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Unraveling corporate brand equity: a measurement model based on consumer perception of corporate brands

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Abstract

Purpose: Consumer perception of corporate brand equity has primarily focused on product brand dimensions, neglecting considerations at the firm analysis level. Assessing corporate brands requires different criteria relevant to the competitiveness of companies, such as their prominence, management, and meeting society's demands. In this sense, this study aims to develop and validate a scale of corporate brand equity founded on consumer perceptions, transcending industry boundaries, and comparing its relationship with the market share of companies.

Design/methodology/approach: The authors used an integrative approach to clarify the construct's domain, building on previous measures. They took several steps to select appropriate items, refine the measure, validate it through reliability tests, convergent and discriminant analyses, test the validity of the second-order formative structure of corporate brand equity, and assess associations between first-order factors, the second-order factor, and market share.

Results: The model identifies three first-order dimensions of corporate brands (Presence, Outstanding management, and Responsible) that shape the second-order factor (corporate brand equity). They are directly related, but not proportionally, to market share,

contributing to the general and joint assessment of the company's competitive performance considering the consumer.
Originality: To the best of the authors' knowledge, this study is the first attempt to develop a comprehensive measurement model of corporate brand equity that considers the firm level of analysis, combines metrics from previous research on corporate brand evaluation criteria, and includes consumer perceptions of the company's competitiveness, unifying branding theory with the theory of the marketing firm.

Keywords: marketing; corporate brand equity; scale development; market share; informational reinforcement.

Introduction

Corporate brands assume a critical role in the contemporary marketing landscape, serving distinct purposes for consumers compared to product brands. While consumers typically engage in transient interactions with product or service brands, corporate brands play a multifaceted role, acting as vehicles for conveying a company's general image and fostering its competitive edge (Abratt and Mingione, 2022; Balmer and Greyser, 2003). These corporate brands are perceived from a different level of analysis, potentially seen as an overarching umbrella encompassing a product portfolio, reflecting consumers' general perceptions of the offerings, or evaluated as independent entities capable of being assessed based on management practices and alignment with societal expectations (Anisimova, 2013; Biedenbach, 2012; Hsu, 2011).

The concept of Corporate Brand Equity (CBE), as posited by Keller (2000), serves as a central tenet in understanding the theoretical scope of branding literature for companies. CBE entails the cumulative outcomes of various actions taken under the corporate brand. This notion embodies a differential response from consumers in reaction to corporate brands' conveyed actions and information (Keller, 2000; Ormeño, 2007). Subsuming a set of behavioral reactions, CBE entails a trajectory beginning with the recognition of the company's brand and its potential associations with its image, subsequently leading to evaluations encompassing various facets, such as management effectiveness, reputation, and the social and environmental implications on consumers (Keller, 2020; Keller and Lehmann, 2006).

Within this context, consumer-based corporate brand equity refers to how consumers perceive a company's overall performance in both the marketplace and society. These evaluations serve as fundamental sources of feedback regarding the organizational brand's alignment with consumer expectations (Foxall, 1992; Marín, 1980). Consequently, consumer-based assessments of CBE emerge as informational reinforcements, imbuing the company with a sense of purpose and impelling it towards strategic endeavors (Foxall, 2021). Importantly, it encompasses the intricate relationships between firm actions and outcomes, calibrated to fulfill consumers' desired criteria and thresholds (Foxall *et al.*, 2021). As such, CBE offers a complementary dimension to traditional performance metrics employed for corporate brands, transcending measures such as sales competitiveness - market share (Edeling and Himme, 2018) - to encompass consumer acceptance of the firm's actions and their ultimate impact.

Advancements in CBE measurement models have made significant strides, albeit encountering critical gaps and limitations. CBE investigations often exhibit a unidimensional focus, primarily centered around corporate brand awareness or, when multidimensional, focus on product and service brand equity (Chang *et al.*, 2015; Hsu, 2011; Hur *et al.*, 2014). Nevertheless, the multifaceted nature of CBE calls for a broader understanding involving its association with socially perceived company performance, prestige, symbolism for consumers, innovation attributes, and the manifestation of sound financial health justifying corporate existence (Mann and Guhman, 2015; Sarkar and Bhattacharjee, 2017; Walsh *et al.*, 2009). Additionally, scholars have highlighted the significance of certain corporate brands, deemed more valuable by consumers due to their representations of social or environmental responsibilities (Hur *et al.*, 2014; Keller, 2020; Mann and Guhman, 2015).

A significant challenge is consolidating all the CBE criteria that authors have justified with theoretical support that can fully encompass them. In the current state of the art, when considering the different forms of CBE, studies use different measures to capture it among consumers, needing a theoretical structure capable of explaining how and why they can come together. Despite having paths already taken in constructing a CBE scale, some limitations must be overcome. Studies generally (1) use measures and dimensions of products/services brand equity extrapolating to the corporate level, not making distinctions between different levels of analysis since they have different natures and purposes, (2) use only one dimension when considered at the corporate level, (3) apply to only large company brands, disregarding small or local company brands that are part of the competitive arena, (4) use measures of reputation and corporate social responsibility as predictors of CBE, disregarding that the equity of corporate brands can encompass them, (5) do not test the existence of a formative structure of the dimensions in a single general factor, (6) do not use a theoretical framework complementary to the theory of corporate branding that encompasses the dimensions of the CBE and purposes of their combination to form a general CBE, and (7) when related to actual measures of the company's competitive performance, do not consider all dimensions of CBE, inhibiting detection of the full relations with performance.

Addressing these challenges and advancing the frontiers of CBE research constitutes the primary contribution of this paper. Our study endeavors to develop and validate a novel corporate brand equity scale founded on consumer perceptions, transcending industry boundaries. Moreover, we seek to establish a robust association between CBE and market share, a reliable and objective measure of competitive brand performance. Guided by the Theory of the Marketing Firm (Foxall, 2021), which postulates that the evaluation of corporate brands by consumers results in informational reinforcement for companies, the researchers propose a measurement scale that elucidates the dimensions of CBE and the intricate interaction between them and corporate competitiveness, relating it with corporate branding theory (Keller, 2020).

Theoretical background

Branding theoretical foundation and origin of corporate brand equity

Managing a company's brand involves developing marketing activities aimed at the institution (Brexendorf and Keller, 2017; Swaminathan et al., 2022). Theoretical aspects of the branding literature have postulated that such activities may encompass adopting a brand orientation, developing internal branding capabilities, and consistently delivering the brand (M'zungu et al., 2010). Chang et al. (2015) found that how companies perform these activities changes the perception of CBE and that measuring it is essential to reveal this management. In this way, a solid grasp of corporate brand equity and its measurement is crucial in ascertaining branding effectiveness.

Through a financial aspect, the CBE was originally conceived as an intangible brand asset whose structural foundation is the set of goods and rights of a corporation, which refers to extra-organizational elements (Gambetti *et al.*, 2017). In this regard, the value of corporate brands refers to the future expectations of their financial performance as reported in external sources of information prepared by business consultancies, such as their positions in the rankings of the most valuable companies (Davcik *et al.*, 2015; Pope and Kim, 2022; Terzić and Đalić, 2019). However, this aspect does not capture the fulfillment of stakeholders' desires, other than financiers, which culminated in assessing reputation (Cowan and Guzman, 2020) or the consumer's perception of the company's performance (Keller, 2000).

Academic interest in CBE based on consumer perception began with studies on corporate identity, corporate reputation, and corporate communication (Balmer, 2012; Keller, 2000; Wiedmann, 2014), having its own theoretical body because there is not much correspondence with the literature on assets intangibles (Lev, 2019), the focus of the company's evaluations. The literature opens with concerns about building and differentiating the corporate brand from product or service brands (King, 1991). Balmer (1995) establishes that corporate brand is not limited to the organization but to a wide variety of corporate entities that brands encompass, including corporations, their subsidiaries, and brand networks (Balmer and Gray, 2003).

Owning a corporate brand asset can be of high/low value due to the presence/absence of a differentiating image compared to competitors (Mahboobi Renani *et al.*, 2021; Teece, 2015). Some studies suggest that brand equity increases sales and market share and that it is a consequence of the company derived from its actions toward the consumer (Kim, 2001; Oliveira-Castro *et al.*, 2008; Rahman *et al.*, 2019). However, studies have used measures that assess only one dimension, either at the product or part of the corporate level, which has limited the demonstration of the full effect of the CBE. In this sense, aspects such as image, recognition, and judgment of the brand by stakeholders, especially consumers, become relevant in the assessment of corporate brand equity, going beyond financial metrics and characterizing the company's competitiveness (Abratt and Mingione, 2022).

The formation of the CBE has developed through some winding paths. Some authors took the items and scales developed for consumer-based brand equity of products and services (Chang *et al.*, 2015), a research topic already well developed in terms of measurement scales (Christodoulides and De Chernatony, 2010), and placed it as a reference to the corporate brand, without many distinctions of the different purposes of the brand analysis level for consumers to evaluate.

Some other authors have developed CBE scales applied to a service provider business brand or applied to business to business, concerned with a specific brand in an industry, which is usually a large company (Davis *et al.*, 2008; Juntunen *et al.*, 2011; Van Riel et al., 2005). At the same time, other authors have conceived scales and dimensions of corporate reputation applying to brand assessments (Fombrun *et al.*, 2015; Walsh *et al.*, 2009), needing an analytical focus on whether all items measure the company's performance from consumers' perspective. In addition, other scales measure dimensions of social and environmental responsibility (Hsu, 2011; Hur *et al.*, 2014) applying to corporate brands through items that were not developed to assess the consumer's perception of firm performance, making the dimensions of responsibilities predictive, and not part, of the CBE construct.

To sum up, the development of CBE scales has been unstructured, without a theoretical structure explaining why consumers evaluate corporate brands and their performances, which indicators should be part of its structure, and how competitiveness between company brands interferes with evaluations of one corporate brand against another.

The CBE in the theory of the marketing firm

The theory of the marketing firm (Foxall, 2021) aims to explain more objectively and pragmatically why and how companies and consumers do what they do and interact, creating markets. Since corporate branding is marketing activities aimed at the company's brand (Keller, 2020; Sinclair and Keller, 2017; Swaminathan *et al.*, 2022), this theory can help explain its purposes and effectiveness. Through behavioral psychology (Skinner, 1965), great importance is attributed to environmental contexts to explain behavior (whether of the company or consumers) and its consequences that influence subsequent behaviors. In this sense, companies, represented by the top part - marketing firm - of Figure 1, have as an antecedent any situation (S) of the firm that induces it to adopt marketing behavior ($R_{\text{marketing firm}}$), such as a context of commercialization opportunities with consumers or even the existence of demand for products of a company.

Adopting marketing behavior (branding activities at the corporate level) brings a bifurcated consequence, one for the company itself (R^{iu}/P^{iu}) and another for the consumer market (S). For the company, it can bring greater revenues and profits, known as utilitarian reinforcements, and prestige, known as informational reinforcements. It is a punishment if the consequence brings lower revenues, losses, or defamation of the company's brand. Both acquired reinforcements and punishments influence the emission of the subsequent behavior.

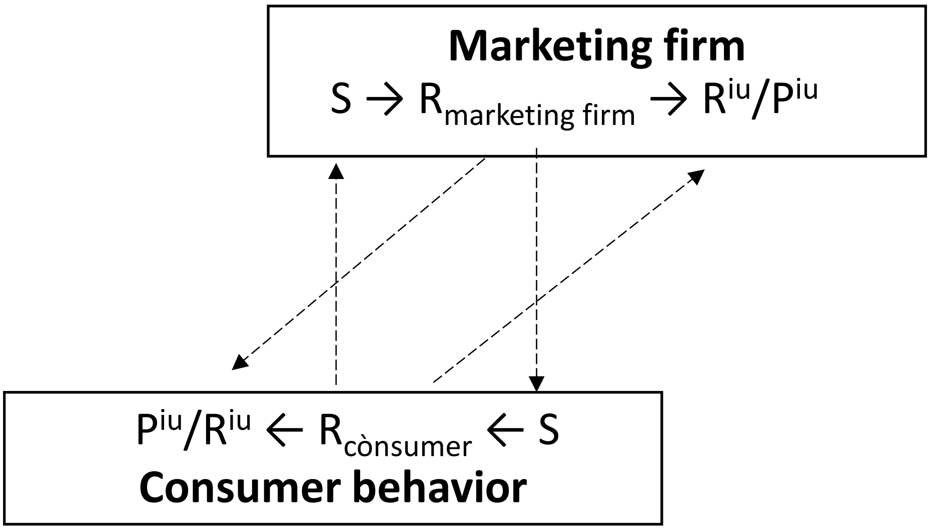


Figure 1. Model adapted from the Theory of the Marketing Firm.

Source: Figure adapted from Foxall (2021, p. 265, Figure 8.2)

The consequence to the consumer market occurs via the marketing process, which is divided into two aspects. In the first one, by adopting marketing behavior, the company can prepare the sales environment (consumer's S) to facilitate or encourage purchase behavior ($R_{consumer}$) or pecuniary exchange between consumer and company. In the second aspect, marketing behavior can configure product or service brands to deliver utilitarian rewards (R^{iu}/P^{iu}) to consumers when they use them, for example, when using a smartphone to access a social network or make calls. They can also configure informational rewards when marketers develop branding activities capable of generating status so that consumers receive compliments when purchasing products.

Consumer behaviors can generate two bifurcated consequences (Foxall *et al.*, 2021). One for themselves when they enjoy status or use a purchased product or service (R^{iu}/P^{iu}). The second consequence benefits the company by providing information about what consumers want so that it later offers something more suited to their desires. In this model, the firm and the consumer have utilitarian and informational consequences (rewards/reinforcers or sanctions/punishments). Traditionally, the utilitarian consequences for companies are financial gains or market competitiveness gains measured, usually by objective performance result metrics (Porto and Foxall, 2020). Revenue market share is typically a utilitarian consequence of marketing activity companies try to increase, and the consequences are mediated using the firm's resources. The company takes the revenue to improve or become more competitive.

Informational consequences for companies are socially mediated (Foxall, 2020). In an environment where companies compete to obtain greater utilitarian rewards, social reinforcement is complementary to these rewards because it provides social feedback on the company's performance. Consumers provide feedback on corporate brands based on their subjective evaluations, indicating whether the company is heading in the right direction or if their efforts are accepted. With positive feedback, it is praised, has a better reputation, and its corporate brand becomes more valued by consumers. This way, it depends on other stakeholders (typically consumers) attaching praise to it to increase its equity. Throughout the history of social reinforcement, the company learns, among others, the path it must follow to obtain more prestige among the target audiences of interest. In this sense, the theory of the marketing firm can help understand corporate brand equity assessments to integrate a consumer and firm perspective.

Consumers give feedback on corporate brand performance and are part of a learning system in which the company learns to improve itself (Foxall, 2021). It can enable managers to assess whether the company's brand has followed the right direction to meet consumer desires (Brandt, 2020), whether it needs to change due to losses (Casal *et al.*, 2017), whether it should improve the production process or product innovation for delivery to consumers (Forza and Salvador, 2000; Vendrell-Herrero *et al.*, 2022), or even whether it is accepted in the society in which it operates (Fombrun *et al.*, 2015).

Capturing the extension of the feedback about the corporate brand socially mediated by consumers has taken a fragmented path in the literature. Some authors have suggested that consumer feedback about the performance of a corporate brand, or their ability to provide informational reinforcement to companies, only pertains to the company's awareness. Therefore, if a corporate brand is well-known, it will have high brand equity (Hur *et al.*, 2014). Other authors argue that consumer feedback is based on the company's management style, which is the source of its brand equity (Shamma and Hassan, 2011). Thus, consumers praise companies that adopt the best practices (Pope and Kim, 2022). Some other authors state that consumers appreciate companies that have adopted responsible practices in the market (Van Riel *et al.*, 2005). Initiatives to measure corporate reputation and brand equity scales (Argenti and Druckenmiller, 2004; Shamma and Hassan, 2011) have established the foundational structures of informational reinforcers from consumers to companies. However, a more comprehensive and integrated structure is still absent.

CBE scale development

Based on the exploratory steps proposed by Churchill (1979), the researchers specified the domain of the CBE construct that signaled the consumer's perception of the performance of companies' brands and resorted to the published scales of this content to generate sample items. The authors define this perception as evaluative responses (or feedback) about the performance of the company's brand, being an informational reinforcer (Foxall, 2021). The concrete object (Rossiter, 2002) is the corporate brand with its attributes (items that illustrate the criteria by which performance is evaluated).

Researchers searched on Scopus, Science Direct, and Web of Science search engines for scales measuring corporate brand equity, B2B brand equity, and corporate reputation using the keywords "scale" or " measure" and "corporate brand equity" or "firm brand equity" or "corporate reputation", with no time limit. The researchers filtered the search to find measures that focused on the evaluations made by consumers for company brands. Then, all measures that focused on financial measures or the perception of other stakeholders were eliminated.

This research identified 13 scales or measures containing 42 constructs and 152 items or specific criteria that researchers have been working on to measure the consumer's perception of the corporate brand through evaluative indications. As the authors used scales that had already been factorially validated, the items' refinement and the measure's purification were more direct. Out-of-topic items focused exclusively on the product (and not on the company) were eliminated, as well as constructs that did not illustrate the consumer's perception of the companies' brand performance, such as brand personality and brand attitude (centered on consumer reaction and not the company) or feelings about the brand, such as trust or credibility (centered on the effect of brands on individual consumer level of analysis, but not of their feedback on companies' brand performance).[1] In addition, the researchers analyzed the wording of each item within each construct to identify the themes addressed, eliminating item redundancy. These themes are shown in Figure 2.

This left 12 criteria consumers could evaluate as a corporate brand's performance, representing CBE. A face validity test with three consumers verified the criteria's clarity, understandability, and appropriateness. Next, the researchers carried out a content validity analysis through interviews with a degree of agreement of relevance and full representativeness of the construct by some judges (three academic marketing researchers, two human resources professionals, and two marketing professionals) on the indicators and the how much they represent the CBE construct and consumer perception of the company's brand performance. The results of this step showed a degree of agreement above 80% for representativeness and relevance. Figure 2 shows the themes and measures after the content validity phase, containing authors' constructs to capture the CBE.

Figure 2. Themes and measures of CBE, reputation, and brand equity.

Theme	CBE or corporate value scale	Reputation scale	Brand equity scale in B2B or service provider
Awareness/ Knowledge / Recognition of the firm´s brand	Hsu (2011) CBE, Biedenbach (2012) - awareness, Chang *et al.* (2015) - CBE, Hur *et al.* (2014) - CBE		Davis et al. (2008) – image, Juntunen *et al.* (2011) - awareness
Consumption or loyalty of products of the firm´s brand	Biedenbach (2012) - loyalty, Chang *et al.* (2015) CBE, Van Riel *et al.* (2005) - loyalty		Davis *et al.* (2008) - image
Availability of the products of the firm´s brand	Chang *et al.* (2015) CBE	Sarkar & Bhattacharjee (2017) and Fombrun *et al.* (2015) – product in - Reptrack	Van Riel *et al.* (2005) – product distribution
Quality of the products of the firm´s brand	Biedenbach (2012) – perceived quality	Walsh *et al.* (2009) - product and service quality	Davis *et al.* (2008) – service provider quality
Firm´s brand reputation/prestige	Sarkar and Bhattacharjee (2017) – Eminence CBCBE, Mann and Guhman (2015) - Prestige	Hsu (2011) - Reputation, Walsh *et al.* (2009) - reputation scale Fombrun et al. (2015) - Reptrack	Van Riel et al. (2005) - product brand equity, Hur *et al.* (2014) - reputation
Competence of the seller belonging to the firm's brand when dealing with customers	Van Riel *et al.* (2005) - service quality and service personnel, Anisimova (2013) - consumer valorisation	Walsh *et al.* (2009) - customer orientation	Davis *et al.* (2008) - image, Juntunen *et al.* (2011) - image
Firm's innovation in the market transmitted in the brand	Sarkar and Bhattacharjee (2017) – Eminence CBCBE	Walsh *et al.* (2009) - product and service quality	
Financial health of the firm´s brand	Van Riel *et al.* (2005) – CBE	Walsh *et al.* (2009) - reliable and financially strong company, Sarkar and Bhattacharjee (2017) and Fombrun *et al.* (2015) – performance in - Reptrack	
Ethical practices conveyed by the firm´s brand	Mann and Guhman (2015) – Corporate ethics	Sarkar and Bhattacharjee (2017) and Fombrun *et al.* (2015) – Governance in - Reptrack	
Social responsibility conveyed by the firm´s brand	Mann and Guhman (2015) – Corporate social responsibility		Hsu (2011) - CSR, Hur *et al.* (2014) - CSR
Environmental responsibility conveyed by the firm´s brand		Walsh *et al.* (2009) social and environmental responsibility, Sarkar and Bhattacharjee (2017) and Fombrun *et al*. (2015) – citizenship in - Reptrack	Hsu (2011) - CSR, Hur et al. (2014) - CSR
Appreciation of employees conveyed by the firm's brand		Walsh *et al.* (2009) - good employer	
This research will cover all these themes.			

Source: Authors own creation

Firms' brand performance is evaluated by consumers based on multiple themes. Brand awareness is the primary indicator of the company's performance, as it is necessary to evaluate other criteria (Biedenbach, 2012; Chang *et al.*, 2015; Davis *et al.*, 2008; Hsu, 2011; Hur *et al.*, 2014; Juntunen *et al.*, 2011). Consumers provide feedback once they recognize the brand, while less-valued brands are not remembered or recognized.

Almost all brand equity studies capture a measure to include products as part of the corporate brand portfolio (Christodoulides and De Chernatony, 2010). The researchers identified three themes under this notion. Consumption or loyalty to the company's branded products is one of them (Biedenbach, 2012; Chang *et al.*, 2015; Davis *et al.*, 2008; Van Riel *et al.*, 2005). The measure suggests that consumers can evaluate its corporate brand through the purchase and use of products belonging to the company (Keller, 2016; Shamma and Hassan, 2011). These products or services generate direct experiences with some of the company's brands, and this experience is generalized more holistically in the corporate brand, which consumers can value.

Another one is the availability of the company's branded products (Chang et al., 2015; Fombrun *et al.*, 2015; Sarkar and Bhattacharjee, 2017; Van Riel *et al.*, 2005). In this way, companies with a good logistics network can generate greater accessibility to their products to consumers, who generally approve, attracting positive feedback. From the consumer's perspective, while the scarcity of a product brand can make it more valued by giving a sense of urgency, at the corporate brand level of analysis, if the company's products are often out of stock, this corporate brand would be bad assessed for failing to meet consumer demand (Hamilton *et al.*, 2019).

In addition, the quality of the company's branded products evaluated by consumers may reflect on the company's brand (Biedenbach, 2012; Fombrun *et al.*, 2015; Sarkar and Bhattacharjee, 2017; Van Riel *et al.*, 2005). Companies get good sales response if it covers high-quality products, whether combined with a breadth or depth portfolio (Kirca *et al.*, 2020). These product brands generate direct experiences when consumed, and the perceived qualities are transferred through the generalization and categorization of stimuli to the company brand (Aaker and Keller, 1990). Thus, consumers can generate good feedback on the performance of the company's brand based on the quality of the product portfolio they have experienced from the same company.

From a unidimensional perspective, the firm's brand reputation is similar to the assessment of brand image valence (Bhattacharjee, 2017; Hur *et al.*, 2014; Van Riel *et al.*, 2005). However, in some studies where the multidimensional perspective is considered, they show it as having dimensions that encompass several aspects or behaviors of the firm (Hsu, 2011; Sarkar and Bhattacharjee, 2017; Walsh *et al.*, 2009), such as leadership, performance, and workplace (Fombrun *et al.*, 2015). However, for the proposal to be evaluated by the consumer as perceptions of firms' brand performance, not all dimensions of the multidimensional perspective were considered for the corporate brand, such as leadership and workplace, because they fell in the evaluation phase - content validity. Thus, the corporate brand attracts good feedback from consumers on the strength of its reputation if consumers perceive that the corporate brand image is positive. Conversely, a bad reputation attracts bad feedback.

In addition, consumers occasionally encounter companies' call centers and interact in some way with attendants and salespeople or need to deal with a customer relationship system. The competence of the seller of the firm's brand when dealing with customers is another theme identified in the consumer perception of the firm's brand performance. Consumers usually evaluate the company's responses (as responding to their level of satisfaction with the service) and their ability to resolve complaints that occur in transactions, from which this indicator derives (Anisimova, 2013; Davis *et al.*, 2008; Juntunen *et al.*, 2011; Van Riel *et al.*, 2005; Walsh *et al.*, 2009).

The firm's innovation in the market transmitted in the brand encompasses new developments or adaptations of its products, processes, or management that convey or add value to consumers when launched in the market (Kahn, 2018; O'Sullivan and Dooley, 2009). This theme illustrates the company's action to differentiate itself from competitors and become a pioneer, evaluated by some proposals as indicators (Sarkar and Bhattacharjee, 2017; Walsh *et al.*, 2009). Consumers give performance feedback about companies' innovations when they participate in market tests or give their opinion about something new that the company has launched in the market (Hoeffler and Keller, 2002).

The financial health of the company's brand refers to the overall financial performance perceived by consumers (Fombrun *et al.*, 2015; Sarkar and Bhattacharjee, 2017; Van Riel *et al.*, 2005; Walsh *et al.*, 2009). As much as consumers hardly know the actual financial performance of the company precisely, they can perceive the signs of financial health that it emits. Thus, some companies exhibit good financial performance (e.g., display their finance in the media). In contrast, others do not, interfering with the company's brand performance perceived by consumers.

The theme of ethical practices conveyed by the firm's brand is conduct guided by the moral principles of stakeholders perceived by consumers (Fombrun et al., 2015; Sarkar and Bhattacharjee, 2017). A transparent company that accounts for its actions to interested parties without breaking the rules accepted in each society usually has its corporate brand well evaluated by consumers. Social responsibility conveyed by the firm's brand is another theme that expresses consumers' perceptions of the company's voluntary actions in favor of people in the community other than the consumers themselves (Hsu, 2011; Hur et al., 2014; Kumar et al., 2019). By adopting various voluntary practices, the corporate brand can be perceived by consumers as altruistic and acting in favor of society.

The environmental responsibility conveyed by the firm's brand concerns the protection of the environment made by the company perceived by consumers (Fombrun *et al.,* 2015; Sarkar and Bhattacharjee, 2017; Walsh *et al.,* 2009). Practices to reduce pollutants - firms' carbon footprint reduction (Mahapatra *et al.*, 2021) - and implement pro-environmental rules can be perceived as a positive image in the corporate brand for improving species' lives, being well evaluated by consumers (Rahman *et al.*, 2021). Finally, the theme of appreciating employees conveyed by the firm's brand encompasses the exposure of the recognition of employees to consumers (Walsh *et al.*, 2009). Consumers' perceptions of the ranking of the best companies to work for or the explicit praise to employees can make them give good feedback on the company's brand performance, demonstrating that it knows how to value them.

Although current research scales measure these thematic aspects related to the corporate brand, a new scale is needed to capture consumers' perceptions of firms' brand performance as informational reinforcement to the firm. It should cover all 12 criteria and use appropriate wording for the items. Furthermore, consumers need to compare corporate brands within their respective industries. Thus, the researchers propose a new CBE measurement scale.

Method

The researchers performed an empirical test to build and validate a new CBE scale. This is a cross-sectional study with a correlational one to detect its relationship with the firm's revenue market share, a competitive index. The study was carried out in each of the five regions of Brazil, a country with continental dimensions. The sample comprised 823 consumers and followed the perspective of evaluating the heterogeneity of companies and consumers. The research did not need to be submitted to the Research Ethics Committee of the participating universities, as it does not deal with a sensitive topic, does not involve vulnerable populations, and does not carry out experiments with humans and animals. Despite this, it followed the provisions in the resolution of the

Brazilian National Council of Ethics in Research - CONEP, about the rights of research participants and a term of free and informed consent made available. In this term, the research objectives were described, as well as the rights of the participants and the use of data in aggregate form for research purposes.

The respondents needed to know some of the 58 corporate brands used in the questionnaires. These corporate brands were selected due to the availability of data regarding revenue sales in the following industries: the automotive industry with eleven companies; the beverage industry with nine companies; the information technology industry with thirteen companies; the mobile operator industry with five companies, and large retail chain industry with twenty companies. The revenue data were extracted from Economatica®, a database containing financial data from Brazilian companies in various sectors of the country's economy for five years. The researchers averaged the market share in each industry per year for stability and thus compared it with the CBE, which is more enduring.

Five online questionnaire versions were created to prevent respondent fatigue, each containing all corporate brands in a specific industry. An initial question was asked using the day the respondent was born to randomize the sample and avoid selection errors. They were directed to one of five questionnaire versions based on their answer, and each questionnaire contained a set of brands from their respective industries. To account for multiple brands and consumer evaluations, the database was restructured to have each line represent a specific combination of brands in industries and consumers, culminating in an initial total sample of 9,667 cases. This sample combination allows for a better comparison of the brands in each criterion since this research proposes comparing brand competitiveness based on consumer perception. For each analysis, the sample size changed depending on the data availability of the consumer response for each brand.

The researchers were also careful to minimize self-selection bias. Respondents working at one of the investigated companies could be interested in evaluating and overvaluing (or undervaluing) the companies they work, distorting the results. We eliminated this sample before proceeding with the final analyses. An Anova test containing the independent variable, whether or not the sample works at one of the companies listed in the survey, with the dependent variable being the CBE score, showed that they differed significantly [$F(1, 9665) = 53.9$; $p \leq 0.01$; the mean value of respondents who worked = 0.38; Standard Error = 0.05; the mean value of respondents who did not work in any of these companies = 0.00; Standard Error = 0.01]. In addition, this research did not benefit the respondents who participated, which could also distort the sample selection. The sample characteristics of respondents are displayed in Table I.

Table I: Sample profile.

Sample of respondents		Percentage
Sex	Female	58.3%
	Male	41.7%
Age	< 24	68.7%
	> 24	31.3%
Region	Southeast	43.9%
	Northeast	22.9%
	Center-West	22.1%
	South	7.9%
	North	3.2%

Source: Authors own creation

The instrument covers the themes the conceptual review indicated as forming part of the CBE construct (Figure 2). The researchers considered that the themes are mutually excluding and collectively exhaustive, and 12 indicators were reached with this. The wording of the items was written in a language that is easy for any respondent to understand and who is minimally familiar with the company's brand.

The researchers also apply procedures to avoid the common method variance of the measurement constructs (Podsakoff *et al.*, 2003). The researchers applied the questionnaire in the online format. Still, the system randomized the order in which the questions were displayed, and in each item, there was a chance for the consumer to mark (I don't know how to evaluate the firm). All items were contextualized for each industry, containing a set of companies. For example, for the degree of knowledge of the automotive sector indicator, the wording was: "From the list of automobile producers below, indicate how well the company is known in your country." A question and an evaluation scale (Likert type) for each indicator were offered to the respondents so that they could mark (Figure 3). Companies that are part of a holding company (or business group) were listed separately in the questionnaire, as they have different structures and records. This was possible because these firm brands also operate separately.

To avoid nonresponse error, we assumed that people who did not want to participate in the research would be people who would not be interested in company matters (children up to the age of onset of adolescence) and people who are interested in companies, but who never heard about a specific firm brand and who, therefore, would not know how to evaluate it. In this sense, we used respondent proxies for those who answered that they did not know how to evaluate the firm brand in at least one of the scale's metrics. One more Anova test containing the independent variable, whether or not the respondent marked the alternative that did not know how to evaluate the firm's brand, with the dependent variable being the CBE score, showed that they differed significantly [$F (1, 9285) = 2698.6$; $p \leq 0.01$; the mean value of respondents who indicated that they did not know how to evaluate the brand = -1.13; Standard Error = 0.03; the mean value of respondents who indicated that they knew how to evaluate the brand = 0.18; Standard Error = 0.01]. This result demonstrates that non-respondents would tend to assign a very low value to companies, undervaluing them. However, this does not hinder those more likely to evaluate according to what they judged to represent the firm's brand value for themselves.

Figure 3. CBE scale.

Indicators	Question	Scales[a]
Level of corporate brand knowledge (Knowledge)	From the list of companies from sector __ below, indicate how well the company is known in your country	1- Unknown, 2- Barely known, 3- Moderately known, 4- Well-known, 5- Extremely well-known
Level of products consumption belonging to the corporate brand (Consumption)	From the list of companies from sector __ below, indicate how much the products or services of these companies are consumed in your country	1- Not consumed, 2- Barely consumed, 3- Moderately consumed, 4- Highly consumed, 5- Very highly consumed
Level of products availability belonging to the corporate brand (Availability)	From the list of companies from sector __ below, indicate how much the products or services of these companies are available in your country	1- Not available, 2- Barely available, 3- Moderately available, 4- Highly available, 5- Extremely available
Level of products perceived quality belonging to the corporate brand (Quality)	From the list of companies from sector __ below, indicate the degree of quality of the products or services of these companies in your country	1- Very low quality, 2- Low quality, 3- Average quality, 4- High quality, 5- Very high quality
Level of market innovations promoted by the corporate brand (Innovation)	From the list of companies from sector __ below, indicate how much the companies are innovative (launches new products/services and/or adopts new technologies for production and/or provision of service and/or adopts different management practices) in your country	1- Not innovative, 2- Barely innovative, 3- Reasonably innovative, 4- Very innovative, 5- Extremely innovative
Level of corporate brand reputation (Reputation)	From the list of companies from sector __ below, indicate the level of reputation of each company in your country	1- Awful reputation, 2- Bad reputation, 3- Neutral reputation, 4- Good reputation, 5- Excellent reputation
Level of competence in customer relations by the corporate brand employees (Competence)	From the list of companies from sector __ below, indicate the degree of competence of the employees in relating with the customer in your country	1- Incompetent, 2- Barely competent, 3- Reasonably competent, 4- Very competent, 5- Extremely competent
Level of the corporate brand´s financial health (Financial health)	From the list of companies from sector __ below, indicate the degree of the company's financial health (the company presents good indicators of profitability, revenue and is not indebted) in your country	1- Does not appear to have good financial health, 2- Appears to have reasonable financial health, 3- Appears to have good financial health, 4- Appears to have very good financial health, 5- Appears to have excellent financial health
Level of visibility of corporate brand employee appreciation (Appreciation)	From the list of companies from sector __ below, indicate the degree of visibility of employee appreciation in your country	1- Invisible, 2- Barely visible, 3- Visible, 4- Highly visible, 5- Extremely visible
Level of social programs adoption under the corporate brand umbrella (Social programs)	From the list of companies from sector __ below, indicate the degree of adoption of social programs focusing on your country	1- Never adopted, 2- Rarely adopted, 3- Occasionally adopted, 4- Frequently adopted, 5- Always adopted
Level of pro-environmental practices adoption under the corporate brand umbrella (Environmental practices)	From the list of companies from sector __ below, indicate the degree of adoption of practices that are in accordance with the environment in your country	1- Never adopted, 2- Rarely adopted, 3- Occasionally adopted, 4- Frequently adopted, 5- Always adopted
Level of ethical practices adoption under the corporate brand umbrella (Ethical practices)	From the list of companies from sector __ below, indicate the degree of adoption of good ethical practices (being a "clean record" company) in your country	1- Never adopted, 2- Rarely adopted, 3- Occasionally adopted, 4- Frequently adopted, 5- Always adopted

[a] For each scale, an alternative was given to the respondent, who could indicate, “I do not know how to evaluate this company”.

Source: Authors own creation

For the validation analysis, all the indicators were relativized by the industry's mean for comparative data analysis in the same industry. Thus, a value below (above) one means it is lower (higher) than the mean for the companies that comprise the sector. Next, the researchers conducted an exploratory factor analysis of 12 items based on the Eigenvalue > 1. The items were then grouped into three factors with factor loadings above

0.35, as shown in Table II, using Promax rotation and variance extracted in 65.3%. Finally, Cronbach's alphas were calculated for the three factors with values above 0.70.

Next, a confirmatory factor analysis was performed. First, the data were entered into an electronic spreadsheet with the sample of 1,346 cases and randomly divided into two subgroups to perform separate analyses and revalidate the results, one with the randomization of 50% of the sample (split sample 1) and the (split sample 2). Next, the Adanco software for Partial Least Squares Modeling (PLS) was used for the confirmatory factor analysis due to its robustness to non-normalized multivariate data, heteroscedastic and allows testing of formative and reflexive structures (Hair *et al.*, 2012). The model had a reflective structure for first-order factors and a formative structure for second-order factors. We tested alternative models with a unifactorial structure (CFI = 0.63; TLI = 0.53; RMSEA = 0.15; SRMR = 0.18) and with two factors (CFI = 0.93; TLI = 0.91; RMSEA = 0.06; SRMR = 0.07). They had worse indices than the three-factor structure; therefore, the three-factor structure was chosen and represented the CBE.

The univariate and multivariate (Mardia Index) analyses obtained univariate values for the kurtosis that were above 1.0. The results also indicated nonmultivariate normality of the data with a critical ratio of 78.68, and for this reason, Partial Least Squares Modeling was also used. The sampling power for the confirmatory factor analysis with 51 degrees of freedom (alpha = 0.05), the null hypothesis for RMSEA of 0.08, and the alternative RMSEA Hypothesis of 0.05 was in the order of 99.99%, an excellent parameter for avoiding the Type 2 Error.

To investigate the correlations of each CBE factor, the total CBE factor (general and subdivided into each of the five investigated industries), the researchers conducted nine ordinary least square regressions (OLS), with the dependent variable being the average market share of companies of five years. For all of them, the equation Market $share_i = \alpha + \beta CBE_i + e_i$ was used, where the notation i represents the company, α the intercept, β the parameter estimates, and e the regression error. This equation was used for the subdivided analysis in each industry and the analysis having the independent variable of each CBE factor. The factorial scores of the CBE and the company's market share were compared across industries after being divided by the industry average. The results were standardized using Z scores. All nine regression analyses showed no heteroscedasticity problem (White test $\chi^2 = 3.9$; $p > 0.05$ for the general CBE, White test varying χ^2 from 3.6 to 4.1; $p > 0.05$ for each factor of CBE, and White test varying χ^2 from 1.8 to 4.9; $p > 0.05$ for each industry with general CBE).

Results

Confirmatory validation

Three confirmatory factorial validations were performed to revalidate the results and detect their stability (Table II). Confirmatory factorial validation with 1,346 cases showed suitable adjustments for a factorial structure with three first-order constructs (CFI = 0.95, TLI = 0.94, RMSEA = 0.05, SRMR = 0.04). The two subsamples fit well within the reference parameters (Hu and Bentler, 1999).

The most suitable structure was that of three first-order constructs. The 12 indicators together formed three dimensions of CBE as consumers perception on brand's firm performance: (1) Corporate Brand's Presence, formed by the level of corporate brand knowledge, the level of products consumption belonging to the corporate brand, and the level of products availability belonging to the corporate brand; (2) Corporate Brand's Outstanding Management, formed by the level of products perceived quality belonging to the corporate brand, the level of corporate brand reputation, the level of competence in customer relations by corporate brand employees, the level of the corporate brand financial health, and level of market innovation promoted by the corporate brand; and (3) Responsible Corporate Brand, formed by the level of visibility of corporate brand employee appreciation, the level of social programs adoption under the corporate brand umbrella, the level of pro-environmental practices adoption under the corporate brand umbrella, and the level of ethical practices adoption under the corporate brand umbrella.

All first-order constructs have convergent validity within accepted parameters (AVE > 0.50), with CR and Dijkstra-Henseler's rho above 0.70. Although some dimensions have a high inter-construct correlation, they were still within the discriminant validity parameters according to the HTMT criterion - below 0.90 (Benitez *et al.*, 2020).

Table II. Validation of the CBE scale.

CBE metrics	Total sample			Sub sample 1	Sub sample 2
	Principal component[a]	Factor loading	Reliability	Factor loading	Factor loading
Consumption	0.92	0.89		0.88	0.88
Availability	0.92	0.88		0.88	0.88
Knowledge	0.76	0.85		0.86	0.85

Dimension: Corporate Brand's Presence	Cronbach's alpha[b]:		0.90	0.91	0.90
	Dijkstra-Henseler's rho[c]:		0.91	0.91	0.90
	Composite reliability (CR)[d]:		0.91	0.91	0.90
	Average variance extracted (AVE)[e]:		0.76	0.76	0.75
CBE metrics	Total sample		Reliability	Sub sample 1	Sub sample 2
Reputation	0.86	0.87		0.87	0.87
Quality perception	0.76	0.84		0.84	0.84
Innovation	0.75	0.83		0.83	0.84
Financial health	0.67	0.80		0.81	0.80
Customer rel. competence	0.75	0.76		0.77	0.77
Dimension: Corporate Brand's Outstanding Management	Cronbach's alpha[b]:		0.91	0.91	0.91
	Dijkstra-Henseler's rho[c]:		0.91	0.92	0.91
	Composite reliability (CR)[d]:		0.91	0.91	0.91
	Average variance extracted (AVE)[e]:		0.68	0.67	0.68
CBE metrics	Total sample		Reliability	Sub sample 1	Sub sample 2
Employee appreciation	0.82	0.83		0.83	0.83
Ethical practices	0.59	0.74		0.74	0.75
Environmental practices	0.82	0.70		0.70	0.70
Social programs	0.68	0.54		0.53	0.53
Dimension: Responsible Corporate Brand	Cronbach's alpha[b]:		0.80	0.80	0.80
	Dijkstra-Henseler's rho[c]:		0.81	0.82	0.82
	Composite reliability (CR)[d]:		0.80	0.80	0.80
	Average variance extracted (AVE)[e]:		0.50	0.50	0.51
Sample	Chi square	CFI	TLI	RMSEA	SRMR
Total sample	1,313 ($p \leq 0.001$)	0.95	0.94	0.05	0.04
Sub sample 1	626 ($p \leq 0.001$)	0.96	0.94	0.05	0.04
Sub sample 2	602 ($p \leq 0.001$)	0.96	0.95	0.05	0.04
Consctruct correlations		Inter-construct correlation	Discriminant validity (Heterotrait-Monotrait Ratio of Correlations (HTMT)[f]		
CB's Presence / CB's Outstanding management		0.88	0.88	0.88	0.88
CB's Presence / Responsible CB		0.58	0.58	0.59	0.59
CB's Outstanding management / Responsible CB		0.78	0.78	0.78	0.78

[a]The principal component analysis with Promax rotation and Kaiser normalization showed KMO = 0.86; $p \leq 0.01$, and variance extracted = 65.3%. [bcd]for good reliability values should be above 0.70. [e] for good convergent validity values should be above 0.50. [f] for good discriminant validity values should be less than 0.90.

Source: Authors own creation

The researchers validated a second-order CBE model formed by the first-order constructs of Corporate Brand's Outstanding Management, Corporate Brand's Presence, and Responsible Corporate Brand (Table III). This model also showed convergent validity (AVE > 0.50), CR, and Dijkstra-Henseler's rho above 0.70. The formative structure with weights was also adequate (Benitez *et al.*, 2020), with a low VIF value.

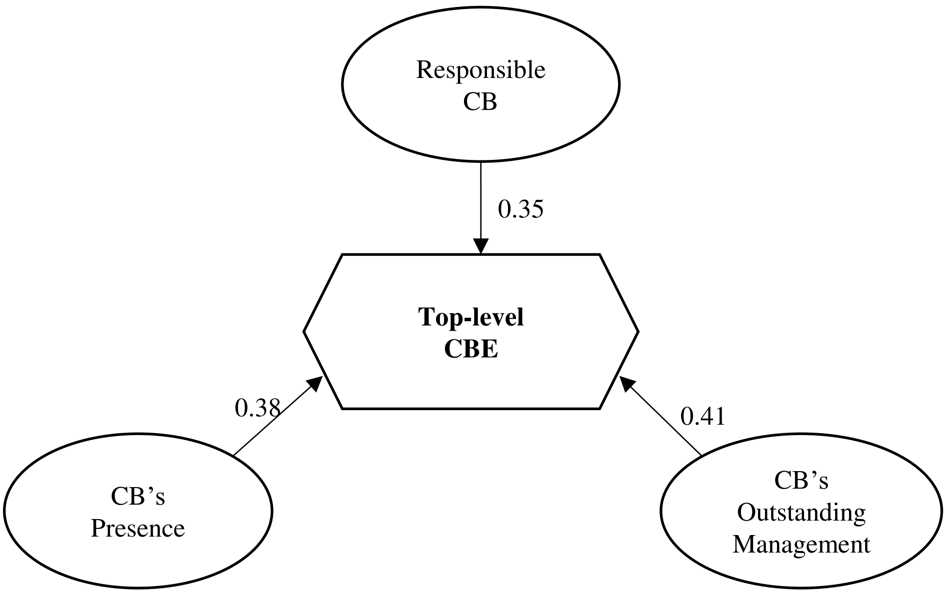
Table III. Validation of the second-order CBE.

CBE (Top-level) - Second-order factor	Factor loading	Weights	VIF[a]
Corporate Brand's Outstanding Management	0.87	0.41	3.76
Corporate Brand's Presence	0.81	0.38	2.78
Responsible Corporate Brand	0.76	0.35	1.80
Cronbach's alpha[b]:		0.85	
Dijkstra-Henseler's rho[c]:		0.86	
Composite reliability (CR)[d]:		0.85	
Average variance extracted (AVE)[e]:		0.66	

[a]The variance inflation factor should be below 5.0. [bcd] for good reliability values should be above 0.70. [e] for good convergent validity values should be above 0.50.
Source: Authors own creation

The formative structure for the second-order factor makes sense because the first-order constructs are not substitutes for each other but rather form the general construct of CBE (Figure 4). In the formative structure, it is noticed that they have similar weights to form the second-order structure, being higher for Corporate Brand's Outstanding Management.

Figure 4. The second-order composite model of CBE.



Source: elaborated by the authors

Additionally, the researchers compared the second-order factor (CBE) between industries [$F(4, 1341) = 285.2$; $p \leq 0.01$; the mobile operator industry presented the highest corporate brand equities (Mean = 1.36; Standard Error = 0.04); the beverage industry presented the lowest corporate brand equities (Mean = 1.07; Standard Error = 0.04)]. This is possibly due to the greater homogenization of corporate branding enhancement among competing mobile operating versus the heterogeneity of these practices among beverage companies.

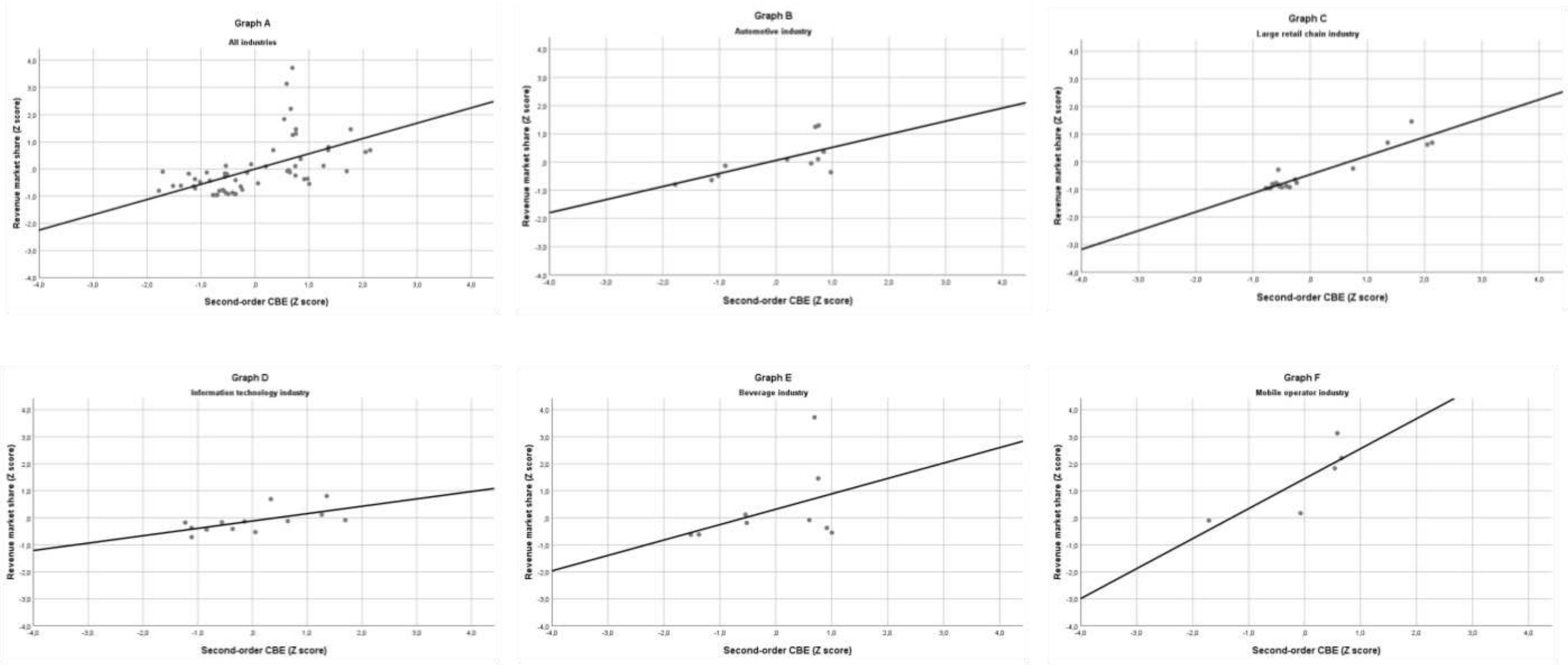
Associations with market share

Table IV presents the results of all nine OLS regressions performed with 58 corporate brands, seven significantly related to revenue market share. There are two main findings to note. Firstly, the relationship between the variables was not significant across all industries. This is due to varying levels of heterogeneity between them, with some industries having few dominant players and others having smaller companies that do not disclose revenue data. This makes it difficult to obtain a representative sample and generalize the relationships between these variables across different industries. Secondly, the relationship is not proportional, indicating non-linear relationships. The results show some with higher-than-expected market shares and brands with lower-than-expected shares for higher CBE values.

[Insert Table IV]
Source: Authors own creation

Graphs A, B, C, D, E, and F in Figure 5 demonstrate the linear relationship between the variables. Chart A is the general relationship between second-order CBE and revenue market share, and Charts B through F illustrate this same relationship for each industry analyzed. The proportional relationship would be illustrated if the data were on the regression line. It is observed that, despite the existence of the regression line, there are brands with high levels of CBE that are well above and below the line, especially in Graph B, Graph E, and Graph F.

Figure 5. CBE and market share graphs, separated by industry.Source: elaborated by the authors



Graphs G, H, and I (Figure 6) demonstrate the linear relationships of the first-order factors with the revenue market share. Again, it is possible to observe that for higher values in each CBE factor, the revenue market share data show a greater discrepancy (higher and lower) than expected from the proportional relationship on the straight line.

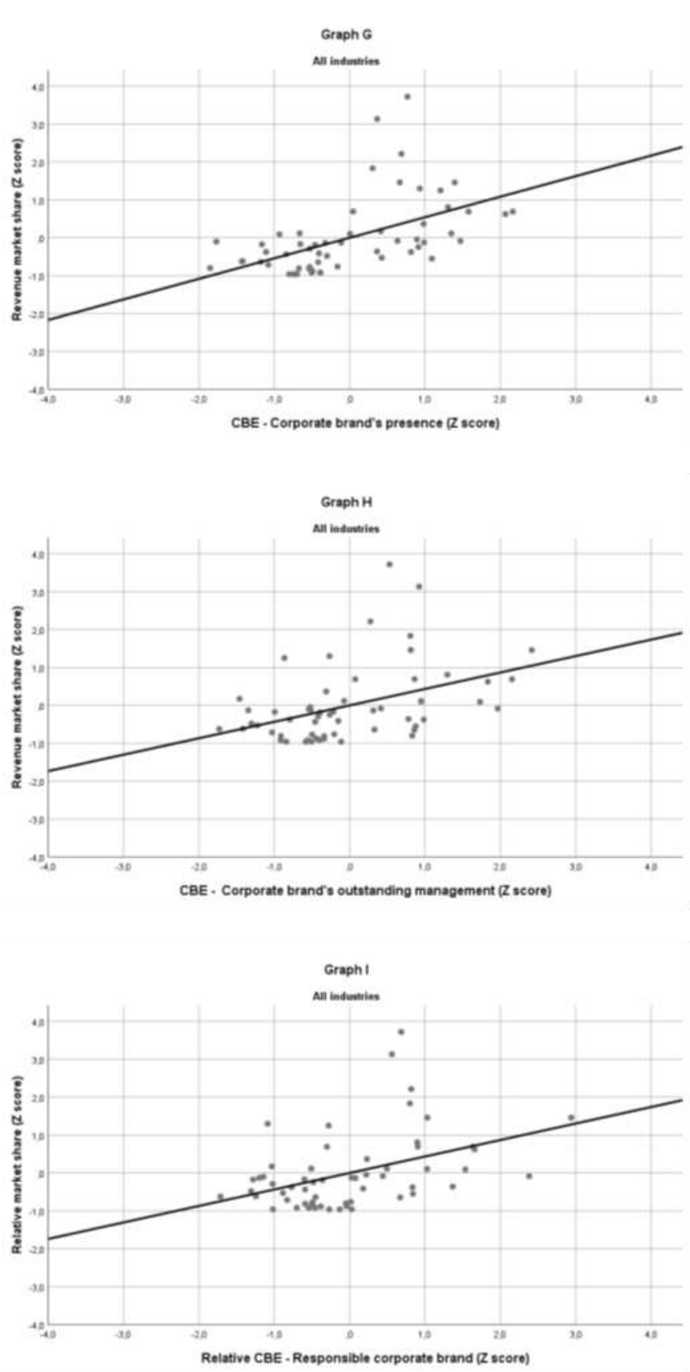


Figure 6. Graphs of the CBE factors and market share.

Source: elaborated by the authors

Discussion

Measuring CBE through consumer perception is crucial for understanding the companies behind product management and institutional brand delivery (Keller, 2020; M'zungu *et al.*, 2010), allowing the evaluation of the corporate marketing's actions impact on the consumer (Brexendorf and Keller, 2017; Swaminathan *et al.*, 2022). With the CBE measure proposed in this research, this research contributes to the corporate branding literature by highlighting the previously unnoticed dimensions and perceptions of delivery to the consumer.

In addition to being able to verify the effectiveness of corporate branding activities (Balmer, 2012), the CBE measured in this research follows the marketing company theory (Foxall, 2021). In this way, the most valued corporate brands receive socially mediated reinforcement from consumers (they are approved and praised), and the least valued are those who do not receive this reinforcement or are punished (disapproved and depreciated). In this sense, CBE is an assessment that provides feedback on the company's brand's performance.

The corporate brand can have different sources of building its equity. With 12 indicators, this research showed the corporate brand's equity through consumers' perception (Biedenbach, 2012; Guzmán and Davis, 2017; Van Riel *et al.*, 2005). The CBE measurement scale showed good convergent and discriminant validity, which enabled the determination of its dimensions. The three dimensions – Corporate Brand's Presence, Corporate Brand's Outstanding Management, and Responsible Corporate Brand – cover a broad spectrum of CBE. Each of these tripods can lead to the origin of how a corporation's brand becomes valuable.

This research proposes that the first element that composes the CBE construct is formed by indices demonstrating its presence, making it a widespread company. Corporate Brand's Presence refers to the large-scale manifestation of this brand in society, making it appear everywhere – at the point of sale, in society's everyday comments, and in the consumption of its products/services. It covers the set of indicators of corporate brand awareness, product consumption belonging to the corporate brand, and availability of these products (Biedenbach, 2012; Guzmán and Davis, 2017; Juntunen *et al.*, 2011; Keller, 2016; Shamma and Hassan, 2011; Van Riel *et al.*, 2005). This dimension gives prominence to the company's brand.

Complementarily, the Corporate Brand's Outstanding Management dimension refers to how much the corporation adopts the highest levels of competence and management in its productive, commercial, and financial activities perceived by consumers. The products perceived quality belonging to the corporate brand, the corporate brand reputation, the competence in customer relations by the corporate brand employees, the corporate brand's financial health, and the market innovations promoted by the corporate brand make up this dimension of the CBE. This dimension helps the perceptions of good management (Fombrun *et al.*, 2015; Walsh *et al.*, 2009), and consumers value the firm. The corporate brand formed by high levels of this dimension usually has a good status, an example of powerful and remarkable management, and perhaps a reference for other companies.

The third dimension of CBE is the Responsible Corporate Brand - a set of responsibilities consumers perceive in the corporate brand. It covers the visibility of corporate brand employee appreciation, the social programs adoption under the corporate brand umbrella, the pro-environmental practices adoption under the corporate brand umbrella, and the ethical practices adoption under the corporate brand umbrella. It is an extension of the corporate brand that demonstrates the exemplary character of the company in society (Fombrun *et al.*, 2015; Hsu, 2011; Sarkar and Bhattacharjee, 2017). A high level of this dimension conveys how much consumers perceive that the company's brand conveys the responsible practices that society currently demands. The perception is that the company is doing more than just commercializing its products and producing something more for society.

The balance of the three dimensions in the CBE formation means that the firm depends almost equally on them to leverage its value, with a slightly greater weight for Corporate Brand's Outstanding Management. A company can prioritize a dimension to increase its value, but it will only get a top level if it leverages them together. Therefore, CBE is not only about prioritizing its awareness and image (Keller, 2016; Shamma and Hassan, 2011) or considering corporate social responsibility (Hsu, 2011; Sarkar and Bhattacharjee, 2017) and aspects of reputation (Fombrun *et al.*, 2015) in isolation. But instead, the company should increase (or get consumer feedback) for all of them together.

Thus, consumers would not perceive a company brand with only one highlighted dimension as valuable. For example, a perceived firm's brand with a high presence and poor management would not be appreciated by consumers. In the same way, but on the opposite side, a Corporate Brand's Outstanding Management without the consumer perceiving it as present would leave consumers indifferent. In addition, consumers who perceive a corporate brand with high levels of presence and outstanding management but an irresponsible attitude (with ethical, social, or environmental problems) could give negative evaluations of this brand due to being more prone to corporate scandals. A responsible and present brand perceived to have bad management may not be sustainable and leave the market. In this sense, making a corporation brand highly valuable is hard work.

The sources of corporate brand equity are externalities of the corporate practices that reflect on the corporation's name. Simultaneously, consumers exposed to this brand evaluate it, providing a source of the firm's social performance (Foxall, 2021). Companies that check their performance through these effects can redirect their future behavior, making obtaining higher levels of this social reward possible. In this sense, the CBE may signal improvements to the company's performance in the consumer market, and companies can learn over time with this process.

There is a slight tendency for higher levels of CBE to accompany higher levels of market share. However, the disproportionate effects of CBE (and its dimensions) on the market share indicate that the company can try to maximize both social and utilitarian reinforcers (Foxall, 2021) almost independently. In this sense, they appear to be orthogonal axes and are like the brand equity proposal at the product level (Oliveira-Castro *et al.*, 2008). The company’s brand can achieve good performance based on utilitarian reinforcement and poor performance based on social reinforcement, or vice versa. However, as there is evidence of a linear association (albeit low), it would be only partially independent.

Concluding remarks

Theoretical Contributions

Our study of the Corporate Brand Equity (CBE) scale measurement provides significant theoretical contributions across various facets. At its core, our research enhances the understanding of brand equity by integrating consumer perception into assessing competitive brand performance at the corporate level. This integration is a relevant departure from traditional approaches, offering a novel perspective in brand equity literature and being the first attempt to develop a comprehensive corporate brand equity measurement model. By doing so, the research paves the way for future studies to explore the brand equity of corporations in a more consumer-centric manner.

Furthermore, the study aligns seamlessly with existing marketing theory, bridging a critical gap. Notably, the elements of brand value (Sinclair and Keller, 2017), including branding actions effectiveness (Swaminathan *et al.,* 2022), and the theory of the marketing firm (Foxall, 2021) have often been treated as distinct entities. Our research melds these domains, demonstrating how consumer perceptions can be crucial in understanding and evaluating institutional branding effectiveness and could be associated with corporate competitive performance metrics. In this sense, the alignment enriches the theoretical framework of brand management strategies, offering a more holistic and integrated approach that acknowledges the consumer's role in corporate performance, being responsible for giving feedback on this performance (offering informational reinforcement to the firm). In this way, it encourages a more comprehensive evaluation that considers corporate brand equity in its entirety, including its dimensions, rather than in product categories.

Managerial implications

Our validated Corporate Brand Equity (CBE) scale emerges as a potential way of measuring the intangible assets of corporate brands for managers and accountants, providing a nuanced view of their firm's brand performance through the lens of consumer perception. Such a perspective can contribute to informed decision-making, enabling registration in a company's annual report's management discussion and analysis section (Sinclair and Keller, 2017). By incorporating consumer insights into brand performance evaluation, managers can develop strategies more aligned with market needs and consumer expectations (Foxall, 2021). In the competitive analysis of industries, the CBE scale stands out as a dynamic instrument for benchmarking. It enables companies to conduct longitudinal monitoring of their brand equity, facilitating a comprehensive comparison with their competitors. These practical implications underscore the CBE scale's role as an auxiliary tool in marketing, offering robust solutions for corporate brand assessment and strategic development.

Limitations and future research

The scale addresses critical challenges in data collection (many corporate brands to be evaluated) and respondent engagement. By including options for respondents to indicate a lack of familiarity or inability to assess a company, the scale mitigates issues related to respondent fatigue and data accuracy. The enhancement ensures more reliable and comprehensive data collection and improves respondent engagement, enriching the insights gathered. The CBE scale validation process allows studies to investigate the relationship between CBE and financial (utilitarian) performance metrics such as profitability and company value. This exploration can extend to comparative analyses across different geographic regions and organizational types, including non-profits, thereby broadening the scope of brand equity research.

Footnote

[1] We had to eliminate trust and credibility because they did not adhere to corporate brand equity (assessing the company brand's performance). They are individual-centric reactions, which is not pertinent for CBE. They ultimately affect the consumer and lead to their behaviors, but the consumer does not evaluate these constructs to give feedback to the company. Furthermore, the reputation literature has generally accepted that these constructs are not part of the reputation construct but are their antecedents (Barros et al., 2020; Walsh et al., 2009).

Disclosure statement

The authors report that there are no competing interests to declare.

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