

# The impact of logo change on brand loyalty with the mediating role of brand attitude

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## Abstract

**Purpose** – This research examines the impact of logo changes within rebranding strategies, with a focus on the recent logo transformation of Burger King. Redesigns of logos often reflect shifts in brand strategies and consumer preferences. This study aims to evaluate the effects of logo changes on brand loyalty with the mediating role of brand attitude.

**Design/methodology/approach** – This study investigates the influence of Burger King's logo change on consumer behavior, specifically regarding brand loyalty. The research involves an analysis of the appropriateness and familiarity of the old and new Burger King logos, based on data collected from 468 Egyptian consumers. Statistical analysis is conducted using Partial Least Squares Structural Equation Modeling (PLS-SEM) to assess the impact of logo changes on consumer loyalty.

**Findings** – The findings indicate that a change in logo can positively affect brand loyalty, particularly when the new logo is perceived as both appropriate and familiar to consumers. Additionally, the study highlights the mediating role of brand attitude, suggesting that favorable brand perceptions enhance the relationship between logo changes and consumer loyalty.

**Practical implications** – The practical implications of this study highlight key strategies for brand managers involved in rebranding efforts and the associated risks of such processes. Ensuring logo appropriateness and maintaining elements of familiarity are crucial to fostering consumer acceptance and loyalty.

**Originality/value** – This study highlights the important role of logo change “logo appropriateness and familiarity,” offering a new perspective on how aligning logos with brand identity and retaining familiar elements can enhance consumer acceptance and loyalty with the presence of brand attitude as a mediator in this relationship.

**Keywords** Logo change, Familiarity, Appropriateness, Brand attitude, Brand loyalty

**Paper type** Research paper

## 1. Introduction

In recent times, numerous companies have undergone rebranding efforts by altering their names or logos. Logo redesigns are a popular company rebranding tactic. According to [Muzellec and Lambkin \(2006\)](#), rebranding comprises giving a brand a new name, catchphrase, symbol, design or mix of these. Despite logos' growing role in brand identity, research on logo modifications is scarce. Some scholars have ignored logo design or change arguments ([Kohli and Suri, 2002](#); [Hem and Iversen, 2004](#)).

[Walsh et al. \(2010\)](#) found that customers with strong brand loyalty dislike logo modifications, while those with weaker brand commitment like them. Few studies have examined how such dynamics affect non-Western markets. Egypt, a rapidly growing consumer market, provides an interesting context for examining the impact of logo changes, especially considering the cultural nuances and economic conditions that influence consumer behavior.

Egypt's consumer market growth correlates with the fast food industry's broad expansion since the 1970s. Auntie Anne's, Burger King, Pizza Hut, Domino's Pizza, Cook Door, Papa John's, KFC, Hardees, McDonald's, Dunkin' Donuts, Starbucks and Subway are expected to



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boost the market by 15% annually (Mahmoud *et al.*, 2021; Khashan *et al.*, 2023; Sayed, 2023; Mohamed, 2024). Given this market expansion, understanding consumer perceptions of rebranding, particularly through logo changes, becomes even more critical in the Egyptian context.

The moderating influence of brand attitude in how logo modifications affect brand loyalty in the Egyptian market is examined in this study to fill the gap. While logo revisions have been studied in Western contexts, less has been done in emerging markets like Egypt, where traditional and modern consumer behaviors coexist. Little emphasis has been paid to brand attitude as a mediator between logo changes and brand loyalty, particularly regarding the new logo's appropriateness and familiarity. This study analyzes logo modification in Egyptian rebranding to fill this gap.

This adds to the theoretical knowledge of branding by exploring how brand attitude mediates the relationship between logo alterations and brand loyalty. This research enhances the literature on logo appropriateness and familiarity in an emerging market environment and sheds light on how cultural factors affect customer attitudes toward rebranding projects.

On a practical contribution level, this research offers valuable insights for brand managers in emerging markets like Egypt. Understanding how consumers perceive logo changes, particularly familiarity and appropriateness, will help managers make informed rebranding decisions and avoid Tropicana's 2009 logo change, which dropped sales 20% in a month (Pettersson and Hannelius, 2021). This study will help brand managers maintain and improve brand loyalty while aligning visual identity modifications with consumer expectations.

The study begins with a review of related literature, followed by the methodology, statistical analysis of results, discussion, followed by a conclusion, and both theoretical and practical implications ended with study limitations.

The specific objectives of this research are as follows:

- (1) To identify the effect of logo changes as a rebranding strategy on brand loyalty.
- (2) To determine the influence of logo changes on brand attitude.
- (3) To assess the relationship between brand attitude and brand loyalty.
- (4) To investigate the mediating effect of brand attitude on the relationship between rebranding (logo changes) and brand loyalty.

## 2. Literature review

Brand identity is vital to communicating values, mission and personality to consumers. Lane Keller (2013) defines brand identity as several tangible and intangible factors that distinguish a brand from its competitors, such as its logo, name and visual symbols. Rebranding, especially through logo revisions, is often used strategically to influence consumer perceptions of a brand (Muzellec and Lambkin, 2006). Visual identity modifications represent brand strategy improvements to update consumer perceptions and strengthen brand equity (Aaker, 2004).

This research bases logo change on brand revitalization, which indicates that organizations must update their visual identity to stay competitive in a changing market (Kapferer, 2008). This theoretical perspective is important when analyzing how logo modifications affect brand loyalty. Logos are crucial visual cues that affect brand recognition, memory and emotional connection (Müller *et al.*, 2013). This study examines how logo appropriateness and familiarity affect customer brand identification perception through logo alterations.

### 2.1 Rebranding

Rebranding is crucial for businesses confronting external and internal changes. Rebranding involves renaming, repositioning, revamping and relaunching brands to maintain competitiveness through innovation, according to Muzellec *et al.* (2003). Lane Keller

(2013) advises brand managers to focus on customer-based brand equity when rebranding to build and reinvigorate a brand. Muzellec *et al.* (2003) define rebranding as changing stakeholders' perceptions of the brand to distinguish it from competitors. According to Muzellec *et al.* (2003), logo reshaping affects brand loyalty and consumer views.

Brand reinforcement, rejuvenation, repositioning, revitalization and rechristening are similar to rebranding. Academic arguments center on Muzellec and Lambkin's (2006) definition, which emphasizes new names, symbols or designs to reestablish brand identity. Rebranding relies on logo appropriateness and familiarity, according to this study.

While rebranding definitions differ, most researchers agree on brand image, recognition and customer relationship renewal. Rebranding considers external (brand image) and internal (brand identity) viewpoints. Dual perceptions can affect consumer attitudes, and the study defines rebranding as "the process of reestablishing brand image to align with an evolving brand identity."

### 2.2 Logo change

Rebranding may not always mean a logo change. Rebranding may require more than logo changes. Organizations must adjust to market conditions when internal and external surroundings change (Banerjee, 2008). Economic, customer and competitive reasons influence logo revisions (Kapferer, 2008; Bolhuis *et al.*, 2018; Müller *et al.*, 2013). Business strategy shifts, brand image changes and organizational reorganization (Rosson and Brooks, 2004) also affect logo changes.

The market is constantly evolving; thus, brand managers must constantly modify their brands to match customer expectations and market needs.

### 2.3 Logo appropriateness

The question of which logo is "best" is irrelevant to brand managers because logo design is subjective and might vary by creator (Shen and Lin, 2021). Consider the "most appropriate" logo design instead. According to Haig and Harper (1997), a good logo should be intriguing, appropriate, original and reflect the company's legitimacy. Hem and Iversen (2004) add that it should be recognized, significant and emotionally impactful. Logos help brand distinction, audience connection and communication, according to Adams (2008).

Appropriateness does not guarantee design quality (Frascara, 1988). The objective is to link the logo with the brand's purpose (Molenaar, 2015), whether classic or modern (Shen and Lin, 2021). This study follows Doyle and Bottomley (2004), who highlight brand name font appropriateness. Sensory-social and functional elements determine appropriateness, and the external environment affects company or brand impression (Bottomley and Doyle, 2006).

### 2.4 Logo familiarity

Brand familiarity influences consumer behavior and can provide outside indications for buying. Customers will learn about brands through channels, ads, purchases and friends' recommendations. After being familiar with a brand, consumers may use it (Shen and Lin, 2021). Consumer brand choice is closely correlated with brand understanding (Haley and Case, 1979).

Bettman and Sujun (1987) suggest that customers may favor well-known brands due to their familiarity and history. Conversely, buyers' preferences for unfamiliar brands are unclear because they have no or a weak opinion of them (Fazio, 1986).

Brand managers should seek to boost brand recognition because, as the previous researchers said, consumers are more likely to buy a brand if they can associate and recall the logo. Few studies have examined logo familiarity; however, Chadwick and Walters (2009) found that a logo can boost company identification, familiarity and admiration. Melewar and Saunders (1998) found that standardizing a company's visual system increases product and

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brand recognition. A brand's advantages and recognition should be communicated to consumers through its logo and color (Kent and Allen, 1994).

### 2.5 Brand loyalty

Brand loyalty, a key term in brand marketing (Aaker, 2009), measures consumer brand loyalty. Customer brand loyalty indicates their propensity of switching brands. Brand loyalty reduces vulnerability to competition in marketing and product upgrades. Consumers with lower brand loyalty explore alternative brands.

Brand loyalty affects marketing expenditures (Aaker, 1995). Mainly, maintaining clients costs less than getting them (Blackwell *et al.*, 2006). Since encouraging loyal customers to switch brands is expensive, loyalty serves as a strong barrier to competitors.

Fornell and Wernerfelt (1988) found that getting new consumers costs three times as much as retaining them. Reichheld and Teal (1996) say 5% client loyalty can boost profitability by 40–95%. Beyond fiscal value, Reichheld and Sasser (1990) suggest that increasing customer retention from 90 to 95% and keeping 5% more customers for 12 months might increase annual profit by 75%. Müller *et al.* (2013) examine brand loyalty and logo appropriateness. Logo appropriateness and familiarity correlate with brand loyalty through intermediary characteristics like logo attitude, brand attitude and brand modernity.

### 2.6 Brand attitude

The way a firm treats its products and services might show how consumers view them. It can show if buyers want and need the product. Salehzadeh and Pool (2017) say brand attitude is key to brand evaluation. It produces high brand equity outcomes like performance and recognition. Consumer perceptions toward a brand rely on its market choices and awareness, according to Saad *et al.* (2017). Consumers bond with brands (Walsh *et al.*, 2010), increasing their perceived worth (Ebrahim *et al.*, 2016). Emotions, moods and affective attitudes strongly impact loyalty (Rajumesh, 2014).

When a company suddenly rebrands, customers may ask why. The result can be ambiguity and negative feelings. However, if clients like the rebranding, there may be a lot of demand for it, reducing uncertainty and shock from the new logo. Pauwels-Delassus and Descotes (2013) found that customer support of rebranding helped the previous logo's perceived quality, brand image and brand loyalty shift to the new one. In a follow-up study, open-minded customers had better opinions of the relaunched company, which increased brand loyalty and trust (Pauwels-Delassus and Descotes, 2013; Shen and Lin, 2021).

### 2.7 Logo change elements and brand loyalty

Logo changes might hurt brand loyalty, yet they are necessary for brand growth. Minor logo changes can boost a company's image and consumer attachment, but they may alienate devoted customers who link the business with the old design. Audience impressions of the new logo and its alignment with brand values affect brand loyalty (Williams *et al.*, 2021).

Brand loyalty depends on a logo's industry significance. A well-designed logo can convey the brand's identity, values and products, making it more desirable. Customers trust a logo more when they think it fits the brand, boosting their loyalty. A good logo shows the brand's dedication and reminds customers why they are loyal (Kelly, 2017).

Brand identification and logo familiarity boost brand loyalty. Frequent logo exposure helps build brand trust. Brand recognition and loyalty increase with familiarity. Repeated exposure to recognizable logos increases favorable attitudes, recall value and perceived loyalty (Bastami *et al.*, 2015).

### 2.8 Logo change elements and brand attitude

Successful logo renewals improve customer impressions and may attract new and returning customers. However, poorly accepted logo revisions can cause negative views, especially

among committed customers who feel estranged from the new look. A logo change's impact on brand perceptions depends on how well it matches the business's values and resonates with targeted consumers (Williams and Son, 2022).

Consumers like brand-appropriate logos, according to research. An excellent logo conveys the brand's image, attitude and stance, boosting consumer perception. An improper logo may not meet consumer expectations, resulting in bad perceptions (Williams and Son, 2022).

Brand attitudes are also shaped by logo familiarity. Brands with familiar emblems are associated with trust, reliability and comfort; therefore, consumers like them. Brand recognition and recall, which influence customer attitudes during decision-making, improve with familiarity (Morgan et al., 2021).

### 2.9 Brand attitude and brand loyalty

Thus, logo familiarity strongly influences brand attitude. This makes more people like brands with recognized logos. Many organizations utilize logos, which is ideal because most people link them with trust, reliability and brand comfort. Logo familiarity improves brand recognition and recall, which is necessary to change customer attitudes while making decisions (Saydan and Dülek, 2019).

### 2.10 Hypotheses development

This study examines how logo alteration based on appropriateness and familiarity affects customer brand loyalty through brand attitude. Rebranding is the study's main focus to examine how logo changes effect consumer perceptions. To clarify the research variables, each is defined as follows:

- (1) *Logo appropriateness*: Logo appropriateness refers to how well a logo fits the brand's image, identity and values. It reflects the extent to which the design elements of the logo align with the brand's core attributes, making it a relevant representation of the brand. A fitting logo is unique, recognizable and creates an emotional connection with consumers (Shen and Lin, 2021; Haig and Harper, 1997).
- (2) *Logo familiarity*: Logo familiarity is defined as the degree of recognition and experiential accumulation in a consumer's memory regarding a logo, typically resulting from repeated exposure through advertisements, product usage or word-of-mouth recommendations (Shen and Lin, 2021). Familiar logos are often associated with increased trust and comfort, playing a significant role in influencing consumer decisions (Bettman & Sujan, 1987).
- (3) *Brand attitude*: Brand attitude refers to a consumer's overall evaluation or affective response toward a brand. It is shaped by factors like brand experiences and perceptions of the brand's attributes. A positive brand attitude is essential for driving loyalty and can mediate the relationship between brand actions (like logo changes) and consumer loyalty (Salehzadeh and Pool, 2017; Rajumesh, 2014).
- (4) *Brand loyalty*: Brand loyalty reflects a consumer's consistent preference and commitment to repurchasing a particular brand. Strong brand loyalty is often characterized by reduced susceptibility to competitor promotions and a higher likelihood of repeat purchases (Aaker, 2009; Oliver, 2014). It is a crucial metric for long-term business success and is significantly impacted by both brand attitude and familiarity (Müller et al., 2013).

The following is research hypotheses:

*H1*. There is an impact for logo change on brand loyalty

*H1a*. There is an impact for logo appropriateness on brand loyalty

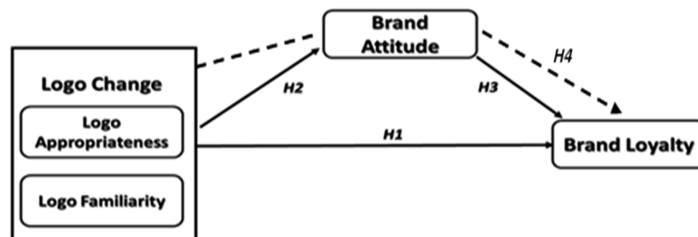
- H1b.* There is an impact for logo familiarity on brand loyalty
- H2.* There is an impact for logo change on brand attitude
- H2a.* There is an impact for logo appropriateness on brand attitude
- H2b.* There is an impact for logo familiarity on brand attitude
- H3.* There is an impact for brand attitude on brand loyalty
- H4.* Brand attitude mediates the relationship between logo change and brand loyalty.
- H4a.* Brand attitude mediates the relationship between logo appropriateness and brand loyalty.
- H4b.* Brand attitude mediates the relationship between logo familiarity and brand loyalty.

The suggested research framework is illustrated in [Figure 1](#), showing the relationships between research variables based on the above hypotheses:

### 3. Research methodology

#### 3.1 Sampling and data collection

For the purposes of this study, a sample size of 468 fast food restaurant customers (in general, customers who used to consume Burger King) were used to partake. Burger King is a leading fast food chain globally. In Egypt, Burger King is one of the most popular, competitive and growing fast food brands ([Mohamed, 2024](#)). Their involvement was sought through the distribution of questionnaires across various social media platforms. The survey used a seven-point Likert scale for the measurements included in the study. This scaling approach was deliberately selected for its effectiveness in gauging the strength of respondents' responses ([Brown and Churchill, 2009](#)). The questionnaire was presented in English using simple and easy statement vocabulary to be easy to understand and disseminated to participants via links shared across multiple social media platforms as Facebook, WhatsApp and X "Twitter previously." While the three platforms were effective in collecting the data, WhatsApp was somehow faster in providing responses and feedback. These links directed them to a Google Form where they could respond to the questionnaire. The questionnaire included images of the new and old Burger King logo. Consequently, data from 468 Egyptian respondents were examined. The collection of data was facilitated through a convenience sampling technique. Data were collected between September 2023 and November 2023.



Source(s): Developed by the researchers

Figure 1. Research model

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### 3.2 Measurements

The questionnaire contained demographic questions such as gender, age, occupation, income and marital status. The questionnaire started with a screening question: “Do you consume Burger King products?”. Also, the questionnaire was tested with 25 participants to ensure ease and clarity of the statements. No changes were made to the questionnaire as it was easy to understand and clear about the variables tested in the study.

The concept of logo appropriateness has not been thoroughly explored or defined within prior literature. To address this, this study draws insights from [Doyle and Bottomley's \(2004\)](#) perspectives on the appropriateness of fonts for brand names. So, the operationalization of logo appropriateness can be established as the extent to which the Logo effectively reflects the brand image. As for variable measurement, the current study adopts some dimensions implemented by [Bottomley and Doyle \(2006\)](#) and [Doyle and Bottomlet \(2004\)](#). As for logo appropriateness, a three-item measurement set was developed ([Appendix-Table A1](#)) using a Likert seven-point scale for assessment, ranging from 1 (strongly disagree) to 7 (strongly agree). Higher scores indicate the consumer's perception of greater appropriateness of the logo for the brand.

As for logo familiarity, this study turns to the insights of [Alba and Hutchinson \(1987\)](#) concerning brand familiarity. Logo familiarity is conceptualized as “the degree of experiential accumulation in consumers' memory resulting from interactions with a Logo.”

As for variable measurement, the study employs the dimensions presented by [Campbell and Keller \(2003\)](#) and [Shen and Lin \(2021\)](#) for logo familiarity. Accordingly, a three-item measurement set was formulated ([Appendix-Table A1](#)) based on previous scholars' scales. Two items from [Foroudi et al. \(2014\)](#) and one item from [Hirschman \(1986\)](#) as presented in [Table A1](#) in the [Appendix](#). The assessment employs a Likert seven-point scale, ranging from 1 (strongly disagree) to 7 (strongly agree). A higher score signifies consumers' increased familiarity with the logo.

Regarding brand loyalty, [Chaudhuri and Holbrook \(2001\)](#) describe brand loyalty as a customer's strong devotion to a favored product or service, demonstrated by repeated purchases made in the future. According to [Alzaydi \(2024\)](#), [Odin et al. \(2001\)](#) and [Oliver \(2014\)](#), loyalty indicates that customers believe a brand gives unique value. It also represents a brand's recurring and persistent purchase behavior ([Chaudhuri and Holbrook, 2001](#)). Based on the above definitions, a three-question measurement set was proposed in ([Table 1](#)). Three statements were adopted, as one statement was adopted from [Yoo et al. \(2000\)](#), one from [Zeithaml et al. \(1996\)](#) and one from [Odin et al. \(2001\)](#), as shown in [Table A1](#) in the [Appendix](#). A Likert seven-point scale was employed for evaluation, spanning from 1 (strongly disagree) to 7 (strongly agree). Participants were prompted to respond to these questions after viewing the logo.

Finally, for brand attitude, [Jiang et al. \(2016\)](#) and [Ismail et al. \(2024\)](#) concluded that the brand's approach toward production flexibility and consumer decision-making is reflected in the logo. Research by [Rafiq et al. \(2020\)](#) and [S raphin et al. \(2016\)](#) has demonstrated that brand attitudes had a considerable impact on repurchase intention, which represents brand loyalty. A good attitude towards the brand has a definite effect on product quality and value. According to [Rafiq et al. \(2020\)](#), consumers were more likely to buy a product if they had a negative opinion about the brand than if they had a positive one. Additionally, according to [Ariffin et al. \(2016\)](#), customer love and repurchase intention were closely related.

Five items were used to measure brand attitude. The five items were based on the work of [Chiu et al. \(2009\)](#) and are illustrated in [Table A1](#) in the [Appendix](#).

## 4. Statistical results

### 4.1 Descriptive statistics

The sample majority were males (318), presenting more than half of the respondents when compared to the 32% of the sample being females (150). The youth who were younger than

**Table 1.** Frequency table for demographic variables

Variable	Categories	Frequency	Percentage
Gender	Female	150	32%
	Male	318	68%
Age	<30 years old	332	71%
	≥30 years old	136	29%
Marital status	Ever married	150	32%
	Never married	318	68%
Income	20,000 and above	42	9%
	From 10,000 to 19,000	108	23%
	From 4,000 to 9,000	318	68%
Occupation	Private business	9	2%
	Private sector	136	29%
	Public sector	14	3%
	Unemployed	309	66%

**Source(s):** Based on calculation of the surveyed sample from brand users

30 years old (332) were representing around 71% of the sample. While those who were 30 years or older (136) were only 29% of the sample. Around 68% of the sample were never married (318), while 32% were married, divorced or widowed.

Regarding the income, 68% of the respondents reported that their income is lower than 9,000 (318). However, only 9% reported their income to be more than 20,000 (42). This shows how the majority tend to have lower disposable incomes. This comes in line with around 66% of the sample being unemployed (309). While around 29% of them work in the private sector (136). In addition, 3% worked as public sector (14) employees and 2% as private business owners (9).

#### 4.2 Measurement model (reliability and convergent validity)

First level analysis: Confirmatory factor analysis (CFA) is used to evaluate the accuracy and consistency of factors (Bandalos and Finney, 2018). The Cronbach's alpha was used to evaluate the reliability, as shown in Table 2. Each variable had a Cronbach's alpha coefficient greater than 0.7.

**Table 2.** Reliability and validity analysis for phenomenon

	Item	Loadings	Outer VIF	Cronbach's alpha	Composite reliability	Average variance extracted (AVE)
Brand attitude	BA1	0.883	3.336	0.946	0.958	0.822
	BA2	0.910	4.710			
	BA4	0.927	4.986			
	BA5	0.872	3.665			
	BL1	0.887	2.446			
Brand loyalty	BL2	0.946	4.288	0.905	0.941	0.841
	BL3	0.918	3.355			
	LC1	0.879	3.038			
Logo change	LC3	0.881	3.089	0.883	0.916	0.689
	LC4	0.611	1.325			
	LC5	0.869	2.672			
	LC6	0.877	2.856			

**Source(s):** Based on calculations using SmartPLS

Results in [Table 2](#) evaluated the validity of the assertions by computing the average variance extracted and the composite reliability (see [Table 1](#)). Every factor has an average variance extracted (AVE) over 0.5 and a composite reliability (CR) above 0.7 ([Shrestha, 2021](#)). This shows that the claims are trustworthy as contributing factors. Each statement had loadings exceeding 0.7 ([Purwanto and Sudargini, 2021](#)), indicating their significance in describing the variable and suggesting they should not be minimized. Considering the multicollinearity test, it was found that the statements did not suffer from any multicollinearity. This can be explained by the VIF of each statement being lower than 5.

Regarding [Table 3](#), it is essential to ensure discriminant validity. It is verified by ensuring that the square of the AVE for each variable surpasses the inter-correlation, as noted by [Tyagi et al. \(2022\)](#).

Partial least squares structural equation modeling (PLS-SEM) is particularly suited for this study due to its ability to handle complex models with multiple latent variables and small-to-medium sample sizes. PLS-SEM is effective when the research objective is prediction-oriented, making it ideal for exploring relationships between variables, such as how logo changes affect brand loyalty through the mediation of brand attitude. Additionally, PLS-SEM does not require strict assumptions about data normality, which is beneficial for handling non-normal data distributions often found in real-world consumer behavior studies ([Hair et al., 2017](#)).

[Figure 2](#) represents the structural equation model examining the relationships logo change, brand attitude and brand loyalty. Logo change is measured by six indicators (LC1 to LC6) with factor loadings between 0.611 and 0.880. Brand attitude, influenced by logo change (path coefficient 0.712), is measured by five indicators (BA1 to BA5), with strong loadings from 0.866 to 0.926. Brand attitude has a direct effect on brand loyalty (path coefficient 0.500). Brand loyalty, measured by three indicators (BL1 to BL3), is also directly influenced by logo change (path coefficient 0.473). The R-squared values show that brand attitude and brand loyalty are explained by 50.8 and 81.1%, respectively. The model shows first-level analysis, which includes the three main variables.

Second level analysis: The correctness and consistency of components are assessed using CFA. The reliability was assessed using Cronbach's alpha. The Cronbach's alpha coefficient for each variable was more than 0.7 ([Shrestha, 2021](#)). As such, every statement appropriately summarizes the factors included in the study. By calculating the average variance extracted and the composite reliability, we assessed the veracity of the claims. Each factor has a CR of greater than 0.7 and an AVE of greater than 0.5 ([Shrestha, 2021](#)).

[Table 4](#) above, this demonstrates the veracity of the statements as causative elements. The loadings for each statement were greater than 0.7, indicating that they are important for characterizing the variable and that they should not be minimized ([Purwanto and Sudargini, 2021](#)).

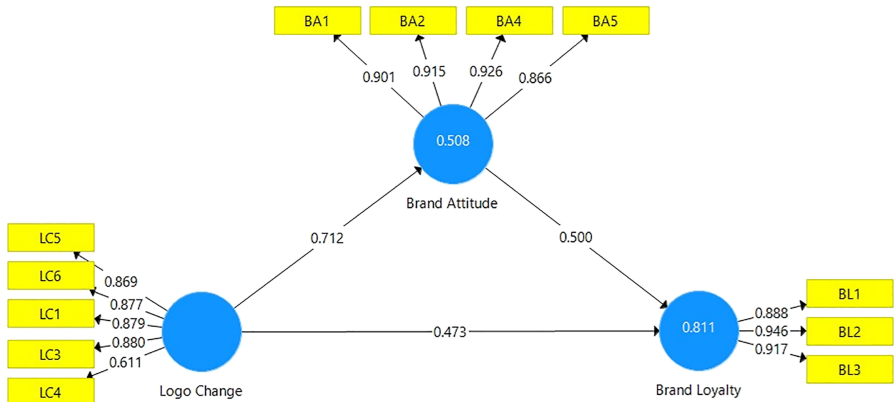
Similarly to [Table 5](#), it is essential to ensure discriminant validity. It is important that the square of the AVE for each variable exceeds the intercorrelation, as mentioned by [Tyagi et al. \(2022\)](#).

In [Figure 3](#), Logo Appropriateness, measured by two indicators (LA1 and LA3), has strong factor loadings of 0.943 each and a moderate effect on brand attitude (path coefficient 0.272).

**Table 3.** Discriminant validity analysis

	Brand attitude	Brand loyalty	Logo change
Brand attitude	0.907		
Brand loyalty	0.835	0.917	
Logo change	0.711	0.829	0.830

**Source(s):** Based on calculations using SmartPLS



Source(s): Based on calculations using Smart PLS

Figure 2. Structural equation modeling

Table 4. Reliability and validity analysis for phenomenon

	Item	Loadings	Outer VIF	Cronbach's alpha	Composite reliability	Average variance extracted (AVE)
Brand attitude	BA1	0.883	3.336	0.946	0.958	0.822
	BA2	0.910	4.710			
	BA4	0.927	4.986			
	BA5	0.872	3.665			
Brand loyalty	BL1	0.887	2.446	0.905	0.941	0.841
	BL2	0.946	4.288			
	BL3	0.918	3.355			
Logo appropriate	LA1	0.943	2.530	0.875	0.941	0.889
	LA3	0.943	2.530			
Logo familiarity	LF1	0.660	1.253	0.770	0.867	0.690
	LF2	0.907	2.348			
	LF3	0.900	2.293			

Source(s): Based on calculations using SmartPLS

Logo Familiarity, measured by three indicators (LF1 to LF3) with loadings ranging from 0.660 to 0.908, influences both brand attitude (0.479) and brand loyalty (0.399). Brand attitude, in turn, directly affects brand loyalty with a path coefficient of 0.495. The model suggests that Logo Familiarity plays a significant role in shaping brand attitude and brand loyalty, while logo appropriateness primarily affects brand attitude. The R-squared values indicate that brand attitude is explained by 50.9% and brand loyalty by 81.7% of the variance in the model.

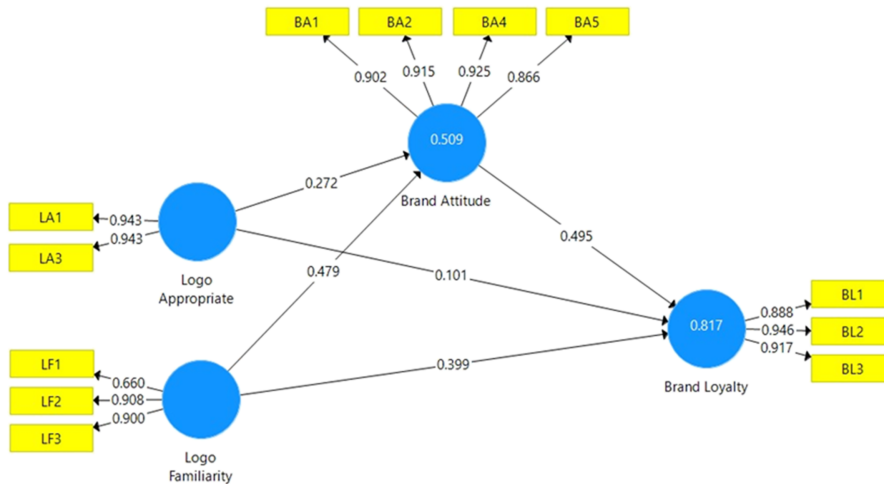
4.3 Structural model and hypothesis testing (PLS-SEM path coefficient – mediation effect)

After applying SEM, the phenomenon was more understood. In Table 6, brand attitude ( $\beta = 0.5$ ) had a positive significant impact on brand loyalty at a 99% confidence level. While logo change ( $\beta = 0.712$ ) had a positive significant impact on brand attitude at a 99% confidence level. In addition, logo appropriate ( $\beta = 0.272$ ) and logo familiarity ( $\beta = 0.479$ ) both had a positive significant impact on brand attitude at 99% confidence level. Moreover, logo change ( $\beta = 0.473$ ) had a positive significant impact on brand loyalty at a 99% confidence level. On the other hand, logo appropriate ( $\beta = 0.101$ ) had an insignificant impact on brand

**Table 5.** Fornell–Larker criterion of discriminant validity analysis

	Brand attitude	Brand loyalty	Logo appropriate	Logo familiarity
Brand attitude	0.907			
Brand loyalty	0.835	0.917		
Logo appropriate	0.654	0.739	0.943	
Logo familiarity	0.689	0.822	0.793	0.830

**Source(s):** Based on calculations using SmartPLS



**Source(s):** Based on calculations using Smart PLS

**Figure 3.** Structural equation modeling

loyalty at the 5% significance level. Furthermore, logo familiarity ( $\beta = 0.399$ ) had a positive significant impact on brand loyalty at a 99% confidence level. This would prove that brand attitude is a significant mediator.

Regarding the mediation effect, brand attitude mediates the relationship between logo change, specifically “logo appropriateness” and “logo familiarity” and brand loyalty at a 99% confidence level. Brand attitude acts as a partial mediator in the relationship between both logo change and brand loyalty and logo familiarity and brand loyalty. However, it serves as a complete mediator in the relationship between logo appropriateness and brand loyalty.

The previous results show that logo change has a significant positive impact on both brand attitude ( $\beta = 0.712$ ) and brand loyalty ( $\beta = 0.473$ ) at a 99% confidence level. This suggests that changing a logo can influence how consumers perceive and interact with a brand. While logo appropriateness significantly impacts brand attitude ( $\beta = 0.272$ ), it does not significantly impact brand loyalty ( $\beta = 0.101$ ) at a 5% significance level. This indicates that while an appropriate logo can shape attitudes toward a brand, it may not directly influence loyalty.

As for logo familiarity, results show that it significantly impacts both brand attitude ( $\beta = 0.479$ ) and brand loyalty ( $\beta = 0.399$ ) at a 99% confidence level. This suggests that familiar logos can positively influence both how consumers perceive a brand and their loyalty toward it. Brand attitude also shows a significant impact on brand loyalty ( $\beta = 0.5$ ) and mediates the relationship between logo change, logo appropriateness, logo familiarity and brand loyalty at a 99% confidence level. This indicates that brand attitude plays a crucial role in determining brand loyalty.

**Table 6.** Path coefficients of the model

	Original sample	Sample mean	Standard deviation	T statistics	P values
Brand attitude > Brand loyalty	0.500	0.497	0.053	9.407	0.000
Logo change > Brand attitude	0.712	0.712	0.047	15.306	0.000
Logo appropriate > Brand attitude	0.272	0.274	0.064	4.274	0.000
Logo familiarity > Brand attitude	0.479	0.478	0.062	7.71	0.000
Logo change > Brand loyalty	0.473	0.475	0.052	9.052	0.000
Logo appropriate > Brand loyalty	0.101	0.106	0.06	1.685	0.093
Logo familiarity > Brand loyalty	0.399	0.399	0.055	7.276	0.000
Mediating effects					
Logo change > Brand attitude > Brand loyalty	0.354	0.355	0.038	9.359	0.000
Logo appropriate > Brand attitude > Brand loyalty	0.143	0.143	0.036	3.967	0.000
Logo familiarity > Brand attitude > Brand loyalty	0.227	0.231	0.042	5.383	0.000

**Note(s):** \*\*\*  $p$ -value < 0.01, \*\*  $p$ -value < 0.05, \*  $p$ -value > 0.05  
**Source(s):** Based on calculations using SmartPLS

#### 4.4 Model goodness of fit

As in Table 7, model 1 accounted for 80.8% of the variation in data based on brand loyalty, brand attitude and logo change. While model 2 shows 81.4% variation explained by logo familiarity, logo appropriate, brand attitude and brand loyalty. Additionally, in accordance with the criteria by Hair *et al.* (2017), the goodness-of-fit indices (Q2, normed fit index [NFI] and standardized root mean square residual [SRMR]) indicated a favorable fit of the models 1 and 2 to the data. The Q2 is greater than zero. The model shows a good fit of data. The lower the SRMR shows the low value for residuals since it is close to zero. The NFI should be greater than 0.8 to show how the model is a good fit. The following is a detailed explanation of the two models:

- (1) Model 1: This model accounted for 80.8% of the variation in data based on brand loyalty, brand attitude and logo change. The goodness-of-fit indices for this model are within acceptable ranges (SRMR = 0.058, NFI = 0.864), indicating a good fit. The SRMR value is close to zero, suggesting low residuals, and the NFI value is greater than 0.8, which is generally considered a good fit.
- (2) Model 2: This model explained 81.4% of the variation based on logo familiarity, logo appropriateness, brand attitude and brand loyalty. The goodness-of-fit indices for this model (SRMR = 0.060, NFI = 0.843) also indicate a good fit. The SRMR value is close to zero, indicating low residuals and the NFI value is greater than 0.8, suggesting a good fit.

**Table 7.** Model evaluation metrics

	SSO	SSE	Q <sup>2</sup>	R square	R square adjusted
Model 1	807.000	262.771	0.674	0.810	0.808
Model 2	807.000	258.279	0.680	0.817	0.814

**Note(s):** 1: SRMR = 0.058, d\_ULS = 0.306, d\_G = 0.312, Chi-Square = 488.023, NFI = 0.864  
2: SRMR = 0.060, d\_ULS = 0.327, d\_G = 0.36, Chi-Square = 563.850 and NFI = 0.843  
**Source(s):** Based on calculations using SmartPLS

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In accordance with the criteria by [Hair et al. \(2017\)](#), these results suggest that both models exhibit a robust fit and explain a substantial portion of the variance in the variables. This indicates that models are well-specified and that the relationships between the variables in the two models are well captured. To sum up, the findings of the study revealed the proposed model exhibited a robust fit and explained a substantial portion of the variance in the variables.

- (1) As for logo change and brand loyalty: The positive significant impact of logo change on brand loyalty ( $\beta = 0.473$ ) suggests that a change in logo can potentially enhance brand loyalty. This indicates that when a brand changes its logo, it can lead to increased loyalty among consumers, especially if the new logo is perceived as more appropriate or familiar.
- (2) As for logo change and brand attitude: The positive significant impact of logo change on brand attitude ( $\beta = 0.712$ ) implies that a change in logo can positively influence consumers' attitudes toward the brand. This suggests that a well-executed logo change, which includes elements of appropriateness and familiarity, can improve consumers' overall perception of the brand.
- (3) As for the role of brand attitude as a mediator: The findings indicate that both the link between logo familiarity and brand loyalty and the relationship between logo change and brand loyalty are significantly mediated by brand attitude. This implies that consumer sentiments toward the brand have a major impact on the impact of logo changes and logo familiarity on brand loyalty. Nonetheless, brand attitude entirely mediates the link between logo appropriateness and brand loyalty, suggesting that brand attitude fully explains the influence of logo appropriateness on brand loyalty.
- (4) As for logo appropriateness and familiarity: Only logo familiarity has a major impact on brand loyalty, despite the fact that both appropriateness and familiarity have a favorable significant impact on brand attitude. This implies that although a suitable logo can shape opinions about a company, it might not have a direct impact on customer loyalty unless the logo is also well-known to them.

## 5. Discussion

This study highlights the significant impact of logo redesigns on brand attitude and brand loyalty, showing that logo changes can strengthen or weaken consumer relationships. The analysis reveals a strong positive influence of logo change on brand attitude ( $\beta = 0.712$ ,  $p < 0.01$ ), confirming that a well-executed redesign enhances consumer perceptions. Additionally, brand attitude significantly influences brand loyalty ( $\beta = 0.500$ ,  $p < 0.01$ ), emphasizing that consumers' emotional and cognitive evaluations are key predictors of loyalty.

Interestingly, while logo appropriateness influences brand attitude ( $\beta = 0.272$ ,  $p < 0.01$ ), it does not directly affect brand loyalty ( $\beta = 0.101$ ,  $p > 0.05$ ). This suggests that although an appropriate logo fosters positive attitudes, it alone is insufficient to guarantee loyalty without additional factors, such as familiarity. In contrast, logo familiarity has a significant effect on both brand attitude ( $\beta = 0.479$ ,  $p < 0.01$ ) and brand loyalty ( $\beta = 0.399$ ,  $p < 0.01$ ), indicating that consumers prefer logos they recognize, which helps retain their loyalty. This aligns with familiarity theory, which asserts that consumers favor brands that offer continuity and reduce uncertainty ([Bettman and Sujun, 1987](#)).

Brand attitude also serves as a mediator, bridging the relationship between logo change and brand loyalty (indirect effect  $\beta = 0.354$ ,  $p < 0.01$ ). Notably, this mediation is stronger when logo familiarity is high, highlighting the importance of familiar logos in reinforcing both positive attitudes and loyalty (indirect effect of familiarity on loyalty through brand attitude:

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$\beta = 0.227, p < 0.01$ ). Managing consumer perceptions during rebranding is therefore crucial to ensuring favorable attitudes, which in turn enhance loyalty.

All hypotheses (H1, H1a, H1b, H2, H2a, H2b, H3, H4, H4a and H4b) are supported, confirming the relationships between logo change, brand attitude, and loyalty. The insignificance of logo appropriateness on loyalty challenges prior assumptions, suggesting that appropriateness shapes attitudes but does not guarantee loyalty without familiarity.

These findings are consistent with prior research. For instance, Walsh *et al.* (2010) demonstrated that logo changes affect brand attitude and loyalty, while Shen and Lin (2021) confirmed that strategic logo changes positively influence loyalty, supporting this study's conclusions. The significance of logo familiarity aligns with Morgan *et al.* (2021), who found that familiar logos elicit positive consumer responses. Additionally, Park *et al.* (2013) observed that logos influence attitudes but not always behavior, mirroring this study's finding that appropriateness affects attitudes but not loyalty. Williams *et al.* (2021) also emphasized the importance of brand attitude in rebranding, which is echoed in this study's results.

In conclusion, this study reveals the nuanced relationship between logo change, brand attitude and loyalty. While logo appropriateness shapes attitudes, logo familiarity is essential for maintaining loyalty. Therefore, brand managers should prioritize familiar design elements during logo updates and manage consumer perceptions to foster positive attitudes, ensuring long-term loyalty.

### 5.1 The significance contribution of the study

The research uniquely isolates and examines logo appropriateness and familiarity as distinct variables influencing brand attitude and loyalty, while Pimentel and Heckler (2003) examined the overall impact of drastic logo changes on consumer perceptions and loyalty, noting potential confusion and negative impacts without distinguishing between the two.

Note that this study explicitly explores how logo change affects brand loyalty, focusing on brand attitude as a mediator. It isolates logo appropriateness and familiarity, while Walsh *et al.* (2010) examine how logo redesigns affect brand perceptions and loyalty, focusing on brand commitment as a moderator.

Also, another contribution of the study is that it introduces a cross-cultural comparison as follows:

- (1) From a western context, Walsh *et al.* (2010) predominantly examine consumer reactions in a Western context, which have different consumer behavior patterns compared to non-Western settings. Western consumers might place a higher emphasis on brand history and commitment, leading to initial resistance but eventual acceptance if the new logo aligns with the brand's core values and enhances its relevance. While the current study finds that logo changes significantly enhance brand loyalty, especially when the new logo is perceived as appropriate and familiar. This finding is based on empirical evidence from Egyptian consumers. In the current study, results show that both logo appropriateness and familiarity positively impact brand attitude. However, only familiarity significantly impacts brand loyalty. It can be said that Western consumers may prioritize familiarity and historical consistency in brand logos, reflecting a preference for established and recognizable brand elements.
- (2) In the Asian context, Zahari *et al.* (2021) found that logo appropriateness, aligning the logo design with the brand's image and values, enhances consumer trust and preference. This study highlights the importance of cultural symbols and design elements that resonate with local consumers.

In Asian markets, cultural symbols and traditional design elements often play a crucial role in consumer acceptance of logo changes. Brands that incorporate these elements into their new logos may see higher levels of consumer trust and loyalty, while in the Egyptian market, well-established global brands are dominating the market, and any change in their logos do not take

into consideration the impact of using cultural symbols or traditional designs. Also, in the study of [Barijan et al. \(2021\)](#), the study found that brand familiarity has a positive effect on brand attachment. This suggests that the more familiar consumers are with a brand, the stronger their attachment to the brand, which is similar to the findings of the current study that it is focusing on the Egyptian market.

## 6. Conclusions

As the study focuses on Burger-King logo change, since the logo change has shown a significant positive impact on brand loyalty and attitude, Burger King should capitalize on this by reinforcing the new logo across all marketing channels. This includes in-store branding, online presence, packaging and advertising campaigns, which indeed have been considered by Burger King.

While logo appropriateness alone may not directly influence brand loyalty, it does affect brand attitude. Burger King should ensure that the new logo aligns with customer expectations and the brand's identity. Additionally, maintaining elements of familiarity within the new logo can help retain customer loyalty. Also, it is recommended before making any changes to conduct extensive market research to understand current consumer perceptions and desires related to the brand and its visual identity. The study also suggests involving customers early in the process of logo change through surveys or focus groups to understand their reactions to potential logo designs and ensure that the changes align with their expectations. It is also strongly recommended to maintain elements that reflect Burger King's heritage or any other brand to preserve brand familiarity, which is crucial for maintaining loyalty. Also, monitoring brand attitude post-logo change is crucial to ensure it is positively influencing brand loyalty as this change may hurt the brand and of course will impact customer loyalty in a negative manner.

### 6.1 Theoretical implications

This study makes a significant theoretical contribution to the field of branding by deepening our understanding of how visual brand elements, such as logos, influence consumer behavior, particularly in emerging markets. The research extends existing theory on brand identity and consumer perception by demonstrating the nuanced effects of logo changes on brand attitude and brand loyalty. While prior studies have generally focused on the negative impact of logo changes on loyal consumers ([Walsh et al., 2010](#)), this study highlights that when a logo is perceived as appropriate and familiar, it can positively affect both brand attitude and brand loyalty.

This study shows that brand attitude mediates logo change and brand loyalty. Identifying brand attitude as the psychological mechanism by which customers evaluate logo changes helps explain how visual identity modifications can improve or diminish loyalty. This study strengthens attitude-behavior theory by showing that positive attitudes about a new logo reduce negative reactions and increase long-term loyalty.

The analysis separates logo appropriateness and logo familiarity, advancing rebranding theory. To increase consumer commitment, the logo must match the brand's identity, not just familiarity. This differentiation enhances brand equity and visual identity discussions, especially in culturally varied countries like Egypt.

### 6.2 Practical implications

This study provides useful insights for rebranding brand managers and marketing strategists. First, the research emphasizes logo appropriateness, advising brand managers to design logos that follow current design trends and reflect the firm's values and identity. Ensure the logo matches the brand to boost consumer acceptance, reduce change resistance and boost brand loyalty.

Second, logo familiarity helps retain consumer loyalty after a change. To minimize disruption, organizations should keep important components of the old logo familiar to longtime customers. Maintaining continuity helps preserve trust and mitigates the negative effects of an abrupt visual identity transition.

The study also highlights brand attitude mediation. Marketers must actively control consumer emotions and impressions during rebranding. Companies can foresee loyalty effects and make modifications by testing user reactions to the new design before launch. Phased logo launches and more consumer engagement can improve brand sentiments and ease the transition.

Finally, these findings are especially useful for multinational businesses in culturally varied regions like Egypt. Companies revising logos must consider consumer expectations and resistance to new logos to avoid brand damage. Brand managers must assess the risks of changing logos, such as negative effects on brand image, awareness or switching to competitors, to maintain consumer loyalty in competitive markets.

These research's concrete insights and comprehensive understanding of how logo redesigns affect consumer behavior make them new. This study sheds light on how logo appropriateness and familiarity can boost consumer acceptability and loyalty by matching logos with brand identity. Brand attitude as a mediating factor emphasizes the need for regulating consumer emotions and perceptions during rebranding.

### 6.3 Limitations

This study provides valuable insights into the effects of logo changes on brand loyalty and attitude, but several limitations must be considered. First, the focus on the Egyptian market limits the generalizability of the findings to other cultural or geographic contexts, as consumer responses to logo changes can vary based on cultural and economic conditions. Similar limitations are seen in studies like [Hannelius and Petterson \(2021\)](#) in Sweden and [Alamanda et al. \(2015\)](#) in Jakarta, which were also confined to single markets.

Second, the use of a quantitative methodology, while statistically rigorous, may not capture the full emotional and psychological complexity of consumer reactions to logo changes. A mixed-method approach, including qualitative interviews or focus groups, could offer deeper insights into consumer perceptions.

Third, the study is based on a single case – Burger King's logo change – limiting its applicability to other brands or industries with different dynamics, such as technology or luxury brands. Expanding the research to other sectors would provide a more holistic understanding of how logo changes affect brand loyalty.

Additionally, the use of convenience sampling with 468 Egyptian consumers may introduce sampling bias, potentially limiting the representativeness of the findings. A more randomized sampling method would improve the generalizability of the results.

Finally, while the study recommends ongoing monitoring of consumer responses, it would benefit from real-time, longitudinal studies to assess how brand loyalty and attitude evolve over time. Other variables, such as perceived brand quality, brand commitment or consumer demographics, could also be explored to gain further insights into the effects of logo changes.

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The authors confirm they have no conflict of interests to declare.

A local ethics committee ruled that no formal ethics approval was required in this particular research, they only asked to have a copy of the published report after the research has been completed.

*Consent for publication*

Consent for participant is not applicable.

Authors confirm that all the data and materials are available

Authors confirm that the manuscript is the authors' original work and the manuscript has not received prior publication and is not under consideration for publication elsewhere.

Authors reassure that they have contributed significantly to the work, have read the manuscript, attest to the validity and legitimacy of the data and its interpretation and agree to its submission. Also, authors of this paper confirm that the paper is not copied or plagiarized version of some other published work.

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*Availability of data and materials*

The authors declare they have full access to all study data, take fully responsibility for the accuracy of the data analysis and have authority over manuscript preparation and decisions to submit the manuscript for publication.

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Y.T. has scrutinized the literature and formulated the research gap. In addition, he wrote down the literature review. A.M. formulated the methodical framework of this study to achieve the desired objectives. She selected the sample size from the available population, and has designed, together with A.M. the data collection instrument and suggested the method of data analysis. H.H. has presented the discussion of results. The discussion of different collected data presented in the results. A.M. contributed to this research by collaborating with H.H. and Y.T. in the design of the data collection instruments.

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## References

- Aaker, D.A. (1995), *Strategic Market Management*, 4th ed., Wiley, New York.
- Aaker, D.A. (2004), "Leveraging the corporate brand", *California Management Review*, Vol. 46 No. 3, pp. 6-18, doi: [10.2307/41166218](https://doi.org/10.2307/41166218).
- Aaker, D.A. (2009), *Managing Brand Equity: Capitalizing on the Value of a Brand Name*, Simon and Schuster, New York.
- Adams, S. (2008), *Masters of Design: Logos and Identity: A Collection of the Most Inspiring Logo Designers in the World*, Rockport Publishers.
- Alamanda, D.T., Aprillia, D. and Prasetyo, A.P. (2015), "The effect of the new logo and brand image towards the customer loyalty of Starbucks, Jakarta", *Proceedings of the 2nd International Conference on Innovation on Global Trends in Academic Research (GTAR 2015)*, Bandung, Indonesia, Vol. 1.

- 
- Alba, J.W. and Hutchinson, J.W. (1987), "Dimensions of consumer expertise", *Journal of Consumer Research*, Vol. 13 No. 4, pp. 411-454, doi: [10.1086/209080](https://doi.org/10.1086/209080).
- Alzaydi, Z. (2024), "Examining the mediating effect of multi-channel integration quality in the relationship with service quality, customer satisfaction and customer loyalty in the Saudi banking sector", *Management and Sustainability: An Arab Review*, Vol. 3 No. 2, pp. 132-149, doi: [10.1108/MSAR-12-2022-0061](https://doi.org/10.1108/MSAR-12-2022-0061).
- Ariffin, S., Yusof, J.M., Putit, L. and Shah, M.I.A. (2016), "Factors influencing perceived quality and repurchase intention towards green products", *Procedia Economics and Finance*, Vol. 37, pp. 391-396, doi: [10.1016/s2212-5671\(16\)30142-3](https://doi.org/10.1016/s2212-5671(16)30142-3).
- Bandalos, D.L. and Finney, S.J. (2018), "Factor analysis: exploratory and confirmatory", in *The Reviewer's Guide to Quantitative Methods in the Social Sciences*, Routledge, pp. 98-122.
- Banerjee, S. (2008), "Logo change: little image touch up or serious overhaul! Imperatives and scanning parameters", *Journal of Marketing and Communication*, Vol. 4 No. 1, pp. 59-70.
- Barijan, D., Ariningsih, E.P. and Rahmawati, F. (2021), "The influence of brand trust, brand familiarity, and brand experience on brand attachments", *Journal of Digital Marketing and Halal Industry*, Vol. 3 No. 1, pp. 73-84.
- Bastami, N., Mira, S.A. and Afzali, M.G.K. (2015), "Structural equation modeling of brand logo indicators and its impact on the loyalty of consumer", *Cumhuriyet Üniversitesi Fen Edebiyat Fakültesi Fen Bilimleri Dergisi*, Vol. 36 No. 3, pp. 3765-3772.
- Bettman, J.R. and Sujan, M. (1987), "Effects of framing on evaluation of comparable and noncomparable alternatives by expert and novice consumers", *Journal of Consumer Research*, Vol. 14 No. 2, pp. 141-154, doi: [10.1086/209102](https://doi.org/10.1086/209102).
- Blackwell, R.D., Miniard, P.W. and Engel, J.F. (2006), *Consumer Behavior*, Vol. 10, Thomson South-Western Mason, OH.
- Bolhuis, W., De Jong, M.D. and Van Den Bosch, A.L. (2018), "Corporate rebranding: effects of corporate visual identity changes on employees and consumers", *Journal of Marketing Communications*, Vol. 24 No. 1, pp. 3-16, doi: [10.1080/13527266.2015.1067244](https://doi.org/10.1080/13527266.2015.1067244).
- Bottomley, P.A. and Doyle, J.R. (2006), "The interactive effects of colors and products on perceptions of brand logo appropriateness", *Marketing Theory*, Vol. 6 No. 1, pp. 63-83, doi: [10.1177/1470593106061263](https://doi.org/10.1177/1470593106061263).
- Brown, J.W. and Churchill, R.V. (2009), *Complex Variables and Applications*, McGraw-Hill, New York.
- Campbell, M.C. and Keller, K.L. (2003), "Brand familiarity and advertising repetition effects", *Journal of Consumer Research*, Vol. 30 No. 2, pp. 292-304, doi: [10.1086/376800](https://doi.org/10.1086/376800).
- Chadwick, S. and Walters, G. (2009), "Sportswear identification, distinctive design and manufacturer logos—issues from the front line", *The Marketing Review*, Vol. 9 No. 1, pp. 63-78, doi: [10.1362/146934709x414332](https://doi.org/10.1362/146934709x414332).
- Chaudhuri, A. and 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*, Vol. 65 No. 2, pp. 81-93, doi: [10.1509/jmkg.65.2.81.18255](https://doi.org/10.1509/jmkg.65.2.81.18255).
- Chiu, C.M., Chang, C.C., Cheng, H.L. and Fang, Y.H. (2009), "Determinants of customer repurchase intention in online shopping", *Online Information Review*, Vol. 33 No. 4, pp. 761-784, doi: [10.1108/14684520910985710](https://doi.org/10.1108/14684520910985710).
- Doyle, J.R. and Bottomley, P.A. (2004), "Font appropriateness and brand choice", *Journal of Business Research*, Vol. 57 No. 8, pp. 873-880, doi: [10.1016/s0148-2963\(02\)00487-3](https://doi.org/10.1016/s0148-2963(02)00487-3).
- Ebrahim, R., Ghoneim, A., Irani, Z. and Fan, Y. (2016), "A brand preference and repurchase intention model: the role of consumer experience", *Journal of Marketing Management*, Vol. 32 Nos 13-14, pp. 1230-1259, doi: [10.1080/0267257x.2016.1150322](https://doi.org/10.1080/0267257x.2016.1150322).
- Fazio, R.H. (1986), "How do attitudes guide behavior", in *Handbook of Motivation and Cognition: Fountains of Social Behavior/Lawrence Erlbaum Associates*.

- Fornell, C. and Wernerfelt, B. (1988), "A model for customer complaint management", *Marketing Science*, Vol. 7 No. 3, pp. 287-298, doi: [10.1287/mksc.7.3.287](https://doi.org/10.1287/mksc.7.3.287).
- Foroudi, P., Melewar, T.C. and Gupta, S. (2014), "Linking corporate logo, corporate image, and reputation: an examination of consumer perceptions in the financial setting", *Journal of Business Research*, Vol. 67 No. 11, pp. 2269-2281, doi: [10.1016/j.jbusres.2014.06.015](https://doi.org/10.1016/j.jbusres.2014.06.015).
- Frascara, J. (1988), "Graphic design: fine art or social science?", *Design Issues*, Vol. 5 No. 1, pp. 18-29, doi: [10.2307/1511556](https://doi.org/10.2307/1511556).
- Haig, W.L. and Harper, L. (1997), *How to Create Effective Company Logos*, Van Nostrand Reinhold, New York.
- Hair Jr, J.F., Matthews, L.M., Matthews, R.L. and Sarstedt, M. (2017), "PLS-SEM or CB-SEM: updated guidelines on which method to use", *International Journal of Multivariate Data Analysis*, Vol. 1 No. 2, pp. 107-123, doi: [10.1504/ijmda.2017.10008574](https://doi.org/10.1504/ijmda.2017.10008574).
- Haley, R.I. and Case, P.B. (1979), "Testing thirteen attitude scales for agreement and brand discrimination", *Journal of Marketing*, Vol. 43 No. 4, pp. 20-32, doi: [10.1177/002224297904300403](https://doi.org/10.1177/002224297904300403).
- Hannelius, J. and Pettersson, J. (2021), "Rebranding of stereotypical food brands – how Nordic consumers perceive the product rebranding and its impact on brand equity", Master's thesis, International Marketing, Jönköping University.
- Hem, L.E. and Iversen, N.M. (2004), "How to develop a destination brand logo: a qualitative and quantitative approach", *Scandinavian Journal of Hospitality and Tourism*, Vol. 4 No. 2, pp. 83-106, doi: [10.1080/15022250410003852](https://doi.org/10.1080/15022250410003852).
- Hirschman, E.C. (1986), "The effect of verbal and pictorial advertising stimuli on aesthetic, utilitarian and familiarity perceptions", *Journal of Advertising*, Vol. 15 No. 2, pp. 27-34, doi: [10.1080/00913367.1986.10673002](https://doi.org/10.1080/00913367.1986.10673002).
- Ismail, E., Elsharnouby, M.H. and Abd Elaal, M.H. (2024), "Enhancing purchasing stock intention in investor-brands interaction: the moderated mediation role of sector knowledge", *Management and Sustainability: An Arab Review*, Vol. 3 No. 1, pp. 43-68, doi: [10.1108/MSAR-05-2023-0026](https://doi.org/10.1108/MSAR-05-2023-0026).
- Jiang, Y., Gorn, G.J., Galli, M. and Chattopadhyay, A. (2016), "Does your company have the right logo? How and why circular-and angular-logo shapes influence brand attribute judgments", *Journal of Consumer Research*, Vol. 42 No. 5, pp. 709-726, doi: [10.1093/jcr/ucv049](https://doi.org/10.1093/jcr/ucv049).
- Kapferer, J.N., (2008), *The New Strategic Brand Management: Creating and Sustaining Brand Equity Long Term*, 4th ed., Kogan Page, London and Philadelphia.
- Kelly, M. (2017), "Analysing the complex relationship between logo and brand", *Place branding and public diplomacy*, Vol. 13 No. 1, pp. 18-33, doi: [10.1057/pb.2016.3](https://doi.org/10.1057/pb.2016.3).
- Kent, R.J. and Allen, C.T. (1994), "Competitive interference effects in consumer memory for advertising: the role of brand familiarity", *Journal of Marketing*, Vol. 58 No. 3, pp. 97-105, doi: [10.1177/002224299405800307](https://doi.org/10.1177/002224299405800307).
- Khashan, M.A., Elsouhuy, M.M., Aziz, M.A., Alasker, T.H. and Ghonim, M.A. (2023), "Mediating customer engagement in the relationship between fast-food restaurants' innovativeness and brand evangelism during COVID-19: evidence from emergent markets", *International Journal of Contemporary Hospitality Management*, Vol. 35 No. 10, pp. 1-22.
- Kohli, C. and Suri, R. (2002), "Creating effective logos: insights from theory and practice", *Business Horizons*, Vol. 45 No. 3, pp. 58-64, doi: [10.1016/s0007-6813\(02\)00203-3](https://doi.org/10.1016/s0007-6813(02)00203-3).
- Lane Keller, K. (2013), *Strategic Brand Management: Building, Measuring, and Managing Brand Equity*, Pearson Education, UK.
- Mahmoud, A.H., Mohamed, N.M. and El-wardany, S.A. (2021), "Knowledge and attitudes of students toward fast food in Assiut university", *Assiut Scientific Nursing Journal*, Vol. 9 No. 24, pp. 66-75.
- Melewar, T.C. and Saunders, J. (1998), "Global corporate visual identity systems: standardization, control and benefits", *International Marketing Review*, Vol. 15 No. 4, pp. 291-308, doi: [10.1108/02651339810227560](https://doi.org/10.1108/02651339810227560).

- 
- Mohamed, R. (2024), "Studying the moderating effect of consumers' demographics on the relationship between green marketing strategies and perception of climate change: a field study on fast food restaurants in Egypt", *MSA-Management Sciences Journal*, Vol. 3, pp. 41-93.
- Molenaar, J. (2015), "Brand logo modifications: adhering to traditionalism, or pursuing modernity?", (Master's thesis, University of Twente), available at: <http://purl.utwente.nl/essays/67370>
- Morgan, C., Fajardo, T.M. and Townsend, C. (2021), "Show it or say it: how brand familiarity influences the effectiveness of image-based versus text-based logos", *Journal of the Academy of Marketing Science*, Vol. 49 No. 3, pp. 566-583, doi: [10.1007/s11747-020-00760-0](https://doi.org/10.1007/s11747-020-00760-0).
- Müller, B., Kocher, B. and Crettaz, A. (2013), "The effects of visual rejuvenation through brand logos", *Journal of Business Research*, Vol. 66 No. 1, pp. 82-88, doi: [10.1016/j.jbusres.2011.07.026](https://doi.org/10.1016/j.jbusres.2011.07.026).
- Muzellec, L. and Lambkin, M. (2006), "Corporate rebranding: destroying, transferring or creating brand equity?", *European Journal of Marketing*, Vol. 40 Nos 7/8, pp. 803-824, doi: [10.1108/03090560610670007](https://doi.org/10.1108/03090560610670007).
- Muzellec, L., Doogan, M. and Lambkin, M. (2003), "Corporate rebranding-an exploratory review", *Irish Marketing Review*, Vol. 16, pp. 31-40.
- Odin, Y., Odin, N. and Valette-Florence, P. (2001), "Conceptual and operational aspects of brand loyalty: an empirical investigation", *Journal of Business Research*, Vol. 53 No. 2, pp. 75-84, doi: [10.1016/s0148-2963\(99\)00076-4](https://doi.org/10.1016/s0148-2963(99)00076-4).
- Oliver, R.L. (2014), *Satisfaction: A Behavioral Perspective on the Consumer: A Behavioral Perspective on the Consumer*, Routledge, New York.
- Park, C.W., Eisingerich, A.B., Pol, G. and Park, J.W. (2013), "The role of brand logos in firm performance", *Journal of Business Research*, Vol. 66 No. 2, pp. 180-187.
- Pauwels-Delassus, V. and Mogos Descotes, R. (2013), "Brand name change: can trust and loyalty be transferred?", *Journal of Brand Management*, Vol. 20 No. 8, pp. 656-669, doi: [10.1057/bm.2013.7](https://doi.org/10.1057/bm.2013.7).
- Pettersson, J. and Hannelius, J. (2021), "Rebranding of stereotypical food brands: how nordic consumers perceive the product rebranding and its impact on brand equity", Mater Thesis, JÖNKÖPING University.
- Pimentel, R.W. and Heckler, S.E. (2003), "Changes in logo designs: chasing the elusive butterfly curve", *Persuasive Imagery*, pp. 105-127.
- Purwanto, A. and Sudargini, Y. (2021), "Partial least squares structural equation modeling (PLS-SEM) analysis for social and management research: a literature review", *Journal of Industrial Engineering and Management Research*, Vol. 2 No. 4, pp. 114-123.
- Rafiq, M.R., Rai, I.H. and Hussain, S. (2020), "The impact of logo shapes redesign on brand loyalty and repurchase intentions through brand attitude", *International Review of Management and Marketing*, Vol. 10 No. 5, p. 117.
- Rajumesh, S. (2014), "The impact of consumer experience on brand loyalty: the mediating role of brand attitude", *International Journal of Management and Social Sciences Research (IJMSSR)*, Vol. 3 No. 1, pp. 73-79.
- Reichheld, F.F. and Sasser, W.E., Jr (1990), "Zero defections: quality comes to services", *Harvard Business Review*, Vol. 68 No. 5, pp. 105-111.
- Reichheld, F.F. and Teal, T. (1996), *The Loyalty Effect: The Hidden Force behind Growth, Profits and Lasting*, Harvard Business School Publications, Boston.
- Rosson, P. and Brooks, M.R. (2004), "M&s and corporate visual identity: an exploratory study", *Corporate Reputation Review*, Vol. 7 No. 2, pp. 181-194, doi: [10.1057/palgrave.crr.1540219](https://doi.org/10.1057/palgrave.crr.1540219).
- Saad, S., Fali, M., Isa, N., Salahuddin, N. and Annual, A. (2017), "An empirical study on brand image factors that influence students' behavior", *International Journal of Economic Research*, Vol. 14 No. 19, pp. 43-59.
- Salehzadeh, R. and Pool, J.K. (2017), "Brand attitude and perceived value and purchase intention toward global luxury brands", *Journal of International Consumer Marketing*, Vol. 29 No. 2, pp. 74-82, doi: [10.1080/08961530.2016.1236311](https://doi.org/10.1080/08961530.2016.1236311).

- Saydan, R. and Dülek, B. (2019), "The impact of social media advertisement awareness on brand awareness, brand image, brand attitude and brand loyalty: a research on university students", *International Journal of Contemporary Economics and Administrative Sciences*, Vol. 9 No. 2, pp. 470-494, doi: [10.5281/zenodo.3596116](https://doi.org/10.5281/zenodo.3596116).
- Sayed, M.S. (2023), "The impact of sensory marketing on managing a sustainable fast-food business in Egypt", *International Journal of Tourism, Archaeology, and Hospitality*, Vol. 3 No. 1, pp. 161-174, doi: [10.21608/ijtah.2023.189052.1068](https://doi.org/10.21608/ijtah.2023.189052.1068).
- Séraphin, H., Ambaye, M., Gowreesunkar, V. and Bonnardel, V. (2016), "A marketing research tool for destination marketing organizations' logo design", *Journal of Business Research*, Vol. 69 No. 11, pp. 5022-5027, doi: [10.1016/j.jbusres.2016.04.074](https://doi.org/10.1016/j.jbusres.2016.04.074).
- Shen, H.H. and Lin, C.H. (2021), "Evaluation for rebranding: the impact of logo change on brand attitude and brand loyalty", *Journal of Management Marketing and Logistics*, Vol. 8 No. 1, pp. 17-33, doi: [10.17261/Pressacademia.2021.1384](https://doi.org/10.17261/Pressacademia.2021.1384).
- Shrestha, N. (2021), "Factor analysis as a tool for survey analysis", *American Journal of Applied Mathematics and Statistics*, Vol. 9 No. 1, pp. 4-11, doi: [10.12691/ajams-9-1-2](https://doi.org/10.12691/ajams-9-1-2).
- Tyagi, S.K., Sharma, S.K. and Gaur, A. (2022), "Determinants of continuous usage of library resources on handheld devices: findings from PLS-SEM and fuzzy sets (fsQCA)", *The Electronic Library*, Vol. 40 No. 4, pp. 393-412, doi: [10.1108/el-02-2022-0026](https://doi.org/10.1108/el-02-2022-0026).
- Walsh, M.F., Page Winterich, K. and Mittal, V. (2010), "Do logo redesigns help or hurt your brand? The role of brand commitment", *The Journal of Product and Brand Management*, Vol. 19 No. 2, pp. 76-84, doi: [10.1108/10610421011033421](https://doi.org/10.1108/10610421011033421).
- Williams, A.S. and Son, S. (2022), "Sport rebranding: the effect of different degrees of sport logo redesign on brand attitude and purchase intention", *International Journal of Sports Marketing and Sponsorship*, Vol. 23 No. 1, pp. 155-172, doi: [10.1108/IJSMS-01-2021-0016](https://doi.org/10.1108/IJSMS-01-2021-0016).
- Williams, A.S., Son, S., Walsh, P. and Park, J. (2021), "The influence of logo change on brand loyalty and the role of attitude toward rebranding and logo evaluation", *Sport Marketing Quarterly*, Vol. 30 No. 1, pp. 69-81, doi: [10.32731/SMQ.291.032021.06](https://doi.org/10.32731/SMQ.291.032021.06).
- Yoo, B., Donthu, N. and Lee, S. (2000), "An examination of selected marketing mix elements and brand equity", *Journal of the Academy of Marketing Science*, Vol. 28 No. 2, pp. 195-211, doi: [10.1177/0092070300282002](https://doi.org/10.1177/0092070300282002).
- Zahari, A.R., Esa, E. and Azizan, N.A. (2021), "Logo design characteristics of the top 50 most valuable ASEAN brands: an empirical study of pre-and post-Coronavirus impact", *Global Business and Management Research*, Vol. 13.
- Zeithaml, V.A., Berry, L.L. and Parasuraman, A. (1996), "The behavioral consequences of service quality", *Journal of Marketing*, Vol. 60 No. 2, pp. 31-46, doi: [10.2307/1251929](https://doi.org/10.2307/1251929).

### Further reading

- Byun, G.I., Kim, J. and Kim, G.J. (2013), "A study on the influence of price discount policy in brand coffee shops on perceived value, brand attitude, and repurchase intention", *Culinary science and hospitality research*, Vol. 19 No. 3, pp. 274-290.
- Collange, V. (2008), "The impact of brand name substitution on product evaluation and purchase intention", *Recherche et Applications en Marketing*, Vol. 23 No. 2, pp. 1-18, doi: [10.1177/205157070802300201](https://doi.org/10.1177/205157070802300201).
- Kaikati, J.G. and Kaikati, A.M. (2004), "Identity Crisis the dos and don'ts of brand rechristening", *Marketing Management*, Vol. 13 No. 1, pp. 45-49.
- Keller, K.L. (1999), "Managing brands for the long run: brand reinforcement and revitalization strategies", *California Management Review*, Vol. 41 No. 3, pp. 102-124, doi: [10.2307/41165999](https://doi.org/10.2307/41165999).
- Lehu, J.M. (2004), "Back to life! Why brands grow old and sometimes die and what managers then do: an exploratory qualitative research put into the French context", *Journal of Marketing Communications*, Vol. 10 No. 2, pp. 133-152, doi: [10.1080/13527260410001693811](https://doi.org/10.1080/13527260410001693811).

- Meisenzahl, M. (2021), *Burger King Is Changing its Logo after 20 Years in a Massive Rebrand-See what the New Packaging and Employee Uniforms Will Look like*, Business Insider, available at: <https://www.businessinsider.com/burger-king-redesigned-logo-and-signs-with-whopper-2021-1>
- Melewar, T.C. and Akel, S. (2005), "The role of corporate identity in the higher education sector: a case study", *Corporate Communications: An International Journal*, Vol. 10 No. 1, pp. 41-57, doi: [10.1108/13563280510578196](https://doi.org/10.1108/13563280510578196).
- Rafiq, M.R., Rai, I.H. and Hussain, S. (2020), "The impact of logo shapes redesign on brand loyalty and repurchase intentions through brand attitude", *International Review of Management and Marketing*, Vol. 10 No. 5, pp. 117-126, doi: [10.32479/irmm.10308](https://doi.org/10.32479/irmm.10308).
- Shah, S.S.H., Aziz, J., Jaffari, A.R., Waris, S., Ejaz, W., Fatima, M. and Sherazi, S.K. (2012), "The impact of brands on consumer purchase intentions", *Asian Journal of Business Management*, Vol. 4 No. 2, pp. 105-110.
- van Riel, C.B. and van Hasselt, J.J. (2002), "Conversion of organizational identity research findings into actions", in *Corporate and Organizational Identities*, Routledge, pp. 176-194.

## Appendixes

**Table A1.** Variables, measurement questions and reference sources of variables

Variable	Measurement	Source
Logo appropriateness	- The new logo is more suitable for [brand name] than the old one	- Doyle and Bottomley (2004)
	- In general, the brand image of [brand name] is highly suitable for its logo design	- Doyle and Bottomley (2004)
	- The new [brand name] logo is appropriate	- Bottomley and Doyle (2006)
Logo familiarity	- I'm familiar with both the old and new logos of [brand name]	- Foroudi <i>et al.</i> (2014)
	- I'm acclimated to the new logo of [brand name]	- Hirschman (1986)
	- I know the new logo of [brand name]	- Foroudi <i>et al.</i> (2014)
Brand loyalty	- The new logo makes me more loyal to [brand name]	- Yoo <i>et al.</i> (2000)
	- During my next purchase, I will buy the products with [brand name] new logo	- Zeithaml <i>et al.</i> (1996)
	- The new logo makes me more willing to choose [brand name]	- Odin <i>et al.</i> (2001)
Brand attitude	- I think it's a brand which offers good performance products	- Chiu <i>et al.</i> (2009)
	- I think it's a brand that suits me	
	- It is a brand that I can rely on	
	- I think it's a brand with a good image	
	- I consider this is a brand with a strong value for money	



**Figure A1.** Burger King logo

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