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The Impact of Greenwashing Towards Brand Trust and Brand Loyalty: A Study of Nike Move to Zero Initiatives

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Abstract: Green marketing is vital for companies to meet consumer demand for sustainable products. However, greenwashing—where companies falsely claim environmental benefits—poses a significant challenge, particularly in the fashion industry, by eroding consumer trust and undermining genuine sustainability efforts. Nike, a leading brand in athletic apparel and footwear, launched the Move to Zero initiative aiming for zero waste and zero carbon emissions by 2025. Despite this, some consumers suspect greenwashing, leading to scepticism about Nike's sustainability claims. A notable lawsuit has suggested that Nike misled consumers about the actual environmental impact of its products, potentially harming brand trust and loyalty. This study investigates the impact of greenwashing on brand trust and loyalty in the context of Nike's initiative. Using a quantitative approach, surveys were distributed to Nike customers in Indonesia aware of the Move to Zero initiative. Data analysis using descriptive statistics and the PLS-SEM method revealed significant concerns about greenwashing. Many respondents believe Nike's sustainability claims are more marketing than genuine commitment, are sceptical about the effectiveness of the initiatives, and feel Nike needs more transparency about its sustainability practices and impact. The PLS-SEM analysis showed that greenwashing significantly tarnishes the green brand image, leading to a diminished perception of Nike's environmental efforts. A strong green brand image positively influences brand trust, but overall trust scores were low due to perceived greenwashing. Brand trust positively impacts brand satisfaction, which in turn influences brand loyalty. However, dissatisfaction due to perceived greenwashing lowers both trust and loyalty. The PLS-SEM analysis also indicated significant variance in brand trust and loyalty explained by preceding variables. The findings highlight the importance of transparency and authenticity in green marketing to foster brand loyalty. This research offers valuable insights for Nike and other brands on enhancing trust and loyalty through genuine sustainability efforts and avoiding greenwashing.

PENDAHULUAN

The fashion industry is a major contributor to climate change through its energy-intensive production, reliance on synthetic fibers, and significant waste generation. Over 60% of garment materials are synthetic, tying the industry to fossil fuels. Annually, it generates around 92 million tons of textile waste, much of which ends up in landfills and releases methane.

Additionally, the industry consumes about 93 billion cubic meters of water, worsening global water scarcity. Fashion accounts for up to 10% of global greenhouse gas emissions, underlining the need for sustainability. As awareness of environmental impact grows, consumers across all age groups are increasingly demanding eco-friendly products.

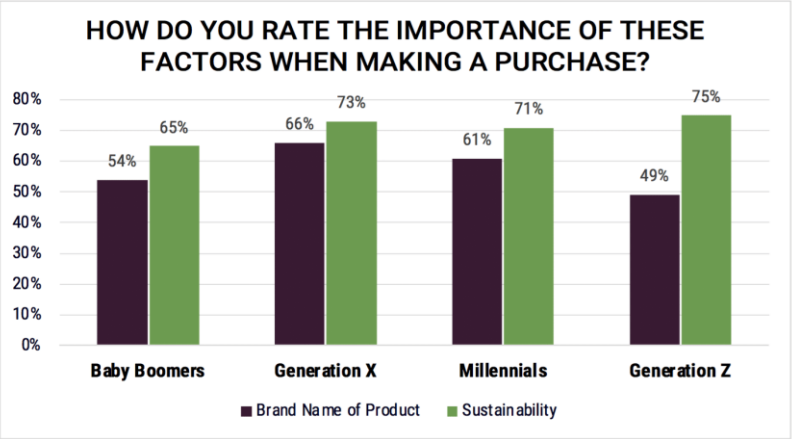

Figure 1 Demand in Sustainable Products (First Insight, 2021)

Green marketing, which involves promoting products as environmentally friendly and sustainable, is increasingly adopted by fashion brands. This strategy includes using sustainable materials, reducing carbon footprints, and supporting ethical labor practices to appeal to eco-conscious consumers. Examples include Patagonia's use of recycled materials and its Worn Wear program, as well as H&M's Conscious Collection featuring organic cotton and recycled polyester.

Figure 2 Fashion Brands Use Green Marketing (Delmas & Burbano, 2011)

Despite efforts towards sustainability, the rise of greenwashing—where companies misleadingly promote their environmental efforts—has led to consumer skepticism. Greenwashing damages trust, as consumers feel deceived when false claims are exposed, harming brand loyalty and satisfaction. Trust and satisfaction are crucial for brand loyalty, but greenwashing can severely undermine both, leading to decreased consumer engagement. Nike's Move to Zero initiative, aiming for zero carbon and waste by 2025, includes significant goals like reducing greenhouse gas emissions, increasing sustainable materials, and minimizing water use in textile production.

Figure 3 Nike Move to zero (Nike, 2023)

Despite Nike's sustainability efforts, the company has faced criticism and legal challenges accusing it of greenwashing. Critics argue that Nike exaggerates its environmental initiatives to attract eco-conscious consumers without significant operational changes. A notable lawsuit claimed that Nike's Move to Zero marketing misled consumers about its products' actual environmental impact, potentially damaging brand trust and loyalty. Although Nike won the lawsuit, skepticism remains, especially on social media, about the authenticity of the brand's sustainability claims.

Figure 1.4 X User Criticized Nike Sustainability Claims (X @alecleach_, 2023)

Problem Statement

Greenwashing poses a significant threat to brand trust and loyalty, particularly in the context of Nike's Move to Zero initiative, which targets zero carbon and zero waste by 2025. Despite positioning itself as a sustainability leader, Nike has faced criticism and legal challenges accusing it of exaggerating its environmental claims. This skepticism undermines consumer trust, a crucial element for brand success.

Preliminary research with 91 respondents familiar with the initiative revealed that 84.1% would view Nike negatively if its sustainability claims were inaccurate, indicating a perception of greenwashing. Additionally, 78.5% expressed disinterest in buying Nike products if the claims were false, highlighting the potential impact on brand loyalty. The findings suggest that greenwashing can damage Nike's reputation and hinder its ability to achieve its sustainability goals.

Understanding consumer perceptions of greenwashing is essential for brands like Nike to validate their sustainability efforts. This study examines the impact of greenwashing on brand trust and loyalty, focusing on Nike's Move to Zero initiative. The research aims to explore how perceived greenwashing affects consumer trust and loyalty in Nike's case

METHOD

Research Method

The initial phase of this research will employ a survey approach for data collection. According to Roxas and Lindsay (2012), the survey method is effective for hypothesizing about variables through participant responses (Roxas & Lindsay, 2012). Additionally, it is crucial that the survey questions are perceived uniformly by all respondents to ensure reliability (Antonides, 2017). This preliminary survey will gather data on consumer awareness and perspectives regarding Nike sustainability efforts. The survey also seeks to confirm whether similar sentiments are present among consumers in Indonesia. For data collection, the survey will be disseminated using the Google Forms platform online.

The main research for this study will be carried out using a survey method. According to Fienberg and Tanur (1989), survey research is designed to gather information from a large sample size to accurately represent a population's attributes. This method relies on well-structured statistical sampling and questionnaire design to quantify responses (Fowler, 2014). For efficient data collection, the survey will be distributed to participants through an online Google Forms platform. This main survey aims to evaluate customer perceptions of brand trust and loyalty. The questions will be derived from a rigorously structured formal questionnaire and the entire survey process will be executed online to facilitate accessibility and ease of participation.

Population and Sample

The target population for this preliminary study encompasses Indonesian consumers who are knowledgeable about Nike Move to Zero sustainability initiatives. The sample size for the preliminary study is at least 40 respondents which is within the range suggested in the study by Perneger et al. (2015), which are necessary to ensure statistical reliability and validity in initial research surveys. This study focuses on consumers in Bandung and the Greater Jakarta area (Jabodetabek), which includes Jakarta, Bogor, Depok, Tangerang, and Bekasi. Jakarta and its surrounding areas are Indonesia's economic powerhouses, contributing significantly to the national GDP and housing a large proportion of the urban population. The economic power of Jakarta and its metropolitan area makes it a premier center for commerce, including retail sales of global brands like Nike (Tech in Asia, 2023). Bandung, on the other hand, is known for its vibrant retail environment, a thriving hub for manufacturing businesses, and a popular tourist destination, contributing to significant sales performance for Nike products (Kemenparekraf, 2024). By focusing on these high-sales regions, the study aims to capture insights from a substantial portion of Nike's customer base in Indonesia, ensuring the sample is representative of key market segments where Nike has a strong presence. This targeted approach enhances the relevance and applicability of the study findings.

The target population for this study comprises customers of Nike in Indonesia who are aware of Nike sustainability efforts, specifically its Move to Zero initiatives. The minimum sample for this

research is based on a study from Maholtra (2010), in which the minimum sample size of marketing research is 200 samples. This sample size is essential for obtaining reliable insights into consumer perceptions of Nike green marketing initiatives. This study centres on customers in Bandung and the Greater Jakarta area (Jabodetabek), comprising Jakarta, Bogor, Depok, Tangerang, and Bekasi. Indonesia's economic powerhouses, Jakarta and the surrounding areas help greatly contribute to the national GDP and home a sizable fraction of the metropolitan population. Jakarta and its metropolitan area's economic might makes it a top centre for business, including retail sales of worldwide companies as Nike (Tech in Asia, 2023). Conversely, Bandung is well-known for its bustling retail location, active manufacturing hub, and popular tourist destination, which helps Nike's sales performance to be rather high (Kemenparekraf, 2024). With an eye on these high-sales areas, the study seeks to provide insights from a sizable portion of Nike's Indonesian customer base, thereby guaranteeing the sample is representative of important market segments where Nike is rather prominent. This focused strategy increases the study results' applicability and significance.

RESULT AND DISCUSSION

In accordance with the data collecting and analysis methodology outlined in the preceding chapter, the data analysis from the process and the results are displayed in this chapter. The data analysis is based on the data collected from the quantitative research from the preliminary survey and main survey.

1. Preliminary Survey

The method for conducting the quantitative analysis was a questionnaire-based survey. The survey obtained 91 numbers of respondents. The result of this data analysis is used to conduct and validate the problem for the main study.

a. Respondent's Perspective of Nike Move to Zero

Figure 4.1 illustrates respondents' perspectives on Nike Move to Zero sustainability claims. The survey question asked if learning that Nike sustainability claims were not entirely accurate would influence their perception of the brand. Results show that 96.7% of respondents would have a negative perception, indicating high expectations for transparency and authenticity in green marketing. Additionally, 2.2% were uncertain, and only 1.1% stated their perception would remain unchanged. This highlights the critical importance of genuine sustainability efforts.

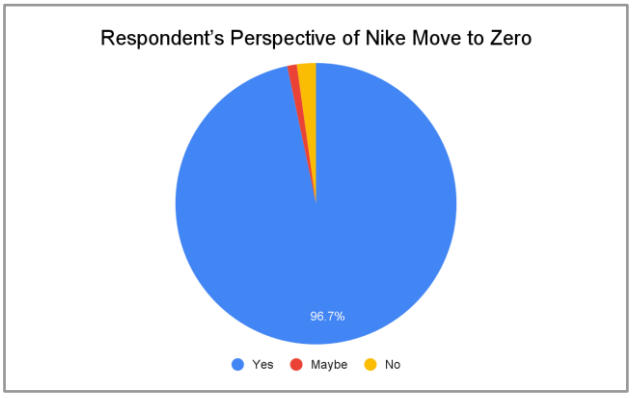

Figure 4.1 Respondent's Perspective of Nike Move to Zero

b. Respondent's Repeat Purchase of Nike

As seen in Figure 4.2, the majority of respondents, accounting for 91.2.5%, indicated that they would not continue to trust Nike if they learned that Nike

sustainability claims were not completely accurate. This is followed by 7.7% of respondents who expressed uncertainty about their trust in the brand, and only a small fraction of 1.1% would still trust Nike under these circumstances. This data suggests that potential greenwashing could significantly impact consumer trust and loyalty towards Nike.

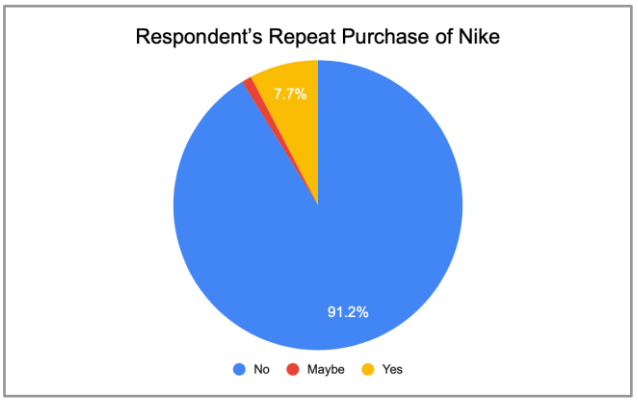

Figure 4.2 Respondent's Repeat Purchase Tendency of Nike

Main Research

A quantitative study was carried out using a questionnaire-based survey. The main survey garnered responses from 229 respondents, meeting the criteria and passing the screening questions. Despite this, the main survey successfully reached the minimum required sample size as outlined in chapter three.

Respondent Socio-Demographic Profile

This section is focused on assessing the social and demographic profile of the respondents.

Domicile

Figure 4.3 illustrates the domicile distribution of respondents. A majority of 58.1% reside in the Jabodetabek area, while 41.9% are from Bandung. This indicates a slightly higher representation from Jabodetabek in the survey sample.

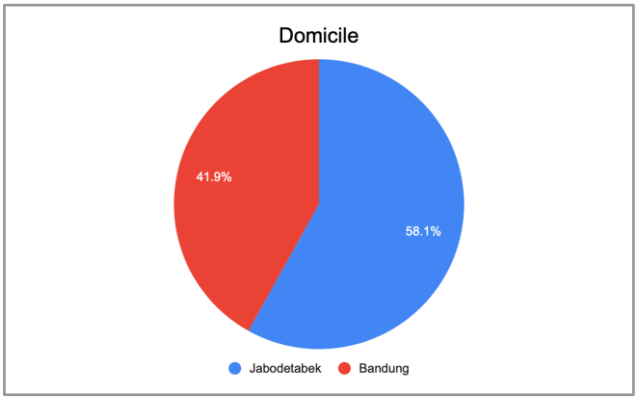

Figure 4.3 Respondent Domicile – Main Survey

Respondent Behavioral Profile

This section is focused on assessing the habit of respondents in using Nike products and their perception of the green marketing of the brand (Move to Zero).

Respondents' Perception of Nike Move to Zero

As seen in Figure 4.4, greenwashing is the most significant concern, with 24.8% of the respondents indicating that Nike's sustainability claims might be more about marketing than genuine commitment to environmental stewardship. This suggests a demand for more authentic and verifiable sustainability practices. Another major concern is the lack of evidence of tangible

impact, highlighted by 23.9% of the respondents. These respondents feel that there should be more concrete proof and visible results of the sustainability initiatives that Nike is implementing.

The lack of transparency is also a significant issue, with 18.6% of the respondents indicating that Nike needs to be more open about its sustainability practices and their actual impact. This highlights the need for clearer and more accessible information regarding Nike's efforts and achievements in sustainability. The lack of product quality is a concern for 22.1% of the respondents, who are worried that the shift to more sustainable products might compromise the quality and durability that Nike is known for. Lastly, 10.6% of the respondents expressed dissatisfaction with the lack of consumer awareness programs. This indicates a need for Nike to better educate and engage its consumers about the benefits and importance of sustainable practices.

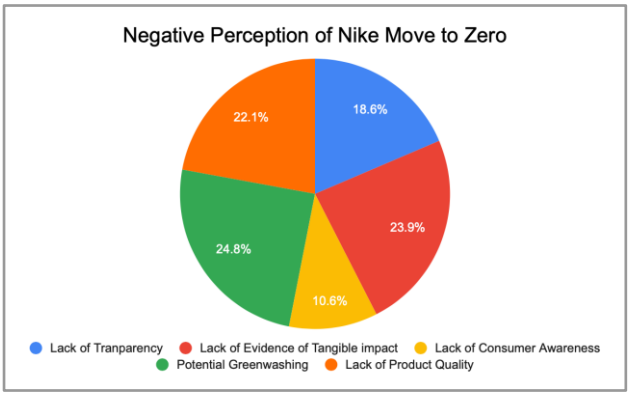

Figure 4.4 Negative Perception of Nike Move to Zero

Descriptive Analysis

Table 4.1, which follows, displays the findings of the descriptive analysis:

Table 4.1 Descriptive Statistics Analysis

Variable	Label	Indicator	Mean	Median	Min	Max	Std.dev
Greenwash	GW1	Nike Move to Zero exaggerates the environmental benefits of its products.	5.253	5	1	7	1.356
	GW2	Nike Move to Zero hides crucial details that could affect the perception of its environmental claims.	5.192	5	1	7	1.389
	GW3	Nike Move to Zero uses misleading wording in its environmental statements.	5.24	5	1	7	1.373
	GW4	Nike Move to Zero uses deceptive visuals or graphics related to its environmental initiatives.	5.227	5	1	7	1.374
	GW5	Nike Move to Zero is ambiguous or unclear.	5.21	5	1	7	1.325

Green Brand Image	GBI1	Nike Move to Zero is viewed as a good example of its sustainable movement.	2.817	3	1	7	1.325
	GBI2	Nike Move to Zero is well-known for its commitment to environmental reputation.	2.773	3	1	7	1.405
	GBI3	Nike Move to Zero is reliable for its dedication to sustainable development.	2.882	3	1	7	1.38
	GBI4	Nike Move to Zero succeeds in incorporating environmental features into its products.	2.834	3	1	7	1.331
Green Brand Trust	GBT1	I trust that Nike Move to Zero commitment to the environment is consistently solid.	2.904	3	1	7	1.46
	GBT2	I feel that Nike Move to Zero claims about its environmental effort are credible.	2.974	3	1	7	1.572
	GBT3	Nike Move to Zero dedication to environmental issues meets my standards.	2.847	3	1	7	1.495
	GBT4	Nike Move to Zero consistently fulfills its promises and commitments regarding environmental protection.	2.934	3	1	7	1.481
Green Brand Satisfaction	GBS1	I believe it's the right decision to purchase Nike products due to the environmental dedication of their Move to Zero initiatives.	2.917	3	1	7	1.486
	GBS2	I am satisfied with the environmental performance of Nike Move to Zero initiatives.	2.895	3	1	7	1.503
	GBS3	Overall, I am pleased with Nike Move to Zero	2.86	3	1	7	1.483

		initiative due to its focus on environmental concerns.					
	GBS4	Overall, I am happy to purchase Nike products because of the eco-friendly practices highlighted by the Move to Zero initiatives.	2.878	3	1	7	1.437
Green Brand Loyalty	GBL1	I'm willing to continue purchasing Nike products due to the environmental friendliness of the Move to Zero initiatives.	2.843	3	1	7	1.469
	GBL2	Nike Move to Zero initiatives makes Nike my preferred brand for sports products due to its environmental consciousness.	2.83	3	1	7	1.472
	GBL3	I am willing to pay more for Nike products because of the environmentally friendly practices highlighted in the Move to Zero initiatives.	2.93	3	1	7	1.482
	GBL4	I will recommend Nike products to others because of the environmental priorities emphasized by the Move to Zero initiatives.	2.817	3	1	7	1.507
	GBL5	I consider myself a loyal customer of Nike because of the Move to Zero initiatives.	2.852	3	1	7	1.44

Assessing each variable shown in Table 4.1, Respondents clearly see the initiatives in different ways depending on certain criteria. For the greenwash variable, the mean values range from 5.192 to 5.253, indicating a high level of agreement with the claims that Nike Move to Zero may exaggerate environmental benefits, hide crucial details, use misleading language, employ deceptive visuals, and be ambiguous or unclear. This suggests a notable concern among respondents about the authenticity of Nike's environmental claims. Regarding the green brand image, the mean values range from 2.773 to 2.882. Respondents do not see Nike Move to Zero as a particularly good example of a sustainable movement and do not strongly recognize its commitment to environmental reputation. They also do not view Nike as reliable in its dedication to sustainable development or successful in incorporating environmental features into its products. These values reflect a more neutral to slightly negative opinion of Nike's environmental initiatives.

For green brand trust, the mean values range from 2.847 to 2.974. Respondents do not strongly trust Nike Move to Zero's commitment to the environment, do not find Nike's environmental claims particularly credible, do not believe that Nike meets their standards for environmental dedication, and do not think Nike consistently fulfills its environmental promises. This indicates a low level of trust among respondents in Nike's environmental claims and commitments. Green brand satisfaction shows mean values ranging from 2.86 to 2.917. Respondents do not strongly believe it is the right decision to purchase Nike products due to the greenwashing issue, are not particularly satisfied with the environmental performance of the Move to Zero initiatives, and are not especially pleased overall with Nike's focus on environmental concerns. They are also not particularly happy to purchase Nike products because of the eco-friendly practices highlighted by the initiatives. These values reflect moderate dissatisfaction with Nike's environmental initiatives.

Green brand loyalty shows mean values ranging from 2.83 to 2.93. Respondents are not strongly willing to continue purchasing Nike products due to their greenwashing issue and do not consider themselves loyal customers because of the Move to Zero initiatives. These values indicate a relatively low level of loyalty towards Nike's environmental efforts. In conclusion, while respondents have significant concerns about potential greenwashing in Nike's Move to Zero initiatives, their perceptions of Nike's green brand image, trust, satisfaction, and loyalty is relatively low. This suggests that there is skepticism about the authenticity and impact of Nike's environmental initiatives.

Partial Least Square (PLS-SEM) Analysis Result

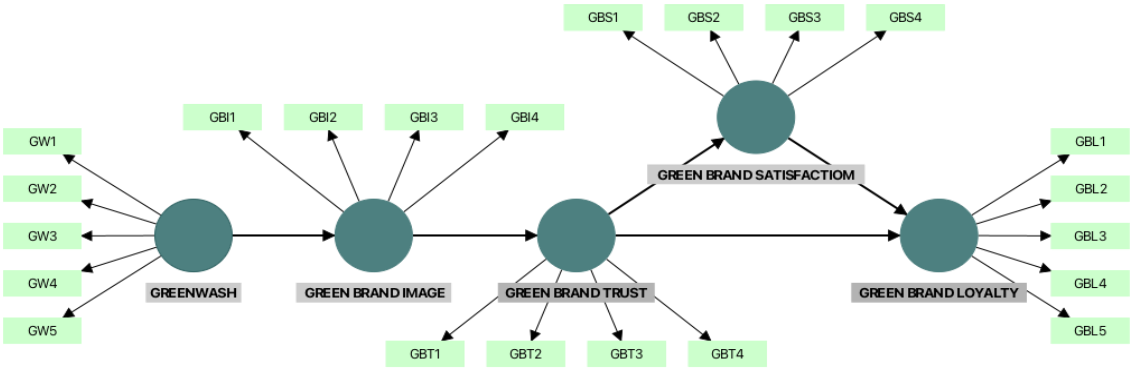

Figure 4.5 PLS-SEM Model Construct

This research aims to examine the exploratory model derived from the conceptual framework by employing Partial Least Square (PLS) analysis with the assistance of SmartPLS software. The SmartPLS software will play a crucial role in identifying and quantifying the variables as well as elucidating the relationships between each variable in the model. The analysis will encompass several key variables: Greenwash, Green Brand Image, Green Brand Trust, Green Brand Satisfaction, and Green Brand Loyalty.

To conduct a thorough analysis, the research will follow several essential steps. Firstly, indicator reliability will be assessed to ensure that the individual measurement items reliably reflect their corresponding constructs. Next, internal consistency reliability will be evaluated to confirm that

the set of indicators consistently measures the underlying constructs. Convergent validity will then be checked to ensure that the indicators of each construct are highly correlated and thus represent the same concept. Finally, discriminant validity will be tested to verify that the constructs are distinct and uncorrelated with each other.

This structured approach will provide a comprehensive understanding of the variables and their interrelationships within the proposed model. The research model is visually represented in Figure 4.5 above, illustrating the pathways and connections between Greenwash, Green Brand Image, Green Brand Trust, Green Brand Satisfaction, and Green Brand Loyalty. This detailed analysis will offer valuable insights into the effectiveness of Nike Move to Zero initiatives and its impact on consumer perceptions and behaviors.

Indicator Reliability

The indicator reliability test is assessed by examining the outer loading values in SmartPLS, where an indicator is considered reliable if it has a score greater than 0.7 (Hair et al., 2011). Table 4.2 presents the results of the indicator reliability test, which demonstrate the reliability of various indicators across the different variables.

Table 4.2 Indicator Reliability Resul

Variable	Indicator	Outer Loading	Reliability
Greenwash	GW1	0.906	Reliable
	GW2	0.873	Reliable
	GW3	0.879	Reliable
	GW4	0.894	Reliable
	GW5	0.864	Reliable
Green Brand Image	GBI1	0.866	Reliable
	GBI2	0.873	Reliable
	GBI3	0.867	Reliable
	GBI4	0.872	Reliable
Green Brand Trust	GBT1	0.868	Reliable
	GBT2	0.886	Reliable
	GBT3	0.879	Reliable
	GBT4	0.854	Reliable
Green Brand Satisfaction	GBS1	0.885	Reliable
	GBS2	0.876	Reliable
	GBS3	0.878	Reliable
	GBS4	0.879	Reliable
Green Brand Loyalty	GBL1	0.882	Reliable

	GBL2	0.876	Reliable
	GBL3	0.875	Reliable
	GBL4	0.882	Reliable
	GBL5	0.875	Reliable

In summary, the indicator reliability results show that all the indicators for each variable in the model have outer loading values greater than 0.7. This confirms their reliability in measuring the respective constructs, which is essential for ensuring the accuracy and consistency of the measurement model in the PLS-SEM analysis.

Internal Consistency Reliability

The next step in testing the reliability of the measurement model involves identifying the composite reliability of all variables. Composite reliability assesses the internal consistency of the indicators measuring each construct, with a desired score higher than 0.7 to confirm reliability (Hair et al., 2011). The composite reliability results are shown in Table 4.3 below.

Table 4.3 Internal Consistency Reliability Result

Variable	Composite Reliability	Reliability
Greenwash	0.947	Reliable
Green Brand Image	0.925	Reliable
Green Brand Trust	0.927	Reliable
Green Brand Satisfaction	0.932	Reliable
Green Brand Loyalty	0.944	Reliable

As illustrated in Table 4.3, all variables exceed the minimum composite reliability score of 0.7, indicating that the measurement model is reliable and that the indicators consistently and accurately reflect the constructs being studied. This high level of reliability is crucial for the subsequent analysis and interpretation of the relationships between the variables in the model, providing a robust foundation for understanding the impact of Nike Move to Zero initiatives on consumer perceptions and behaviors

Convergent Validity

The convergent validity test is determined by analyzing the Average Variance Extracted (AVE) score for each variable. An AVE score higher than 0.5 is required for the construct to be considered valid (Hair et al., 2014). Table 4.4 presents the results of the convergent validity test.

Table 4.4 Convergent Validity Result

Variable	AVE	Validity
Greenwash	0.780	Valid
Green Brand Image	0.756	Valid
Green Brand Trust	0.760	Valid
Green Brand Satisfaction	0.774	Valid
Green Brand Loyalty	0.771	Valid

As shown in Table 4.4, all variables have AVE scores that exceed the minimum threshold of 0.5. This confirms that all variables in this research are valid, as they effectively capture the

underlying constructs they are intended to measure. The high AVE scores ensure that the constructs exhibit good convergent validity, meaning that the indicators are well correlated with their respective constructs. This reliability is crucial for the accuracy and consistency of the overall measurement model in the PLS-SEM analysis.

Discriminant Validity

The subsequent step is to identify discriminant validity using the Fornell-Larcker Criterion. This analysis is performed by comparing the square root of the Average Variance Extracted (AVE) for each variable to the correlations between that variable and all other variables (Hair et al., 2014). For discriminant validity to be established, the square root of the AVE for each variable must be greater than the highest correlation with any other variable. Table 4.5 presents the results of the divergent validity test.

Table 4.5 Divergent Validity Result

	GBI	GBL	GBS	GBT	GW
GBI	**0.870**				
GBL	0.608	**0.878**			
GBS	0.606	0.602	**0.880**		
GBT	0.618	0.569	0.583	**0.872**	
GW	-0.645	-0.612	-0.604	-0.585	**0.883**

These results confirm that all square root scores of AVE are higher than the correlation scores between the constructs. This implies that the constructs exhibit good discriminant validity, as they are more strongly related to their own indicators than to other constructs in the model. Establishing discriminant validity ensures that each construct is unique and distinct from the others, which is essential for the robustness of the measurement model. In conclusion, the Fornell-Larcker Criterion results indicate that all variables in the model meet the requirements for discriminant validity. This supports the integrity of the constructs and confirms that they are sufficiently distinct from each other, providing a solid foundation for further analysis.

Collinearity Test

The collinearity test is conducted to ensure that there are no multiple indicator that are highly correlated, which can distort the results of the analysis. The Variance Inflation Factor (VIF) is used to measure collinearity between indicators, with a VIF score less than 5 being considered acceptable (Wong, 2013). Table 4.6 presents the VIF results for all indicators.

Table 4.6 Collinearity Test Result

Indicator Label	VIF
GW1	3.563
GW2	2.814
GW3	2.997
GW4	3.135
GW5	2.665
GBI1	2.412

GBI2	2.440
GBI3	2.369
GBI4	2.448
GBT1	2.526
GBT2	2.755
GBT3	2.481
GBT4	2.177
GBS1	2.694
GBS2	2.597
GBS3	2.561
GBS4	2.487
GBL1	2.967
GBL2	2.787
GBL3	2.736
GBL4	2.921
GBL5	2.870

Overall, all VIF scores for the indicators are well below the threshold of 5, indicating that collinearity is not a concern in this model. This ensures that the results of the PLS-SEM analysis will not be adversely affected by multicollinearity among the variables. This supports the robustness of the measurement model and the reliability of the subsequent analysis.

Structural Path Significance

Following the completion of the reliability, validity, and collinearity tests for the model, the subsequent step involves conducting a bootstrapping analysis to examine the relationships between the variables. This technique generates T-statistics, which help in determining the significance of the model's paths and whether the proposed hypotheses are supported. The model comprises five variables with 22 indicators, including five for greenwash, four for green brand image, four for green brand trust, four for green brand satisfaction, and five for green brand loyalty.

The bootstrapping approach evaluates the path coefficients, coefficients of determination (R^2), and cross-validated redundancy (Q^2). For the paths to be considered statistically significant, the T-statistics should exceed 1.96 at a 5% significance level (Hair et al., 2014). The results of the bootstrapping analysis, shown in Figure 4.6, indicate that the T-statistics for all paths are above the 1.96 threshold, confirming significant relationships between all constructs.

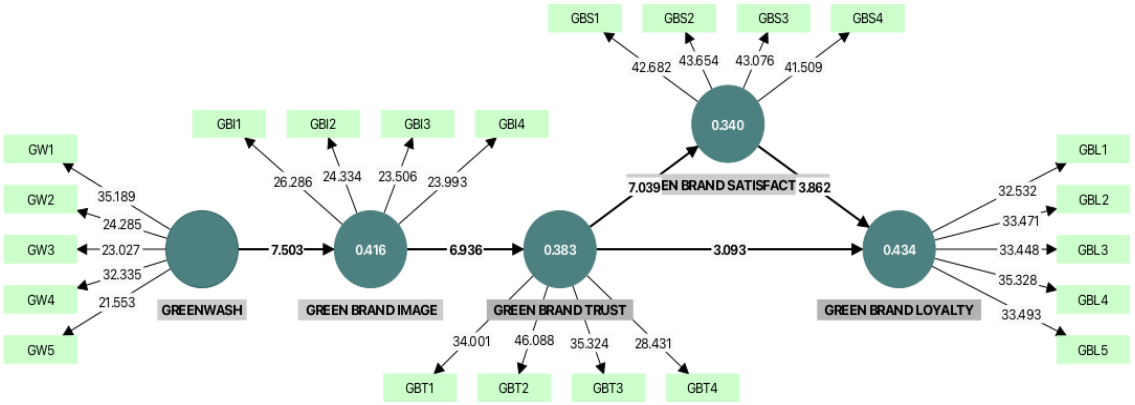

Figure 4.6 Structural Path Significance

In this model, the path from Greenwash to Green Brand Image has a T-statistic of 7.503, signifying a substantial impact of greenwashing on brand image. Likewise, the path from Green Brand Image to Green Brand Trust shows a T-statistic of 6.936, indicating a significant influence of brand image on brand trust. The path from Green Brand Trust to Green Brand Satisfaction is marked by a T-statistic of 7.039, demonstrating a strong effect of trust on satisfaction. Lastly, the relationship between Green Brand Satisfaction and Green Brand Loyalty has a T-statistic of 3.862, underscoring the significant influence of satisfaction on loyalty.

The bootstrapping analysis confirms that all relationships within the model are statistically significant. This validation underscores the interconnectedness of greenwash, green brand image, green brand trust, green brand satisfaction, and green brand loyalty. The significant path coefficients highlight the importance of authentic green marketing practices. The results suggest that minimizing greenwashing and promoting genuine sustainability efforts can positively impact brand image, trust, satisfaction, and ultimately, customer loyalty.

Table 4.7 Structural Path Significance

Path	Original Sample	Sample Mean	Standard Deviation	T statistics	R^2	Q^2
Greenwash → Green Brand Image	-0.645	-0.653	0.086	7.503	0.416	0.386
Green Brand Image → Green Brand Trust	0.618	0.627	0.089	6.936	0.383	0.291
Green Brand Trust → Green Brand Satisfaction	0.583	0.591	0.083	7.039	0.340	0.218
Green Brand Satisfaction → Green Brand Loyalty	0.409	0.410	0.106	3.862	0.434	0.216
Green Brand Trust → Green Brand Loyalty	0.331	0.334	0.107	3.093		

Based on the updated data presented in Table 4.7, the path significance and predictive accuracy for the variables related to Nike Move to Zero initiatives have been assessed. The T-statistic for the path from Greenwash to Green Brand Image is 7.053, indicating a significant negative relationship. The path from Green Brand Image to Green Brand Trust has a T-statistic of 6.936, demonstrating a strong positive influence. Similarly, the path from Green Brand Trust to Green Brand Satisfaction shows a T-statistic of 7.039, indicating significant positive effects. The path

from Green Brand Satisfaction to Green Brand Loyalty has a T-statistic of 3.862, confirming its significance. Additionally, the path from Green Brand Trust to Green Brand Loyalty shows a T-statistic of 3.093, also confirming significance.

The R^2 values further illustrate the explanatory power of the independent variables on the dependent variables. The R^2 for Green Brand Image is 0.416, indicating that 41.6% of its variance is explained by Greenwash. Green Brand Trust has an R^2 of 0.383, showing that 38.3% of its variance is explained by Green Brand Image. Green Brand Satisfaction has an R^2 of 0.340, meaning that 34.0% of its variance is explained by Green Brand Trust. Lastly, Green Brand Loyalty has an R^2 of 0.434, indicating that 43.4% of its variance is explained by both Green Brand Trust and Green Brand Satisfaction.

The Q^2 values, which assess the predictive relevance of the model, further support the model's validity. All constructs have Q^2 values greater than 0, indicating good predictive relevance. Specifically, Green Brand Image has a Q^2 of 0.386, Green Brand Trust has a Q^2 of 0.291, Green Brand Satisfaction has a Q^2 of 0.218, and Green Brand Loyalty has a Q^2 of 0.216. These values confirm that the model has substantial predictive relevance and can reliably forecast outcomes have related to green brand image, trust, satisfaction, and loyalty.

Overall, the bootstrapping results, along with the R^2 and Q^2 values, strongly support the hypothesized relationships, demonstrating significant and meaningful connections between the variables. This validates the model and underscores the importance of genuine green marketing practices in enhancing brand image, trust, satisfaction, and loyalty among consumers.

Furthermore, the Goodness of Fit (GoF) index is used to evaluate the predictive relevance and structural validity of a PLS-SEM model to assess its overall fit (Henseler & Sarstedt, 2013). The GoF is calculated by taking the square root of the average R^2 and the average communalities (AVE) values (S. Hussain et al., 2018). Table 4.8 displays the GoF result, which is 0.550, indicating that the model has a significant fit.

Table 4.8 Goodness of Fit Result

Variable	**R^2**	**AVE**
Greenwash		0.780
Green Brand Image	0.416	0.756
Green Brand Trust	0.383	0.760
Green Brand Satisfaction	0.340	0.774
Green Brand Loyalty	0.434	0.771
GoF	0.550	

In summary, the results from the bootstrapping analysis, along with the R^2, Q^2, and GoF values, support the hypotheses and demonstrate significant and meaningful relationships between the variables. This validates the model and underscores the importance of genuine green marketing practices in enhancing brand image, trust, satisfaction, and loyalty.

Effect Size (F2)

The effect size (F^2) measures the influence of an independent variable on a dependent variable. According to Wong (2013), F^2 values can be interpreted as follows: 0.02 indicates a small effect,

0.15 a medium effect, and 0.35 a large effect. Table 4.9 provides the F^2 results from the study, which are detailed below. (Hair et al., 2011).

Table 4.9 Effect Size Test Result

	GBI	GBL	GBS	GBT	GW
GBI				0.620	
GBL					
GBS		0.195			
GBT		0.127	0.515		
GW	0.711				

As presented in Table 4.9, the effect size analysis reveals several significant findings. Firstly, greenwash (GW) has a large impact on green brand image (GBI) with an F^2 value of 0.711. Furthermore, green brand image (GBI) shows a large effect on green brand trust (GBT) with an F^2 value of 0.620. Additionally, green brand trust (GBT) exhibits a large effect on green brand satisfaction (GBS) with an F^2 value of 0.515. Green brand satisfaction (GBS) shows a medium effect on green brand loyalty (GBL) with an F^2 value of 0.195. Lastly, green brand trust (GBT) has a medium effect on green brand loyalty (GBL) with an F^2 value of 0.127.

Hypothesis Testing

The hypotheses were tested using SmartPLS by analyzing the T-statistics and p-values derived from the inner model path coefficients. The results of the hypothesis testing are detailed in Table 4.10 below.

Table 4.10 Hypothesis Testing

Hypothesis	Structural Path	Path Coefficient	P Value	Result
H1	Greenwash → Green Brand Image	-0.645	0.000	**Accepted**
H2	Green Brand Image → Green Brand Trust	0.618	0.000	**Accepted**
H3	Green Brand Trust → Green Brand Satisfaction	0.583	0.000	**Accepted**
H4	Green Brand Satisfaction → Green Brand Loyalty	0.409	0.000	**Accepted**
H5	Green Brand Trust → Green Brand Loyalty	0.331	0.002	**Accepted**

a. H1: Greenwash negatively influences green brand image.

Hypothesis 1 posits that greenwash negatively influences green brand image. The path coefficient for H1 is -0.645 with a P-value of 0.000, indicating strong support for the hypothesis. Thus, it is confirmed that greenwash negatively influences green brand image.

b. H2: Green brand image positively influences green brand trust.

Hypothesis 2 suggests that green brand image positively influences green brand trust. The path coefficient for H2 is 0.618 with a P-value of 0.000, supporting the hypothesis and confirming that green brand image positively influences green brand trust.

c. H3: Green brand trust positively influences green brand satisfaction.

Hypothesis 3 argues that green brand trust positively impacts green brand satisfaction. With a path coefficient of 0.583 and a P-value of 0.000, the hypothesis is accepted. Therefore, it is confirmed that green brand trust positively influences green brand satisfaction.

d. H4: Green brand satisfaction positively influences green brand loyalty.

Hypothesis 4 posits that green brand satisfaction positively affects green brand loyalty. The path coefficient for this path is 0.409 with a P-value of 0.000, leading to the acceptance of the hypothesis. Thus, green brand satisfaction positively influences green brand loyalty.

e. H5: Green brand trust positively influences green brand loyalty.

Hypothesis 5 suggests that green brand trust positively impacts green brand loyalty. The path coefficient of 0.331 with a P-value of 0.002 confirms the hypothesis. Consequently, it is confirmed that green brand trust positively influences green brand loyalty.

Mediation Result

Mediation tests are critical in understanding how a mediating variable channels the effect of an independent variable to a dependent variable, demonstrating the influence of a third variable on the relationship between the initial two variables (MacKinnon et al., 2007). As outlined by Hayes (2015), certain conditions must be met to establish mediating effects.

1. The independent variable must have a significant effect on the dependent variable (T-statistic > 1.96 or P-value < 0.05).
2. The independent variable must significantly affect the mediating variable (T-statistic > 1.96 or P-value < 0.05).
3. Both the independent and mediating variables must significantly affect the dependent variable (T-statistic > 1.96 or P-value < 0.05).

Mediation can be categorized as either full or partial. According to Zhao, Lynch, and Chen (2010), full mediation occurs when the direct relationship between the independent and dependent variables is not significant, while the relationship between the mediating and dependent variables is significant. Conversely, partial mediation occurs when both the direct relationship between the independent and dependent variables and the relationship between the mediating and dependent variables are significant. Preacher and Kelley (2011) further elaborate that full mediation means the effect of the independent variable on the dependent variable is completely transmitted through the mediating variable, while partial mediation indicates that the mediating variable only partially transmits this effect. In this study, a mediating test used to assess the impact of three mediating variables in this research, which are Green Brand Image, Green Brand Trust, and Green Brand Satisfaction.

a. Mediation Test on Green Brand Image

The green brand image variable is a mediation variable between the independent variable of greenwash and the dependent variable of green loyalty.

Table 4.11 Total Effect Result on Independent Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Trust	4.073	0.000

Greenwash → Green Brand Satisfaction	2.992	0.003
Greenwash → Green Brand Loyalty	2.928	0.003

Based on the results presented in Table 4.11, the total effect of the independent variable (Greenwash) on the dependent variables (Green Brand Trust, Green Brand Satisfaction, and Green Brand Loyalty) is significant for all paths. The path from Greenwash to Green Brand Trust has a T-statistic of 4.073 and a P-value of 0.000, the path from Greenwash to Green Brand Satisfaction has a T-statistic of 2.992 and a P-value of 0.003, and the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003. These significant results indicate that the independent variable (Greenwash) has a substantial total effect on the dependent variables, thereby fulfilling the first criterion for mediation analysis.

Table 4.12 Total Effect Result on Independent Variable to Mediating Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Image	7.503	0.000

Based on the results presented in Table 4.12, the total effect of the independent variable (Greenwash) on the mediating variable (Green Brand Image) is examined. The findings indicate that the path from Greenwash to Green Brand Image has a T-statistic of 7.503 and a P-value of 0.000, demonstrating a significant effect. Therefore, it can be concluded that the independent variable (Greenwash) has a significant total effect on the mediating variable (Green Brand Image), thereby fulfilling the second criterion for mediation analysis.

Table 4.13 Total Effect Result on Independent & Mediating Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Trust	4.073	0.000
Greenwash → Green Brand Satisfaction	2.992	0.003
Greenwash → Green Brand Loyalty	2.928	0.003
Green Brand Image → Green Brand Trust	6.936	0.000
Green Brand Image → Green Brand Satisfaction	3.962	0.000
Green Brand Image → Green Brand Loyalty	3.824	0.000

Based on the results presented in Table 4.13, the total effect of the independent variable (Greenwash) and the mediating variable (Green Brand Image) on the dependent variables (Green Brand Trust, Green Brand Satisfaction, and Green Brand Loyalty) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Trust has a T-statistic of 4.073 and a P-value of 0.000, the path from Greenwash to Green Brand Satisfaction has a T-statistic of 2.992 and a P-value of 0.003, and the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003. Additionally, the path from Green Brand Image to Green Brand Trust has a T-statistic of 6.936 and a P-value of 0.000, the path from Green Brand Image to Green Brand Satisfaction has a T-statistic of 3.962 and a P-value of 0.000, and the path from Green Brand Image to Green Brand Loyalty has a T-statistic of 3.824 and a P-value of 0.000. These significant results indicate that both the independent variable (Greenwash) and the mediating variable (Green Brand Image) have substantial total effects on the dependent variables, thereby fulfilling the third criterion for mediation analysis.

Based on these three steps, Green Brand Image is confirmed as a mediating variable between

Greenwash and the dependent variables (Green Brand Trust, Green Brand Satisfaction, and Green Brand Loyalty), supporting the hypothesis of partial mediation since the relationships between the independent variable and the mediating variable, as well as between the mediating variable and the dependent variables, are significant.

Table 4.14 Total Effect Result on Independent Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Satisfaction	2.992	0.003
Greenwash → Green Brand Loyalty	2.928	0.003
Green Brand Image → Green Brand Satisfaction	3.962	0.000
Green Brand Image → Green Brand Loyalty	3.824	0.000

Based on the results presented in Table 4.14, the total effect of the independent variable (Greenwash) and the mediating variable (Green Brand Trust) on the dependent variables (Green Brand Satisfaction and Green Brand Loyalty) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Satisfaction has a T-statistic of 2.992 and a P-value of 0.003, and the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003. Additionally, the path from Green Brand Trust to Green Brand Satisfaction has a T-statistic of 3.962 and a P-value of 0.000, and the path from Green Brand Trust to Green Brand Loyalty has a T-statistic of 3.824 and a P-value of 0.000. These significant results indicate that both the independent variable (Greenwash) and the mediating variable (Green Brand Trust) have substantial total effects on the dependent variables.

Table 4.15 Total Effect Result on Independent Variable to Mediating Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Trust	4.073	0.000
Green Brand Image → Green Brand Trust	6.936	0.000

Based on the results presented in Table **4.15**, the total effect of the independent variable (Greenwash) on the mediating variable (Green Brand Trust) is examined. The findings indicate significant results for both paths. Specifically, the path from Greenwash to Green Brand Trust has a T-statistic of 4.073 and a P-value of 0.000, and the path from Green Brand Trust to Green Brand Trust has a T-statistic of 6.936 and a P-value of 0.000. These significant results indicate that the independent variable (Greenwash) has a substantial total effect on the mediating variable (Green Brand Trust).

Table 4.16 Total Effect Result on Independent & Mediating Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Satisfaction	2.992	0.003
Greenwash → Green Brand Loyalty	2.928	0.003
Green Brand Image → Green Brand Satisfaction	3.962	0.000
Green Brand Image → Green Brand Loyalty	3.824	0.000
Green Brand Trust → Green Brand Satisfaction	7.039	0.000
Green Brand Trust → Green Brand Loyalty	6.617	0.000

Based on the results presented in **Table 4.16**, the total effect of the independent variable (Greenwash) and the mediating variable (Green Brand Trust) on the dependent variables (Green Brand Satisfaction and Green Brand Loyalty) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Satisfaction has a T-statistic of 2.992 and a P-value of 0.003, and the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003. Additionally, the path from Green Brand Trust to Green Brand Satisfaction has a T-statistic of 7.039 and a P-value of 0.000, and the path from Green Brand Trust to Green Brand Loyalty has a T-statistic of 6.617 and a P-value of 0.000. These significant results indicate that both the independent variable (Greenwash) and the mediating variable (Green Brand Trust) have substantial total effects on the dependent variables.

Based on the three conducted steps, Green Brand Trust is confirmed as a mediating variable between Greenwash and the dependent variables (Green Brand Satisfaction and Green Brand Loyalty). The mediation hypothesis is obtained as partial mediation since the relationships between the independent variable and the mediating variable, as well as between the mediating variable and the dependent variables, are significant.

Mediation Test on Green Brand Satisfaction

The green brand satisfaction variable is a mediation variable between the independent variable of greenwash and the dependent variable of green loyalty.

Table 4.17 Total Effect Result on Independent Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Loyalty	2.928	0.003
Green Brand Image → Green Brand Loyalty	3.824	0.000
Green Brand Trust → Green Brand Loyalty	6.617	0.000

Based on the results presented in **Table 4.17**, the total effect of the independent variable (Greenwash) and the mediating variable (Green Brand Image and Green Brand Trust) on the dependent variable (Green Brand Loyalty) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003, the path from Green Brand Image to Green Brand Loyalty has a T-statistic of 3.824 and a P-value of 0.000, and the path from Green Brand Trust to Green Brand Loyalty has a T-statistic of 6.617 and a P-value of 0.000. These significant results indicate that both the independent variable (Greenwash) and the mediating variables (Green Brand Image and Green Brand Trust) have substantial total effects on the dependent variable (Green Brand Loyalty).

Table 4.18 Total Effect Result on Independent Variable to Mediating Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Satisfaction	2.992	0.003
Green Brand Image → Green Brand Satisfaction	3.962	0.000
Green Brand Trust → Green Brand Satisfaction	7.039	0.000

Based on the results presented in **Table 4.18**, the total effect of the independent variable (Greenwash) and the mediating variables (Green Brand Image and Green Brand Trust) on the mediating variable (Green Brand Satisfaction) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Satisfaction has a T-statistic of 2.992 and a P-value of 0.003, the path from Green Brand Image to Green Brand Satisfaction has a T-statistic of 3.962 and a P-value of 0.000, and the path from Green Brand Trust to Green Brand Satisfaction has a T-statistic of 7.039 and a P-value of 0.000. These significant results indicate that the independent variable (Greenwash) and the mediating variables (Green Brand Image and Green Brand Trust) have substantial total effects on the mediating variable (Green Brand Satisfaction).

Table 4.19 Total Effect Result on Independent & Mediating Variable to Dependent Variable

Structural Path	T-stat	P value
Greenwash → Green Brand Loyalty	2.928	0.003
Green Brand Image → Green Brand Loyalty	3.824	0.000
Green Brand Trust → Green Brand Loyalty	6.617	0.000
Green Brand Satisfaction → Green Brand Loyalty	3.862	0.000

Based on the results presented in **Table 4.19**, the total effect of the independent variable (Greenwash) and the mediating variables (Green Brand Image, Green Brand Trust, and Green Brand Satisfaction) on the dependent variable (Green Brand Loyalty) is examined. The findings indicate significant results for all paths. Specifically, the path from Greenwash to Green Brand Loyalty has a T-statistic of 2.928 and a P-value of 0.003, the path from Green Brand Image to Green Brand Loyalty has a T-statistic of 3.824 and a P-value of 0.000, the path from Green Brand Trust to Green Brand Loyalty has a T-statistic of 6.617 and a P-value of 0.000, and the path from Green Brand Satisfaction to Green Brand Loyalty has a T-statistic of 3.862 and a P-value of 0.000. These significant results indicate that the independent variable (Greenwash) and the mediating variables (Green Brand Image, Green Brand Trust, and Green Brand Satisfaction) have substantial total effects on the dependent variable (Green Brand Loyalty).

Based on the three conducted steps, Green Brand Satisfaction is confirmed as a mediating variable between Greenwash and the dependent variable (Green Brand Loyalty). The mediation hypothesis is obtained as partial mediation since the relationships between the independent variable and the mediating variable, as well as between the mediating variable and the dependent variable, are significant.

Consumer perception regarding greenwashing on Nike Move to Zero green marketing.

The survey results indicate that respondents have significant concerns regarding greenwashing in Nike's Move to Zero initiatives. According to Figure 4.1, 96.7% of respondents would have a negative perception of the brand if they learned that Nike's sustainability claims were not entirely accurate. This high percentage reflects the critical importance of transparency and authenticity in green marketing. Additionally, Figure 4.2 shows that 91.2% of respondents indicated they would not continue to trust Nike if they discovered the sustainability claims were misleading. Only a small fraction, 1.1%, would still trust Nike under these circumstances. This data underscores the potential damage that greenwashing can do to consumer trust and highlights the need for Nike to ensure its environmental claims are genuine and verifiable.

Greenwash negatively influences green brand image.

Based on the PLS-SEM results, greenwash has a significant negative impact on green brand image, with a T-statistic of 7.503. The effect size (F^2) of greenwash on green brand image is 0.711, indicating a large effect. When consumers perceive greenwashing in Nike's sustainability claims, it tarnishes the brand's image, making it harder for the company to be seen as a genuine leader in environmental stewardship. The survey data from Table 4.1 supports this finding, showing that respondents do not view Nike Move to Zero as a particularly good example of a sustainable movement (mean = 2.817) and do not strongly recognize its commitment to environmental reputation (mean = 2.773). This negative impact on brand image suggests that consumers are highly sensitive to perceived dishonesty in green marketing practices, and addressing these concerns is crucial for maintaining a positive brand image. Similar findings have been reported in other studies. For example, Minh-Tri Ha (2022) found that greenwash negatively impacts green brand equity through the mediating role of green brand image. This study highlights the detrimental effects of perceived dishonesty in green marketing and emphasizes the importance of genuine sustainability practices to maintain a positive brand image.

Green brand image positively influences green brand trust.

The PLS-SEM analysis shows that a positive green brand image enhances green brand trust, with a T-statistic of 6.936 and an effect size (F^2) of 0.620, indicating a large effect. However, when consumers

perceive Nike's green marketing as greenwashing, the brand image suffers, which in turn negatively affects brand trust. The survey results (Table 4.1) indicate that respondents do not strongly believe in the credibility of Nike's environmental claims (mean = 2.974) or that Nike meets their standards for environmental dedication (mean = 2.847). This lack of trust is directly linked to the negative perception of the brand image caused by greenwashing, showing the interconnected nature of these constructs. This relationship is supported by research conducted by Chen (2010), who found that a positive green brand image enhances consumer trust. Their study demonstrated that when consumers perceive a brand as genuinely environmentally friendly, their trust in the brand increases. Conversely, perceptions of greenwashing diminish brand trust.

Green brand trust positively influences green brand satisfaction.

According to the PLS-SEM results, green brand trust has a positive influence on green brand satisfaction, with a T-statistic of 7.039 and an effect size (F^2) of 0.515, indicating a large effect. However, if consumers perceive greenwashing, their trust in the brand diminishes, which subsequently lowers their satisfaction with the brand. The survey data reveals that respondents are not particularly satisfied with the environmental performance of the Move to Zero initiatives (mean = 2.895) and are not especially pleased overall with Nike's focus on environmental concerns (mean = 2.86). This indicates that the erosion of trust due to perceived greenwashing negatively impacts consumer satisfaction. This finding is consistent with the research by Han, Hsu, and Lee (2009), who found that trust in a company's environmental claims significantly enhances customer satisfaction. Their study indicated that consumers who trust a brand's environmental initiatives are more likely to be satisfied with the brand overall.

Green brand satisfaction positively influences green brand loyalty.

The PLS-SEM findings indicate that green brand satisfaction leads to higher green brand loyalty, with a T-statistic of 3.862 and an effect size (F^2) of 0.195, indicating a medium effect. Yet, when consumers are dissatisfied due to perceived greenwashing, their loyalty to the brand declines. Satisfaction is essential for fostering loyalty, and dissatisfaction stemming from distrust and a negative brand image caused by greenwashing results in lower consumer loyalty. The survey data supports this, showing that respondents are not strongly willing to continue purchasing Nike products due to their environmental friendliness (mean = 2.843) and do not see Nike as their preferred brand for sports products due to its environmental consciousness (mean = 2.83). Similar results have been reported by Oliver (1999), who found that customer satisfaction is a key determinant of brand loyalty. Additionally, Martínez (2015) explored the antecedents of customer loyalty from a green marketing perspective and found that green brand satisfaction significantly influences green brand loyalty. Oliver's study highlights the importance of maintaining high levels of customer satisfaction to foster loyalty, especially in the context of green marketing.

Green brand trust positively influences green brand loyalty.

Lastly, the PLS-SEM results confirm that green brand trust positively impacts green brand loyalty, with a T-statistic of 3.093 and an effect size (F^2) of 0.127, indicating a medium effect. However, when consumers perceive greenwashing, the resulting lack of trust diminishes loyalty. The survey data indicates that respondents do not strongly trust that Nike Move to Zero's commitment to the environment is solid (mean = 2.904) and do not feel that Nike consistently fulfills its promises regarding environmental protection (mean = 2.934). Maintaining consumer trust is therefore vital for ensuring continued loyalty, and addressing greenwashing concerns is imperative for sustaining this trust. This relationship is supported by the study conducted by Chaudhuri and Holbrook (2001), which found that trust in a brand significantly enhances brand loyalty. Furthermore, Alhaddad (2015) confirmed the structural relationship between brand image, brand trust, and brand loyalty, demonstrating that trust is a crucial component in building long-term loyalty among consumers.

The mediating role of green brand image, green brand trust, and green brand satisfaction.

Even though previous discussions indicate that greenwashing does not directly influence brand loyalty, the analysis explored the mediating roles of green brand image, green brand trust, and green brand satisfaction. Green brand image was found to have a significant mediating effect, with a T-statistic of 7.503 and a P-value of 0.000 for the path from greenwash to green brand image, indicating that greenwashing negatively impacts green brand image. This, in turn, affects green brand trust, satisfaction, and loyalty. Green brand trust also mediated the relationship

between greenwash and brand satisfaction (T-statistic = 7.039, P-value = 0.000) and loyalty (T-statistic = 6.617, P-value = 0.000). Additionally, green brand satisfaction mediated the relationship between greenwash and brand loyalty (T-statistic = 3.862, P-value = 0.000). These findings support the hypothesis of partial mediation, as all paths are significant. This aligns with studies by Zhao, Lynch, and Chen (2010) and Nguyen et al. (2021), highlighting the importance of mediating variables in understanding the indirect effects of greenwashing on brand loyalty. Thus, the study confirms that green brand image, trust, and satisfaction partially mediate the relationship between greenwashing and brand loyalty, illustrating the complex pathways through which greenwashing impacts brand perceptions and loyalty in the context of Nike's Move to Zero initiatives.

CONCLUSION

The study set out to explore how consumers perceive Nike's Move to Zero initiatives, particularly in relation to greenwashing, and to understand the impact of these perceptions on brand trust and loyalty. Data was gathered through an online survey targeting Nike customers in various Indonesian cities, and the analysis was conducted using Partial Least Square Structural Equation Modeling (PLS-SEM) and descriptive statistics.

The findings reveal that a significant portion of consumers view Nike's sustainability efforts with skepticism. Specifically, 24.8% of respondents believe that Nike's environmental claims might be more focused on marketing than on genuine sustainability. Additionally, 23.9% of respondents expressed concerns over the lack of tangible impact from these initiatives, while 18.6% pointed out the need for greater transparency in Nike's sustainability practices. These perceptions indicate that many consumers see the Move to Zero campaign as potentially greenwashing, which highlights the importance of authenticity, transparency, and verifiable impact in green marketing.

The analysis further demonstrated that these perceptions have a notable effect on brand trust and loyalty. Perceived greenwashing significantly damages Nike's green brand image, leading to diminished trust and satisfaction among consumers. The data showed that when consumers doubt the authenticity of Nike's environmental claims, their trust in the brand declines, which in turn lowers their overall satisfaction. This reduction in trust and satisfaction ultimately impacts brand loyalty, with many respondents expressing hesitation in continuing to purchase or recommend Nike products due to concerns over the brand's sincerity.

The study also found that the negative influence of perceived greenwashing on brand trust and satisfaction is considerable. The PLS-SEM analysis revealed that greenwashing perceptions have a strong negative effect on brand image, and this damaged image leads to lower levels of trust. In turn, trust influences satisfaction, and satisfaction affects loyalty. However, when trust and satisfaction are compromised due to perceptions of greenwashing, loyalty is also significantly reduced.

In conclusion, the study underscores the critical impact of consumer perceptions on the success of sustainability initiatives like Nike's Move to Zero. The perception of greenwashing can severely harm brand trust, satisfaction, and ultimately, loyalty. For Nike to maintain and strengthen its position in an increasingly environmentally conscious market, it must ensure that its sustainability claims are not only genuine but also transparent and verifiable. By doing so,

Nike can foster greater trust and loyalty among its consumers, reinforcing its commitment to sustainability in a credible and meaningful way.

BIBLIOGRAPHY

Alhaddad, Abdullah. (2015). A STRUCTURAL MODEL OF THE RELATIONSHIPS BETWEEN BRAND IMAGE, BRAND TRUST AND BRAND LOYALTY. International Journal of Management Research & Review. 5. 137-144.

Angeles, R. (2014). Using the Technology-Organization-Environment Framework for Analyzing Nike's "Considered Index" Green Initiative, a Decision Support System-Driven System. Journal of Management and Sustainability, 4(1), p96. https://doi.org/10.5539/jms.v4n1p96

Antonides, G. (2017). Sustainable Consumer Behaviour: A Collection of Empirical Studies. Sustainability, 9(10), 1686. https://doi.org/10.3390/su9101686

Bag, S. (2014). Consumer behavior towards green marketing: An empirical study. ZENITH International Journal of Multidisciplinary Research, 4, 290-299

Bartels, J., & Hoogendam, K. (2011). The role of social identity and attitudes toward sustainability brands in buying behaviors for organic products. Journal of Brand Management, 18(9), 697–708. https://doi.org/10.1057/bm.2011.3

Bulanov, N. M., Suvorov, A. Yu., Blyuss, O. B., Munblit, D. B., Butnaru, D. V., Nadinskaia, M. Yu., & Zaikin, A. A. (2021). Basic principles of descriptive statistics in medical research. Sechenov Medical Journal, 12(3), 4–16. https://doi.org/10.47093/2218-7332.2021.12.3.4-16

Butt, M. M., Mushtaq, S., Afzal, A., Khong, K. W., Ong, F. S., & Ng, P. F. (2017). Integrating Behavioural and Branding Perspectives to Maximize Green Brand Equity: A Holistic Approach. Business Strategy and the Environment, 26(4), 507–520. https://doi.org/10.1002/bse.1933

Campbell, B., Khachatryan, H., Behe, B., Dennis, J., & Hall, C. (2015). Consumer Perceptions of Eco-friendly and Sustainable Terms. Agricultural and Resource Economics Review, 44(1), 21–34. https://doi.org/10.1017/S1068280500004603

Chang, F.-P., Chia-Hui, H., & Chun-Chih, C. (2023). Consumer perception of "Green" and Sustainable Development Goals (the case of fashion product design and charm attributes). E3S Web of Conferences, 460, 05024. https://doi.org/10.1051/e3sconf/202346005024

Chaudhuri, A., & Holbrook, M. B. (2001). The Chain of Effects from Brand Trust and Brand Affect to Brand Performance: The Role of Brand Loyalty. Journal of Marketing, 65(2), 81–93. https://doi.org/10.1509/jmkg.65.2.81.18255

Chen, Y.-S. (2010). The Drivers of Green Brand Equity: Green Brand Image, Green Satisfaction, and Green Trust. Journal of Business Ethics, 93(2), 307–319. https://doi.org/10.1007/s10551-009-0223-9

Chen, Y.-S., & Chang, C.-H. (2013). Greenwash and Green Trust: The Mediation Effects of Green Consumer Confusion and Green Perceived Risk. Journal of Business Ethics, 114(3), 489–500. https://doi.org/10.1007/s10551-012-1360-0

Chen, Y.-S., Huang, A.-F., Wang, T.-Y., & Chen, Y.-R. (2020). Greenwash and green purchase behaviour: The mediation of green brand image and green brand loyalty. Total Quality Management & Business Excellence, 31(1–2), 194–209. https://doi.org/10.1080/14783363.2018.1426450

Chew, J. (2021). Behind the explosive rise of Indonesia's Tier 2 and 3 cities. Tech in Asia. https://www.techinasia.com/explosive-rise-indonesias-tier-2-3-citie

Chrisjatmiko, K. (2018). Towards green loyalty: The influences of green perceived risk, green image, green trust and green satisfaction. IOP Conference Series: Earth and Environmental Science, 106, 012085. https://doi.org/10.1088/1755-1315/106/1/012085

Cooksey, R. W. (2020). Descriptive Statistics for Summarising Data. In R. W. Cooksey, Illustrating Statistical Procedures: Finding Meaning in Quantitative Data (pp. 61–139). Springer Singapore. https://doi.org/10.1007/978-981-15-2537-7_5

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. https://doi.org/10.1016/j.jclepro.2017.07.184

Dawes, J. (2008). Do Data Characteristics Change According to the Number of Scale Points Used? An Experiment Using 5-Point, 7-Point and 10-Point Scales. International Journal of Market Research, 50(1), 61–104. https://doi.org/10.1177/147078530805000106

De Freitas Netto, S. V., Sobral, M. F. F., Ribeiro, A. R. B., & Soares, G. R. D. L. (2020). Concepts and forms of greenwashing: A systematic review. Environmental Sciences Europe, 32(1), 19. https://doi.org/10.1186/s12302-020-0300-3

Delmas, M. A., & Burbano, V. C. (2011). The Drivers of Greenwashing. California Management Review, 54(1), 64–87. https://doi.org/10.1525/cmr.2011.54.1.64

Deari, H., Isejni, S., & Ferati, R. (2020). Green Marketing and Consumer Behavior towards Green Brands. , 23, 04-11. https://doi.org/10.52155/IJPSAT.V23.2.2280.

Dormann, C. F., Elith, J., Bacher, S., Buchmann, C., Carl, G., Carré, G., Marquéz, J. R. G., Gruber, B., Lafourcade, B., Leitão, P. J., Münkemüller, T., McClean, C., Osborne, P. E., Reineking, B., Schröder, B., Skidmore, A. K., Zurell, D., & Lautenbach, S. (2013). Collinearity: A review of methods to deal with it and a simulation study evaluating their performance. Ecography, 36(1), 27–46. https://doi.org/10.1111/j.1600-0587.2012.07348.x

Ellen MacArthur Foundation. (2017). A new textiles economy: Redesigning fashion's future. Ellen MacArthur Foundation. https://www.ellenmacarthurfoundation.org/a-new-textiles-economy

F. Hair Jr, J., Sarstedt, M., Hopkins, L., & G. Kuppelwieser, V. (2014). Partial least squares structural equation modeling (PLS-SEM): An emerging tool in business research. European Business Review, 26(2), 106–121. https://doi.org/10.1108/EBR-10-2013-0128

Fienberg, S. E., & Tanur, J. M. (1989). Combining Cognitive and Statistical Approaches to Survey Design. Science, 243(4894), 1017–1022. https://doi.org/10.1126/science.243.4894.1017

First Insight. (2021). The state of consumer spending: Gen Z shoppers demand sustainable retail. First Insight. https://www.firstinsight.com/white-papers-posts/gen-z-shoppers-demand-sustainability

Fornell, C., & Larcker, D. F. (1981). Structural Equation Models with Unobservable Variables and Measurement Error: Algebra and Statistics. Journal of Marketing Research, 18(3), 382–388. https://doi.org/10.1177/002224378101800313

Franses, P. H., & Paap, R. (2001). Quantitative Models in Marketing Research (1st ed.). Cambridge University Press. https://doi.org/10.1017/CBO9780511753794

Gallo, T., Pacchera, F., Cagnetti, C., & Silvestri, C. (2023). Do Sustainable Consumers Have Sustainable Behaviors? An Empirical Study to Understand the Purchase of Food Products. Sustainability, 15(5), 4462. https://doi.org/10.3390/su15054462

Grubor, A., & Milovanov, O. (2017). Brand Strategies in the Era of Sustainability. Interdisciplinary Description of Complex Systems, 15(1), 78–88. https://doi.org/10.7906/indecs.15.1.6

Guo, S. (2023). Analysis of Nike's Marketing Strategy Based on Adolescent Consumer Psychology. Advances in Economics, Management and Political Sciences, 48(1), 288–295. https://doi.org/10.54254/2754-1169/48/20230463

Ha, M.-T. (2022). Greenwash and green brand equity: The mediating role of green brand image, green satisfaction, and green trust, and the moderating role of green concern. PLOS ONE, 17(11), e0277421. https://doi.org/10.1371/journal.pone.0277421

Hair, J. F., Sarstedt, M., & Ringle, C. M. (2019). Rethinking some of the rethinking of partial least squares. European Journal of Marketing, 53(4), 566–584. https://doi.org/10.1108/EJM-10-2018-0665

Hameed, I., Hyder, Z., Imran, M., & Shafiq, K. (2021). Greenwash and green purchase behavior: An environmentally sustainable perspective. Environment, Development and Sustainability, 23(9), 13113–13134. https://doi.org/10.1007/s10668-020-01202-1

Han, H., Hsu, L.-T. (Jane), & Lee, J.-S. (2009). Empirical investigation of the roles of attitudes toward green behaviors, overall image, gender, and age in hotel customers' eco-friendly decision-making process. International Journal of Hospitality Management, 28(4), 519–528. https://doi.org/10.1016/j.ijhm.2009.02.004

Harris, F., Roby, H., & Dibb, S. (2016). Sustainable clothing: Challenges, barriers and interventions for encouraging more sustainable consumer behaviour. International Journal of Consumer Studies, 40(3), 309–318. https://doi.org/10.1111/ijcs.12257

Hayes, A. F. (2015). An Index and Test of Linear Moderated Mediation. Multivariate Behavioral Research, 50(1), 1–22. https://doi.org/10.1080/00273171.2014.962683

H&M. (2019). H&M's Conscious Collection launches worldwide with a sustainable fashion future in mind. H&M. https://about.hm.com/news/general-news-2019/h-m-s-conscious-collection-launches-worldwide-with-a-sustainable.html

Henseler, J., Ringle, C. M., & Sarstedt, M. (2016). Testing measurement invariance of composites using partial least squares. International Marketing Review, 33(3), 405–431. https://doi.org/10.1108/IMR-09-2014-0304

Henseler, J., Ringle, C. M., & Sinkovics, R. R. (2009). The use of partial least squares path modeling in international marketing. In R. R. Sinkovics & P. N. Ghauri (Eds.), Advances in International Marketing (Vol. 20, pp. 277–319). Emerald Group Publishing Limited. https://doi.org/10.1108/S1474-7979(2009)0000020014

Henseler, J., & Sarstedt, M. (2013). Goodness-of-fit indices for partial least squares path modeling. Computational Statistics, 28(2), 565–580. https://doi.org/10.1007/s00180-012-0317-1

Hussain, S., Fangwei, Z., Siddiqi, A. F., Ali, Z., & Shabbir, M. S. (2018). Structural Equation Model for Evaluating Factors Affecting Quality of Social Infrastructure Projects. Sustainability, 10(5), 1415. https://doi.org/10.3390/su10051415

Howland, D. (2023). Nike faces lawsuit over greenwashing claims. Retail Dive. https://www.retaildive.com/news/nike-faces-lawsuit-greenwashing-claims/650282/

Jaiswal, D., Singh, B., Kant, R., & Biswas, A. (2022). Towards green product consumption: Effect of green marketing stimuli and perceived environmental knowledge in Indian consumer market. Society and Business Review, 17(1), 45–65. https://doi.org/10.1108/SBR-05-2021-0081

Jia, T., Iqbal, S., Ayub, A., Fatima, T., & Rasool, Z. (2023). Promoting Responsible Sustainable Consumer Behavior through Sustainability Marketing: The Boundary Effects of Corporate Social Responsibility and Brand Image. Sustainability, 15(7), 6092. https://doi.org/10.3390/su15076092

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. https://doi.org/10.3390/su11030873

Ktisti, E., Hatzithomas, L., & Boutsouki, C. (2022). Green Advertising on Social Media: A Systematic Literature Review. Sustainability, 14(21), 14424. https://doi.org/10.3390/su142114424

Kuchinka, D., Balazs, S., Gavriletea, M., & Djokic, B.-B. (2018). Consumer Attitudes toward Sustainable Development and Risk to Brand Loyalty. Sustainability, 10(4), 997. https://doi.org/10.3390/su10040997

Kumar, P., & Polonsky, M. J. (2017). An Analysis of the Green Consumer Domain within Sustainability Research: 1975 to 2014. Australasian Marketing Journal, 25(2), 85–96. https://doi.org/10.1016/j.ausmj.2017.04.009

Laghaie, A., & Otter, T. (2023). Measuring Evidence for Mediation in the Presence of Measurement Error. Journal of Marketing Research, 60(5), 847–869. https://doi.org/10.1177/00222437231151873

Lassoued, R., & Hobbs, J. E. (2015). Consumer confidence in credence attributes: The role of brand trust. Food Policy, 52, 99–107. https://doi.org/10.1016/j.foodpol.2014.12.003

Leckie, C., Rayne, D., & Johnson, L. W. (2021). Promoting Customer Engagement Behavior for Green Brands. Sustainability, 13(15), 8404. https://doi.org/10.3390/su13158404

Losh-Hesselbart, S., & Fowler, F. J. (1985). Survey Research Methods. Journal of the American Statistical Association, 80(392), 1077. https://doi.org/10.2307/2288598

MacFarland, T. W. (2014). Data Exploration, Descriptive Statistics, and Measures of Central Tendency. In T. W. MacFarland, Introduction to Data Analysis and Graphical Presentation in Biostatistics with R (pp. 5–16). Springer International Publishing. https://doi.org/10.1007/978-3-319-02532-2_2

MacKinnon, D. P., Fairchild, A. J., & Fritz, M. S. (2007). Mediation Analysis. Annual Review of Psychology, 58(1), 593–614. https://doi.org/10.1146/annurev.psych.58.110405.085542

Magnier, L., & Schoormans, J. (2015). Consumer reactions to sustainable packaging: The interplay of visual appearance, verbal claim and environmental concern. Journal of Environmental Psychology, 44, 53–62. https://doi.org/10.1016/j.jenvp.2015.09.005

Majeed, M. U., Aslam, S., Murtaza, S. A., Attila, S., & Molnár, E. (2022). Green Marketing Approaches and Their Impact on Green Purchase Intentions: Mediating Role of Green Brand Image and Consumer Beliefs towards the Environment. Sustainability, 14(18), 11703. https://doi.org/10.3390/su141811703

Malhotra, N. K. (1991). Administration of Questionnaires for Collecting Quantitative Data in International Marketing Research. Journal of Global Marketing, 4(2), 63–92. https://doi.org/10.1300/J042v04n02_05

Malhotra, N. K. (2010). Marketing research: An applied orientation (6th ed). Pearson.

Martínez, P. (2015). Customer loyalty: Exploring its antecedents from a green marketing perspective. International Journal of Contemporary Hospitality Management, 27(5), 896–917. https://doi.org/10.1108/IJCHM-03-2014-0115

McDonald, S., & Oates, C. J. (2006). Sustainability: Consumer Perceptions and Marketing Strategies. Business Strategy and the Environment, 15(3), 157–170. https://doi.org/10.1002/bse.524

McKinsey & Company. (2020). Fashion on climate: How the fashion industry can urgently act to reduce its greenhouse gas emissions. McKinsey & Company. https://www.mckinsey.com/~/media/mckinsey/industries/retail/our%20insights/fashion%20on%20climate/fashion-on-climate-full-report.pdf

Ministry of Tourism and Creative Economy of the Republic of Indonesia. (2024). Interesting facts about Bandung, the flower city full of creativity. Kemenparekraf. https://kemenparekraf.go.id/en/articles/interesting-facts-about-bandung-the-flower-city-full-of-creativity

Mohd Suki, N. (2015). Customer environmental satisfaction and loyalty in the consumption of green products. International Journal of Sustainable Development & World Ecology, 22(4), 292–301. https://doi.org/10.1080/13504509.2015.1054328

Montgomery, A. W., Lyon, T. P., & Barg, J. (2023). No End in Sight? A Greenwash Review and Research Agenda. Organization & Environment, 108602662311689. https://doi.org/10.1177/10860266231168905

Ms. Rajeswari.K, Dr. R. V. Suganya. (2023). Green Marketing and Its Influence on Consumer Purchasing Behaviour. Tuijin Jishu/Journal of Propulsion Technology, 44(4), 3592–3601. https://doi.org/10.52783/tjjpt.v44.i4.1501

Neumann, H. L., Martinez, L. M., & Martinez, L. F. (2021). Sustainability efforts in the fast fashion industry: Consumer perception, trust and purchase intention. Sustainability Accounting, Management and Policy Journal, 12(3), 571–590. https://doi.org/10.1108/SAMPJ-11-2019-0405

Nguyen, T. T. H., Nguyen, K. O., Cao, T. K., & Le, V. A. (2021). The Impact of Corporate Greenwashing Behavior on Consumers' Purchase Intentions of Green Electronic Devices: An Empirical Study in Vietnam. The Journal of Asian Finance, Economics and Business, 8(8), 229–240. https://doi.org/10.13106/JAFEB.2021.VOL8.NO8.0229

Niinimäki, K., Peters, G., Dahlbo, H., Perry, P., Rissanen, T., & Gwilt, A. (2020). The environmental price of fast fashion. Nature Reviews Earth & Environment, 1(5), 278–278. https://doi.org/10.1038/s43017-020-0054-x

Nike. (2023). Sustainability. Nike. https://www.nike.com/id/sustainability

Oliver, R. L. (1999). Whence Consumer Loyalty? Journal of Marketing, 63(4_suppl1), 33–44. https://doi.org/10.1177/00222429990634s105

Olsen, M. C., Slotegraaf, R. J., & Chandukala, S. R. (2014). Green Claims and Message Frames: How Green New Products Change Brand Attitude. Journal of Marketing, 78(5), 119–137. https://doi.org/10.1509/jm.13.0387

Panda, T. K., Kumar, A., Jakhar, S., Luthra, S., Garza-Reyes, J. A., Kazancoglu, I., & Nayak, S. S. (2020). Social and environmental sustainability model on consumers' altruism, green purchase intention, green brand loyalty and evangelism. Journal of Cleaner Production, 243, 118575. https://doi.org/10.1016/j.jclepro.2019.118575

Papista, E., Chrysochou, P., Krystallis, A., & Dimitriadis, S. (2018). Types of value and cost in consumer–green brands relationship and loyalty behaviour. Journal of Consumer Behaviour, 17(1). https://doi.org/10.1002/cb.1690

Papista, E., & Dimitriadis, S. (2019). Consumer – green brand relationships: Revisiting benefits, relationship quality and outcomes. Journal of Product & Brand Management, 28(2), 166–187. https://doi.org/10.1108/JPBM-09-2016-1316

Papista, E., & Krystallis, A. (2013). Investigating the Types of Value and Cost of Green Brands: Proposition of a Conceptual Framework. Journal of Business Ethics, 115(1), 75–92. https://doi.org/10.1007/s10551-012-1367-6

Parguel, B., Benoît-Moreau, F., & Larceneux, F. (2011). How Sustainability Ratings Might Deter 'Greenwashing': A Closer Look at Ethical Corporate Communication. Journal of Business Ethics, 102(1), 15–28. https://doi.org/10.1007/s10551-011-0901-2

Patagonia. (2016). Our footprint. Patagonia. https://www.patagonia.com/our-footprint

Peneda De Oliveira, C., & Sousa, B. M. (2020). Green Consumer Behavior and Its Implications on Brand Marketing Strategy: In V. Naidoo & R. Verma (Eds.), Advances in Marketing, Customer Relationship Management, and E-Services (pp. 69–95). IGI Global. https://doi.org/10.4018/978-1-5225-9558-8.ch004

Perneger, T. V., Courvoisier, D. S., Hudelson, P. M., & Gayet-Ageron, A. (2015). Sample size for pre-tests of questionnaires. Quality of Life Research, 24(1), 147–151. https://doi.org/10.1007/s11136-014-0752-2

Quarterman, J., & Pitts, B. (2005). Statistical data analysis techniques employed in Sport Marketing Quarterly: 1992 to 2004.. Sport marketing quarterly, 14, 227-2

Raykov, T. (2002). Analytic Estimation of Standard Error and Confidence Interval for Scale Reliability. Multivariate Behavioral Research, 37(1), 89–103. https://doi.org/10.1207/S15327906MBR3701_04

Roxas, B., & Lindsay, V. (2012). Social Desirability Bias in Survey Research on Sustainable Development in Small Firms: An Exploratory Analysis of Survey Mode Effect. Business Strategy and the Environment, 21(4), 223–235. https://doi.org/10.1002/bse.730

Sahin, A., Zehir, C., & Kitapçı, H. (2011). The Effects of Brand Experiences, Trust and Satisfaction on Building Brand Loyalty; An Empirical Research On Global Brands. Procedia - Social and Behavioral Sciences, 24, 1288–1301. https://doi.org/10.1016/j.sbspro.2011.09.143

Sarstedt, M., Ringle, C. M., & Hair, J. F. (2021). Partial Least Squares Structural Equation Modeling. In C. Homburg, M. Klarmann, & A. E. Vomberg (Eds.), Handbook of Market Research (pp. 1–47). Springer International Publishing. https://doi.org/10.1007/978-3-319-05542-8_15-2

Setia, M. (2016). Methodology series module 5: Sampling strategies. Indian Journal of Dermatology, 61(5), 505. https://doi.org/10.4103/0019-5154.190118

Shahrin, R., Quoquab, F., Jamil, R., Mahadi, N., Mohammad, J., Salam, Z., & Hussin, N. (2017). Green "Eco-Label" or "Greenwashing"? Building Awareness About Environmental Claims of Marketers. Advanced Science Letters, 23(4), 3205–3208. https://doi.org/10.1166/asl.2017.7713

Singh, J. J., Iglesias, O., & Batista-Foguet, J. M. (2012). Does Having an Ethical Brand Matter? The Influence of Consumer Perceived Ethicality on Trust, Affect and Loyalty. Journal of Business Ethics, 111(4), 541–549. https://doi.org/10.1007/s10551-012-1216-7

Stoica, M., & Hickman, T. M. (2021). Sustainability through the lens of the professional adviser: The case for brand trust. Journal of Product & Brand Management, 31(5), 689–701. https://doi.org/10.1108/JPBM-05-2021-3466

Texas A&M International University, Kock, N., Lynn, G., & Stevens Institute of Technology. (2012). Lateral Collinearity and Misleading Results in Variance-Based SEM: An Illustration and Recommendations. Journal of the Association for Information Systems, 13(7), 546–580. https://doi.org/10.17705/1jais.00302

The Fashion Law. (2024). Nike beats lawsuit accusing it of greenwashing its wares. The Fashion Law. https://www.thefashionlaw.com/nike-beats-lawsuit-accusing-it-of-greenwashing-its-wares/

Tian, W., Huang, K., Zhu, C., Sun, Z., Shao, L., Hu, M., & Feng, X. (2022). Recent progress in biobased synthetic textile fibers. Frontiers in Materials, 9, 1098590. https://doi.org/10.3389/fmats.2022.1098590

Tongco, Ma. D. C. (2007). Purposive Sampling as a Tool for Informant Selection. Ethnobotany Research and Applications, 5, 147. https://doi.org/10.17348/era.5.0.147-158

Torelli, C. J., Monga, A. B., & Kaikati, A. M. (2012). Doing Poorly by Doing Good: Corporate Social Responsibility and Brand Concepts. Journal of Consumer Research, 38(5), 948–963. https://doi.org/10.1086/660851

Ulusoy, E., & Barretta, P. G. (2016). How green are you, really? Consumers' skepticism toward brands with green claims. Journal of Global Responsibility, 7(1), 72–83. https://doi.org/10.1108/JGR-11-2015-0021

Vehovar, V., Toepoel, V., & Steinmetz, S. (2016). Non-probability Sampling. In C. Wolf, D. Joye, T. Smith, & Y. Fu, The SAGE Handbook of Survey Methodology (pp. 329–345). SAGE Publications Ltd. https://doi.org/10.4135/9781473957893.n22

Voorhees, C. M., Brady, M. K., Calantone, R., & Ramirez, E. (2016). Discriminant validity testing in marketing: An analysis, causes for concern, and proposed remedies. Journal of the Academy of Marketing Science, 44(1), 119–134. https://doi.org/10.1007/s11747-015-0455-4

Yang, S., & Chai, J. (2022). The Influence of Enterprises' Green Marketing Behavior on Consumers' Green Consumption Intention—Mediating Role and Moderating Role. Sustainability, 14(22), 15478. https://doi.org/10.3390/su142215478

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. https://doi.org/10.2224/sbp.8181

Yohana F. C. P. Meilani, I. B., Margaretha P. Berlianto, & Ian N. Suryawan, R. R. M. (2020). The Influence of Brand Awareness, Brand Image, and Brand Trust on Brand Loyalty. Jurnal Manajemen, 24(3), 412. https://doi.org/10.24912/jm.v24i3.676

Young, W., Hwang, K., McDonald, S., & Oates, C. J. (2010). Sustainable consumption: Green consumer behaviour when purchasing products. Sustainable Development, 18(1), 20–31. https://doi.org/10.1002/sd.394

Zhao, X., Lynch, J. G., & Chen, Q. (2010). Reconsidering Baron and Kenny: Myths and Truths about Mediation Analysis. Journal of Consumer Research, 37(2), 197–206. https://doi.org/10.1086/651257.