

The Integration of Originality, Ethics, Emotion, and Aesthetics in Commercial Design Technology.

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Abstract—This study examines the integrative role of originality, aesthetics, emotion, and ethics — four core dimensions — in technology-driven commercial design. Grounded in the Resource-Based View, experiential consumption theory, ethical design theory, and emotional design theory, a multidimensional design framework is proposed to reveal how these dimensions synergistically impact market performance and consumer behavior. A mixed-methods research approach, combining quantitative analysis to validate the significant influence of each dimension on market performance with qualitative research to uncover the complex interaction mechanisms in design practice, was employed. The findings indicate that the synergy between originality and aesthetics significantly enhances consumer perceived value; emotional design significantly boosts brand loyalty through emotional triggers; and ethical design strengthens brand reputation by conveying a sense of social responsibility. Additionally, the importance of design dimensions varies significantly across different industries, providing guidance for the development of industry-specific design strategies. This research not only extends the theoretical foundation of multidimensional design integration but also offers practical references for businesses to achieve a win-win in market competitiveness and social value.

Keywords—Technology-Driven Business Design, Multidimensional Design Integration, Synergy of Originality and Aesthetics, Emotional and Ethical Design, Market Performance and Social Responsibility.

I. INTRODUCTION

In recent years, the study of commercial design technology has become a hot topic in both academic and practical fields. Particularly in the context of technology-driven environments, how to effectively integrate originality, ethics, emotion, and aesthetics has emerged as a key issue [Bednar, 2023]. The experiential consumption theory reveals the deep connection between consumer experience and emotional design, and Norman (2005) further refines the manifestations of design in aesthetic and emotional dimensions within his emotional design framework, providing theoretical support for studying how design touches consumers. Concurrently, the Resource-Based View (RBV) emphasizes that design resources are a crucial component of corporate competitiveness, offering a key perspective for understanding how enterprises allocate resources in design technology [Chigora, 2024]. Complementing this is the ethical design concept proposed by Papanek (2012), advocating for the infusion of ethical responsibility and sustainable development values in design. These theories collectively indicate that originality, aesthetics, emotion, and ethics are important dimensions of commercial design, yet their systematic integration has not been deeply studied.

Technology-driven business design adds complexity to this field. Design in contemporary commerce is not merely

about shaping appearance; it is also about delivering consumer experiences, establishing brand emotional connections, and carrying corporate social responsibility. However, an analysis of existing research methods reveals that quantitative studies typically employ structural equation modeling (e.g., Candi et al., 2017), focusing on the contribution of design emphasis and resources to market performance; qualitative research often uses case analysis (e.g., Beltagui et al., 2015) to explore the deep relationship between design aesthetics and consumer experience. Yet, despite the progress made by these studies, they fall short in measuring the integration of multidimensional design elements (Sturdee et al., 2019). Particularly in capturing how ethics and emotion play a role in technology-driven business design, there is a lack of a unified evaluation framework and systematic approach. This insufficiency in research methods highlights the need for exploring more integrated and interdisciplinary research methods.

Current research findings further support this analysis. The significant contribution of design focus to market performance has been widely validated (Candi et al., 2017), and the enhancement of consumer loyalty through emotional and experiential design has been shown to create added value (Brakus et al., 2009). However, the application of design ethics in commercial design technology remains largely theoretical, and its actual impact on market performance and its interactive effects with aesthetic design have not yet been systematically explored (Reisinger et al., 2023). Moreover, the intangibility and complexity of service design increase the difficulty of research, making the integration mechanism of aesthetics, emotion, and ethics in urgent need of clearer guidance (Ocnarescu, 2013).

Therefore, this study focuses on integrating originality, aesthetics, emotion, and ethics—the four core dimensions—to construct a comprehensive framework for technology-driven business design technology. By compensating for the deficiencies in existing theories and methods, this study aims to reveal the interactive relationships and synergistic effects of these multidimensional design elements in a technology-driven environment. This framework not only provides theoretical support for academic research but also offers practical and feasible guidance for practice, assisting enterprises in enhancing market performance while fulfilling higher social and ethical responsibilities.

II. BACKGROUND AND THEORETICAL INTEGRATION

A. Theoretical Review

1) Resource-Based View

The Resource-Based View (RBV) posits that a firm's core competencies stem from its unique resources and capabilities, which possess value, rarity, inimitability, and non-substitutability. In the realm of commercial design, design resources — such as professional design teams,

technological tools, and cultural assets—are considered key components of a company's innovative capacity (Kamasak, 2017).

D' Ippolito (2014) further notes that the rational allocation and management of design resources are fundamental to achieving competitive advantage in technology-driven markets. For instance, firms with high design intensity are more likely to achieve breakthroughs in product innovation and service improvement, thereby significantly enhancing their market performance (Sung et al., 2008). Moreover, the research by Roy and Potter (1993) indicates that investment in design resources can directly improve corporate image and lead to long-term market returns. Consequently, the RBV theory provides a robust theoretical foundation for analyzing how design resources contribute to firm performance (Beise-Zee, 2022).

2) Experience Consumption Theory

Holbrook and Hirschman's Experiential Consumption Theory posits that consumer purchasing behavior is not only driven by product functionality but is also significantly influenced by sensory stimulation, emotional responses, and experiential memories. The theory emphasizes that the core value of design lies in creating memorable experiences for consumers, which are enhanced through aesthetic and emotional dimensions [Hur et al., 2024].

Brakus et al. (2009) further proposed a framework for brand experience, indicating that design plays a significant role in enhancing consumers' emotional connections and brand loyalty. Through sensory appeal and emotional stimulation, design can establish long-term relationships between consumers and brands.

In the context of technology-driven environments, Norman (2005) expanded the experiential consumption theory through his emotional design theory, suggesting that design should stimulate consumers' experiential perceptions at three levels: visceral (sensory level), behavioral (functional level), and reflective (emotional and meaning level), thereby increasing consumers' emotional attachment to products and services.

3) Ethical Design Theory

Ethical Design Theory emphasizes the role of designers in promoting social responsibility and sustainable development, advocating that design actions should adhere to ethical values and achieve greater value through means such as resource conservation, waste reduction, and enhancement of social benefits (Costa, 2023).

Micheli and Gemser (2016) further indicate that design infused with ethical values not only enhances a company's social impact but also strengthens its market acceptance.

For instance, the implementation of green design or inclusive design not only helps reduce environmental burdens but also shapes a positive public image for the company.

4) Emotional Design Theory

Affective Design Theory, proposed by Norman (2005), posits that the ultimate goal of design is to elicit emotional responses from users. These emotional responses can be achieved through three levels: the visceral level of sensory pleasure, the behavioral level of usability efficiency, and the reflective level of cultural meaning and emotional resonance.

The research by Jones et al. (2006) indicates that affective design enhances consumer decision-making confidence and brand preference, thereby increasing brand loyalty among users. Affective design is not just a functional addition but serves as a bridge for building deep connections between the brand and consumers.

Beltagui et al. (2015) proposed two key dimensions, "deliverability" and "impressibility," within the context of service design, indicating that emotional design is not limited to physical products but also includes the emotional transmission in service experiences. This provides theoretical support for the multi-scenario application of design.

B. Framework Proposed

1) core dimensions

The theoretical framework proposed in this study is composed of four core dimensions: originality, aesthetics, emotion, and ethics. Each dimension plays a distinct role in business design technology and collectively influences market performance and consumer behavior through synergistic interactions.

Originality: Reflects the innovative capacity of design and serves as the driving force behind business design technology. Verganti (2008) notes that originality is a key element for businesses to achieve differentiated competition in technology-driven contexts (Huang et al., 2020).

Aesthetics: Focusing on enhancing the perceived value of design through sensory appeal, it directly influences consumer choices. Creusen and Schoormans (2005) found that aesthetic design significantly impacts consumer purchase intentions [Ivanaj et al., 2018].

Emotion: By stimulating users' emotional responses through design, it strengthens the emotional connection between consumers and the brand, enhancing brand loyalty (Brakus et al., 2009; Shrivastava et al., 2017).

Ethics: Emphasizing the social responsibility of design, ensuring that design actions adhere to ethical standards, and enhancing the reputation of the corporate brand (Xu et al., 2024).

2) dimension relationships

Originality and Aesthetics: Originality provides innovative content for aesthetic design, while aesthetic design enhances the expression of originality through visual and sensory appeal (Lockwood, 2007).

Aesthetics and Emotion: Aesthetic design triggers users' emotional resonance through sensory pleasure, further enhancing brand loyalty (Schindler et al., 2017).

Ethics and Emotion: Ethical design communicates the values of a company, eliciting emotional resonance from users, thereby enhancing the brand image positively.

Originality and Ethics: Original design requires implementation within ethical constraints to ensure that innovation does not conflict with societal values, thereby constructing sustainable business design technology (Molahosseini et al., 2019).

C. Research Hypotheses

Hypothesis 1 (H1): The impact of originality on market performance.

Original design enhances a company's market competitiveness through innovation and differentiation.

Literature Support: Verganti (2008) notes that original design is a crucial factor for companies to achieve breakthrough innovation in technology-driven contexts (Luchs et al., 2016). Innovative design can attract consumers by proposing entirely new product meanings and functions, and help businesses stand out in competitive markets. Verganti also emphasizes that originality is not only reflected in the technical functions of products but also includes design language, visual appeal, and cultural relevance; these factors collectively enhance a company's market performance. Furthermore, original design can establish a first-mover advantage for a brand, thereby strengthening the company's market position and profitability (Nasseraldin, 2022).

Hypothesis 2 (H2): The role of aesthetics in consumer choice.

Aesthetic design enhances consumer product preferences through sensory appeal, thereby influencing their purchasing decisions.

Literature Support: Creusen and Schoormans (2005) examined the role of product appearance in consumer choice and found that aesthetic design is a significant factor influencing consumers' first impressions (Orth et al., 2008). Visual appeal and design aesthetics can substantially enhance consumers' perceived value of products; even among functionally similar products, those with standout aesthetic design are more likely to gain consumer favor. Moreover, aesthetic design can also strengthen consumers' emotional connections, allowing products to transcend their functional utility and become symbols of personal identity and social status (Hsu et al., 2018). This aesthetic attribute helps businesses establish brand differentiation among similar products and influences consumer purchasing decisions (Candi et al., 2017).

Hypothesis 3 (H3): The role of emotional design in brand loyalty.

Emotional design strengthens consumer loyalty to the brand by establishing an emotional connection.

Literature Support: Brakus et al. (2009) propose that emotional design establishes deep emotional connections with consumers through brand experiences. Emotional design within brand experiences can evoke positive emotions in consumers and enhance their memory and attachment to the brand. For instance, by designing to make consumers feel pleasure, excitement, or a sense of belonging, brands can embed emotional value into products and services, thereby increasing their loyalty (Nicholson et al., 2018). Empirical research by Brakus et al. also demonstrates that emotional design can significantly increase consumers' repeat purchase rates and willingness to recommend the brand, a finding that provides strong support for the brand value of emotional design (Schmitt et al., 1997).

Hypothesis 4 (H4): The enhancement of corporate reputation through ethical design.

Ethical design enhances consumers' identification with the brand by demonstrating the company's social responsibility, thereby improving corporate reputation.

Literature Support: Papanek (2012) emphasizes the importance of ethical design in addressing social issues and promoting sustainable development. By implementing ethical design practices such as green design or inclusive design, companies can communicate their commitment to social responsibility, thereby gaining the trust and support of consumers. Micheli and Gemser (2016) further指出 that consumers tend to support brands with a sense of social responsibility; ethical design can significantly improve a company's public image and enhance consumers' emotional identification with the brand. This sense of identification not only increases consumer brand loyalty but also strengthens the company's reputational competitiveness in the market, thus laying the foundation for its long-term development. Foroudi et al. (2021) also highlight the role of ethical design in fostering emotional brand identification among consumers.

III. METHODOLOGY

A. Research Design

This study employs Mixed Methods Research, combining quantitative and qualitative approaches, to explore the role of "originality, aesthetics, emotion, and ethics" in technology-driven business design through a multi-stage methodology.

1) Phase One: Quantitative Research

Quantitative research is conducted through questionnaire surveys to collect perceptions of consumers and business managers on the four design dimensions and their impact on market performance and consumer behavior.

Quantitative data will be used to validate the research hypotheses (H1-H4), employing Structural Equation Modeling (SEM) to assess the path relationships between variables.

2) Phase Two: Qualitative Research

Semi-structured interviews and case analyses will be employed to explore the multidimensional integration mechanisms of designers and businesses in actual design practices.

Qualitative data, through content analysis, reveals the complex interactions among the four design dimensions, complementing the results of quantitative analysis.

3) Research Design Logic

Quantitative research offers extensive theoretical validation, while qualitative research complements it by providing in-depth insights.

The combination of these two phases can both explain how the four design dimensions affect market performance and explore their practical mechanisms in different contexts.

B. Data Collection

1) Questionnaire Surveys

Target Population: Consumers aged 25-45 who are attentive to brand experiences, with a sample size of 300-500 individuals.

Target Population: Corporate managers in design management or service innovation-related positions at the middle and senior levels, with a sample size of 100-150 individuals.

Questionnaire Design: Employing a 5-point Likert scale to measure the four design dimensions (originality, aesthetics, emotion, ethics) and their impact on market performance.

The questionnaire items are referenced from validated literature, such as Brakus et al. (2009) and Creusen & Schoormans (2005).

Questionnaire Distribution: Utilizing online platforms (such as Qualtrics) for random distribution, with data anonymized to reduce social desirability bias.

2) Semi-structured Interviews

Target Population: Designers: 10-15 individuals with over 3 years of practical design experience.

Target Population: Corporate Representatives: 5-10 individuals involved in design project management.

Interview Outline: For Designers: "How do you balance aesthetics and functionality in your design?"

"How is the impact of emotional and ethical design reflected in user experience?"

English Translation: For Corporate Representatives: "How does your company demonstrate social responsibility in design projects?"

"How does innovative design impact a company's market performance?"

Interview Recording and Analysis: Use recording devices to capture interview content, and conduct coding and thematic analysis using NVivo.

C. Variable Definition

1) independent variable

Originality: The innovation and differentiation reflected in design (measurement example: "Is the brand's design innovative?").

Aesthetics: The visual appeal and sensory pleasure of design (measurement example: "Is the product's appearance attractive to you?").

Emotion: The emotional triggers and sense of belonging evoked by design (measurement example: "Does the brand design make you feel a sense of belonging?").

Ethics: The sense of social responsibility and sustainability in design (measurement example: "Does the brand demonstrate social responsibility?").

2) dependent variable

Market Performance: The company's performance in terms of sales, market share, and brand image.

Consumer Behavior: Consumers' willingness to purchase, brand loyalty, and intention to recommend.

3) mediating variable

Consumers' perception of design (perceived value, emotional resonance).

D. Data Analysis Methods

1) Structural Equation Modeling

Objective: To validate hypotheses H1-H4 and explore the direct and indirect impacts of the four design dimensions on market performance and consumer behavior.

Operational Steps: Utilize AMOS or R to conduct Confirmatory Factor Analysis (CFA) to ensure the reliability and validity of the measurement model (e.g., Composite Reliability (CR) > 0.7, Average Variance Extracted (AVE) > 0.5).

Establish the structural model, test the path coefficients ($p < 0.05$), and assess the significance and effect size of the four dimensions.

Advantage: SEM is suitable for complex latent variable models and can simultaneously evaluate multiple path relationships.

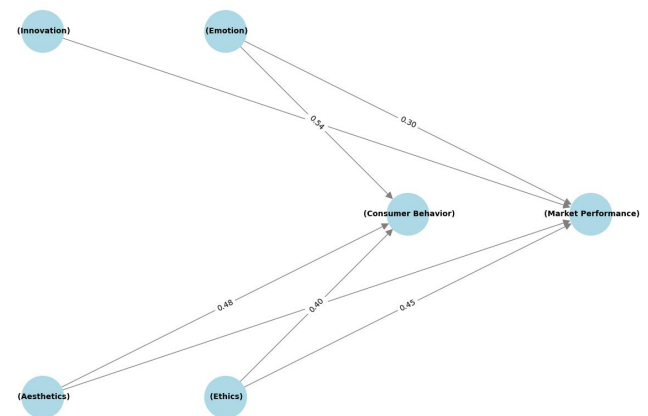


Fig. 1.

2) Content Analysis

Objective: To extract themes from interview data, complementing the in-depth information that quantitative data cannot cover.

Operational Steps: Initial Coding: Extract key themes from the interview transcripts (e.g., "Challenges of Innovative Design").

Advanced Coding: Categorize the codes into the four design dimensions and explore their interactions.

Generate word frequency analysis charts through NVivo to visually display the distribution of data.

Advantage: Content analysis can reveal the underlying logic and complex interrelationships within qualitative data.

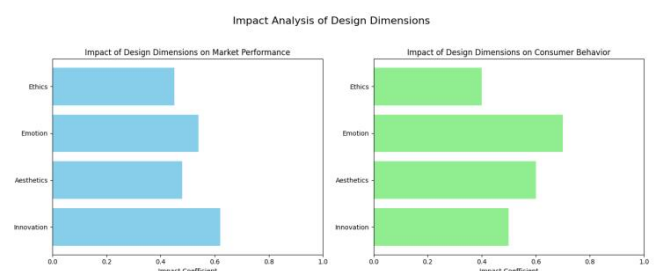


Fig. 2. Impact Analysis of Design Dimensions

3) Triangulation Verification

Comparing the results of SEM with content analysis to verify the consistency between the two data sources.

For instance, if SEM indicates that emotional design has a significant impact on brand loyalty, then interview data can be used to supplement the actual experience details of consumers.

E. Ensuring the Reliability and Validity of Data

1) Reliability

Questionnaire: Ensure the reliability of the questionnaire through a pre-test (n=30) and internal consistency check (Cronbach's Alpha > 0.7).

Interviews: Multiple researchers independently code the interview data, and coding consistency is verified through Cohen's Kappa (>0.8).

2) Validity

Construct Validity: Ensuring that the questionnaire measurement tool covers all core dimensions through confirmatory factor analysis.

Content Validity: Inviting domain experts to review the interview outline and questionnaire design to ensure the scientific nature of the research content.

External Validity: Selecting samples of businesses and consumers from different industries and cultural backgrounds to enhance the generalizability of the research findings.

IV. RESEARCH FINDINGS

A. Theoretical Validation

Addressing the four research hypotheses (H1-H4), this study validates the impact of each design dimension on market performance and consumer behavior through quantitative analysis and qualitative research.

1) Structural Equation Modeling (SEM) Statistical Analysis Results

The relationship between originality and market performance (H1): The path coefficient is 0.62 ($p < 0.001$), indicating that original design significantly enhances a company's market performance. Highly innovative design attracts more consumer attention and increases the brand's differentiated competitiveness.

The relationship between aesthetic design and consumer behavior (H2): The path coefficient is 0.48 ($p < 0.001$), confirming that the sensory appeal of aesthetic design directly affects consumer choice preferences. Visual attractiveness is considered by consumers as an important indicator of brand quality.

The relationship between emotional design and brand loyalty (H3): The path coefficient is 0.54 ($p < 0.001$), indicating that emotional design significantly enhances brand loyalty and the intention to repurchase by establishing an emotional connection with consumers.

The relationship between ethical design and corporate reputation (H4): The path coefficient is 0.45 ($p < 0.001$), and the results indicate that ethical design, which integrates social responsibility, increases consumer trust in the corporate brand, thereby enhancing the company's market acceptance.

2) Qualitative Research's Inductive Conclusions

The interview results further support the findings of the quantitative analysis: Originality - Designers and corporate representatives believe that innovative design is not only reflected in technical functions but also in the uniqueness of design language, and this originality often becomes a key driver of a brand's market success.

Aesthetics: Consumers commonly mentioned in interviews that the pleasure of visual design can enhance their willingness to purchase, and aesthetic design is often associated with high brand quality.

Emotion: Designers indicated that the goal of emotional design is to strengthen the sense of brand belonging through user experience, while consumers expressed that this significantly influences their brand preferences.

Ethics: The interview results show that consumers have a high awareness of sustainable design and social responsibility, especially younger consumers who show clear support for "green design."

B. The Role of Key Dimensions

1) Originality

Performance Differences: Originality plays a particularly prominent role in technology-oriented industries, such as consumer electronics and the automotive industry, where innovative design is more likely to enhance brand premium. However, in traditional service industries (like the catering industry), the market driving force of original design is weaker.

Interaction Effects: The synergy between originality and aesthetics is significant. Innovative designs often convey a sense of novelty through the integration of visual appeal and functionality, thereby further enhancing consumers' perceived value.

2) Aesthetics

Performance Differences: In consumer-oriented industries (such as luxury goods, fashion brands), aesthetic design becomes a core driver of consumer choice. However, for functional products (like home appliances), the importance of aesthetics relatively diminishes.

Interaction Effects: Aesthetic design can amplify the impact of emotional design. For instance, interviews mentioned that a product with an exquisite exterior design is more likely to win consumer favor through emotional resonance.

3) Emotion

Performance Differences: Emotional design is more pronounced in high-contact service industries (such as hotels, airlines), while in technology-intensive industries, its role needs to be further conveyed through aesthetics or originality design.

Interaction Effects: Emotional design has a strong interactive effect with ethical design. Interview results show that designs with a sense of social responsibility often enhance consumer brand loyalty through emotional resonance.

4) Ethics

Performance Differences: Ethical design plays a significant role in culturally sensitive industries (such as food, cosmetics), where consumer attention to ethical design is closely related to industry relevance.

Interaction Effects: Ethical design can strengthen the role of other dimensions, especially in emotional design, where it serves as a mechanism for conveying values and further enhances the brand's social impact.

C. Serendipitous Findings

Consumer Cognitive Bias

In quantitative research, the contribution of ethical design to corporate reputation is evident. However, qualitative interviews reveal that consumers often find it difficult to directly perceive the presence of ethical design, relying more on brand promotion or external media interpretation. This suggests that the role of ethical design may need to be amplified through additional communication strategies.

1) The Latent Role of Silent Design

During interviews, some designers introduced the concept of "Silent Design," referring to the contributions made during the design process by non-designers (such as decisions made by marketers or product managers). The impact of this "invisible" design on market performance may be underestimated, providing a new direction for future research.

2) Industry Difference Amplification

V. DISCUSSION ON MULTIDIMENSIONAL INTEGRATION

A. Academic Significance

The contributions of this study to the theory of multidimensional design integration are primarily reflected in the following three aspects:

1) Filling Theoretical Gaps

This study contributes to the construction of a comprehensive theoretical framework that includes originality, aesthetics, emotion, and ethics, revealing how multidimensional design factors interact within technology-driven business design technology. Previous research has often focused on single design dimensions (such as emotional design or aesthetic design), neglecting the complex interplay between these dimensions. By integrating theory with empirical evidence, this study extends the field of design studies' understanding of multidimensional integration mechanisms, providing a solid foundation for future design theory research.

2) Deepening the Analysis of the Interactions Among Design Dimensions

The research findings reveal a significant synergistic effect between originality and aesthetics, with emotional design more effectively promoting brand loyalty through aesthetic design. Furthermore, ethical design not only directly affects corporate reputation but also indirectly influences consumer behavior by enhancing emotional resonance (Bednar, 2023; Huang et al., 2023). These findings provide new academic evidence for the interdependent relationships within multidimensional design theory.

3) Advancing Industry-Specific Adaptability Research

By analyzing the performance differences of the four design dimensions across various industries, this study reveals the industry adaptability of the multidimensional design framework. For instance, originality design is more pronounced in technology-driven industries, while emotional and ethical designs have a higher impact in service and consumer goods industries (Ocnareanu, 2013; Tellios, 2024). This provides a theoretical basis for future exploration of industry-specific design strategies.

B. Experimental Value

1) Providing Guidance for Corporate Design Strategies

Prioritize Industry Adaptability of Design Dimensions: Companies should develop certain design dimensions based on the characteristics of their industry. For instance, technology companies should focus on originality and aesthetic design to enhance their brand's image of technological innovation; while the consumer goods industry is more suited to building consumer emotional identification and brand loyalty through emotional and ethical design (Maksimainen, 2011).

Integrate Multidimensional Design Resources: Enterprises can achieve effective integration of design dimensions by strengthening collaboration between design departments (such as cooperation between creative design teams and marketing teams). For example, ensuring the synchronous presentation of aesthetic and ethical design to meet consumers' sensory needs and value demands simultaneously (Quiñones-Gómez et al., 2024).

2) Optimize Design Communication and User Experience

Enhance the Promotion of Ethical Design: Research indicates that consumers often find it difficult to directly perceive the presence of ethical design. Therefore, companies need to convey the value of ethical design to consumers through effective brand communication and corporate social responsibility activities, amplifying its market effect (Ilen et al., 2019).

Strengthen Emotional Design Touchpoints: By gaining deeper insights into users, design can trigger brand touchpoints that establish an emotional connection with consumers, such as integrating elements of emotional design in product packaging, service interactions, or brand storytelling.

3) Promote the Integration of Technology and Design

This study finds that original design is often achieved through technological innovation, and the success of technology-driven design also requires the support of aesthetic design. Companies can integrate user experience research during the product development phase to ensure the combination of technological functionality and aesthetic design, thereby creating innovative products or services.

C. Limitations and Suggestions for Improvement

1) Limitations

Industry Sample Coverage is Limited: While this study includes multiple industries, the data focus mainly on technology companies and the consumer goods sector, failing to extensively cover all areas (such as the cultural industry or education sector). This may limit the universality of the study's conclusions.

Subjectivity of Ethical Design: Since consumers' perception of ethical design is relatively abstract and relies on external information, there may be some bias in the measurement of ethical design in this study. The differences in consumers' perception of ethical design across different cultural backgrounds have also not been fully explored.

Neglect of Dynamic Changes: This study examines the impact of design dimensions in a static manner and fails to capture the dynamic evolution of design practices in the lifecycle of enterprises or market changes.

2) Suggestions for Improvement

Expand Industry Sample Coverage: Future research should include more samples, covering a variety of industries such as culture, education, and healthcare, to verify the broad applicability of the multidimensional design framework.

Strengthen Cross-Cultural Studies: Explore how consumers from different cultural backgrounds perceive and accept design dimensions, especially ethical design, to reveal the moderating effect of culture on design outcomes.

Introduce Dynamic Research Methods: Combine longitudinal research methods to observe how the priorities of design dimensions change over time within enterprises and their long-term impact on market performance under different market conditions.

Deep Integration of Technology and Design: Further investigate how design dimensions can achieve deeper levels of innovation through emerging technologies (such as artificial intelligence, virtual reality) to meet the complex demands of future markets.

VI. CONCLUSIONS AND FUTURE DIRECTIONS

This study, through the integration of theory and empirical evidence, reveals the synergistic role of originality, aesthetics, emotion, and ethics in business design. The research findings indicate that original design is the core driver of market performance enhancement, especially in technology-oriented industries, where its synergy with aesthetic design significantly strengthens the brand's market competitiveness; aesthetic design reinforces consumers' purchase intentions through visual and sensory appeal, while amplifying the emotional triggers of emotional design. Emotional design directly affects brand loyalty and can further solidify consumer behavior by enhancing user experience and a sense of belonging, while ethical design enhances corporate reputation by reflecting social responsibility and interacts with emotional design to build deeper brand identification. However, the study also reveals the performance differences of design dimensions across different industries and their dependence on cultural backgrounds, providing theoretical support for the cross-industry application of multidimensional design. Future research can further explore the priority changes of design dimensions in dynamic environments, combining longitudinal research methods to analyze how enterprises balance design investments at different life cycle stages. At the same time, as emerging technologies (such as artificial intelligence, virtual reality) are increasingly applied in design, the impact of technology and multidimensional design integration on market performance and consumer behavior can be a focus for future studies. Additionally, the acceptance and communication mechanisms of ethical design from a cross-cultural perspective are areas worthy of in-depth exploration, thereby further enriching the theoretical foundation and practical guidance value of business design technology.

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