consumers. *Food Research International, 130*, 108881.

Tsai, P. H., Lin, G. Y., Zheng, Y. L., Chen, Y. C., Chen, P. Z., & Su, Z. C. (2020). Exploring the effect of Starbucks' green marketing on consumers' purchase decisions from consumers' perspective. *Journal of Retailing and Consumer Services, 56*, 102162.

Uddin, S. F., & Khan, M. N. (2018). Young consumer's green purchasing behavior: Opportunities for green marketing. *Journal of Global Marketing, 31*(4), 270-281.

Utami, K. S. (2020). Green Consumers Behavior: Perilaku konsumen dalam pembelian produk ramah lingkungan. *Jurnal Maksipreneur: Manajemen, Koperasi, Dan Entrepreneurship, 9*(2), 208-223.

Wahyuni, I., Alimuddin, A., Habbe, H., & Mediaty, M. (2020). Esensi akuntansi lingkungan dalam keberlanjutan perusahaan. *Jurnal Ilmiah Akuntansi Manajemen,* 3(2), 147-159.

Wang, L., Wong, P. P. W., & Narayanan Alagas, E. (2020). Antecedents of green purchase behaviour: an examination of altruism and environmental knowledge. *International Journal of Culture, Tourism and Hospitality Research, 14*(1), 63-82.

Wang, L., Wong, P. P., & Narayanan, E. A. (2020). The demographic impact of consumer green purchase intention toward green hotel selection in China. *Tourism and Hospitality Research, 20*(2), 210-222.

Wei, R., & Zimmermann, W. (2017). Biocatalysis as a green route for recycling the recalcitrant plastic polyethylene terephthalate. *Microbial biotechnology, 10*(6), 1302-1307.

Welford, R. (Ed.). (2013). *Hijacking environmentalism: Corporate responses to sustainable development*. Routledge.

Wiederhold, M., & Martinez, L. F. (2018). Ethical consumer behaviour in Germany: The attitude-behaviour gap in the green apparel industry. *International journal of consumer studies, 42*(4), 419-429.

Wymer, W., & Polonsky, M. J. (2015). The limitations and potentialities of green marketing. *Journal of Nonprofit & Public Sector Marketing, 27*(3), 239-262.

Xiao, C., & Dunlap, R. E. (2007). Validating a comprehensive model of environmental concern cross-nationally: A US-Canadian comparison. *Social science quarterly, 88*(2), 471-493.

Xiao, C., & Hong, D. (2010). Gender differences in environmental behaviors in China. *Population and Environment, 32*, 88-104.

Xu, P., Zeng, Y., Fong, Q., Lone, T., & Liu, Y. (2012). Chinese consumers' willingness to pay for green-and eco-labeled seafood. *Food control, 28*(1), 74-82.

Xu, X., Hua, Y., Wang, S., & Xu, G. (2020). Determinants of consumer's intention to purchase authentic green furniture. *Resources, Conservation and Recycling, 156*, 104721.

Yadav, R., & Pathak, G. S. (2016). Young consumers' intention towards buying green products in a developing nation: Extending the theory of planned behavior. *Journal of cleaner production, 135*, 732-739.

Yang, Y. C., & Zhao, X. (2019). Exploring the relationship of green packaging design with consumers' green trust, and green brand attachment. *Social Behavior and Personality: an international journal, 47*(8), 1-10.

Yulianthi, A. D., & Sadguna, I. G. A. J. (2020). Faktor-faktor yang mempengaruhi keputusan wisatawan untuk menginap di Green Hotel di Kabupaten Badung Bali. *Jurnal Bisnis Dan Kewirausahaan, 16*(2), 177-188.

Zhao, H. H., Gao, Q., Wu, Y. P., Wang, Y., & Zhu, X. D. (2014). What affects green consumer behavior in China? A case study from Qingdao. *Journal of Cleaner Production, 63*, 143-151.